



ANT 0								
GSM850 TX Channel	Burst Average Power (dBm)			Tune-up Limit (dBm)	Frame-Average Power (dBm)			Tune-up Limit (dBm)
	128	189	251		128	189	251	
Frequency (MHz)	824.2	836.4	848.8		824.2	836.4	848.8	
GSM 1 Tx slot	32.10	32.25	32.02	33.50	23.10	23.25	23.02	24.50
GPRS 1 Tx slot	32.18	32.28	32.15	33.50	23.18	23.28	23.15	24.50
GPRS 2 Tx slots	31.20	31.18	30.87	32.50	25.20	25.18	24.87	26.50
GPRS 3 Tx slots	28.97	29.28	28.98	30.50	24.71	25.02	24.72	26.24
GPRS 4 Tx slots	27.94	27.99	28.06	29.50	24.94	24.99	25.06	26.50
EDGE 1 Tx slot	25.98	26.19	25.98	27.50	16.98	17.19	16.98	18.50
EDGE 2 Tx slots	25.60	25.76	25.54	27.00	19.60	19.76	19.54	21.00
EDGE 3 Tx slots	23.63	23.68	23.65	25.00	19.37	19.42	19.39	20.74
EDGE 4 Tx slots	21.88	21.83	21.92	23.00	18.88	18.83	18.92	20.00

ANT 2								
GSM1900 TX Channel	Burst Average Power (dBm)			Tune-up Limit (dBm)	Frame-Average Power (dBm)			Tune-up Limit (dBm)
	512	661	810		512	661	810	
Frequency (MHz)	1850.2	1880	1909.8		1850.2	1880	1909.8	
GSM 1 Tx slot	29.19	29.21	29.08	30.50	20.19	20.21	20.08	21.50
GPRS 1 Tx slot	29.44	29.44	29.43	30.50	20.44	20.44	20.43	21.50
GPRS 2 Tx slots	28.58	28.71	28.64	29.70	22.58	22.71	22.64	23.70
GPRS 3 Tx slots	26.80	26.82	27.18	28.00	22.54	22.56	22.92	23.74
GPRS 4 Tx slots	25.72	25.65	25.20	27.00	22.72	22.65	22.20	24.00
EDGE 1 Tx slot	25.41	25.62	25.41	26.50	16.41	16.62	16.41	17.50
EDGE 2 Tx slots	24.95	25.11	24.60	26.00	18.95	19.11	18.60	20.00
EDGE 3 Tx slots	24.02	24.10	23.41	25.00	19.76	19.84	19.15	20.74
EDGE 4 Tx slots	23.05	22.99	22.67	24.00	20.05	19.99	19.67	21.00



ANT 1								
GSM850 TX Channel	Burst Average Power (dBm)			Tune-up Limit (dBm)	Frame-Average Power (dBm)			Tune-up Limit (dBm)
	128	189	251		128	189	251	
Frequency (MHz)	824.2	836.4	848.8		824.2	836.4	848.8	
GSM 1 Tx slot	32.25	32.38	32.23	33.50	23.25	23.38	23.23	24.50
GPRS 1 Tx slot	32.28	32.45	32.23	33.50	23.28	23.45	23.23	24.50
GPRS 2 Tx slots	31.35	31.44	31.11	32.50	25.35	25.44	25.11	26.50
GPRS 3 Tx slots	29.24	29.26	29.00	30.50	24.98	25.00	24.74	26.24
GPRS 4 Tx slots	28.28	27.81	27.52	29.50	25.28	24.81	24.52	26.50
EDGE 1 Tx slot	26.24	26.35	26.25	27.50	17.24	17.35	17.25	18.50
EDGE 2 Tx slots	25.55	25.78	25.75	27.00	19.55	19.78	19.75	21.00
EDGE 3 Tx slots	23.66	23.94	23.74	25.00	19.40	19.68	19.48	20.74
EDGE 4 Tx slots	21.79	22.05	21.77	23.00	18.79	19.05	18.77	20.00

ANT 0								
GSM1900 TX Channel	Burst Average Power (dBm)			Tune-up Limit (dBm)	Frame-Average Power (dBm)			Tune-up Limit (dBm)
	512	661	810		512	661	810	
Frequency (MHz)	1850.2	1880	1909.8		1850.2	1880	1909.8	
GSM 1 Tx slot	28.91	29.20	28.75	30.00	19.91	20.20	19.75	21.00
GPRS 1 Tx slot	29.00	29.20	28.78	30.00	20.00	20.20	19.78	21.00
GPRS 2 Tx slots	28.15	28.23	28.06	29.20	22.15	22.23	22.06	23.20
GPRS 3 Tx slots	26.75	26.67	26.47	27.50	22.49	22.41	22.21	23.24
GPRS 4 Tx slots	25.23	25.39	24.55	26.50	22.23	22.39	21.55	23.50
EDGE 1 Tx slot	25.47	25.38	24.94	26.00	16.47	16.38	15.94	17.00
EDGE 2 Tx slots	24.64	24.61	24.18	25.50	18.64	18.61	18.18	19.50
EDGE 3 Tx slots	23.67	23.39	22.85	24.50	19.41	19.13	18.59	20.24
EDGE 4 Tx slots	22.47	22.30	21.50	23.50	19.47	19.30	18.50	20.50



ANT 0								
GSM850 TX Channel	Burst Average Power (dBm)			Tune-up Limit (dBm)	Frame-Average Power (dBm)			Tune-up Limit (dBm)
	128	189	251		128	189	251	
Frequency (MHz)	824.2	836.4	848.8		824.2	836.4	848.8	
GSM 1 Tx slot	32.10	32.25	32.02	33.50	23.10	23.25	23.02	24.50
GPRS 1 Tx slot	32.18	32.28	32.15	33.50	23.18	23.28	23.15	24.50
GPRS 2 Tx slots	31.20	31.18	30.87	32.50	25.20	25.18	24.87	26.50
GPRS 3 Tx slots	28.97	29.28	28.98	30.50	24.71	25.02	24.72	26.24
GPRS 4 Tx slots	27.94	27.99	28.06	29.50	24.94	24.99	25.06	26.50
EDGE 1 Tx slot	25.98	26.19	25.98	27.50	16.98	17.19	16.98	18.50
EDGE 2 Tx slots	25.60	25.76	25.54	27.00	19.60	19.76	19.54	21.00
EDGE 3 Tx slots	23.63	23.68	23.65	25.00	19.37	19.42	19.39	20.74
EDGE 4 Tx slots	21.88	21.83	21.92	23.00	18.88	18.83	18.92	20.00

ANT 2								
GSM1900 TX Channel	Burst Average Power (dBm)			Tune-up Limit (dBm)	Frame-Average Power (dBm)			Tune-up Limit (dBm)
	512	661	810		512	661	810	
Frequency (MHz)	1850.2	1880	1909.8		1850.2	1880	1909.8	
GSM 1 Tx slot	29.19	29.21	29.08	30.50	20.19	20.21	20.08	21.50
GPRS 1 Tx slot	29.44	29.44	29.43	30.50	20.44	20.44	20.43	21.50
GPRS 2 Tx slots	28.58	28.71	28.64	29.70	22.58	22.71	22.64	23.70
GPRS 3 Tx slots	26.80	26.82	27.18	28.00	22.54	22.56	22.92	23.74
GPRS 4 Tx slots	25.72	25.65	25.20	27.00	22.72	22.65	22.20	24.00
EDGE 1 Tx slot	25.41	25.62	25.41	26.50	16.41	16.62	16.41	17.50
EDGE 2 Tx slots	24.95	25.11	24.60	26.00	18.95	19.11	18.60	20.00
EDGE 3 Tx slots	24.02	24.10	23.41	25.00	19.76	19.84	19.15	20.74
EDGE 4 Tx slots	23.05	22.99	22.67	24.00	20.05	19.99	19.67	21.00



ANT 1								
GSM850 TX Channel	Burst Average Power (dBm)			Tune-up Limit (dBm)	Frame-Average Power (dBm)			Tune-up Limit (dBm)
	128	189	251		128	189	251	
Frequency (MHz)	824.2	836.4	848.8		824.2	836.4	848.8	
GSM 1 Tx slot	32.08	32.20	31.50	33.50	23.08	23.20	22.50	24.50
GPRS 1 Tx slot	32.09	32.22	32.30	33.50	23.09	23.22	23.30	24.50
GPRS 2 Tx slots	29.75	29.60	29.49	31.00	23.75	23.60	23.49	25.00
GPRS 3 Tx slots	27.90	27.84	27.64	29.00	23.64	23.58	23.38	24.74
GPRS 4 Tx slots	26.16	26.21	26.03	28.00	23.16	23.21	23.03	25.00
EDGE 1 Tx slot	26.15	26.23	26.10	27.50	17.15	17.23	17.10	18.50
EDGE 2 Tx slots	25.56	25.79	25.62	27.00	19.56	19.79	19.62	21.00
EDGE 3 Tx slots	23.81	23.90	23.81	25.00	19.55	19.64	19.55	20.74
EDGE 4 Tx slots	21.69	21.78	21.59	23.00	18.69	18.78	18.59	20.00

ANT 0								
GSM1900 TX Channel	Burst Average Power (dBm)			Tune-up Limit (dBm)	Frame-Average Power (dBm)			Tune-up Limit (dBm)
	512	661	810		512	661	810	
Frequency (MHz)	1850.2	1880	1909.8		1850.2	1880	1909.8	
GSM 1 Tx slot	28.91	29.20	28.75	30.00	19.91	20.20	19.75	21.00
GPRS 1 Tx slot	29.00	29.20	28.78	30.00	20.00	20.20	19.78	21.00
GPRS 2 Tx slots	28.15	28.23	28.06	29.20	22.15	22.23	22.06	23.20
GPRS 3 Tx slots	26.75	26.67	26.47	27.50	22.49	22.41	22.21	23.24
GPRS 4 Tx slots	25.23	25.39	24.55	26.50	22.23	22.39	21.55	23.50
EDGE 1 Tx slot	25.47	25.38	24.94	26.00	16.47	16.38	15.94	17.00
EDGE 2 Tx slots	24.64	24.61	24.18	25.50	18.64	18.61	18.18	19.50
EDGE 3 Tx slots	23.67	23.39	22.85	24.50	19.41	19.13	18.59	20.24
EDGE 4 Tx slots	22.47	22.30	21.50	23.50	19.47	19.30	18.50	20.50



ANT 0								
GSM850 TX Channel	Burst Average Power (dBm)			Tune-up Limit (dBm)	Frame-Average Power (dBm)			Tune-up Limit (dBm)
	128	189	251		128	189	251	
Frequency (MHz)	824.2	836.4	848.8		824.2	836.4	848.8	
GSM 1 Tx slot	32.10	32.25	32.02	33.50	23.10	23.25	23.02	24.50
GPRS 1 Tx slot	32.18	32.28	32.15	33.50	23.18	23.28	23.15	24.50
GPRS 2 Tx slots	31.20	31.18	30.87	32.50	25.20	25.18	24.87	26.50
GPRS 3 Tx slots	28.97	29.28	28.98	30.50	24.71	25.02	24.72	26.24
GPRS 4 Tx slots	27.94	27.99	28.06	29.50	24.94	24.99	25.06	26.50
EDGE 1 Tx slot	25.98	26.19	25.98	27.50	16.98	17.19	16.98	18.50
EDGE 2 Tx slots	25.60	25.76	25.54	27.00	19.60	19.76	19.54	21.00
EDGE 3 Tx slots	23.63	23.68	23.65	25.00	19.37	19.42	19.39	20.74
EDGE 4 Tx slots	21.88	21.83	21.92	23.00	18.88	18.83	18.92	20.00

ANT 2								
GSM1900 TX Channel	Burst Average Power (dBm)			Tune-up Limit (dBm)	Frame-Average Power (dBm)			Tune-up Limit (dBm)
	512	661	810		512	661	810	
Frequency (MHz)	1850.2	1880	1909.8		1850.2	1880	1909.8	
GSM 1 Tx slot	29.19	29.21	29.08	30.50	20.19	20.21	20.08	21.50
GPRS 1 Tx slot	29.44	29.44	29.43	30.50	20.44	20.44	20.43	21.50
GPRS 2 Tx slots	28.58	28.71	28.64	29.70	22.58	22.71	22.64	23.70
GPRS 3 Tx slots	26.80	26.82	27.18	28.00	22.54	22.56	22.92	23.74
GPRS 4 Tx slots	25.72	25.65	25.20	27.00	22.72	22.65	22.20	24.00
EDGE 1 Tx slot	25.41	25.62	25.41	26.50	16.41	16.62	16.41	17.50
EDGE 2 Tx slots	24.95	25.11	24.60	26.00	18.95	19.11	18.60	20.00
EDGE 3 Tx slots	24.02	24.10	23.41	25.00	19.76	19.84	19.15	20.74
EDGE 4 Tx slots	23.05	22.99	22.67	24.00	20.05	19.99	19.67	21.00



ANT 1								
GSM850 TX Channel	Burst Average Power (dBm)			Tune-up Limit (dBm)	Frame-Average Power (dBm)			Tune-up Limit (dBm)
	128	189	251		128	189	251	
Frequency (MHz)	824.2	836.4	848.8		824.2	836.4	848.8	
GSM 1 Tx slot	32.25	32.38	32.23	33.50	23.25	23.38	23.23	24.50
GPRS 1 Tx slot	32.28	32.45	32.23	33.50	23.28	23.45	23.23	24.50
GPRS 2 Tx slots	31.35	31.44	31.11	32.50	25.35	25.44	25.11	26.50
GPRS 3 Tx slots	29.24	29.26	29.00	30.50	24.98	25.00	24.74	26.24
GPRS 4 Tx slots	28.28	27.81	27.52	29.50	25.28	24.81	24.52	26.50
EDGE 1 Tx slot	26.24	26.35	26.25	27.50	17.24	17.35	17.25	18.50
EDGE 2 Tx slots	25.55	25.78	25.75	27.00	19.55	19.78	19.75	21.00
EDGE 3 Tx slots	23.66	23.94	23.74	25.00	19.40	19.68	19.48	20.74
EDGE 4 Tx slots	21.79	22.05	21.77	23.00	18.79	19.05	18.77	20.00

ANT 0								
GSM1900 TX Channel	Burst Average Power (dBm)			Tune-up Limit (dBm)	Frame-Average Power (dBm)			Tune-up Limit (dBm)
	512	661	810		512	661	810	
Frequency (MHz)	1850.2	1880	1909.8		1850.2	1880	1909.8	
GSM 1 Tx slot	27.90	28.11	27.72	29.20	18.90	19.11	18.72	20.20
GPRS 1 Tx slot	27.92	28.12	27.75	29.20	18.92	19.12	18.75	20.20
GPRS 2 Tx slots	24.76	24.84	24.61	26.20	18.76	18.84	18.61	20.20
GPRS 3 Tx slots	23.09	23.11	22.66	24.40	18.83	18.85	18.40	20.14
GPRS 4 Tx slots	21.81	21.82	21.65	23.20	18.81	18.82	18.65	20.20
EDGE 1 Tx slot	25.33	25.18	24.78	26.00	16.33	16.18	15.78	17.00
EDGE 2 Tx slots	24.49	24.61	24.21	25.50	18.49	18.61	18.21	19.50
EDGE 3 Tx slots	22.38	22.96	22.14	24.10	18.12	18.70	17.88	19.84
EDGE 4 Tx slots	21.59	21.85	20.40	22.40	18.59	18.85	17.40	19.40



ANT 0								
GSM850 TX Channel	Burst Average Power (dBm)			Tune-up Limit (dBm)	Frame-Average Power (dBm)			Tune-up Limit (dBm)
	128	189	251		128	189	251	
Frequency (MHz)	824.2	836.4	848.8		824.2	836.4	848.8	
GSM 1 Tx slot	32.10	32.25	32.02	33.50	23.10	23.25	23.02	24.50
GPRS 1 Tx slot	32.18	32.28	32.15	33.50	23.18	23.28	23.15	24.50
GPRS 2 Tx slots	31.20	31.18	30.87	32.50	25.20	25.18	24.87	26.50
GPRS 3 Tx slots	28.97	29.28	28.98	30.50	24.71	25.02	24.72	26.24
GPRS 4 Tx slots	27.94	27.99	28.06	29.50	24.94	24.99	25.06	26.50
EDGE 1 Tx slot	25.98	26.19	25.98	27.50	16.98	17.19	16.98	18.50
EDGE 2 Tx slots	25.60	25.76	25.54	27.00	19.60	19.76	19.54	21.00
EDGE 3 Tx slots	23.63	23.68	23.65	25.00	19.37	19.42	19.39	20.74
EDGE 4 Tx slots	21.88	21.83	21.92	23.00	18.88	18.83	18.92	20.00

ANT 2								
GSM1900 TX Channel	Burst Average Power (dBm)			Tune-up Limit (dBm)	Frame-Average Power (dBm)			Tune-up Limit (dBm)
	512	661	810		512	661	810	
Frequency (MHz)	1850.2	1880	1909.8		1850.2	1880	1909.8	
GSM 1 Tx slot	29.19	29.21	29.08	30.50	20.19	20.21	20.08	21.50
GPRS 1 Tx slot	29.44	29.44	29.43	30.50	20.44	20.44	20.43	21.50
GPRS 2 Tx slots	28.58	28.71	28.64	29.70	22.58	22.71	22.64	23.70
GPRS 3 Tx slots	26.80	26.82	27.18	28.00	22.54	22.56	22.92	23.74
GPRS 4 Tx slots	25.72	25.65	25.20	27.00	22.72	22.65	22.20	24.00
EDGE 1 Tx slot	25.41	25.62	25.41	26.50	16.41	16.62	16.41	17.50
EDGE 2 Tx slots	24.95	25.11	24.60	26.00	18.95	19.11	18.60	20.00
EDGE 3 Tx slots	24.02	24.10	23.41	25.00	19.76	19.84	19.15	20.74
EDGE 4 Tx slots	23.05	22.99	22.67	24.00	20.05	19.99	19.67	21.00



ANT 1								
GSM850 TX Channel	Burst Average Power (dBm)			Tune-up Limit (dBm)	Frame-Average Power (dBm)			Tune-up Limit (dBm)
	128	189	251		128	189	251	
Frequency (MHz)	824.2	836.4	848.8		824.2	836.4	848.8	
GSM 1 Tx slot	32.25	32.38	32.23	33.50	23.25	23.38	23.23	24.50
GPRS 1 Tx slot	32.28	32.45	32.23	33.50	23.28	23.45	23.23	24.50
GPRS 2 Tx slots	31.35	31.44	31.11	32.50	25.35	25.44	25.11	26.50
GPRS 3 Tx slots	29.24	29.26	29.00	30.50	24.98	25.00	24.74	26.24
GPRS 4 Tx slots	28.28	27.81	27.52	29.50	25.28	24.81	24.52	26.50
EDGE 1 Tx slot	26.24	26.35	26.25	27.50	17.24	17.35	17.25	18.50
EDGE 2 Tx slots	25.55	25.78	25.75	27.00	19.55	19.78	19.75	21.00
EDGE 3 Tx slots	23.66	23.94	23.74	25.00	19.40	19.68	19.48	20.74
EDGE 4 Tx slots	21.79	22.05	21.77	23.00	18.79	19.05	18.77	20.00

ANT 0								
GSM1900 TX Channel	Burst Average Power (dBm)			Tune-up Limit (dBm)	Frame-Average Power (dBm)			Tune-up Limit (dBm)
	512	661	810		512	661	810	
Frequency (MHz)	1850.2	1880	1909.8		1850.2	1880	1909.8	
GSM 1 Tx slot	27.11	27.23	26.96	28.40	18.11	18.23	17.96	19.40
GPRS 1 Tx slot	27.16	27.31	26.96	28.40	18.16	18.31	17.96	19.40
GPRS 2 Tx slots	24.05	24.24	23.76	25.40	18.05	18.24	17.76	19.40
GPRS 3 Tx slots	22.27	22.30	21.97	23.60	18.01	18.04	17.71	19.34
GPRS 4 Tx slots	21.12	21.19	21.05	22.40	18.12	18.19	18.05	19.40
EDGE 1 Tx slot	25.29	25.29	24.92	26.00	16.29	16.29	15.92	17.00
EDGE 2 Tx slots	23.95	24.05	23.54	25.30	17.95	18.05	17.54	19.30
EDGE 3 Tx slots	22.25	22.12	21.73	23.50	17.99	17.86	17.47	19.24
EDGE 4 Tx slots	20.65	20.80	19.74	21.70	17.65	17.80	16.74	18.70



ANT 0								
GSM850 TX Channel	Burst Average Power (dBm)			Tune-up Limit (dBm)	Frame-Average Power (dBm)			Tune-up Limit (dBm)
	128	189	251		128	189	251	
Frequency (MHz)	824.2	836.4	848.8		824.2	836.4	848.8	
GSM 1 Tx slot	32.10	32.25	32.02	33.50	23.10	23.25	23.02	24.50
GPRS 1 Tx slot	32.18	32.28	32.15	33.50	23.18	23.28	23.15	24.50
GPRS 2 Tx slots	31.20	31.18	30.87	32.50	25.20	25.18	24.87	26.50
GPRS 3 Tx slots	28.97	29.28	28.98	30.50	24.71	25.02	24.72	26.24
GPRS 4 Tx slots	27.94	27.99	28.06	29.50	24.94	24.99	25.06	26.50
EDGE 1 Tx slot	25.98	26.19	25.98	27.50	16.98	17.19	16.98	18.50
EDGE 2 Tx slots	25.60	25.76	25.54	27.00	19.60	19.76	19.54	21.00
EDGE 3 Tx slots	23.63	23.68	23.65	25.00	19.37	19.42	19.39	20.74
EDGE 4 Tx slots	21.88	21.83	21.92	23.00	18.88	18.83	18.92	20.00

ANT 2								
GSM1900 TX Channel	Burst Average Power (dBm)			Tune-up Limit (dBm)	Frame-Average Power (dBm)			Tune-up Limit (dBm)
	512	661	810		512	661	810	
Frequency (MHz)	1850.2	1880	1909.8		1850.2	1880	1909.8	
GSM 1 Tx slot	29.19	29.21	29.08	30.50	20.19	20.21	20.08	21.50
GPRS 1 Tx slot	29.44	29.44	29.43	30.50	20.44	20.44	20.43	21.50
GPRS 2 Tx slots	28.58	28.71	28.64	29.70	22.58	22.71	22.64	23.70
GPRS 3 Tx slots	26.80	26.82	27.18	28.00	22.54	22.56	22.92	23.74
GPRS 4 Tx slots	25.72	25.65	25.20	27.00	22.72	22.65	22.20	24.00
EDGE 1 Tx slot	25.41	25.62	25.41	26.50	16.41	16.62	16.41	17.50
EDGE 2 Tx slots	24.95	25.11	24.60	26.00	18.95	19.11	18.60	20.00
EDGE 3 Tx slots	24.02	24.10	23.41	25.00	19.76	19.84	19.15	20.74
EDGE 4 Tx slots	23.05	22.99	22.67	24.00	20.05	19.99	19.67	21.00



ANT 1								
GSM850 TX Channel	Burst Average Power (dBm)			Tune-up Limit (dBm)	Frame-Average Power (dBm)			Tune-up Limit (dBm)
	128	189	251		128	189	251	
Frequency (MHz)	824.2	836.4	848.8		824.2	836.4	848.8	
GSM 1 Tx slot	31.88	32.06	31.81	33.00	22.88	23.06	22.81	24.00
GPRS 1 Tx slot	31.90	32.09	31.85	33.00	22.90	23.09	22.85	24.00
GPRS 2 Tx slots	28.79	28.90	28.65	30.00	22.79	22.90	22.65	24.00
GPRS 3 Tx slots	26.99	26.94	26.85	28.30	22.73	22.68	22.59	24.04
GPRS 4 Tx slots	25.86	25.68	25.49	27.20	22.86	22.68	22.49	24.20
EDGE 1 Tx slot	26.21	26.23	26.01	27.50	17.21	17.23	17.01	18.50
EDGE 2 Tx slots	25.46	25.71	25.53	27.00	19.46	19.71	19.53	21.00
EDGE 3 Tx slots	23.78	23.87	23.69	25.00	19.52	19.61	19.43	20.74
EDGE 4 Tx slots	21.71	21.89	21.66	23.00	18.71	18.89	18.66	20.00

ANT 0								
GSM1900 TX Channel	Burst Average Power (dBm)			Tune-up Limit (dBm)	Frame-Average Power (dBm)			Tune-up Limit (dBm)
	512	661	810		512	661	810	
Frequency (MHz)	1850.2	1880	1909.8		1850.2	1880	1909.8	
GSM 1 Tx slot	28.91	29.20	28.75	30.00	19.91	20.20	19.75	21.00
GPRS 1 Tx slot	29.00	29.20	28.78	30.00	20.00	20.20	19.78	21.00
GPRS 2 Tx slots	28.15	28.23	28.06	29.20	22.15	22.23	22.06	23.20
GPRS 3 Tx slots	26.75	26.67	26.47	27.50	22.49	22.41	22.21	23.24
GPRS 4 Tx slots	25.23	25.39	24.55	26.50	22.23	22.39	21.55	23.50
EDGE 1 Tx slot	25.47	25.38	24.94	26.00	16.47	16.38	15.94	17.00
EDGE 2 Tx slots	24.64	24.61	24.18	25.50	18.64	18.61	18.18	19.50
EDGE 3 Tx slots	23.67	23.39	22.85	24.50	19.41	19.13	18.59	20.24
EDGE 4 Tx slots	22.47	22.30	21.50	23.50	19.47	19.30	18.50	20.50



ANT 0								
GSM850 TX Channel	Burst Average Power (dBm)			Tune-up Limit (dBm)	Frame-Average Power (dBm)			Tune-up Limit (dBm)
	128	189	251		128	189	251	
Frequency (MHz)	824.2	836.4	848.8		824.2	836.4	848.8	
GSM 1 Tx slot	32.10	32.25	32.02	33.50	23.10	23.25	23.02	24.50
GPRS 1 Tx slot	32.18	32.28	32.15	33.50	23.18	23.28	23.15	24.50
GPRS 2 Tx slots	31.20	31.18	30.87	32.50	25.20	25.18	24.87	26.50
GPRS 3 Tx slots	28.97	29.28	28.98	30.50	24.71	25.02	24.72	26.24
GPRS 4 Tx slots	27.94	27.99	28.06	29.50	24.94	24.99	25.06	26.50
EDGE 1 Tx slot	25.98	26.19	25.98	27.50	16.98	17.19	16.98	18.50
EDGE 2 Tx slots	25.60	25.76	25.54	27.00	19.60	19.76	19.54	21.00
EDGE 3 Tx slots	23.63	23.68	23.65	25.00	19.37	19.42	19.39	20.74
EDGE 4 Tx slots	21.88	21.83	21.92	23.00	18.88	18.83	18.92	20.00

ANT 2								
GSM1900 TX Channel	Burst Average Power (dBm)			Tune-up Limit (dBm)	Frame-Average Power (dBm)			Tune-up Limit (dBm)
	512	661	810		512	661	810	
Frequency (MHz)	1850.2	1880	1909.8		1850.2	1880	1909.8	
GSM 1 Tx slot	29.19	29.21	29.08	30.50	20.19	20.21	20.08	21.50
GPRS 1 Tx slot	29.44	29.44	29.43	30.50	20.44	20.44	20.43	21.50
GPRS 2 Tx slots	28.58	28.71	28.64	29.70	22.58	22.71	22.64	23.70
GPRS 3 Tx slots	26.80	26.82	27.18	28.00	22.54	22.56	22.92	23.74
GPRS 4 Tx slots	25.72	25.65	25.20	27.00	22.72	22.65	22.20	24.00
EDGE 1 Tx slot	25.41	25.62	25.41	26.50	16.41	16.62	16.41	17.50
EDGE 2 Tx slots	24.95	25.11	24.60	26.00	18.95	19.11	18.60	20.00
EDGE 3 Tx slots	24.02	24.10	23.41	25.00	19.76	19.84	19.15	20.74
EDGE 4 Tx slots	23.05	22.99	22.67	24.00	20.05	19.99	19.67	21.00



ANT 1								
GSM850 TX Channel	Burst Average Power (dBm)			Tune-up Limit (dBm)	Frame-Average Power (dBm)			Tune-up Limit (dBm)
	128	189	251		128	189	251	
Frequency (MHz)	824.2	836.4	848.8		824.2	836.4	848.8	
GSM 1 Tx slot	32.25	32.38	32.23	33.50	23.25	23.38	23.23	24.50
GPRS 1 Tx slot	32.28	32.45	32.23	33.50	23.28	23.45	23.23	24.50
GPRS 2 Tx slots	31.35	31.44	31.11	32.50	25.35	25.44	25.11	26.50
GPRS 3 Tx slots	29.24	29.26	29.00	30.50	24.98	25.00	24.74	26.24
GPRS 4 Tx slots	28.28	27.81	27.52	29.50	25.28	24.81	24.52	26.50
EDGE 1 Tx slot	26.24	26.35	26.25	27.50	17.24	17.35	17.25	18.50
EDGE 2 Tx slots	25.55	25.78	25.75	27.00	19.55	19.78	19.75	21.00
EDGE 3 Tx slots	23.66	23.94	23.74	25.00	19.40	19.68	19.48	20.74
EDGE 4 Tx slots	21.79	22.05	21.77	23.00	18.79	19.05	18.77	20.00

ANT 0								
GSM1900 TX Channel	Burst Average Power (dBm)			Tune-up Limit (dBm)	Frame-Average Power (dBm)			Tune-up Limit (dBm)
	512	661	810		512	661	810	
Frequency (MHz)	1850.2	1880	1909.8		1850.2	1880	1909.8	
GSM 1 Tx slot	27.11	27.23	26.96	28.40	18.11	18.23	17.96	19.40
GPRS 1 Tx slot	27.16	27.31	26.96	28.40	18.16	18.31	17.96	19.40
GPRS 2 Tx slots	24.05	24.24	23.76	25.40	18.05	18.24	17.76	19.40
GPRS 3 Tx slots	22.27	22.30	21.97	23.60	18.01	18.04	17.71	19.34
GPRS 4 Tx slots	21.12	21.19	21.05	22.40	18.12	18.19	18.05	19.40
EDGE 1 Tx slot	25.29	25.29	24.92	26.00	16.29	16.29	15.92	17.00
EDGE 2 Tx slots	23.95	24.05	23.54	25.30	17.95	18.05	17.54	19.30
EDGE 3 Tx slots	22.25	22.12	21.73	23.50	17.99	17.86	17.47	19.24
EDGE 4 Tx slots	20.65	20.80	19.74	21.70	17.65	17.80	16.74	18.70



Band	Ant 2				Ant 2				Ant 0				
	WCDMA II			Tune-up Limit (dBm)	WCDMA IV			Tune-up Limit (dBm)	WCDMA V			Tune-up Limit (dBm)	
	TX Channel	9262	9400		9538	1312	1413		1513	4132	4182		4233
	Rx Channel	9662	9800		9938	1537	1638		1738	4357	4407		4458
Frequency (MHz)	1852.4	1880	1907.6	1712.4	1732.6	1752.6	826.4	836.4	846.6				
3GPP Rel 99	AMR 12.2Kbps	24.33	24.38	24.23	25.70	23.96	24.02	23.98	25.70	23.98	24.06	24.04	25.00
3GPP Rel 99	RMC 12.2Kbps	24.36	24.43	24.26	25.70	24.02	24.06	23.99	25.70	24.03	24.08	24.05	25.00
3GPP Rel 6	HSDPA Subtest-1	23.40	23.45	23.35	24.70	23.13	23.18	23.12	24.70	23.15	23.18	23.23	24.00
3GPP Rel 6	HSDPA Subtest-2	23.44	23.45	23.31	24.70	23.10	23.16	23.03	24.70	23.12	23.20	23.08	24.00
3GPP Rel 6	HSDPA Subtest-3	22.98	22.97	22.77	24.20	22.58	22.64	22.54	24.20	22.70	22.69	22.66	23.50
3GPP Rel 6	HSDPA Subtest-4	22.96	22.88	22.84	24.20	22.60	22.69	22.55	24.20	22.58	22.72	22.69	23.50
3GPP Rel 8	DC-HSDPA Subtest-1	23.28	23.37	23.26	24.70	23.02	23.08	23.02	24.70	23.06	23.13	23.17	24.00
3GPP Rel 8	DC-HSDPA Subtest-2	23.45	23.42	23.26	24.70	23.13	23.13	23.00	24.70	23.14	23.08	23.09	24.00
3GPP Rel 8	DC-HSDPA Subtest-3	22.84	22.91	22.72	24.20	22.53	22.69	22.55	24.20	22.63	22.71	22.70	23.50
3GPP Rel 8	DC-HSDPA Subtest-4	22.89	22.86	22.70	24.20	22.44	22.67	22.44	24.20	22.58	22.65	22.60	23.50
3GPP Rel 6	HSUPA Subtest-1	23.60	24.02	23.91	24.70	23.00	23.12	23.07	24.70	23.16	23.20	23.08	24.00
3GPP Rel 6	HSUPA Subtest-2	21.58	21.61	21.51	22.70	20.72	20.78	20.84	22.70	21.13	21.18	21.16	22.00
3GPP Rel 6	HSUPA Subtest-3	22.62	22.68	22.56	23.70	21.77	21.79	21.80	23.70	22.11	22.19	22.19	23.00
3GPP Rel 6	HSUPA Subtest-4	21.62	21.64	21.57	22.70	20.73	20.91	20.82	22.70	21.16	21.13	21.15	22.00
3GPP Rel 6	HSUPA Subtest-5	23.61	23.68	23.60	24.70	22.83	22.81	22.80	24.70	23.06	23.16	23.22	24.00



Band	Ant 0					Ant 0				Ant 1			
	WCDMA II			Tune-up Limit (dBm)	WCDMA IV			Tune-up Limit (dBm)	WCDMA V			Tune-up Limit (dBm)	
	TX Channel	9262	9400		9538	1312	1413		1513	4132	4182		4233
	Rx Channel	9662	9800		9938	1537	1638		1738	4357	4407		4458
Frequency (MHz)	1852.4	1880	1907.6	1712.4	1732.6	1752.6	826.4	836.4	846.6				
3GPP Rel 99	AMR 12.2Kbps	24.42	24.39	24.26	25.70	24.19	24.11	24.13	25.70	23.72	23.67	23.74	25.00
3GPP Rel 99	RMC 12.2Kbps	24.39	24.45	24.31	25.70	24.23	24.14	24.16	25.70	23.74	23.69	23.71	25.00
3GPP Rel 6	HSDPA Subtest-1	23.09	23.51	23.42	24.70	23.34	23.37	23.40	24.70	22.87	22.90	22.86	24.00
3GPP Rel 6	HSDPA Subtest-2	23.08	23.51	23.42	24.70	23.37	23.38	23.39	24.70	22.87	22.88	22.85	24.00
3GPP Rel 6	HSDPA Subtest-3	22.58	23.02	22.92	24.20	22.92	22.49	22.85	24.20	22.39	22.44	22.40	23.50
3GPP Rel 6	HSDPA Subtest-4	22.65	23.10	22.86	24.20	22.85	22.86	22.93	24.20	22.35	22.35	22.36	23.50
3GPP Rel 8	DC-HSDPA Subtest-1	23.04	23.49	23.33	24.70	23.27	23.39	23.38	24.70	22.84	22.86	22.83	24.00
3GPP Rel 8	DC-HSDPA Subtest-2	23.03	23.43	23.31	24.70	23.24	23.33	23.30	24.70	22.78	22.80	22.82	24.00
3GPP Rel 8	DC-HSDPA Subtest-3	22.50	22.86	22.86	24.20	22.91	22.51	22.78	24.20	22.32	22.39	22.31	23.50
3GPP Rel 8	DC-HSDPA Subtest-4	22.52	23.00	22.80	24.20	22.77	22.73	22.86	24.20	22.35	22.30	22.29	23.50
3GPP Rel 6	HSUPA Subtest-1	23.18	23.45	23.37	24.70	23.39	23.34	23.30	24.70	22.87	22.82	22.85	24.00
3GPP Rel 6	HSUPA Subtest-2	21.12	21.07	21.02	22.70	21.07	21.07	21.08	22.70	20.86	20.91	20.85	22.00
3GPP Rel 6	HSUPA Subtest-3	22.07	22.11	22.04	23.70	22.02	22.05	22.12	23.70	21.89	21.87	21.80	23.00
3GPP Rel 6	HSUPA Subtest-4	21.16	21.17	21.00	22.70	21.05	21.09	21.10	22.70	20.78	20.95	20.82	22.00
3GPP Rel 6	HSUPA Subtest-5	23.22	23.05	23.03	24.70	23.09	23.05	23.12	24.70	22.93	22.89	22.81	24.00



Band	Ant 2				Tune-up Limit (dBm)	Ant 2			Tune-up Limit (dBm)	Ant 0			Tune-up Limit (dBm)
	WCDMA II			WCDMA IV			WCDMA V						
	TX Channel	9262	9400	9538		1312	1413	1513		4132	4182	4233	
Rx Channel	9662	9800	9938	1537	1638	1738	4357	4407	4458				
Frequency (MHz)	1852.4	1880	1907.6	1712.4	1732.6	1752.6	826.4	836.4	846.6				
3GPP Rel 99	AMR 12.2Kbps	24.18	24.24	24.14	25.70	23.96	24.02	23.98	25.70	23.98	24.06	24.04	25.00
3GPP Rel 99	RMC 12.2Kbps	24.20	24.27	24.15	25.70	24.02	24.06	23.99	25.70	24.03	24.08	24.05	25.00
3GPP Rel 6	HSDPA Subtest-1	23.07	23.28	23.19	24.70	23.13	23.18	23.12	24.70	23.15	23.18	23.23	24.00
3GPP Rel 6	HSDPA Subtest-2	23.04	23.29	23.20	24.70	23.10	23.16	23.03	24.70	23.12	23.20	23.08	24.00
3GPP Rel 6	HSDPA Subtest-3	22.60	22.81	22.70	24.20	22.58	22.64	22.54	24.20	22.70	22.69	22.66	23.50
3GPP Rel 6	HSDPA Subtest-4	22.59	22.80	22.69	24.20	22.60	22.69	22.55	24.20	22.58	22.72	22.69	23.50
3GPP Rel 8	DC-HSDPA Subtest-1	23.04	23.24	23.19	24.70	23.02	23.08	23.02	24.70	23.06	23.13	23.17	24.00
3GPP Rel 8	DC-HSDPA Subtest-2	22.95	23.28	23.12	24.70	23.13	23.13	23.00	24.70	23.14	23.08	23.09	24.00
3GPP Rel 8	DC-HSDPA Subtest-3	22.59	22.76	22.62	24.20	22.53	22.69	22.55	24.20	22.63	22.71	22.70	23.50
3GPP Rel 8	DC-HSDPA Subtest-4	22.59	22.78	22.60	24.20	22.44	22.67	22.44	24.20	22.58	22.65	22.60	23.50
3GPP Rel 6	HSUPA Subtest-1	23.05	23.31	23.17	24.70	23.00	23.12	23.07	24.70	23.16	23.20	23.08	24.00
3GPP Rel 6	HSUPA Subtest-2	21.07	21.29	21.18	22.70	20.72	20.78	20.84	22.70	21.13	21.18	21.16	22.00
3GPP Rel 6	HSUPA Subtest-3	22.14	22.24	22.19	23.70	21.77	21.79	21.80	23.70	22.11	22.19	22.19	23.00
3GPP Rel 6	HSUPA Subtest-4	21.11	21.25	21.23	22.70	20.73	20.91	20.82	22.70	21.16	21.13	21.15	22.00
3GPP Rel 6	HSUPA Subtest-5	23.10	23.30	23.20	24.70	22.83	22.81	22.80	24.70	23.06	23.16	23.22	24.00



Band	Ant 0					Ant 0				Ant 1			
	WCDMA II			Tune-up Limit (dBm)	WCDMA IV			Tune-up Limit (dBm)	WCDMA V			Tune-up Limit (dBm)	
	TX Channel	9262	9400		9538	1312	1413		1513	4132	4182		4233
	Rx Channel	9662	9800		9938	1537	1638		1738	4357	4407		4458
Frequency (MHz)	1852.4	1880	1907.6	1712.4	1732.6	1752.6	826.4	836.4	846.6				
3GPP Rel 99	AMR 12.2Kbps	24.42	24.39	24.26	25.70	24.19	24.11	24.13	25.70	24.06	24.03	24.05	25.00
3GPP Rel 99	RMC 12.2Kbps	24.39	24.45	24.31	25.70	24.23	24.14	24.16	25.70	24.09	24.05	24.08	25.00
3GPP Rel 6	HSDPA Subtest-1	23.09	23.51	23.42	24.70	23.34	23.37	23.40	24.70	22.87	22.90	22.86	24.00
3GPP Rel 6	HSDPA Subtest-2	23.08	23.51	23.42	24.70	23.37	23.38	23.39	24.70	22.87	22.88	22.85	24.00
3GPP Rel 6	HSDPA Subtest-3	22.58	23.02	22.92	24.20	22.92	22.49	22.85	24.20	22.39	22.44	22.40	23.50
3GPP Rel 6	HSDPA Subtest-4	22.65	23.10	22.86	24.20	22.85	22.86	22.93	24.20	22.35	22.35	22.36	23.50
3GPP Rel 8	DC-HSDPA Subtest-1	23.04	23.49	23.33	24.70	23.27	23.39	23.38	24.70	22.84	22.86	22.83	24.00
3GPP Rel 8	DC-HSDPA Subtest-2	23.03	23.43	23.31	24.70	23.24	23.33	23.30	24.70	22.78	22.80	22.82	24.00
3GPP Rel 8	DC-HSDPA Subtest-3	22.50	22.86	22.86	24.20	22.91	22.51	22.78	24.20	22.32	22.39	22.31	23.50
3GPP Rel 8	DC-HSDPA Subtest-4	22.52	23.00	22.80	24.20	22.77	22.73	22.86	24.20	22.35	22.30	22.29	23.50
3GPP Rel 6	HSUPA Subtest-1	23.18	23.45	23.37	24.70	23.39	23.34	23.30	24.70	22.87	22.82	22.85	24.00
3GPP Rel 6	HSUPA Subtest-2	21.12	21.07	21.02	22.70	21.07	21.07	21.08	22.70	20.86	20.91	20.85	22.00
3GPP Rel 6	HSUPA Subtest-3	22.07	22.11	22.04	23.70	22.02	22.05	22.12	23.70	21.89	21.87	21.80	23.00
3GPP Rel 6	HSUPA Subtest-4	21.16	21.17	21.00	22.70	21.05	21.09	21.10	22.70	20.78	20.95	20.82	22.00
3GPP Rel 6	HSUPA Subtest-5	23.22	23.05	23.03	24.70	23.09	23.05	23.12	24.70	22.93	22.89	22.81	24.00



Band	Ant 2					Ant 2				Ant 0			
	WCDMA II			Tune-up Limit (dBm)	WCDMA IV			Tune-up Limit (dBm)	WCDMA V			Tune-up Limit (dBm)	
	TX Channel	9262	9400		9538	1312	1413		1513	4132	4182		4233
	Rx Channel	9662	9800		9938	1537	1638		1738	4357	4407		4458
Frequency (MHz)	1852.4	1880	1907.6	1712.4	1732.6	1752.6	826.4	836.4	846.6				
3GPP Rel 99	AMR 12.2Kbps	23.33	23.50	23.38	25.30	23.98	23.97	23.96	25.70	23.98	24.06	24.04	25.00
3GPP Rel 99	RMC 12.2Kbps	23.35	23.53	23.42	25.30	24.03	24.01	23.99	25.70	24.03	24.08	24.05	25.00
3GPP Rel 6	HSDPA Subtest-1	22.39	22.58	22.46	24.30	22.86	22.83	22.72	24.70	23.15	23.18	23.23	24.00
3GPP Rel 6	HSDPA Subtest-2	22.38	22.59	22.44	24.30	22.85	22.81	22.76	24.70	23.12	23.20	23.08	24.00
3GPP Rel 6	HSDPA Subtest-3	21.89	22.11	21.95	23.80	22.38	22.33	22.34	24.20	22.70	22.69	22.66	23.50
3GPP Rel 6	HSDPA Subtest-4	21.90	22.09	22.00	23.80	22.33	22.33	22.28	24.20	22.58	22.72	22.69	23.50
3GPP Rel 8	DC-HSDPA Subtest-1	22.31	22.58	22.38	24.30	22.82	22.81	22.70	24.70	23.06	23.13	23.17	24.00
3GPP Rel 8	DC-HSDPA Subtest-2	22.30	22.57	22.42	24.30	22.77	22.72	22.71	24.70	23.14	23.08	23.09	24.00
3GPP Rel 8	DC-HSDPA Subtest-3	21.88	22.08	21.85	23.80	22.28	22.33	22.33	24.20	22.63	22.71	22.70	23.50
3GPP Rel 8	DC-HSDPA Subtest-4	21.87	22.00	21.92	23.80	22.23	22.33	22.21	24.20	22.58	22.65	22.60	23.50
3GPP Rel 6	HSUPA Subtest-1	22.43	22.57	22.50	24.30	22.88	22.75	22.76	24.70	23.16	23.20	23.08	24.00
3GPP Rel 6	HSUPA Subtest-2	20.38	20.53	20.46	22.30	20.84	20.73	20.71	22.70	21.13	21.18	21.16	22.00
3GPP Rel 6	HSUPA Subtest-3	21.33	21.61	21.45	23.30	21.86	21.78	21.79	23.70	22.11	22.19	22.19	23.00
3GPP Rel 6	HSUPA Subtest-4	20.34	20.52	20.51	22.30	20.87	20.78	20.72	22.70	21.16	21.13	21.15	22.00
3GPP Rel 6	HSUPA Subtest-5	22.40	22.60	22.50	24.30	22.89	22.79	22.79	24.70	23.06	23.16	23.22	24.00



Band	Ant 0					Ant 0				Ant 1			
	WCDMA II			Tune-up Limit (dBm)	WCDMA IV			Tune-up Limit (dBm)	WCDMA V			Tune-up Limit (dBm)	
	TX Channel	9262	9400		9538	1312	1413		1513	4132	4182		4233
	Rx Channel	9662	9800		9938	1537	1638		1738	4357	4407		4458
Frequency (MHz)	1852.4	1880	1907.6	1712.4	1732.6	1752.6	826.4	836.4	846.6				
3GPP Rel 99	AMR 12.2Kbps	19.58	19.63	19.46	21.30	19.47	19.37	19.34	20.80	24.06	24.03	24.05	25.00
3GPP Rel 99	RMC 12.2Kbps	19.62	19.65	19.50	21.30	19.49	19.40	19.35	20.80	24.09	24.05	24.08	25.00
3GPP Rel 6	HSDPA Subtest-1	18.67	18.72	18.55	20.30	18.52	18.39	18.38	19.80	22.87	22.90	22.86	24.00
3GPP Rel 6	HSDPA Subtest-2	18.63	18.74	18.55	20.30	18.52	18.40	18.34	19.80	22.87	22.88	22.85	24.00
3GPP Rel 6	HSDPA Subtest-3	18.14	18.23	18.03	19.80	18.01	17.89	17.85	19.30	22.39	22.44	22.40	23.50
3GPP Rel 6	HSDPA Subtest-4	18.12	18.22	17.80	19.80	18.00	17.89	17.84	19.30	22.35	22.35	22.36	23.50
3GPP Rel 8	DC-HSDPA Subtest-1	18.64	18.69	18.45	20.30	18.42	18.35	18.36	19.80	22.84	22.86	22.83	24.00
3GPP Rel 8	DC-HSDPA Subtest-2	18.56	18.72	18.54	20.30	18.52	18.32	18.26	19.80	22.78	22.80	22.82	24.00
3GPP Rel 8	DC-HSDPA Subtest-3	18.08	18.22	17.98	19.80	17.92	17.82	17.75	19.30	22.32	22.39	22.31	23.50
3GPP Rel 8	DC-HSDPA Subtest-4	18.06	18.12	17.80	19.80	18.00	17.86	17.78	19.30	22.35	22.30	22.29	23.50
3GPP Rel 6	HSUPA Subtest-1	18.64	18.73	18.55	20.30	18.08	18.38	18.37	19.80	22.87	22.82	22.85	24.00
3GPP Rel 6	HSUPA Subtest-2	16.63	16.67	16.57	18.30	16.49	16.40	16.37	17.80	20.86	20.91	20.85	22.00
3GPP Rel 6	HSUPA Subtest-3	17.64	17.70	17.58	19.30	17.48	17.41	17.36	18.80	21.89	21.87	21.80	23.00
3GPP Rel 6	HSUPA Subtest-4	16.62	16.75	16.61	18.30	16.50	16.42	16.36	17.80	20.78	20.95	20.82	22.00
3GPP Rel 6	HSUPA Subtest-5	18.60	18.70	18.60	20.30	18.50	18.40	18.40	19.80	22.93	22.89	22.81	24.00



Band	Ant 2					Ant 2				Ant 0			
	WCDMA II			Tune-up Limit (dBm)	WCDMA IV			Tune-up Limit (dBm)	WCDMA V			Tune-up Limit (dBm)	
	9262	9400	9538		1312	1413	1513		4132	4182	4233		
Rx Channel	9662	9800	9938	1537	1638	1738	4357	4407	4458				
Frequency (MHz)	1852.4	1880	1907.6	1712.4	1732.6	1752.6	826.4	836.4	846.6				
3GPP Rel 99	AMR 12.2Kbps	23.33	23.50	23.38	24.50	23.98	23.97	23.96	25.00	23.98	24.06	24.04	25.00
3GPP Rel 99	RMC 12.2Kbps	23.35	23.53	23.42	24.50	24.03	24.01	23.99	25.00	24.03	24.08	24.05	25.00
3GPP Rel 6	HSDPA Subtest-1	22.39	22.58	22.46	23.50	22.86	22.83	22.72	24.00	23.15	23.18	23.23	24.00
3GPP Rel 6	HSDPA Subtest-2	22.38	22.59	22.44	23.50	22.85	22.81	22.76	24.00	23.12	23.20	23.08	24.00
3GPP Rel 6	HSDPA Subtest-3	21.89	22.11	21.95	23.00	22.38	22.33	22.34	23.50	22.70	22.69	22.66	23.50
3GPP Rel 6	HSDPA Subtest-4	21.90	22.09	22.00	23.00	22.33	22.33	22.28	23.50	22.58	22.72	22.69	23.50
3GPP Rel 8	DC-HSDPA Subtest-1	22.30	22.58	22.38	23.50	22.82	22.81	22.70	24.00	23.06	23.13	23.17	24.00
3GPP Rel 8	DC-HSDPA Subtest-2	22.29	22.57	22.42	23.50	22.77	22.72	22.71	24.00	23.14	23.08	23.09	24.00
3GPP Rel 8	DC-HSDPA Subtest-3	21.88	22.08	21.85	23.00	22.28	22.33	22.33	23.50	22.63	22.71	22.70	23.50
3GPP Rel 8	DC-HSDPA Subtest-4	21.87	22.00	21.92	23.00	22.23	22.33	22.21	23.50	22.58	22.65	22.60	23.50
3GPP Rel 6	HSUPA Subtest-1	22.43	22.57	22.50	23.50	22.88	22.75	22.76	24.00	23.16	23.20	23.08	24.00
3GPP Rel 6	HSUPA Subtest-2	20.38	20.53	20.46	21.50	20.84	20.73	20.71	22.00	21.13	21.18	21.16	22.00
3GPP Rel 6	HSUPA Subtest-3	21.33	21.61	21.45	22.50	21.86	21.78	21.79	23.00	22.11	22.19	22.19	23.00
3GPP Rel 6	HSUPA Subtest-4	20.34	20.52	20.51	21.50	20.87	20.78	20.72	22.00	21.16	21.13	21.15	22.00
3GPP Rel 6	HSUPA Subtest-5	22.40	22.60	22.50	23.50	22.89	22.79	22.79	24.00	23.06	23.16	23.22	24.00



Band	Ant 0				Ant 0				Ant 1				
	WCDMA II			Tune-up Limit (dBm)	WCDMA IV			Tune-up Limit (dBm)	WCDMA V			Tune-up Limit (dBm)	
	9262	9400	9538		1312	1413	1513		4132	4182	4233		
	Rx Channel	9662	9800		9938	1537	1638		1738	4357	4407		4458
Frequency (MHz)	1852.4	1880	1907.6	1712.4	1732.6	1752.6	826.4	836.4	846.6				
3GPP Rel 99	AMR 12.2Kbps	19.58	19.63	19.46	20.50	18.68	18.58	18.50	20.00	24.06	24.03	24.05	25.00
3GPP Rel 99	RMC 12.2Kbps	19.62	19.65	19.50	20.50	18.86	18.79	18.67	20.00	24.09	24.05	24.08	25.00
3GPP Rel 6	HSDPA Subtest-1	18.67	18.72	18.55	19.50	17.72	17.60	17.56	19.00	22.87	22.90	22.86	24.00
3GPP Rel 6	HSDPA Subtest-2	18.63	18.74	18.55	19.50	17.72	17.55	17.55	19.00	22.87	22.88	22.85	24.00
3GPP Rel 6	HSDPA Subtest-3	18.14	18.23	18.03	19.00	17.19	17.05	17.04	18.50	22.39	22.44	22.40	23.50
3GPP Rel 6	HSDPA Subtest-4	18.12	18.22	17.80	19.00	17.20	17.08	17.03	18.50	22.35	22.35	22.36	23.50
3GPP Rel 8	DC-HSDPA Subtest-1	18.64	18.69	18.45	19.50	17.62	17.54	17.55	19.00	22.84	22.86	22.83	24.00
3GPP Rel 8	DC-HSDPA Subtest-2	18.56	18.72	18.54	19.50	17.69	17.48	17.51	19.00	22.78	22.80	22.82	24.00
3GPP Rel 8	DC-HSDPA Subtest-3	18.08	18.22	17.98	19.00	17.11	17.02	17.02	18.50	22.32	22.39	22.31	23.50
3GPP Rel 8	DC-HSDPA Subtest-4	18.06	18.12	17.80	19.00	17.14	17.04	16.99	18.50	22.35	22.30	22.29	23.50
3GPP Rel 6	HSUPA Subtest-1	18.64	18.73	18.55	19.50	17.18	17.59	17.57	19.00	22.87	22.82	22.85	24.00
3GPP Rel 6	HSUPA Subtest-2	16.63	16.67	16.57	17.50	15.69	15.58	15.57	17.00	20.86	20.91	20.85	22.00
3GPP Rel 6	HSUPA Subtest-3	17.64	17.70	17.58	18.50	16.66	16.57	16.57	18.00	21.89	21.87	21.80	23.00
3GPP Rel 6	HSUPA Subtest-4	16.62	16.75	16.61	17.50	15.68	15.60	15.57	17.00	20.78	20.95	20.82	22.00
3GPP Rel 6	HSUPA Subtest-5	18.60	18.70	18.60	19.50	17.70	17.60	17.60	19.00	22.93	22.89	22.81	24.00



Band	Ant 2				Tune-up Limit (dBm)	Ant 2			Tune-up Limit (dBm)	Ant 0			Tune-up Limit (dBm)
	WCDMA II			WCDMA IV			WCDMA V						
	TX Channel	9262	9400	9538		1312	1413	1513		4132	4182	4233	
Rx Channel	9662	9800	9938	1537	1638	1738	4357	4407	4458				
Frequency (MHz)	1852.4	1880	1907.6	1712.4	1732.6	1752.6	826.4	836.4	846.6				
3GPP Rel 99	AMR 12.2Kbps	24.18	24.24	24.14	25.70	23.96	24.02	23.98	25.70	23.98	24.06	24.04	25.00
3GPP Rel 99	RMC 12.2Kbps	24.20	24.27	24.15	25.70	24.02	24.06	23.99	25.70	24.03	24.08	24.05	25.00
3GPP Rel 6	HSDPA Subtest-1	23.07	23.28	23.19	24.70	23.13	23.18	23.12	24.70	23.15	23.18	23.23	24.00
3GPP Rel 6	HSDPA Subtest-2	23.04	23.29	23.20	24.70	23.10	23.16	23.03	24.70	23.12	23.20	23.08	24.00
3GPP Rel 6	HSDPA Subtest-3	22.60	22.81	22.70	24.20	22.58	22.64	22.54	24.20	22.70	22.69	22.66	23.50
3GPP Rel 6	HSDPA Subtest-4	22.59	22.80	22.69	24.20	22.60	22.69	22.55	24.20	22.58	22.72	22.69	23.50
3GPP Rel 8	DC-HSDPA Subtest-1	23.04	23.24	23.19	24.70	23.02	23.08	23.02	24.70	23.06	23.13	23.17	24.00
3GPP Rel 8	DC-HSDPA Subtest-2	22.95	23.28	23.12	24.70	23.13	23.13	23.00	24.70	23.14	23.08	23.09	24.00
3GPP Rel 8	DC-HSDPA Subtest-3	22.59	22.76	22.62	24.20	22.53	22.69	22.55	24.20	22.63	22.71	22.70	23.50
3GPP Rel 8	DC-HSDPA Subtest-4	22.59	22.78	22.60	24.20	22.44	22.67	22.44	24.20	22.58	22.65	22.60	23.50
3GPP Rel 6	HSUPA Subtest-1	23.05	23.31	23.17	24.70	23.00	23.12	23.07	24.70	23.16	23.20	23.08	24.00
3GPP Rel 6	HSUPA Subtest-2	21.07	21.29	21.18	22.70	20.72	20.78	20.84	22.70	21.13	21.18	21.16	22.00
3GPP Rel 6	HSUPA Subtest-3	22.14	22.24	22.19	23.70	21.77	21.79	21.80	23.70	22.11	22.19	22.19	23.00
3GPP Rel 6	HSUPA Subtest-4	21.11	21.25	21.23	22.70	20.73	20.91	20.82	22.70	21.16	21.13	21.15	22.00
3GPP Rel 6	HSUPA Subtest-5	23.10	23.30	23.20	24.70	22.83	22.81	22.80	24.70	23.06	23.16	23.22	24.00



Band	Ant 0					Ant 0				Ant 1			
	WCDMA II			Tune-up Limit (dBm)	WCDMA IV			Tune-up Limit (dBm)	WCDMA V			Tune-up Limit (dBm)	
	TX Channel	9262	9400		9538	1312	1413		1513	4132	4182		4233
	Rx Channel	9662	9800		9938	1537	1638		1738	4357	4407		4458
Frequency (MHz)	1852.4	1880	1907.6	1712.4	1732.6	1752.6	826.4	836.4	846.6				
3GPP Rel 99	AMR 12.2Kbps	24.42	24.39	24.26	25.70	24.19	24.11	24.13	25.70	24.06	24.03	24.05	25.00
3GPP Rel 99	RMC 12.2Kbps	24.39	24.45	24.31	25.70	24.23	24.14	24.16	25.70	24.09	24.05	24.08	25.00
3GPP Rel 6	HSDPA Subtest-1	23.09	23.51	23.42	24.70	23.34	23.37	23.40	24.70	22.87	22.90	22.86	24.00
3GPP Rel 6	HSDPA Subtest-2	23.08	23.51	23.42	24.70	23.37	23.38	23.39	24.70	22.87	22.88	22.85	24.00
3GPP Rel 6	HSDPA Subtest-3	22.58	23.02	22.92	24.20	22.92	22.49	22.85	24.20	22.39	22.44	22.40	23.50
3GPP Rel 6	HSDPA Subtest-4	22.65	23.10	22.86	24.20	22.85	22.86	22.93	24.20	22.35	22.35	22.36	23.50
3GPP Rel 8	DC-HSDPA Subtest-1	23.04	23.49	23.33	24.70	23.27	23.39	23.38	24.70	22.84	22.86	22.83	24.00
3GPP Rel 8	DC-HSDPA Subtest-2	23.03	23.43	23.31	24.70	23.24	23.33	23.30	24.70	22.78	22.80	22.82	24.00
3GPP Rel 8	DC-HSDPA Subtest-3	22.50	22.86	22.86	24.20	22.91	22.51	22.78	24.20	22.32	22.39	22.31	23.50
3GPP Rel 8	DC-HSDPA Subtest-4	22.52	23.00	22.80	24.20	22.77	22.73	22.86	24.20	22.35	22.30	22.29	23.50
3GPP Rel 6	HSUPA Subtest-1	23.18	23.45	23.37	24.70	23.39	23.34	23.30	24.70	22.87	22.82	22.85	24.00
3GPP Rel 6	HSUPA Subtest-2	21.12	21.07	21.02	22.70	21.07	21.07	21.08	22.70	20.86	20.91	20.85	22.00
3GPP Rel 6	HSUPA Subtest-3	22.07	22.11	22.04	23.70	22.02	22.05	22.12	23.70	21.89	21.87	21.80	23.00
3GPP Rel 6	HSUPA Subtest-4	21.16	21.17	21.00	22.70	21.05	21.09	21.10	22.70	20.78	20.95	20.82	22.00
3GPP Rel 6	HSUPA Subtest-5	23.22	23.05	23.03	24.70	23.09	23.05	23.12	24.70	22.93	22.89	22.81	24.00



Band	Ant 2					Ant 2				Ant 0			
	WCDMA II			Tune-up Limit (dBm)	WCDMA IV			Tune-up Limit (dBm)	WCDMA V			Tune-up Limit (dBm)	
	9262	9400	9538		1312	1413	1513		4132	4182	4233		
	Rx Channel	9662	9800		9938	1537	1638		1738	4357	4407		4458
Frequency (MHz)	1852.4	1880	1907.6	1712.4	1732.6	1752.6	826.4	836.4	846.6				
3GPP Rel 99	AMR 12.2Kbps	23.33	23.50	23.38	24.50	23.98	23.97	23.96	25.00	23.98	24.06	24.04	25.00
3GPP Rel 99	RMC 12.2Kbps	23.35	23.53	23.42	24.50	24.03	24.01	23.99	25.00	24.03	24.08	24.05	25.00
3GPP Rel 6	HSDPA Subtest-1	22.39	22.58	22.46	23.50	22.86	22.83	22.72	24.00	23.15	23.18	23.23	24.00
3GPP Rel 6	HSDPA Subtest-2	22.38	22.59	22.44	23.50	22.85	22.81	22.76	24.00	23.12	23.20	23.08	24.00
3GPP Rel 6	HSDPA Subtest-3	21.89	22.11	21.95	23.00	22.38	22.33	22.34	23.50	22.70	22.69	22.66	23.50
3GPP Rel 6	HSDPA Subtest-4	21.90	22.09	22.00	23.00	22.33	22.33	22.28	23.50	22.58	22.72	22.69	23.50
3GPP Rel 8	DC-HSDPA Subtest-1	22.30	22.58	22.38	23.50	22.82	22.81	22.70	24.00	23.06	23.13	23.17	24.00
3GPP Rel 8	DC-HSDPA Subtest-2	22.29	22.57	22.42	23.50	22.77	22.72	22.71	24.00	23.14	23.08	23.09	24.00
3GPP Rel 8	DC-HSDPA Subtest-3	21.88	22.08	21.85	23.00	22.28	22.33	22.33	23.50	22.63	22.71	22.70	23.50
3GPP Rel 8	DC-HSDPA Subtest-4	21.87	22.00	21.92	23.00	22.23	22.33	22.21	23.50	22.58	22.65	22.60	23.50
3GPP Rel 6	HSUPA Subtest-1	22.43	22.57	22.50	23.50	22.88	22.75	22.76	24.00	23.16	23.20	23.08	24.00
3GPP Rel 6	HSUPA Subtest-2	20.38	20.53	20.46	21.50	20.84	20.73	20.71	22.00	21.13	21.18	21.16	22.00
3GPP Rel 6	HSUPA Subtest-3	21.33	21.61	21.45	22.50	21.86	21.78	21.79	23.00	22.11	22.19	22.19	23.00
3GPP Rel 6	HSUPA Subtest-4	20.34	20.52	20.51	21.50	20.87	20.78	20.72	22.00	21.16	21.13	21.15	22.00
3GPP Rel 6	HSUPA Subtest-5	22.40	22.60	22.50	23.50	22.89	22.79	22.79	24.00	23.06	23.16	23.22	24.00



Band	Ant 0					Ant 0				Ant 1			
	WCDMA II			Tune-up Limit (dBm)	WCDMA IV			Tune-up Limit (dBm)	WCDMA V			Tune-up Limit (dBm)	
	TX Channel	9262	9400		9538	1312	1413		1513	4132	4182		4233
	Rx Channel	9662	9800		9938	1537	1638		1738	4357	4407		4458
Frequency (MHz)	1852.4	1880	1907.6	1712.4	1732.6	1752.6	826.4	836.4	846.6				
3GPP Rel 99	AMR 12.2Kbps	19.58	19.63	19.46	20.50	18.68	18.58	18.50	20.00	24.06	24.03	24.05	25.00
3GPP Rel 99	RMC 12.2Kbps	19.62	19.65	19.50	20.50	18.86	18.79	18.67	20.00	24.09	24.05	24.08	25.00
3GPP Rel 6	HSDPA Subtest-1	18.67	18.72	18.55	19.50	17.72	17.60	17.56	19.00	22.87	22.90	22.86	24.00
3GPP Rel 6	HSDPA Subtest-2	18.63	18.74	18.55	19.50	17.72	17.55	17.55	19.00	22.87	22.88	22.85	24.00
3GPP Rel 6	HSDPA Subtest-3	18.14	18.23	18.03	19.00	17.19	17.05	17.04	18.50	22.39	22.44	22.40	23.50
3GPP Rel 6	HSDPA Subtest-4	18.12	18.22	17.80	19.00	17.20	17.08	17.03	18.50	22.35	22.35	22.36	23.50
3GPP Rel 8	DC-HSDPA Subtest-1	18.64	18.69	18.45	19.50	17.62	17.54	17.55	19.00	22.84	22.86	22.83	24.00
3GPP Rel 8	DC-HSDPA Subtest-2	18.56	18.72	18.54	19.50	17.69	17.48	17.51	19.00	22.78	22.80	22.82	24.00
3GPP Rel 8	DC-HSDPA Subtest-3	18.08	18.22	17.98	19.00	17.11	17.02	17.02	18.50	22.32	22.39	22.31	23.50
3GPP Rel 8	DC-HSDPA Subtest-4	18.06	18.12	17.80	19.00	17.14	17.04	16.99	18.50	22.35	22.30	22.29	23.50
3GPP Rel 6	HSUPA Subtest-1	18.64	18.73	18.55	19.50	17.18	17.59	17.57	19.00	22.87	22.82	22.85	24.00
3GPP Rel 6	HSUPA Subtest-2	16.63	16.67	16.57	17.50	15.69	15.58	15.57	17.00	20.86	20.91	20.85	22.00
3GPP Rel 6	HSUPA Subtest-3	17.64	17.70	17.58	18.50	16.66	16.57	16.57	18.00	21.89	21.87	21.80	23.00
3GPP Rel 6	HSUPA Subtest-4	16.62	16.75	16.61	17.50	15.68	15.60	15.57	17.00	20.78	20.95	20.82	22.00
3GPP Rel 6	HSUPA Subtest-5	18.60	18.70	18.60	19.50	17.70	17.60	17.60	19.00	22.93	22.89	22.81	24.00



Band 2							
Ant 2							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch.	Power Middle Ch.	Power High Ch.	Tune-up limit (dbm)
Channel				18700	18900	19100	
Frequency (MHz)				1860	1880	1900	
20	QPSK	1	0	24.07	24.04	23.98	25.7
20	QPSK	1	49	24.00	24.00	23.99	
20	QPSK	1	99	24.01	23.98	23.98	
20	QPSK	50	0	23.08	23.09	23.07	24.7
20	QPSK	50	24	23.12	23.18	23.10	
20	QPSK	50	50	23.17	23.10	23.15	
20	QPSK	100	0	23.22	23.10	23.04	24.7
20	16QAM	1	0	23.37	23.36	23.37	
20	16QAM	1	49	23.28	23.28	23.22	
20	16QAM	1	99	23.34	23.35	23.28	23.7
20	16QAM	50	0	22.06	22.11	22.01	
20	16QAM	50	24	22.23	22.15	22.12	
20	16QAM	50	50	22.18	22.12	22.22	23.7
20	16QAM	100	0	22.15	22.14	22.00	
20	64QAM	1	0	22.27	22.22	22.19	
20	64QAM	1	49	22.19	22.11	21.33	22.7
20	64QAM	1	99	22.11	22.23	22.04	
20	64QAM	50	0	21.08	21.06	20.72	
20	64QAM	50	24	21.14	21.22	20.70	Tune-up limit (dbm)
20	64QAM	50	50	21.12	21.15	20.85	
20	64QAM	100	0	21.18	21.16	20.77	
Channel				1867.5	1890	1902.5	
Frequency (MHz)				1857.5	1880	1902.5	
15	QPSK	1	0	24.02	24.01	24.01	25.7
15	QPSK	1	37	23.96	23.97	24.01	
15	QPSK	1	74	24.02	24.06	24.05	
15	QPSK	36	0	23.09	23.02	23.03	24.7
15	QPSK	36	20	23.18	23.10	23.02	
15	QPSK	36	39	23.16	23.18	23.20	
15	QPSK	75	0	23.19	23.15	23.08	24.7
15	16QAM	1	0	23.30	23.31	23.32	
15	16QAM	1	37	23.29	23.25	23.27	
15	16QAM	1	74	23.40	23.37	23.26	23.7
15	16QAM	36	0	22.09	22.04	22.06	
15	16QAM	36	20	22.15	22.11	22.11	
15	16QAM	36	39	22.19	22.20	22.11	23.7
15	16QAM	75	0	22.11	22.20	22.06	
15	64QAM	1	0	22.18	22.19	21.87	
15	64QAM	1	37	22.31	22.27	21.70	22.7
15	64QAM	1	74	22.19	22.28	22.25	
15	64QAM	36	0	21.19	21.11	20.70	
15	64QAM	36	20	21.18	21.22	20.73	Tune-up limit (dbm)
15	64QAM	36	39	21.21	21.21	21.02	
15	64QAM	75	0	21.15	21.13	20.70	
Channel				18650	18900	19150	
Frequency (MHz)				1855	1880	1905	
10	QPSK	1	0	24.01	24.01	23.93	25.7
10	QPSK	1	25	23.91	23.92	23.96	
10	QPSK	1	49	23.96	23.97	24.05	
10	QPSK	25	0	23.05	23.04	22.98	24.7
10	QPSK	25	12	23.20	23.13	23.10	
10	QPSK	25	25	23.17	23.16	23.12	
10	QPSK	50	0	23.19	23.18	23.09	24.7
10	16QAM	1	0	23.35	23.33	23.35	
10	16QAM	1	25	23.40	23.40	23.34	
10	16QAM	1	49	23.37	23.43	23.43	23.7
10	16QAM	25	0	22.07	22.04	22.04	
10	16QAM	25	12	22.19	22.20	22.07	
10	16QAM	25	25	22.16	22.17	22.17	23.7
10	16QAM	50	0	22.15	22.20	22.06	
10	64QAM	1	0	22.32	22.13	21.70	
10	64QAM	1	25	22.29	22.26	22.08	22.7
10	64QAM	1	49	22.25	22.30	22.25	
10	64QAM	25	0	21.17	21.11	20.70	
10	64QAM	25	12	21.18	21.20	20.88	Tune-up limit (dbm)
10	64QAM	25	25	21.21	21.19	21.07	
10	64QAM	50	0	21.23	21.23	20.77	
Channel				1862.5	1890	1907.5	
Frequency (MHz)				1852.5	1880	1907.5	
5	QPSK	1	0	23.87	23.93	23.99	25.7
5	QPSK	1	12	24.03	24.03	24.00	
5	QPSK	1	24	24.01	24.00	24.01	
5	QPSK	12	0	23.12	23.02	23.13	24.7
5	QPSK	12	7	23.12	23.14	23.19	
5	QPSK	12	13	23.10	23.14	23.19	
5	QPSK	25	0	23.13	23.07	23.06	24.7
5	16QAM	1	0	23.30	23.20	23.29	
5	16QAM	1	12	23.35	23.36	23.36	
5	16QAM	1	24	23.30	23.37	23.37	23.7
5	16QAM	12	0	22.11	22.10	22.17	
5	16QAM	12	7	22.16	22.22	22.15	
5	16QAM	12	13	22.20	22.13	22.18	23.7
5	16QAM	25	0	22.09	22.18	22.08	
5	64QAM	1	0	22.28	22.24	22.01	
5	64QAM	1	12	22.28	22.24	22.18	23.7
5	64QAM	1	24	22.27	22.34	22.26	
5	64QAM	12	0	21.15	21.18	21.21	
5	64QAM	12	7	21.22	21.18	21.20	22.7
5	64QAM	12	13	21.25	21.24	21.20	
5	64QAM	25	0	21.11	21.12	21.13	
Channel				18615	18900	19185	
Frequency (MHz)				1851.5	1880	1906.5	
3	QPSK	1	0	23.94	23.93	23.99	25.7
3	QPSK	1	8	24.03	24.06	24.04	
3	QPSK	1	14	23.96	24.01	24.01	
3	QPSK	8	0	23.03	23.08	23.11	24.7
3	QPSK	8	4	23.07	23.16	23.14	
3	QPSK	8	7	23.08	23.12	23.10	
3	QPSK	15	0	23.07	23.12	23.13	24.7
3	16QAM	1	0	23.26	23.33	23.33	
3	16QAM	1	8	23.34	23.36	23.41	
3	16QAM	1	14	23.31	23.32	23.29	23.7
3	16QAM	8	0	22.19	22.12	22.15	
3	16QAM	8	4	22.15	22.25	22.18	
3	16QAM	8	7	22.20	22.21	22.19	23.7
3	16QAM	15	0	22.13	22.10	22.06	
3	64QAM	1	0	22.19	22.23	22.25	
3	64QAM	1	8	22.32	22.27	22.36	23.7
3	64QAM	1	14	22.27	22.31	22.30	
3	64QAM	8	0	21.16	21.17	21.16	
3	64QAM	8	4	21.27	21.27	21.14	22.7
3	64QAM	8	7	21.17	21.21	21.17	
3	64QAM	15	0	21.11	21.11	21.18	
Channel				18907	18900	19193	
Frequency (MHz)				1850.7	1880	1909.3	
1.4	QPSK	1	0	23.94	23.97	23.96	25.7
1.4	QPSK	1	3	24.02	24.01	23.99	
1.4	QPSK	1	5	23.92	23.95	23.89	
1.4	QPSK	3	0	23.94	24.00	23.91	24.7
1.4	QPSK	3	1	23.98	24.03	24.04	
1.4	QPSK	3	3	23.99	23.96	23.99	
1.4	QPSK	6	0	23.07	22.99	23.07	24.7
1.4	16QAM	1	0	23.17	23.25	23.18	
1.4	16QAM	1	3	23.30	23.38	23.31	
1.4	16QAM	1	5	23.20	23.21	23.18	24.7
1.4	16QAM	3	0	23.02	23.06	22.96	
1.4	16QAM	3	1	23.03	23.08	23.01	
1.4	16QAM	3	3	23.05	23.02	22.97	23.7
1.4	16QAM	6	0	22.06	22.14	22.07	
1.4	64QAM	1	0	22.19	22.14	22.16	
1.4	64QAM	1	3	22.18	22.23	22.28	23.7
1.4	64QAM	1	5	22.13	22.18	22.16	
1.4	64QAM	3	0	22.17	22.17	22.12	
1.4	64QAM	3	1	22.21	22.25	22.15	22.7
1.4	64QAM	3	3	22.11	22.21	22.16	
1.4	64QAM	6	0	21.06	21.02	21.04	



Band 4							
Ant 2							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				20050	20175	20300	
Frequency (MHz)				1720	1732.5	1745	
20	QPSK	1	0	24.31	24.32	24.35	25.7
20	QPSK	1	49	24.20	24.17	24.08	
20	QPSK	1	99	24.21	24.16	24.12	
20	QPSK	50	0	23.35	23.32	23.29	24.7
20	QPSK	50	24	23.41	23.41	23.23	
20	QPSK	50	50	23.36	23.25	23.23	
20	QPSK	100	0	23.29	23.38	23.24	24.7
20	16QAM	1	0	23.69	23.65	23.64	
20	16QAM	1	49	23.51	23.46	23.46	
20	16QAM	1	99	23.57	23.42	23.43	23.7
20	16QAM	50	0	22.31	22.31	22.35	
20	16QAM	50	24	22.39	22.32	22.32	
20	16QAM	50	50	22.34	22.25	22.23	23.7
20	16QAM	100	0	22.35	22.45	22.24	
20	64QAM	1	0	22.29	22.61	22.11	
20	64QAM	1	49	22.41	22.33	22.34	23.7
20	64QAM	1	99	22.41	22.04	22.43	
20	64QAM	50	0	21.33	21.42	21.09	
20	64QAM	50	24	21.42	21.38	21.28	22.7
20	64QAM	50	50	21.29	21.12	21.25	
20	64QAM	100	0	21.41	21.42	21.25	
Channel				20225	20175	20325	Tune-up limit (dBm)
Frequency (MHz)				1717.5	1732.5	1747.5	
15	QPSK	1	0	24.34	24.33	24.33	25.7
15	QPSK	1	37	24.12	24.14	24.11	
15	QPSK	1	74	24.21	24.22	24.14	
15	QPSK	36	0	23.38	23.29	23.31	24.7
15	QPSK	36	20	23.38	23.33	23.20	
15	QPSK	36	39	23.34	23.33	23.30	
15	QPSK	75	0	23.36	23.42	23.23	24.7
15	16QAM	1	0	23.56	23.59	23.62	
15	16QAM	1	37	23.47	23.50	23.44	
15	16QAM	1	74	23.53	23.47	23.42	23.7
15	16QAM	36	0	22.39	22.39	22.33	
15	16QAM	36	20	22.31	22.37	22.30	
15	16QAM	36	39	22.29	22.34	22.22	23.7
15	16QAM	75	0	22.36	22.41	22.24	
15	64QAM	1	0	22.33	22.52	22.27	
15	64QAM	1	37	22.48	22.46	22.44	23.7
15	64QAM	1	74	22.42	22.13	22.33	
15	64QAM	36	0	21.42	21.36	21.34	
15	64QAM	36	20	21.33	21.48	21.30	22.7
15	64QAM	36	39	21.35	21.07	21.28	
15	64QAM	75	0	21.36	21.36	21.30	
Channel				20000	20175	20350	Tune-up limit (dBm)
Frequency (MHz)				1715	1732.5	1750	
10	QPSK	1	0	24.20	24.24	24.21	25.7
10	QPSK	1	25	24.18	24.16	24.15	
10	QPSK	1	49	24.29	24.23	24.22	
10	QPSK	25	0	23.29	23.31	23.21	24.7
10	QPSK	25	12	23.34	23.38	23.22	
10	QPSK	25	25	23.30	23.41	23.29	
10	QPSK	50	0	23.32	23.37	23.21	24.7
10	16QAM	1	0	23.60	23.63	23.56	
10	16QAM	1	25	23.54	23.60	23.51	
10	16QAM	1	49	23.64	23.53	23.60	23.7
10	16QAM	25	0	22.31	22.31	22.27	
10	16QAM	25	12	22.35	22.38	22.27	
10	16QAM	25	25	22.37	22.38	22.30	23.7
10	16QAM	50	0	22.34	22.35	22.29	
10	64QAM	1	0	22.16	22.45	22.40	
10	64QAM	1	25	22.54	22.49	22.42	23.7
10	64QAM	1	49	22.49	22.12	22.47	
10	64QAM	25	0	21.35	21.31	21.24	
10	64QAM	25	12	21.43	21.40	21.26	22.7
10	64QAM	25	25	21.32	21.17	21.38	
10	64QAM	50	0	21.39	21.32	21.29	
Channel				19975	20175	20375	Tune-up limit (dBm)
Frequency (MHz)				1712.5	1732.5	1752.5	
5	QPSK	1	0	24.21	24.19	24.17	25.7
5	QPSK	1	12	24.27	24.26	24.18	
5	QPSK	1	24	24.24	24.25	24.16	
5	QPSK	12	0	23.35	23.31	23.23	24.7
5	QPSK	12	7	23.39	23.36	23.32	
5	QPSK	12	13	23.41	23.39	23.24	
5	QPSK	25	0	23.27	23.38	23.20	24.7
5	16QAM	1	0	23.50	23.54	23.53	
5	16QAM	1	12	23.62	23.63	23.56	
5	16QAM	1	24	23.57	23.57	23.50	23.7
5	16QAM	12	0	22.41	22.36	22.34	
5	16QAM	12	7	22.39	22.37	22.28	
5	16QAM	12	13	22.37	22.42	22.36	23.7
5	16QAM	25	0	22.39	22.31	22.29	
5	64QAM	1	0	22.20	22.51	22.47	
5	64QAM	1	12	22.43	22.47	22.50	23.7
5	64QAM	1	24	22.55	22.09	22.44	
5	64QAM	12	0	21.17	21.28	21.39	
5	64QAM	12	7	21.40	21.46	21.31	22.7
5	64QAM	12	13	21.38	21.22	21.36	
5	64QAM	25	0	21.32	21.44	21.24	
Channel				19965	20175	20385	Tune-up limit (dBm)
Frequency (MHz)				1711.5	1732.5	1753.5	
3	QPSK	1	0	24.24	24.20	24.22	25.7
3	QPSK	1	8	24.32	24.34	24.24	
3	QPSK	1	14	24.27	24.24	24.18	
3	QPSK	8	0	23.29	23.24	23.23	24.7
3	QPSK	8	4	23.35	23.37	23.32	
3	QPSK	8	7	23.42	23.34	23.21	
3	QPSK	15	0	23.36	23.37	23.31	24.7
3	16QAM	1	0	23.64	23.49	23.51	
3	16QAM	1	8	23.63	23.59	23.61	
3	16QAM	1	14	23.55	23.57	23.54	23.7
3	16QAM	8	0	22.41	22.35	22.29	
3	16QAM	8	4	22.41	22.41	22.32	
3	16QAM	8	7	22.37	22.48	22.27	23.7
3	16QAM	15	0	22.34	22.36	22.28	
3	64QAM	1	0	22.28	22.53	22.39	
3	64QAM	1	8	22.47	22.65	22.52	23.7
3	64QAM	1	14	22.49	22.32	22.46	
3	64QAM	8	0	21.18	21.35	21.33	
3	64QAM	8	4	21.37	21.41	21.39	22.7
3	64QAM	8	7	21.34	21.34	21.31	
3	64QAM	15	0	21.32	21.40	21.33	
Channel				19957	20175	20393	Tune-up limit (dBm)
Frequency (MHz)				1710.7	1732.5	1754.3	
1.4	QPSK	1	0	24.15	24.15	24.12	25.7
1.4	QPSK	1	3	24.27	24.30	24.13	
1.4	QPSK	1	5	24.24	24.23	24.07	
1.4	QPSK	3	0	24.25	24.18	24.10	24.7
1.4	QPSK	3	1	24.28	24.31	24.17	
1.4	QPSK	3	3	24.15	24.24	24.12	
1.4	QPSK	6	0	23.25	23.26	23.20	24.7
1.4	16QAM	1	0	23.48	23.49	23.36	
1.4	16QAM	1	3	23.59	23.55	23.50	
1.4	16QAM	1	5	23.56	23.47	23.50	24.7
1.4	16QAM	3	0	23.42	23.33	23.23	
1.4	16QAM	3	1	23.32	23.36	23.29	
1.4	16QAM	3	3	23.28	23.32	23.20	23.7
1.4	16QAM	6	0	22.34	22.32	22.27	
1.4	64QAM	1	0	22.12	22.45	22.36	
1.4	64QAM	1	3	22.21	22.54	22.48	23.7
1.4	64QAM	1	5	22.22	22.44	22.32	
1.4	64QAM	3	0	22.18	22.38	22.37	
1.4	64QAM	3	1	22.29	22.43	22.43	22.7
1.4	64QAM	3	3	22.28	22.37	22.38	
1.4	64QAM	6	0	21.06	21.28	21.17	



Band 5							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				20450	20525	20600	
Frequency (MHz)				829	836.5	844	
10	QPSK	1	0	24.43	24.42	24.42	25.7
10	QPSK	1	25	24.34	24.44	24.43	
10	QPSK	1	49	24.44	24.54	24.29	
10	QPSK	25	0	23.47	23.49	23.49	24.7
10	QPSK	25	12	23.52	23.58	23.57	
10	QPSK	25	25	23.49	23.58	23.47	
10	QPSK	50	0	23.54	23.49	23.60	24.7
10	16QAM	1	0	23.81	23.83	23.86	
10	16QAM	1	25	23.70	23.84	23.83	
10	16QAM	1	49	23.81	23.92	23.71	23.7
10	16QAM	25	0	22.45	22.59	22.54	
10	16QAM	25	12	22.53	22.52	22.54	
10	16QAM	25	25	22.56	22.55	22.57	23.7
10	16QAM	50	0	22.51	22.50	22.49	
10	64QAM	1	0	22.59	22.66	22.64	
10	64QAM	1	25	22.70	22.74	22.76	23.7
10	64QAM	1	49	22.67	22.37	21.72	
10	64QAM	25	0	21.54	21.61	21.55	
10	64QAM	25	12	21.62	21.62	21.60	22.7
10	64QAM	25	25	21.53	21.61	20.86	
10	64QAM	50	0	21.53	21.59	21.28	
Channel				20425	20525	20625	Tune-up limit (dBm)
Frequency (MHz)				826.5	836.5	846.5	
5	QPSK	1	0	24.47	24.51	24.50	25.7
5	QPSK	1	12	24.47	24.45	24.31	
5	QPSK	1	24	24.41	24.52	24.20	
5	QPSK	12	0	23.55	23.64	23.59	24.7
5	QPSK	12	7	23.52	23.57	23.34	
5	QPSK	12	13	23.54	23.56	23.16	
5	QPSK	25	0	23.47	23.56	23.52	24.7
5	16QAM	1	0	23.83	23.83	23.79	
5	16QAM	1	12	23.77	23.83	23.57	
5	16QAM	1	24	23.68	23.85	23.46	23.7
5	16QAM	12	0	22.66	22.51	22.52	
5	16QAM	12	7	22.53	22.60	22.45	
5	16QAM	12	13	22.48	22.61	22.27	23.7
5	16QAM	25	0	22.56	22.52	22.56	
5	64QAM	1	0	22.75	22.73	22.50	
5	64QAM	1	12	22.64	22.69	21.78	23.7
5	64QAM	1	24	22.75	22.55	21.74	
5	64QAM	12	0	21.65	21.66	21.30	
5	64QAM	12	7	21.54	21.63	20.70	22.7
5	64QAM	12	13	21.51	21.61	20.71	
5	64QAM	25	0	21.58	21.61	20.70	
Channel				20415	20525	20635	Tune-up limit (dBm)
Frequency (MHz)				825.5	836.5	847.5	
3	QPSK	1	0	24.47	24.41	24.18	25.7
3	QPSK	1	8	24.50	24.48	24.04	
3	QPSK	1	14	24.40	24.49	24.13	
3	QPSK	8	0	23.54	23.58	23.04	24.7
3	QPSK	8	4	23.49	23.62	23.07	
3	QPSK	8	7	23.50	23.55	23.20	
3	QPSK	15	0	23.57	23.53	23.08	24.7
3	16QAM	1	0	23.83	23.81	23.53	
3	16QAM	1	8	23.83	23.86	23.38	
3	16QAM	1	14	23.69	23.78	23.46	23.7
3	16QAM	8	0	22.64	22.58	22.31	
3	16QAM	8	4	22.60	22.65	22.23	
3	16QAM	8	7	22.57	22.60	22.28	23.7
3	16QAM	15	0	22.60	22.62	22.19	
3	64QAM	1	0	22.63	22.73	21.70	
3	64QAM	1	8	22.75	22.75	21.72	23.7
3	64QAM	1	14	22.63	22.50	21.71	
3	64QAM	8	0	21.65	21.56	20.70	
3	64QAM	8	4	21.58	21.67	20.70	22.7
3	64QAM	8	7	21.49	21.63	20.74	
3	64QAM	15	0	21.53	21.62	20.71	
Channel				20407	20525	20643	Tune-up limit (dBm)
Frequency (MHz)				824.7	836.5	848.3	
1.4	QPSK	1	0	24.39	24.32	23.95	25.7
1.4	QPSK	1	3	24.42	24.47	24.10	
1.4	QPSK	1	5	24.29	24.38	24.09	
1.4	QPSK	3	0	24.41	24.36	24.12	24.7
1.4	QPSK	3	1	24.47	24.40	24.12	
1.4	QPSK	3	3	24.41	24.44	24.37	
1.4	QPSK	6	0	23.42	23.57	23.18	24.7
1.4	16QAM	1	0	23.68	23.69	23.34	
1.4	16QAM	1	3	23.69	23.85	23.50	
1.4	16QAM	1	5	23.61	23.69	23.58	24.7
1.4	16QAM	3	0	23.51	23.51	23.12	
1.4	16QAM	3	1	23.49	23.54	23.29	
1.4	16QAM	3	3	23.42	23.48	23.42	23.7
1.4	16QAM	6	0	22.55	22.62	22.27	
1.4	64QAM	1	0	22.60	22.60	21.70	
1.4	64QAM	1	3	22.68	22.75	21.72	23.7
1.4	64QAM	1	5	22.60	22.59	21.71	
1.4	64QAM	3	0	22.63	22.63	21.70	
1.4	64QAM	3	1	22.65	22.62	21.72	22.7
1.4	64QAM	3	3	22.55	22.58	21.71	
1.4	64QAM	6	0	21.45	21.48	20.72	



Band 7							
Ant 2							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				20850	21100	21350	
Frequency (MHz)				2510	2535	2560	
20	QPSK	1	0	24.42	24.46	24.29	25.7
20	QPSK	1	49	24.47	24.42	24.26	
20	QPSK	1	99	24.57	24.45	24.26	
20	QPSK	50	0	23.70	23.47	23.46	24.7
20	QPSK	50	24	23.67	23.48	23.39	
20	QPSK	50	50	23.63	23.56	23.41	
20	QPSK	100	0	23.65	23.54	23.41	24.7
20	16QAM	1	0	23.78	23.66	23.64	
20	16QAM	1	49	23.50	23.75	23.62	
20	16QAM	1	99	23.92	23.50	23.63	23.7
20	16QAM	50	0	22.63	22.47	22.42	
20	16QAM	50	24	22.62	22.52	22.45	
20	16QAM	50	50	22.67	22.54	22.47	23.7
20	16QAM	100	0	22.62	22.54	22.39	
20	64QAM	1	0	22.62	22.55	22.54	
20	64QAM	1	49	22.70	22.68	21.98	23.7
20	64QAM	1	99	22.80	22.64	22.33	
20	64QAM	50	0	21.70	21.49	21.27	
20	64QAM	50	24	21.76	21.56	21.21	22.7
20	64QAM	50	50	21.74	21.62	21.38	
20	64QAM	100	0	21.65	21.55	21.21	
Channel				20825	21100	21375	Tune-up limit (dBm)
Frequency (MHz)				2507.5	2535	2562.5	
15	QPSK	1	0	24.47	24.39	24.28	25.7
15	QPSK	1	37	24.53	24.47	24.21	
15	QPSK	1	74	24.56	24.48	24.31	
15	QPSK	36	0	23.55	23.46	23.42	24.7
15	QPSK	36	20	23.69	23.35	23.43	
15	QPSK	36	39	23.66	23.56	23.40	
15	QPSK	75	0	23.65	23.50	23.38	24.7
15	16QAM	1	0	23.77	23.74	23.63	
15	16QAM	1	37	23.89	23.87	23.62	
15	16QAM	1	74	23.67	23.81	23.66	23.7
15	16QAM	36	0	22.59	22.45	22.39	
15	16QAM	36	20	22.59	22.55	22.46	
15	16QAM	36	39	22.68	22.50	22.37	23.7
15	16QAM	75	0	22.62	22.50	22.40	
15	64QAM	1	0	22.74	22.60	22.49	
15	64QAM	1	37	22.76	22.74	22.01	23.7
15	64QAM	1	74	22.86	22.71	22.47	
15	64QAM	36	0	21.65	21.50	21.05	
15	64QAM	36	20	21.74	21.56	21.23	22.7
15	64QAM	36	39	21.74	21.62	21.47	
15	64QAM	75	0	21.73	21.57	21.18	
Channel				20800	21100	21400	Tune-up limit (dBm)
Frequency (MHz)				2505	2535	2565	
10	QPSK	1	0	24.39	24.39	24.21	25.7
10	QPSK	1	25	24.48	24.35	24.11	
10	QPSK	1	49	24.51	24.44	24.22	
10	QPSK	25	0	23.61	23.41	23.33	24.7
10	QPSK	25	12	23.67	23.45	23.39	
10	QPSK	25	25	23.63	23.54	23.38	
10	QPSK	50	0	23.58	23.48	23.27	24.7
10	16QAM	1	0	23.85	23.89	23.46	
10	16QAM	1	25	23.77	23.77	23.48	
10	16QAM	1	49	23.87	23.78	23.54	23.7
10	16QAM	25	0	22.56	22.38	22.28	
10	16QAM	25	12	22.65	22.45	22.36	
10	16QAM	25	25	22.66	22.51	22.30	23.7
10	16QAM	50	0	22.66	22.46	22.26	
10	64QAM	1	0	22.74	22.61	22.24	
10	64QAM	1	25	22.74	22.65	22.46	23.7
10	64QAM	1	49	22.82	22.67	22.50	
10	64QAM	25	0	21.64	21.45	21.27	
10	64QAM	25	12	21.63	21.57	21.34	22.7
10	64QAM	25	25	21.55	21.51	21.31	
10	64QAM	50	0	21.60	21.53	21.29	
Channel				20775	21100	21425	Tune-up limit (dBm)
Frequency (MHz)				2502.5	2535	2567.5	
5	QPSK	1	0	24.52	24.31	24.15	25.7
5	QPSK	1	12	24.53	24.50	24.27	
5	QPSK	1	24	24.51	24.44	24.20	
5	QPSK	12	0	23.55	23.47	23.28	24.7
5	QPSK	12	7	23.56	23.53	23.25	
5	QPSK	12	13	23.62	23.61	23.32	
5	QPSK	25	0	23.66	23.52	23.29	24.7
5	16QAM	1	0	23.79	23.64	23.45	
5	16QAM	1	12	23.80	23.76	23.46	
5	16QAM	1	24	23.90	23.74	23.55	23.7
5	16QAM	12	0	22.62	22.56	22.33	
5	16QAM	12	7	22.65	22.52	22.34	
5	16QAM	12	13	22.70	22.65	22.31	23.7
5	16QAM	25	0	22.67	22.57	22.33	
5	64QAM	1	0	22.81	22.68	22.42	
5	64QAM	1	12	22.79	22.69	22.40	23.7
5	64QAM	1	24	22.81	22.77	22.44	
5	64QAM	12	0	21.67	21.59	21.37	
5	64QAM	12	7	21.68	21.57	21.37	22.7
5	64QAM	12	13	21.74	21.63	21.40	
5	64QAM	25	0	21.68	21.48	21.35	



Band 12							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				23060	23095	23130	
Frequency (MHz)				704	707.5	711	
10	QPSK	1	0	24.34	24.12	24.24	25.7
10	QPSK	1	25	24.15	24.15	24.14	
10	QPSK	1	49	24.31	24.24	24.14	
10	QPSK	25	0	23.27	23.33	23.32	24.7
10	QPSK	25	12	23.38	23.34	23.35	
10	QPSK	25	25	23.31	23.30	23.35	
10	QPSK	50	0	23.34	23.28	23.32	24.7
10	16QAM	1	0	23.55	23.49	23.56	
10	16QAM	1	25	23.61	23.61	23.59	
10	16QAM	1	49	23.66	23.60	23.54	23.7
10	16QAM	25	0	22.32	22.28	22.33	
10	16QAM	25	12	22.40	22.35	22.36	
10	16QAM	25	25	22.37	22.36	22.34	23.7
10	16QAM	50	0	22.39	22.31	22.33	
10	64QAM	1	0	22.43	22.31	22.39	
10	64QAM	1	25	22.52	22.42	22.25	23.7
10	64QAM	1	49	22.61	22.54	22.53	
10	64QAM	25	0	21.31	21.33	21.22	
10	64QAM	25	12	21.46	21.39	21.33	22.7
10	64QAM	25	25	21.37	21.41	21.37	
10	64QAM	50	0	21.36	21.34	21.37	
Channel				23035	23095	23155	Tune-up limit (dBm)
Frequency (MHz)				701.5	707.5	713.5	
5	QPSK	1	0	24.27	24.18	24.20	25.7
5	QPSK	1	12	24.27	24.28	24.27	
5	QPSK	1	24	24.23	24.21	24.24	
5	QPSK	12	0	23.38	23.32	23.26	24.7
5	QPSK	12	7	23.33	23.26	23.25	
5	QPSK	12	13	23.33	23.26	23.27	
5	QPSK	25	0	23.36	23.28	23.20	24.7
5	16QAM	1	0	23.59	23.56	23.50	
5	16QAM	1	12	23.60	23.59	23.55	
5	16QAM	1	24	23.61	23.61	23.60	23.7
5	16QAM	12	0	22.36	22.32	22.28	
5	16QAM	12	7	22.39	22.34	22.36	
5	16QAM	12	13	22.32	22.35	22.28	23.7
5	16QAM	25	0	22.40	22.35	22.32	
5	64QAM	1	0	22.37	22.24	22.40	
5	64QAM	1	12	22.51	22.44	22.40	22.7
5	64QAM	1	24	22.35	22.48	22.45	
5	64QAM	12	0	21.39	21.41	21.38	
5	64QAM	12	7	21.34	21.35	21.34	22.7
5	64QAM	12	13	21.43	21.38	21.28	
5	64QAM	25	0	21.42	21.39	21.32	
Channel				23025	23095	23165	Tune-up limit (dBm)
Frequency (MHz)				700.5	707.5	714.5	
3	QPSK	1	0	24.31	24.21	24.28	25.7
3	QPSK	1	8	24.32	24.30	24.30	
3	QPSK	1	14	24.28	24.27	24.18	
3	QPSK	8	0	23.35	23.27	23.30	24.7
3	QPSK	8	4	23.37	23.40	23.35	
3	QPSK	8	7	23.38	23.38	23.25	
3	QPSK	15	0	23.39	23.28	23.21	24.7
3	16QAM	1	0	23.71	23.62	23.52	
3	16QAM	1	8	23.56	23.59	23.60	
3	16QAM	1	14	23.60	23.56	23.46	23.7
3	16QAM	8	0	22.42	22.42	22.32	
3	16QAM	8	4	22.41	22.40	22.36	
3	16QAM	8	7	22.33	22.41	22.27	23.7
3	16QAM	15	0	22.37	22.31	22.30	
3	64QAM	1	0	22.48	22.41	22.47	
3	64QAM	1	8	22.64	22.55	22.45	23.7
3	64QAM	1	14	22.47	22.49	22.43	
3	64QAM	8	0	21.41	21.39	21.36	
3	64QAM	8	4	21.44	21.51	21.40	22.7
3	64QAM	8	7	21.34	21.40	21.36	
3	64QAM	15	0	21.37	21.34	21.24	
Channel				23017	23095	23173	Tune-up limit (dBm)
Frequency (MHz)				699.7	707.5	715.3	
1.4	QPSK	1	0	24.18	24.13	24.08	25.7
1.4	QPSK	1	3	24.23	24.21	24.18	
1.4	QPSK	1	5	24.19	24.20	24.02	
1.4	QPSK	3	0	24.26	24.09	24.18	24.7
1.4	QPSK	3	1	24.25	24.22	24.19	
1.4	QPSK	3	3	24.21	24.22	24.13	
1.4	QPSK	6	0	23.32	23.26	23.12	24.7
1.4	16QAM	1	0	23.60	23.49	23.46	
1.4	16QAM	1	3	23.57	23.57	23.48	
1.4	16QAM	1	5	23.53	23.52	23.43	24.7
1.4	16QAM	3	0	23.34	23.24	23.26	
1.4	16QAM	3	1	23.38	23.30	23.31	
1.4	16QAM	3	3	23.31	23.24	23.13	23.7
1.4	16QAM	6	0	22.32	22.23	22.22	
1.4	64QAM	1	0	22.48	22.42	22.38	
1.4	64QAM	1	3	22.46	22.50	22.42	23.7
1.4	64QAM	1	5	22.46	22.36	22.34	
1.4	64QAM	3	0	22.37	22.38	22.39	
1.4	64QAM	3	1	22.41	22.38	22.32	23.7
1.4	64QAM	3	3	22.40	22.38	22.31	
1.4	64QAM	6	0	21.27	21.21	21.21	



Band 13							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				23230			
Frequency (MHz)				762			
10	QPSK	1	0	23.83			25.2
10	QPSK	1	25	23.84			
10	QPSK	1	49	23.87			
10	QPSK	25	0	22.96			24.2
10	QPSK	25	12	23.01			
10	QPSK	25	25	22.91			
10	QPSK	50	0	23.01			24.2
10	16QAM	1	0	23.16			
10	16QAM	1	25	23.15			
10	16QAM	1	49	23.15			23.2
10	16QAM	25	0	21.97			
10	16QAM	25	12	22.03			
10	16QAM	25	25	21.93			23.2
10	16QAM	50	0	21.95			
10	64QAM	1	0	22.01			
10	64QAM	1	25	22.13			23.2
10	64QAM	1	49	22.04			
10	64QAM	25	0	21.02			
10	64QAM	25	12	21.00			22.2
10	64QAM	25	25	21.04			
10	64QAM	50	0	20.96			
Channel				23206 23230 23255			Tune-up limit (dBm)
Frequency (MHz)				779.5 762 784.5			
5	QPSK	1	0	23.75	23.76	23.86	25.2
5	QPSK	1	12	23.88	23.84	23.87	
5	QPSK	1	24	23.87	23.86	23.87	
5	QPSK	12	0	22.89	22.92	22.92	24.2
5	QPSK	12	7	22.83	22.97	22.83	
5	QPSK	12	13	23.02	23.01	22.92	
5	QPSK	25	0	23.01	22.99	22.91	24.2
5	16QAM	1	0	23.08	23.05	23.08	
5	16QAM	1	12	23.16	23.14	23.09	
5	16QAM	1	24	23.16	23.10	23.03	23.2
5	16QAM	12	0	21.99	21.97	21.98	
5	16QAM	12	7	22.05	21.96	21.96	
5	16QAM	12	13	22.02	21.94	21.97	23.2
5	16QAM	25	0	22.03	21.94	21.88	
5	64QAM	1	0	22.00	22.13	21.98	
5	64QAM	1	12	22.13	22.06	22.08	23.2
5	64QAM	1	24	22.07	22.15	22.00	
5	64QAM	12	0	21.03	21.06	20.99	
5	64QAM	12	7	21.07	21.01	20.92	22.2
5	64QAM	12	13	20.98	21.05	20.97	
5	64QAM	25	0	20.96	20.95	20.88	



Band 14							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				23330			
Frequency (MHz)				793			
10	QPSK	1	0	24.44			25.7
10	QPSK	1	25	24.49			
10	QPSK	1	49	24.32			
10	QPSK	25	0	23.51			
10	QPSK	25	12	23.50			24.7
10	QPSK	25	25	23.48			
10	QPSK	50	0	23.42			
10	16QAM	1	0	23.87			24.7
10	16QAM	1	25	23.84			
10	16QAM	1	49	23.71			
10	16QAM	25	0	22.44			
10	16QAM	25	12	22.54			23.7
10	16QAM	25	25	22.55			
10	16QAM	50	0	22.44			
10	64QAM	1	0	22.75			23.7
10	64QAM	1	25	22.58			
10	64QAM	1	49	22.65			
10	64QAM	25	0	21.50			
10	64QAM	25	12	21.33			22.7
10	64QAM	25	25	21.48			
10	64QAM	50	0	21.55			
Channel				23306	23330	23355	Tune-up limit (dBm)
Frequency (MHz)				790.5	793	795.5	
5	QPSK	1	0	24.48	24.40	24.42	25.7
5	QPSK	1	12	24.48	24.48	24.47	
5	QPSK	1	24	24.47	24.44	24.42	
5	QPSK	12	0	23.54	23.49	23.41	24.7
5	QPSK	12	7	23.60	23.52	23.47	
5	QPSK	12	13	23.50	23.55	23.45	
5	QPSK	25	0	23.59	23.48	23.43	
5	16QAM	1	0	23.74	23.78	23.68	24.7
5	16QAM	1	12	23.78	23.80	23.80	
5	16QAM	1	24	23.80	23.72	23.71	
5	16QAM	12	0	22.51	22.57	22.48	23.7
5	16QAM	12	7	22.62	22.60	22.49	
5	16QAM	12	13	22.59	22.55	22.51	
5	16QAM	25	0	22.57	22.52	22.50	
5	64QAM	1	0	22.71	22.62	22.36	23.7
5	64QAM	1	12	22.78	22.24	22.53	
5	64QAM	1	24	22.33	22.27	22.70	
5	64QAM	12	0	21.61	21.26	21.18	22.7
5	64QAM	12	7	21.68	21.24	21.54	
5	64QAM	12	13	21.36	21.23	21.61	
5	64QAM	25	0	21.64	21.16	21.49	



Band 17							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch./	Power Middle Ch./	Power High Ch./	Tune-up limit (dBm)
Channel				23780	23790	23800	
Frequency (MHz)				709	710	711	
10	QPSK	1	0	24.38	24.29	24.27	25.7
10	QPSK	1	25	24.35	24.27	24.31	
10	QPSK	1	49	24.33	24.40	24.28	
10	QPSK	25	0	23.34	23.36	23.37	24.7
10	QPSK	25	12	23.51	23.39	23.43	
10	QPSK	25	25	23.50	23.51	23.46	
10	QPSK	50	0	23.44	23.37	23.34	24.7
10	16QAM	1	0	23.64	23.67	23.59	
10	16QAM	1	25	23.73	23.67	23.67	
10	16QAM	1	49	23.70	23.70	23.73	23.7
10	16QAM	25	0	22.35	22.28	22.38	
10	16QAM	25	12	22.43	22.42	22.36	
10	16QAM	25	25	22.40	22.45	22.42	23.7
10	16QAM	50	0	22.50	22.35	22.41	
10	64QAM	1	0	22.59	22.53	22.57	
10	64QAM	1	25	22.67	22.66	22.50	23.7
10	64QAM	1	49	22.65	22.65	22.58	
10	64QAM	25	0	21.36	21.43	21.41	
10	64QAM	25	12	21.47	21.43	21.46	22.7
10	64QAM	25	25	21.51	21.55	21.51	
10	64QAM	50	0	21.54	21.40	21.44	
Channel				23755	23790	23825	Tune-up limit (dBm)
Frequency (MHz)				706.5	710	713.5	
5	QPSK	1	0	24.24	24.27	24.26	25.7
5	QPSK	1	12	24.31	24.37	24.39	
5	QPSK	1	24	24.38	24.39	24.31	
5	QPSK	12	0	23.43	23.34	23.35	24.7
5	QPSK	12	7	23.48	23.47	23.43	
5	QPSK	12	13	23.46	23.44	23.40	
5	QPSK	25	0	23.49	23.45	23.42	24.7
5	16QAM	1	0	23.57	23.61	23.61	
5	16QAM	1	12	23.61	23.69	23.63	
5	16QAM	1	24	23.73	23.76	23.68	23.7
5	16QAM	12	0	22.40	22.39	22.36	
5	16QAM	12	7	22.45	22.40	22.38	
5	16QAM	12	13	22.51	22.44	22.43	23.7
5	16QAM	25	0	22.43	22.44	22.49	
5	64QAM	1	0	22.41	22.31	22.54	
5	64QAM	1	12	22.59	22.50	22.51	23.7
5	64QAM	1	24	22.61	22.53	22.49	
5	64QAM	12	0	21.43	21.40	21.44	
5	64QAM	12	7	21.47	21.45	21.53	22.7
5	64QAM	12	13	21.53	21.55	21.51	
5	64QAM	25	0	21.45	21.36	21.40	



Band 25							
Ant 2							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				26140	26340	26590	
Frequency (MHz)				1860	1880	1905	
20	QPSK	1	0	24.13	24.06	23.81	25.7
20	QPSK	1	48	23.99	23.97	23.96	
20	QPSK	1	99	24.02	23.96	23.70	
20	QPSK	50	0	23.05	23.09	23.04	24.7
20	QPSK	50	24	23.18	23.14	23.08	
20	QPSK	50	50	23.10	23.11	23.05	
20	QPSK	100	0	23.16	23.17	22.97	24.7
20	16QAM	1	0	23.34	23.39	23.30	
20	16QAM	1	49	23.37	23.32	23.19	
20	16QAM	1	99	23.23	23.33	23.01	23.7
20	16QAM	50	0	22.11	22.14	22.04	
20	16QAM	50	24	22.16	22.16	22.01	
20	16QAM	50	50	22.19	22.13	22.05	22.7
20	16QAM	100	0	22.18	22.15	22.00	
20	64QAM	1	0	22.18	22.15	21.86	
20	64QAM	1	49	22.25	22.19	21.73	23.7
20	64QAM	1	99	21.80	22.20	21.70	
20	64QAM	50	0	21.19	21.17	20.70	
20	64QAM	50	24	21.24	21.25	20.85	22.7
20	64QAM	50	50	20.98	21.20	20.83	
20	64QAM	100	0	21.14	21.10	20.54	
Channel				26115	26340	26515	Tune-up limit (dBm)
Frequency (MHz)				1857.5	1880	1907.5	
15	QPSK	1	0	24.01	24.09	23.92	25.7
15	QPSK	1	37	24.01	24.00	23.88	
15	QPSK	1	74	23.99	24.09	23.80	
15	QPSK	36	0	23.19	23.14	22.96	24.7
15	QPSK	36	20	23.23	23.17	23.10	
15	QPSK	36	39	23.07	23.13	23.05	
15	QPSK	75	0	23.20	23.18	23.11	24.7
15	16QAM	1	0	23.27	23.38	23.22	
15	16QAM	1	37	23.35	23.25	23.24	
15	16QAM	1	74	23.32	23.35	23.15	23.7
15	16QAM	36	0	22.15	22.16	22.01	
15	16QAM	36	20	22.12	22.14	22.05	
15	16QAM	36	39	22.07	22.18	22.09	23.7
15	16QAM	75	0	22.16	22.12	22.07	
15	64QAM	1	0	22.25	22.23	21.70	
15	64QAM	1	37	22.18	22.24	22.09	23.7
15	64QAM	1	74	22.17	22.25	21.71	
15	64QAM	36	0	21.17	21.12	20.87	
15	64QAM	36	20	21.20	21.21	21.16	22.7
15	64QAM	36	39	21.22	21.21	20.81	
15	64QAM	75	0	21.17	21.21	20.70	
Channel				26090	26340	26640	Tune-up limit (dBm)
Frequency (MHz)				1855	1880	1910	
10	QPSK	1	0	24.01	24.06	23.82	25.7
10	QPSK	1	25	23.92	23.97	23.87	
10	QPSK	1	49	24.04	24.00	23.70	
10	QPSK	25	0	23.08	23.13	22.98	24.7
10	QPSK	25	12	23.11	23.14	23.08	
10	QPSK	25	25	23.08	23.10	23.09	
10	QPSK	50	0	23.17	23.08	22.99	24.7
10	16QAM	1	0	23.40	23.34	23.30	
10	16QAM	1	25	23.33	23.41	23.28	
10	16QAM	1	49	23.40	23.46	23.17	23.7
10	16QAM	25	0	22.09	22.18	21.95	
10	16QAM	25	12	22.15	22.18	22.08	
10	16QAM	25	25	22.06	22.15	22.09	23.7
10	16QAM	50	0	22.13	22.15	21.98	
10	64QAM	1	0	22.28	22.24	22.07	
10	64QAM	1	25	22.32	22.25	22.23	23.7
10	64QAM	1	49	22.28	22.33	21.70	
10	64QAM	25	0	21.15	21.20	20.96	
10	64QAM	25	12	21.22	21.24	21.09	22.7
10	64QAM	25	25	21.16	21.12	20.65	
10	64QAM	50	0	21.08	21.22	20.68	
Channel				26055	26340	26655	Tune-up limit (dBm)
Frequency (MHz)				1852.5	1880	1912.5	
5	QPSK	1	0	24.03	23.93	23.85	25.7
5	QPSK	1	12	24.00	24.06	23.99	
5	QPSK	1	24	24.07	24.05	23.70	
5	QPSK	12	0	23.01	23.11	22.97	24.7
5	QPSK	12	7	23.05	23.20	23.08	
5	QPSK	12	13	23.19	23.18	22.88	
5	QPSK	25	0	23.10	23.09	23.03	24.7
5	16QAM	1	0	23.41	23.31	23.27	
5	16QAM	1	12	23.34	23.34	23.22	
5	16QAM	1	24	23.31	23.34	23.00	23.7
5	16QAM	12	0	22.05	22.14	22.01	
5	16QAM	12	7	22.19	22.16	22.10	
5	16QAM	12	13	22.11	22.19	22.08	23.7
5	16QAM	25	0	22.13	22.15	21.97	
5	64QAM	1	0	22.30	22.25	21.98	
5	64QAM	1	12	22.17	22.21	21.72	23.7
5	64QAM	1	24	22.28	22.32	21.70	
5	64QAM	12	0	21.16	21.10	20.95	
5	64QAM	12	7	21.21	21.20	20.63	22.7
5	64QAM	12	13	21.17	21.28	20.33	
5	64QAM	25	0	21.12	21.14	20.45	
Channel				26055	26340	26675	Tune-up limit (dBm)
Frequency (MHz)				1851.5	1880	1913.5	
3	QPSK	1	0	23.98	23.93	23.87	25.7
3	QPSK	1	8	24.12	24.08	23.82	
3	QPSK	1	14	24.05	24.08	23.70	
3	QPSK	8	0	23.07	23.05	22.95	24.7
3	QPSK	8	4	23.17	23.11	23.02	
3	QPSK	8	7	23.15	23.21	22.74	
3	QPSK	15	0	23.15	23.14	22.92	24.7
3	16QAM	1	0	23.25	23.28	23.13	
3	16QAM	1	8	23.36	23.40	23.11	
3	16QAM	1	14	23.39	23.48	22.84	23.7
3	16QAM	8	0	22.13	22.17	22.00	
3	16QAM	8	4	22.22	22.28	22.12	
3	16QAM	8	7	22.22	22.17	21.96	23.7
3	16QAM	15	0	22.11	22.16	22.01	
3	64QAM	1	0	22.23	22.13	21.73	
3	64QAM	1	8	22.34	22.32	22.31	23.7
3	64QAM	1	14	22.27	22.32	21.97	
3	64QAM	8	0	21.12	21.17	21.71	
3	64QAM	8	4	21.22	21.22	20.35	22.7
3	64QAM	8	7	21.16	21.22	20.17	
3	64QAM	15	0	21.11	21.16	20.31	
Channel				26047	26340	26683	Tune-up limit (dBm)
Frequency (MHz)				1850.7	1880	1914.3	
1.4	QPSK	1	0	23.85	23.95	23.74	25.7
1.4	QPSK	1	3	24.09	24.02	23.83	
1.4	QPSK	1	5	23.99	24.04	23.84	
1.4	QPSK	3	0	23.96	24.00	23.76	24.7
1.4	QPSK	3	1	24.06	24.00	23.78	
1.4	QPSK	3	3	24.05	24.00	23.77	
1.4	QPSK	6	0	23.09	23.01	22.79	24.7
1.4	16QAM	1	0	23.26	23.31	23.02	
1.4	16QAM	1	3	23.32	23.40	22.93	
1.4	16QAM	1	5	23.36	23.39	22.85	24.7
1.4	16QAM	3	0	23.05	23.03	22.86	
1.4	16QAM	3	1	23.14	23.14	22.83	
1.4	16QAM	3	3	23.09	23.11	22.70	23.7
1.4	16QAM	6	0	22.16	22.11	21.91	
1.4	64QAM	1	0	22.12	22.22	22.11	
1.4	64QAM	1	3	22.27	22.31	22.07	23.7
1.4	64QAM	1	5	22.23	22.28	21.91	
1.4	64QAM	3	0	22.13	22.14	22.06	
1.4	64QAM	3	1	22.19	22.23	22.26	22.7
1.4	64QAM	3	3	22.20	22.29	22.08	
1.4	64QAM	6	0	21.01	21.03	21.05	



Band 26							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				26765	26865	26965	
Frequency (MHz)				821.5	831.5	841.5	
15	QPSK	1	0	24.28	24.16	24.24	25.7
15	QPSK	1	37	24.14	24.24	24.21	
15	QPSK	1	74	24.27	24.52	24.13	
15	QPSK	36	0	23.38	23.39	23.34	24.7
15	QPSK	36	20	23.40	23.31	23.37	
15	QPSK	36	39	23.33	23.34	23.29	
15	QPSK	75	0	23.39	23.35	23.35	24.7
15	16QAM	1	0	23.55	23.58	23.61	
15	16QAM	1	37	23.54	23.54	23.60	
15	16QAM	1	74	23.56	23.63	23.47	23.7
15	16QAM	36	0	22.36	22.42	22.34	
15	16QAM	36	20	22.34	22.33	22.30	
15	16QAM	36	39	22.36	22.36	22.33	23.7
15	16QAM	75	0	22.42	22.38	22.33	
15	64QAM	1	0	22.48	22.42	22.41	
15	64QAM	1	37	22.45	22.49	22.41	23.7
15	64QAM	1	74	22.48	22.48	21.70	
15	64QAM	36	0	21.43	21.45	21.41	
15	64QAM	36	20	21.47	21.43	21.37	22.7
15	64QAM	36	39	21.38	21.44	21.49	
15	64QAM	75	0	21.47	21.36	21.42	
Channel				26740	26865	26990	Tune-up limit (dBm)
Frequency (MHz)				819	831.5	844	
10	QPSK	1	0	24.38	24.29	24.37	25.7
10	QPSK	1	25	24.22	24.25	24.23	
10	QPSK	1	49	24.28	24.29	24.20	
10	QPSK	25	0	23.50	23.36	23.44	24.7
10	QPSK	25	12	23.50	23.41	23.37	
10	QPSK	25	25	23.40	23.42	23.37	
10	QPSK	50	0	23.38	23.41	23.42	24.7
10	16QAM	1	0	23.77	23.60	23.75	
10	16QAM	1	25	23.61	23.73	23.64	
10	16QAM	1	49	23.64	23.67	23.62	23.7
10	16QAM	25	0	22.48	22.36	22.37	
10	16QAM	25	12	22.45	22.42	22.36	
10	16QAM	25	25	22.30	22.44	22.38	22.7
10	16QAM	50	0	22.46	22.37	22.33	
10	64QAM	1	0	22.64	22.51	22.57	
10	64QAM	1	25	22.54	22.66	22.66	22.7
10	64QAM	1	49	22.56	22.60	22.05	
10	64QAM	25	0	21.44	21.42	21.43	
10	64QAM	25	12	21.50	21.47	21.48	22.7
10	64QAM	25	25	21.37	21.41	21.29	
10	64QAM	50	0	21.47	21.37	21.36	
Channel				26715	26865	27015	Tune-up limit (dBm)
Frequency (MHz)				816.5	831.5	846.5	
5	QPSK	1	0	24.45	24.32	24.35	25.7
5	QPSK	1	12	24.38	24.36	24.33	
5	QPSK	1	24	24.30	24.37	24.26	
5	QPSK	12	0	23.50	23.37	23.40	24.7
5	QPSK	12	7	23.51	23.41	23.44	
5	QPSK	12	13	23.44	23.36	23.33	
5	QPSK	25	0	23.44	23.40	23.38	24.7
5	16QAM	1	0	23.78	23.60	23.73	
5	16QAM	1	12	23.72	23.66	23.60	
5	16QAM	1	24	23.66	23.72	23.58	23.7
5	16QAM	12	0	22.49	22.38	22.41	
5	16QAM	12	7	22.45	22.45	22.41	
5	16QAM	12	13	22.44	22.37	22.30	23.7
5	16QAM	25	0	22.43	22.36	22.40	
5	64QAM	1	0	22.73	22.56	22.53	
5	64QAM	1	12	22.54	22.59	21.87	23.7
5	64QAM	1	24	22.56	22.57	21.82	
5	64QAM	12	0	21.58	21.56	21.51	
5	64QAM	12	7	21.59	21.50	20.86	22.7
5	64QAM	12	13	21.54	21.45	20.56	
5	64QAM	25	0	21.50	21.39	21.68	
Channel				26705	26865	27025	Tune-up limit (dBm)
Frequency (MHz)				815.5	831.5	847.5	
3	QPSK	1	0	24.43	24.37	24.37	25.7
3	QPSK	1	8	24.41	24.37	24.32	
3	QPSK	1	14	24.30	24.35	24.26	
3	QPSK	8	0	23.51	23.43	23.27	24.7
3	QPSK	8	4	23.54	23.46	23.33	
3	QPSK	8	7	23.40	23.41	23.37	
3	QPSK	15	0	23.42	23.35	23.30	24.7
3	16QAM	1	0	23.79	23.62	23.67	
3	16QAM	1	8	23.80	23.76	23.49	
3	16QAM	1	14	23.68	23.71	23.56	23.7
3	16QAM	8	0	22.53	22.44	22.45	
3	16QAM	8	4	22.59	22.47	22.41	
3	16QAM	8	7	22.46	22.49	22.36	23.7
3	16QAM	15	0	22.56	22.36	22.37	
3	64QAM	1	0	22.61	22.57	21.91	
3	64QAM	1	8	22.68	22.58	21.70	23.7
3	64QAM	1	14	22.58	22.61	21.71	
3	64QAM	8	0	21.59	21.49	20.70	
3	64QAM	8	4	21.55	21.54	20.57	22.7
3	64QAM	8	7	21.49	21.52	20.57	
3	64QAM	15	0	21.50	21.48	20.64	
Channel				26697	26865	27033	Tune-up limit (dBm)
Frequency (MHz)				814.7	831.5	848.3	
1.4	QPSK	1	0	24.37	24.27	24.21	25.7
1.4	QPSK	1	3	24.42	24.30	24.23	
1.4	QPSK	1	5	24.36	24.21	24.15	
1.4	QPSK	3	0	24.41	24.23	24.20	24.7
1.4	QPSK	3	1	24.41	24.33	24.21	
1.4	QPSK	3	3	24.40	24.32	24.20	
1.4	QPSK	6	0	23.41	23.38	23.30	24.7
1.4	16QAM	1	0	23.71	23.59	23.46	
1.4	16QAM	1	3	23.72	23.62	23.59	
1.4	16QAM	1	5	23.63	23.59	23.46	24.7
1.4	16QAM	3	0	23.56	23.29	23.30	
1.4	16QAM	3	1	23.60	23.39	23.30	
1.4	16QAM	3	3	23.50	23.35	23.24	23.7
1.4	16QAM	6	0	22.50	22.46	22.33	
1.4	64QAM	1	0	22.68	22.47	21.74	
1.4	64QAM	1	3	22.68	22.61	21.70	23.7
1.4	64QAM	1	5	22.62	22.46	21.71	
1.4	64QAM	3	0	22.64	22.46	21.72	
1.4	64QAM	3	1	22.57	22.47	21.71	22.7
1.4	64QAM	3	3	22.56	22.51	21.80	
1.4	64QAM	6	0	21.43	21.42	20.70	



Band 30							
Ant 2							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				27710			
Frequency (MHz)				2310			
10	QPSK	1	0	22.18			23.7
10	QPSK	1	25	22.07			
10	QPSK	1	49	22.09			
10	QPSK	25	0	21.18			22.7
10	QPSK	25	12	21.14			
10	QPSK	25	25	21.23			
10	QPSK	50	0	21.14			22.7
10	16QAM	1	0	21.51			
10	16QAM	1	25	21.44			
10	16QAM	1	49	21.52			21.7
10	16QAM	25	0	20.18			
10	16QAM	25	12	20.25			
10	16QAM	25	25	20.19			21.7
10	16QAM	50	0	20.23			
10	64QAM	1	0	20.35			
10	64QAM	1	25	20.42			21.7
10	64QAM	1	49	20.39			
10	64QAM	25	0	19.24			
10	64QAM	25	12	19.21			20.7
10	64QAM	25	25	19.22			
10	64QAM	50	0	19.21			
Channel				27735			
Frequency (MHz)				2315			
5	QPSK	1	0	22.04	22.08	22.10	23.7
5	QPSK	1	12	22.18	22.10	22.13	
5	QPSK	1	24	22.11	22.12	22.14	
5	QPSK	12	0	21.14	21.18	21.17	22.7
5	QPSK	12	7	21.27	21.18	21.20	
5	QPSK	12	13	21.32	21.23	21.13	
5	QPSK	25	0	21.24	21.15	21.21	22.7
5	16QAM	1	0	21.38	21.35	21.42	
5	16QAM	1	12	21.47	21.47	21.42	
5	16QAM	1	24	21.55	21.44	21.44	21.7
5	16QAM	12	0	20.15	20.21	20.17	
5	16QAM	12	7	20.20	20.25	20.29	
5	16QAM	12	13	20.22	20.20	20.19	21.7
5	16QAM	25	0	20.24	20.17	20.23	
5	64QAM	1	0	20.27	20.34	20.47	
5	64QAM	1	12	20.39	20.35	20.37	21.7
5	64QAM	1	24	20.53	20.37	20.31	
5	64QAM	12	0	19.25	19.27	19.23	
5	64QAM	12	7	19.29	19.22	19.33	20.7
5	64QAM	12	13	19.31	19.33	19.25	
5	64QAM	25	0	19.27	19.21	19.27	



Band 66							
Ant 2							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				132072	132322	132572	
Frequency (MHz)				1720	1745	1770	
20	QPSK	1	0	24.14	24.20	24.01	25.7
20	QPSK	1	48	24.00	23.99	23.95	
20	QPSK	1	99	24.13	24.01	23.91	
20	QPSK	50	0	23.15	23.19	23.14	24.7
20	QPSK	50	24	23.24	23.14	23.17	
20	QPSK	50	50	23.23	23.13	23.13	
20	QPSK	100	0	23.22	23.22	23.17	24.7
20	16QAM	1	0	23.49	23.42	23.32	
20	16QAM	1	49	23.38	23.24	23.23	
20	16QAM	1	99	23.49	23.28	23.19	23.7
20	16QAM	50	0	22.19	22.20	22.09	
20	16QAM	50	24	22.29	22.15	22.23	
20	16QAM	50	50	22.29	22.19	22.19	23.7
20	16QAM	100	0	22.28	22.13	22.25	
20	64QAM	1	0	22.35	22.30	22.29	
20	64QAM	1	49	22.23	22.15	22.21	23.7
20	64QAM	1	99	22.34	22.29	22.09	
20	64QAM	50	0	21.15	21.16	21.21	
20	64QAM	50	24	21.23	21.15	21.15	22.7
20	64QAM	50	50	21.25	21.16	21.13	
20	64QAM	100	0	21.34	21.22	21.24	
Channel				132047	132322	132597	Tune-up limit (dBm)
Frequency (MHz)				1717.5	1745	1772.5	
15	QPSK	1	0	24.10	24.08	24.03	25.7
15	QPSK	1	37	24.06	24.00	23.96	
15	QPSK	1	74	24.13	24.11	23.95	
15	QPSK	36	0	23.14	23.19	23.11	24.7
15	QPSK	36	20	23.18	23.25	23.14	
15	QPSK	36	39	23.19	23.16	23.14	
15	QPSK	75	0	23.20	23.21	23.04	24.7
15	16QAM	1	0	23.37	23.39	23.40	
15	16QAM	1	37	23.33	23.32	23.31	
15	16QAM	1	74	23.45	23.30	23.25	23.7
15	16QAM	36	0	22.19	22.19	22.07	
15	16QAM	36	20	22.22	22.14	22.13	
15	16QAM	36	39	22.22	22.17	22.16	23.7
15	16QAM	75	0	22.24	22.19	22.06	
15	64QAM	1	0	22.26	22.22	22.19	
15	64QAM	1	37	22.30	22.29	22.15	22.7
15	64QAM	1	74	22.36	22.26	22.18	
15	64QAM	36	0	21.20	21.19	21.11	
15	64QAM	36	20	21.22	21.20	21.13	22.7
15	64QAM	36	39	21.22	21.18	21.12	
15	64QAM	75	0	21.23	21.16	21.07	
Channel				132022	132322	132622	Tune-up limit (dBm)
Frequency (MHz)				1715	1745	1775	
10	QPSK	1	0	24.09	24.03	24.07	25.7
10	QPSK	1	25	24.08	24.07	24.06	
10	QPSK	1	49	24.14	24.08	24.07	
10	QPSK	25	0	23.16	23.15	23.15	24.7
10	QPSK	25	12	23.19	23.22	23.13	
10	QPSK	25	25	23.19	23.19	23.14	
10	QPSK	50	0	23.20	23.23	23.06	24.7
10	16QAM	1	0	23.59	23.46	23.51	
10	16QAM	1	25	23.44	23.45	23.45	
10	16QAM	1	49	23.54	23.39	23.44	23.7
10	16QAM	25	0	22.18	22.16	22.08	
10	16QAM	25	12	22.23	22.16	22.11	
10	16QAM	25	25	22.21	22.20	22.21	23.7
10	16QAM	50	0	22.23	22.25	22.08	
10	64QAM	1	0	22.37	22.29	22.29	
10	64QAM	1	25	22.42	22.34	22.40	23.7
10	64QAM	1	49	22.36	22.38	22.34	
10	64QAM	25	0	21.20	21.18	21.19	
10	64QAM	25	12	21.30	21.22	21.19	22.7
10	64QAM	25	25	21.24	21.21	21.19	
10	64QAM	50	0	21.30	21.24	21.13	
Channel				131997	132322	132647	Tune-up limit (dBm)
Frequency (MHz)				1712.5	1745	1777.5	
5	QPSK	1	0	24.07	24.10	24.08	25.7
5	QPSK	1	12	24.12	24.06	24.05	
5	QPSK	1	24	24.09	24.11	24.08	
5	QPSK	12	0	23.22	23.13	23.12	24.7
5	QPSK	12	7	23.25	23.15	23.14	
5	QPSK	12	13	23.17	23.22	23.17	
5	QPSK	25	0	23.16	23.20	23.17	24.7
5	16QAM	1	0	23.46	23.36	23.34	
5	16QAM	1	12	23.53	23.43	23.47	
5	16QAM	1	24	23.47	23.38	23.32	23.7
5	16QAM	12	0	22.24	22.17	22.17	
5	16QAM	12	7	22.24	22.21	22.29	
5	16QAM	12	13	22.25	22.23	22.16	23.7
5	16QAM	25	0	22.18	22.22	22.14	
5	64QAM	1	0	22.35	22.31	22.33	
5	64QAM	1	12	22.38	22.36	22.34	23.7
5	64QAM	1	24	22.45	22.31	22.32	
5	64QAM	12	0	21.28	21.19	21.23	
5	64QAM	12	7	21.23	21.28	21.28	22.7
5	64QAM	12	13	21.32	21.21	21.23	
5	64QAM	25	0	21.20	21.22	21.19	
Channel				131987	132322	132657	Tune-up limit (dBm)
Frequency (MHz)				1711.5	1745	1776.5	
3	QPSK	1	0	24.10	24.13	24.08	25.7
3	QPSK	1	8	24.11	24.12	24.16	
3	QPSK	1	14	24.15	24.07	24.11	
3	QPSK	8	0	23.23	23.12	23.17	24.7
3	QPSK	8	4	23.22	23.20	23.19	
3	QPSK	8	7	23.28	23.20	23.12	
3	QPSK	15	0	23.16	23.23	23.18	24.7
3	16QAM	1	0	23.52	23.35	23.45	
3	16QAM	1	8	23.54	23.53	23.47	
3	16QAM	1	14	23.49	23.45	23.45	23.7
3	16QAM	8	0	22.25	22.14	22.17	
3	16QAM	8	4	22.35	22.21	22.20	
3	16QAM	8	7	22.29	22.23	22.22	23.7
3	16QAM	15	0	22.32	22.19	22.16	
3	64QAM	1	0	22.36	22.32	22.35	
3	64QAM	1	8	22.54	22.45	22.38	23.7
3	64QAM	1	14	22.42	22.35	22.40	
3	64QAM	8	0	21.26	21.15	21.14	
3	64QAM	8	4	21.36	21.27	21.20	22.7
3	64QAM	8	7	21.31	21.27	21.24	
3	64QAM	15	0	21.21	21.17	21.23	
Channel				131979	132322	132655	Tune-up limit (dBm)
Frequency (MHz)				1710.7	1745	1779.3	
1.4	QPSK	1	0	24.12	23.98	23.97	25.7
1.4	QPSK	1	3	24.17	24.09	24.04	
1.4	QPSK	1	5	24.10	24.08	24.05	
1.4	QPSK	3	0	24.11	24.14	24.09	24.7
1.4	QPSK	3	1	24.19	24.12	24.10	
1.4	QPSK	3	3	24.17	24.07	24.04	
1.4	QPSK	6	0	23.18	23.09	23.19	24.7
1.4	16QAM	1	0	23.47	23.39	23.37	
1.4	16QAM	1	3	23.52	23.43	23.46	
1.4	16QAM	1	5	23.42	23.36	23.32	24.7
1.4	16QAM	3	0	23.24	23.20	23.16	
1.4	16QAM	3	1	23.28	23.19	23.24	
1.4	16QAM	3	3	23.24	23.18	23.14	23.7
1.4	16QAM	6	0	22.25	22.21	22.24	
1.4	64QAM	1	0	22.27	22.36	22.33	
1.4	64QAM	1	3	22.46	22.33	22.41	23.7
1.4	64QAM	1	5	22.37	22.27	22.25	
1.4	64QAM	3	0	22.34	22.34	22.25	
1.4	64QAM	3	1	22.33	22.34	22.29	23.7
1.4	64QAM	3	3	22.27	22.27	22.22	
1.4	64QAM	6	0	21.18	21.12	21.08	



Band 71							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch./	Power Middle Ch./	Power High Ch./	Tune-up limit (dBm)
Channel				133222	133322	133372	
Frequency (MHz)				673	683	688	
20	QPSK	1	0	24.39	24.32	24.28	25.7
20	QPSK	1	49	24.21	24.25	24.28	
20	QPSK	1	99	24.24	24.21	24.14	
20	QPSK	50	0	23.39	23.37	23.38	24.7
20	QPSK	50	24	23.50	23.42	23.32	
20	QPSK	50	50	23.45	23.39	23.33	
20	QPSK	100	0	23.46	23.30	23.37	24.7
20	16QAM	1	0	23.69	23.66	23.66	
20	16QAM	1	49	23.58	23.58	23.57	
20	16QAM	1	99	23.61	23.58	23.54	23.7
20	16QAM	50	0	22.46	22.32	22.40	
20	16QAM	50	24	22.42	22.33	22.39	
20	16QAM	50	50	22.42	22.39	22.39	23.7
20	16QAM	100	0	22.46	22.34	22.42	
20	64QAM	1	0	21.79	22.29	22.62	
20	64QAM	1	49	22.23	22.43	21.81	23.7
20	64QAM	1	99	22.50	22.00	22.43	
20	64QAM	50	0	20.70	21.36	21.01	
20	64QAM	50	24	20.85	21.40	21.15	22.7
20	64QAM	50	50	21.49	21.04	21.37	
20	64QAM	100	0	21.05	21.36	21.45	
Channel				133197	133297	133397	Tune-up limit (dBm)
Frequency (MHz)				670.5	680.5	690.5	
15	QPSK	1	0	24.23	24.27	24.23	25.7
15	QPSK	1	37	24.23	24.18	24.22	
15	QPSK	1	74	24.28	24.28	24.14	
15	QPSK	36	0	23.41	23.31	23.37	24.7
15	QPSK	36	20	23.45	23.30	23.34	
15	QPSK	36	39	23.38	23.40	23.35	
15	QPSK	75	0	23.36	23.35	23.34	24.7
15	16QAM	1	0	23.68	23.64	23.56	
15	16QAM	1	37	23.38	23.54	23.52	
15	16QAM	1	74	23.54	23.51	23.54	23.7
15	16QAM	36	0	22.28	22.39	22.28	
15	16QAM	36	20	22.31	22.34	22.43	
15	16QAM	36	39	22.45	22.37	22.38	23.7
15	16QAM	75	0	22.45	22.32	22.35	
15	64QAM	1	0	21.71	22.45	22.43	
15	64QAM	1	37	21.70	22.51	22.51	23.7
15	64QAM	1	74	22.41	22.16	22.49	
15	64QAM	36	0	20.70	21.34	20.97	
15	64QAM	36	20	20.44	21.43	21.36	22.7
15	64QAM	36	39	21.00	20.91	21.37	
15	64QAM	75	0	20.86	21.39	21.33	
Channel				133172	133272	133422	Tune-up limit (dBm)
Frequency (MHz)				668	678	683	
10	QPSK	1	0	24.27	24.17	24.29	25.7
10	QPSK	1	25	24.19	24.16	24.20	
10	QPSK	1	49	24.17	24.27	24.18	
10	QPSK	25	0	23.33	23.31	23.33	24.7
10	QPSK	25	12	23.33	23.43	23.26	
10	QPSK	25	25	23.24	23.30	23.27	
10	QPSK	50	0	23.41	23.40	23.28	24.7
10	16QAM	1	0	23.71	23.36	23.60	
10	16QAM	1	25	23.62	23.63	23.53	
10	16QAM	1	49	23.62	23.61	23.47	23.7
10	16QAM	25	0	22.27	22.28	22.30	
10	16QAM	25	12	22.28	22.38	22.33	
10	16QAM	25	25	22.14	22.38	22.23	23.7
10	16QAM	50	0	22.32	22.42	22.24	
10	64QAM	1	0	21.75	21.80	22.44	
10	64QAM	1	25	21.73	22.52	22.48	23.7
10	64QAM	1	49	21.70	22.46	22.13	
10	64QAM	25	0	20.70	21.34	21.35	
10	64QAM	25	12	20.33	21.41	21.36	22.7
10	64QAM	25	25	20.40	21.38	21.31	
10	64QAM	50	0	20.33	21.36	21.30	
Channel				133147	133247	133447	Tune-up limit (dBm)
Frequency (MHz)				665.5	675.5	695.5	
5	QPSK	1	0	24.07	24.21	24.21	25.7
5	QPSK	1	12	24.33	24.20	24.17	
5	QPSK	1	24	24.22	24.20	24.18	
5	QPSK	12	0	23.33	23.35	23.25	24.7
5	QPSK	12	7	23.30	23.36	23.33	
5	QPSK	12	13	23.32	23.30	23.28	
5	QPSK	25	0	23.32	23.37	23.25	24.7
5	16QAM	1	0	23.51	23.53	23.67	
5	16QAM	1	12	23.51	23.55	23.55	
5	16QAM	1	24	23.48	23.53	23.47	23.7
5	16QAM	12	0	22.16	22.40	22.33	
5	16QAM	12	7	22.31	22.37	22.34	
5	16QAM	12	13	22.38	22.34	22.27	23.7
5	16QAM	25	0	22.24	22.39	22.29	
5	64QAM	1	0	21.78	21.74	22.47	
5	64QAM	1	12	21.72	22.51	22.39	23.7
5	64QAM	1	24	21.70	22.56	21.87	
5	64QAM	12	0	20.70	21.16	21.31	
5	64QAM	12	7	20.42	21.41	21.39	22.7
5	64QAM	12	13	20.40	21.40	21.19	
5	64QAM	25	0	20.23	21.10	21.23	



Band 2									
Ant 0									
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch.	Power Middle Ch.	Power High Ch.	Tune-up limit (dbm)		
Channel				18700	18900	19100			
Frequency (MHz)				1860	1880	1900			
20	QPSK	1	0	24.25	24.10	24.15	25.7		
20	QPSK	1	49	24.12	24.04	24.04			
20	QPSK	1	99	24.03	24.11	24.05			
20	QPSK	50	0	23.18	23.10	23.15	24.7		
20	QPSK	50	24	23.34	23.19	23.14			
20	QPSK	50	50	23.22	23.21	23.22			
20	QPSK	100	0	23.29	23.27	23.18	24.7		
20	16QAM	1	0	23.43	23.43	23.45			
20	16QAM	1	49	23.41	23.40	23.35			
20	16QAM	1	99	23.34	23.43	23.47	23.7		
20	16QAM	50	0	22.18	22.17	22.17			
20	16QAM	50	24	22.26	22.28	22.18			
20	16QAM	50	50	22.32	22.24	22.22	23.7		
20	16QAM	100	0	22.21	22.24	22.13			
20	64QAM	1	0	22.35	22.29	22.33			
20	64QAM	1	49	22.35	22.31	21.77	22.7		
20	64QAM	1	99	22.27	22.31	21.86			
20	64QAM	50	0	21.19	21.19	21.00			
20	64QAM	50	24	21.28	21.32	20.92	Tune-up limit (dbm)		
20	64QAM	50	50	21.26	21.24	20.90			
20	64QAM	100	0	21.25	21.25	20.96			
Channel				1867.5	18900	19125			
Frequency (MHz)				1857.5	1880	1902.5			
15	QPSK	1	0	24.14	24.04	24.06	25.7		
15	QPSK	1	37	24.08	24.01	23.95			
15	QPSK	1	74	24.01	24.03	23.97			
15	QPSK	36	0	23.10	23.05	23.10	24.7		
15	QPSK	36	20	23.33	23.16	23.34			
15	QPSK	36	39	23.12	23.11	23.16			
15	QPSK	75	0	23.20	23.25	23.10	24.7		
15	16QAM	1	0	23.37	23.35	23.40			
15	16QAM	1	37	23.37	23.33	23.30			
15	16QAM	1	74	23.27	23.38	23.46	23.7		
15	16QAM	36	0	22.13	22.07	22.14			
15	16QAM	36	20	22.17	22.18	22.14			
15	16QAM	36	39	22.25	22.16	22.13	23.7		
15	16QAM	75	0	22.20	22.19	22.08			
15	64QAM	1	0	22.31	22.23	22.29			
15	64QAM	1	37	22.31	22.26	21.73	22.7		
15	64QAM	1	74	22.20	22.24	21.77			
15	64QAM	36	0	21.18	21.19	20.97			
15	64QAM	36	20	21.28	21.24	20.88	Tune-up limit (dbm)		
15	64QAM	36	39	21.20	21.18	20.85			
15	64QAM	75	0	21.22	21.16	20.87			
Channel				18650	18900	19150			
Frequency (MHz)				1855	1880	1905			
10	QPSK	1	0	24.19	24.06	24.13	25.7		
10	QPSK	1	25	24.12	24.03	23.95			
10	QPSK	1	49	24.01	24.05	23.99			
10	QPSK	25	0	23.13	23.10	23.05	24.7		
10	QPSK	25	12	23.30	23.13	23.10			
10	QPSK	25	25	23.14	23.17	23.17			
10	QPSK	50	0	23.19	23.22	23.09	24.7		
10	16QAM	1	0	23.38	23.42	23.42			
10	16QAM	1	25	23.35	23.32	23.28			
10	16QAM	1	49	23.31	23.40	23.42	23.7		
10	16QAM	25	0	22.17	22.07	22.12			
10	16QAM	25	12	22.23	22.20	22.13			
10	16QAM	25	25	22.32	22.21	22.15	23.7		
10	16QAM	50	0	22.19	22.24	22.12			
10	64QAM	1	0	22.29	22.22	22.28			
10	64QAM	1	25	22.31	22.29	21.70	22.7		
10	64QAM	1	49	22.24	22.31	21.84			
10	64QAM	25	0	21.10	21.13	20.94			
10	64QAM	25	12	21.18	21.32	20.92	Tune-up limit (dbm)		
10	64QAM	25	25	21.18	21.21	20.88			
10	64QAM	50	0	21.25	21.20	20.89			
Channel				1862.5	18900	19175			
Frequency (MHz)				1852.5	1880	1907.5			
5	QPSK	1	0	24.15	24.05	24.07	25.7		
5	QPSK	1	12	24.20	24.15	24.18			
5	QPSK	1	24	24.13	24.16	24.16			
5	QPSK	12	0	23.23	23.13	23.24	24.7		
5	QPSK	12	7	23.38	23.28	23.21			
5	QPSK	12	13	23.27	23.27	23.21			
5	QPSK	25	0	23.28	23.21	23.20	24.7		
5	16QAM	1	0	23.44	23.30	23.38			
5	16QAM	1	12	23.48	23.48	23.46			
5	16QAM	1	24	23.54	23.47	23.42	23.7		
5	16QAM	12	0	22.32	22.24	22.21			
5	16QAM	12	7	22.32	22.35	22.31			
5	16QAM	12	13	22.27	22.27	22.24	23.7		
5	16QAM	25	0	22.30	22.28	22.20			
5	64QAM	1	0	22.47	22.31	21.86			
5	64QAM	1	12	22.35	22.36	21.97	23.7		
5	64QAM	1	24	22.36	22.44	21.97			
5	64QAM	12	0	21.32	21.23	20.86			
5	64QAM	12	7	21.35	21.36	20.95	22.7		
5	64QAM	12	13	21.39	21.40	20.89			
5	64QAM	25	0	21.30	21.33	20.83			
Channel				18615	18900	19185			
Frequency (MHz)				1851.5	1880	1906.5			
3	QPSK	1	0	24.21	24.11	24.09	25.7		
3	QPSK	1	3	24.24	24.24	24.16			
3	QPSK	1	14	24.23	24.19	24.07			
3	QPSK	8	0	23.29	23.29	23.24	24.7		
3	QPSK	8	4	23.36	23.24	23.26			
3	QPSK	8	7	23.31	23.21	23.18			
3	QPSK	15	0	23.34	23.24	23.16	24.7		
3	16QAM	1	0	23.45	23.41	23.42			
3	16QAM	1	8	23.56	23.51	23.43			
3	16QAM	1	14	23.51	23.43	23.48	23.7		
3	16QAM	8	0	22.29	22.37	22.28			
3	16QAM	8	4	22.37	22.38	22.32			
3	16QAM	8	7	22.34	22.32	22.25	23.7		
3	16QAM	15	0	22.35	22.29	22.31			
3	64QAM	1	0	22.45	22.37	21.95			
3	64QAM	1	8	22.60	22.46	22.02	23.7		
3	64QAM	1	14	22.50	22.48	21.92			
3	64QAM	8	0	21.38	21.32	20.88			
3	64QAM	8	4	21.37	21.43	20.88	22.7		
3	64QAM	8	7	21.37	21.36	20.81			
3	64QAM	15	0	21.34	21.35	20.84			
Channel				18607	18900	19193			
Frequency (MHz)				1850.7	1880	1909.3			
1.4	QPSK	1	0	24.11	23.99	23.98	25.7		
1.4	QPSK	1	3	24.20	24.14	24.13			
1.4	QPSK	1	5	24.15	24.04	24.07			
1.4	QPSK	3	0	24.11	24.06	23.99	24.7		
1.4	QPSK	3	1	24.20	24.13	24.15			
1.4	QPSK	3	3	24.19	24.06	24.01			
1.4	QPSK	6	0	23.26	23.13	23.13	24.7		
1.4	16QAM	1	0	23.46	23.42	23.35			
1.4	16QAM	1	3	23.55	23.53	23.49			
1.4	16QAM	1	5	23.52	23.43	23.36	24.7		
1.4	16QAM	3	0	23.20	23.13	23.16			
1.4	16QAM	3	1	23.33	23.24	23.14			
1.4	16QAM	3	3	23.18	23.16	23.06	23.7		
1.4	16QAM	6	0	22.30	22.30	22.26			
1.4	64QAM	1	0	22.38	22.35	21.94			
1.4	64QAM	1	3	22.43	22.42	22.00	23.7		
1.4	64QAM	1	5	22.36	22.41	21.89			
1.4	64QAM	3	0	22.30	22.24	21.89			
1.4	64QAM	3	1	22.37	22.35	22.05	22.7		
1.4	64QAM	3	3	22.37	22.34	21.96			
1.4	64QAM	6	0	21.28	21.25	20.78			



Band 4							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				20050	20175	20300	
Frequency (MHz)				1720	1732.5	1745	
20	QPSK	1	0	24.19	24.13	24.23	25.7
20	QPSK	1	49	24.02	23.94	23.98	
20	QPSK	1	99	24.06	24.04	24.04	
20	QPSK	50	0	23.20	23.16	23.22	24.7
20	QPSK	50	24	23.27	23.16	23.16	
20	QPSK	50	50	23.13	23.10	23.11	
20	QPSK	100	0	23.18	23.23	23.06	24.7
20	16QAM	1	0	23.51	23.50	23.48	
20	16QAM	1	49	23.40	23.31	23.32	
20	16QAM	1	99	23.47	23.33	23.32	23.7
20	16QAM	50	0	22.25	22.22	22.17	
20	16QAM	50	24	22.27	22.17	22.14	
20	16QAM	50	50	22.20	22.15	22.19	23.7
20	16QAM	100	0	22.17	22.27	22.13	
20	64QAM	1	0	22.32	22.36	22.07	
20	64QAM	1	49	22.21	22.20	22.29	23.7
20	64QAM	1	99	22.28	22.04	22.25	
20	64QAM	50	0	21.18	21.26	21.24	
20	64QAM	50	24	21.29	21.20	21.10	22.7
20	64QAM	50	50	21.20	21.13	21.14	
20	64QAM	100	0	21.22	21.24	21.19	
Channel				20250	20175	20325	
Frequency (MHz)				1717.5	1732.5	1747.5	
15	QPSK	1	0	24.21	24.17	24.22	25.7
15	QPSK	1	37	24.07	24.08	24.05	
15	QPSK	1	74	24.04	24.09	24.08	
15	QPSK	36	0	23.33	23.31	23.16	24.7
15	QPSK	36	20	23.27	23.26	23.10	
15	QPSK	36	39	23.27	23.16	23.14	
15	QPSK	75	0	23.24	23.22	23.15	24.7
15	16QAM	1	0	23.49	23.51	23.55	
15	16QAM	1	37	23.41	23.39	23.38	
15	16QAM	1	74	23.48	23.39	23.31	23.7
15	16QAM	36	0	22.30	22.16	22.24	
15	16QAM	36	20	22.20	22.25	22.12	
15	16QAM	36	39	22.20	22.20	22.17	23.7
15	16QAM	75	0	22.23	22.28	22.14	
15	64QAM	1	0	22.43	22.38	22.34	
15	64QAM	1	37	22.30	22.18	22.26	23.7
15	64QAM	1	74	22.37	22.07	22.20	
15	64QAM	36	0	21.27	21.29	21.27	
15	64QAM	36	20	21.25	21.13	21.21	22.7
15	64QAM	36	39	21.27	21.05	21.20	
15	64QAM	75	0	21.32	21.21	21.20	
Channel				20000	20175	20350	
Frequency (MHz)				1715	1732.5	1750	
10	QPSK	1	0	24.16	24.09	24.14	25.7
10	QPSK	1	25	24.14	24.09	24.08	
10	QPSK	1	49	24.15	24.17	24.10	
10	QPSK	25	0	23.24	23.19	23.15	24.7
10	QPSK	25	12	23.31	23.27	23.19	
10	QPSK	25	25	23.30	23.29	23.28	
10	QPSK	50	0	23.32	23.25	23.15	24.7
10	16QAM	1	0	23.87	23.84	23.47	
10	16QAM	1	25	23.43	23.51	23.45	
10	16QAM	1	49	23.52	23.45	23.56	23.7
10	16QAM	25	0	22.25	22.14	22.15	
10	16QAM	25	12	22.27	22.25	22.16	
10	16QAM	25	25	22.24	22.23	22.24	23.7
10	16QAM	50	0	22.31	22.29	22.14	
10	64QAM	1	0	22.36	22.33	22.38	
10	64QAM	1	25	22.46	22.28	22.46	23.7
10	64QAM	1	49	22.42	22.07	22.45	
10	64QAM	25	0	21.30	21.23	21.23	
10	64QAM	25	12	21.30	21.14	21.25	22.7
10	64QAM	25	25	21.35	20.96	21.26	
10	64QAM	50	0	21.30	21.11	21.23	
Channel				19975	20175	20375	
Frequency (MHz)				1712.5	1732.5	1752.5	
5	QPSK	1	0	24.19	24.12	24.06	25.7
5	QPSK	1	12	24.19	24.19	24.16	
5	QPSK	1	24	24.22	24.12	24.15	
5	QPSK	12	0	23.28	23.19	23.19	24.7
5	QPSK	12	7	23.36	23.29	23.23	
5	QPSK	12	13	23.28	23.23	23.14	
5	QPSK	25	0	23.30	23.24	23.23	24.7
5	16QAM	1	0	23.53	23.36	23.43	
5	16QAM	1	12	23.55	23.48	23.47	
5	16QAM	1	24	23.56	23.45	23.44	23.7
5	16QAM	12	0	22.25	22.15	22.29	
5	16QAM	12	7	22.32	22.31	22.21	
5	16QAM	12	13	22.28	22.32	22.28	23.7
5	16QAM	25	0	22.28	22.29	22.26	
5	64QAM	1	0	22.32	22.38	22.44	
5	64QAM	1	12	22.47	22.29	22.39	23.7
5	64QAM	1	24	22.55	22.04	22.40	
5	64QAM	12	0	21.33	21.25	21.33	
5	64QAM	12	7	21.35	21.25	21.29	22.7
5	64QAM	12	13	21.36	21.12	21.27	
5	64QAM	25	0	21.32	21.08	21.24	
Channel				19965	20175	20385	
Frequency (MHz)				1711.5	1732.5	1753.5	
3	QPSK	1	0	24.14	24.04	24.07	25.7
3	QPSK	1	8	24.23	24.20	24.15	
3	QPSK	1	14	24.19	24.20	24.10	
3	QPSK	8	0	23.25	23.18	23.17	24.7
3	QPSK	8	4	23.28	23.26	23.28	
3	QPSK	8	7	23.26	23.29	23.18	
3	QPSK	15	0	23.31	23.31	23.21	24.7
3	16QAM	1	0	23.51	23.42	23.42	
3	16QAM	1	8	23.59	23.56	23.46	
3	16QAM	1	14	23.49	23.41	23.43	23.7
3	16QAM	8	0	22.30	22.21	22.21	
3	16QAM	8	4	22.39	22.33	22.33	
3	16QAM	8	7	22.37	22.27	22.25	23.7
3	16QAM	15	0	22.32	22.22	22.26	
3	64QAM	1	0	22.37	22.24	22.33	
3	64QAM	1	8	22.57	22.26	22.45	23.7
3	64QAM	1	14	22.53	22.19	22.42	
3	64QAM	8	0	21.36	21.16	21.30	
3	64QAM	8	4	21.37	21.17	21.27	22.7
3	64QAM	8	7	21.35	21.09	21.26	
3	64QAM	15	0	21.29	21.14	21.20	
Channel				19957	20175	20393	
Frequency (MHz)				1710.7	1732.5	1754.3	
1.4	QPSK	1	0	24.02	24.07	24.05	25.7
1.4	QPSK	1	3	24.21	24.16	24.08	
1.4	QPSK	1	5	24.09	24.07	23.98	
1.4	QPSK	3	0	24.17	24.02	24.08	24.7
1.4	QPSK	3	1	24.17	24.16	24.09	
1.4	QPSK	3	3	24.14	24.12	24.09	
1.4	QPSK	6	0	23.12	23.14	23.06	24.7
1.4	16QAM	1	0	23.47	23.39	23.37	
1.4	16QAM	1	3	23.50	23.42	23.44	
1.4	16QAM	1	5	23.45	23.41	23.37	24.7
1.4	16QAM	3	0	23.22	23.16	23.13	
1.4	16QAM	3	1	23.22	23.26	23.24	
1.4	16QAM	3	3	23.23	23.16	23.13	23.7
1.4	16QAM	6	0	22.26	22.21	22.14	
1.4	64QAM	1	0	22.34	22.31	22.28	
1.4	64QAM	1	3	22.37	22.28	22.42	23.7
1.4	64QAM	1	5	22.34	22.21	22.33	
1.4	64QAM	3	0	22.36	22.28	22.22	
1.4	64QAM	3	1	22.36	22.34	22.30	23.7
1.4	64QAM	3	3	22.34	22.21	22.23	
1.4	64QAM	6	0	21.25	21.11	21.06	



Band 5							
Ant 1							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low (Ch.)	Power Middle (Ch.)	Power High (Ch.)	Tune-up limit (dBm)
Channel				20450	20525	20600	
Frequency (MHz)				829	836.5	844	
10	QPSK	1	0	24.09	24.12	24.20	25.7
10	QPSK	1	25	23.99	24.14	24.15	
10	QPSK	1	49	24.18	24.24	24.16	
10	QPSK	25	0	23.22	23.22	23.21	24.7
10	QPSK	25	12	23.27	23.24	23.31	
10	QPSK	25	25	23.26	23.28	23.27	
10	QPSK	50	0	23.24	23.26	23.25	24.7
10	16QAM	1	0	23.42	23.48	23.50	
10	16QAM	1	25	23.44	23.49	23.59	
10	16QAM	1	49	23.55	23.64	23.48	23.7
10	16QAM	25	0	22.17	22.28	22.24	
10	16QAM	25	12	22.32	22.27	22.30	
10	16QAM	25	25	22.19	22.25	22.38	23.7
10	16QAM	50	0	22.31	22.26	22.33	
10	64QAM	1	0	22.88	22.77	22.86	
10	64QAM	1	25	22.95	22.74	22.89	23.7
10	64QAM	1	49	22.95	22.56	22.14	
10	64QAM	25	0	21.70	21.80	21.65	
10	64QAM	25	12	21.81	21.83	21.85	22.7
10	64QAM	25	25	21.83	21.79	21.64	
10	64QAM	50	0	21.88	21.80	21.51	
Channel				20425	20525	20625	Tune-up limit (dBm)
Frequency (MHz)				826.5	836.5	846.5	
5	QPSK	1	0	24.19	24.13	24.18	25.7
5	QPSK	1	12	24.09	24.21	23.89	
5	QPSK	1	24	24.08	24.12	23.96	
5	QPSK	12	0	23.30	23.27	23.23	24.7
5	QPSK	12	7	23.23	23.36	23.00	
5	QPSK	12	13	23.14	23.25	23.05	
5	QPSK	25	0	23.22	23.21	23.15	24.7
5	16QAM	1	0	23.57	23.50	23.47	
5	16QAM	1	12	23.39	23.54	23.21	
5	16QAM	1	24	23.39	23.55	23.17	23.7
5	16QAM	12	0	22.26	22.34	22.26	
5	16QAM	12	7	22.20	22.31	22.18	
5	16QAM	12	13	22.19	22.30	22.22	23.7
5	16QAM	25	0	22.26	22.22	22.30	
5	64QAM	1	0	22.94	22.94	22.53	
5	64QAM	1	12	22.83	22.89	21.92	23.7
5	64QAM	1	24	22.81	22.82	21.84	
5	64QAM	12	0	21.84	21.90	21.19	
5	64QAM	12	7	21.75	21.81	20.82	22.7
5	64QAM	12	13	21.78	21.83	21.71	
5	64QAM	25	0	21.70	21.81	20.89	
Channel				20415	20525	20635	Tune-up limit (dBm)
Frequency (MHz)				825.5	836.5	847.5	
3	QPSK	1	0	24.12	24.15	23.99	25.7
3	QPSK	1	8	24.17	24.20	23.99	
3	QPSK	1	14	24.08	24.13	24.04	
3	QPSK	8	0	23.28	23.24	22.89	24.7
3	QPSK	8	4	23.19	23.27	23.03	
3	QPSK	8	7	23.25	23.23	23.20	
3	QPSK	15	0	23.20	23.22	23.02	24.7
3	16QAM	1	0	23.50	23.43	23.20	
3	16QAM	1	8	23.50	23.53	23.21	
3	16QAM	1	14	23.41	23.51	23.27	23.7
3	16QAM	8	0	22.33	22.29	22.05	
3	16QAM	8	4	22.23	22.39	22.15	
3	16QAM	8	7	22.24	22.33	22.19	23.7
3	16QAM	15	0	22.30	22.36	22.10	
3	64QAM	1	0	22.91	22.86	21.84	
3	64QAM	1	8	22.90	23.03	21.82	23.7
3	64QAM	1	14	22.90	22.88	21.79	
3	64QAM	8	0	21.75	21.80	21.63	
3	64QAM	8	4	21.83	21.88	21.73	22.7
3	64QAM	8	7	21.76	21.80	20.75	
3	64QAM	15	0	21.78	21.85	20.77	
Channel				20407	20525	20643	Tune-up limit (dBm)
Frequency (MHz)				824.7	836.5	848.3	
1.4	QPSK	1	0	24.11	24.14	24.03	25.7
1.4	QPSK	1	3	24.10	24.10	24.15	
1.4	QPSK	1	5	23.95	24.09	24.02	
1.4	QPSK	3	0	24.15	24.08	24.06	24.7
1.4	QPSK	3	1	24.10	24.13	24.19	
1.4	QPSK	3	3	24.09	24.08	24.12	
1.4	QPSK	6	0	23.11	23.27	23.23	24.7
1.4	16QAM	1	0	23.38	23.40	23.32	
1.4	16QAM	1	3	23.38	23.55	23.53	
1.4	16QAM	1	5	23.33	23.42	23.39	24.7
1.4	16QAM	3	0	23.15	23.26	23.11	
1.4	16QAM	3	1	23.22	23.29	23.23	
1.4	16QAM	3	3	23.13	23.20	23.15	23.7
1.4	16QAM	6	0	22.19	22.29	22.31	
1.4	64QAM	1	0	22.79	22.85	21.81	
1.4	64QAM	1	3	22.82	22.95	21.84	23.7
1.4	64QAM	1	5	22.75	22.82	21.98	
1.4	64QAM	3	0	22.75	22.76	21.77	
1.4	64QAM	3	1	22.79	22.89	21.84	23.7
1.4	64QAM	3	3	22.74	22.88	22.00	
1.4	64QAM	6	0	21.70	21.79	21.65	



Band 7							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch./	Power Middle Ch./	Power High Ch./	Tune-up limit (dBm)
Channel				20850	21100	21350	
Frequency (MHz)				2510	2535	2560	
20	QPSK	1	0	24.43	24.33	24.18	25.7
20	QPSK	1	49	24.40	24.36	24.21	
20	QPSK	1	99	24.53	24.43	24.20	
20	QPSK	50	0	23.80	23.46	23.37	24.7
20	QPSK	50	24	23.62	23.47	23.35	
20	QPSK	50	50	23.58	23.49	23.38	
20	QPSK	100	0	23.57	23.49	23.30	24.7
20	16QAM	1	0	23.72	23.69	23.53	
20	16QAM	1	49	23.76	23.65	23.47	
20	16QAM	1	99	23.89	23.74	23.52	23.7
20	16QAM	50	0	22.64	22.40	22.33	
20	16QAM	50	24	22.66	22.46	22.32	
20	16QAM	50	50	22.66	22.45	22.30	23.7
20	16QAM	100	0	22.58	22.45	22.32	
20	64QAM	1	0	22.63	22.40	22.44	
20	64QAM	1	49	22.62	22.55	22.46	23.7
20	64QAM	1	99	22.70	22.63	22.38	
20	64QAM	50	0	21.65	21.44	21.35	
20	64QAM	50	24	21.69	21.52	21.43	22.7
20	64QAM	50	50	21.66	21.44	21.39	
20	64QAM	100	0	21.67	21.51	21.40	
Channel				20925	21100	21375	Tune-up limit (dBm)
Frequency (MHz)				2507.5	2535	2562.5	
15	QPSK	1	0	24.41	24.35	24.22	25.7
15	QPSK	1	37	24.50	24.38	24.11	
15	QPSK	1	74	24.49	24.42	24.24	
15	QPSK	36	0	23.49	23.39	23.27	24.7
15	QPSK	36	20	23.64	23.46	23.32	
15	QPSK	36	39	23.64	23.46	23.32	
15	QPSK	75	0	23.58	23.40	23.35	24.7
15	16QAM	1	0	23.72	23.67	23.49	
15	16QAM	1	37	23.83	23.64	23.48	
15	16QAM	1	74	23.80	23.78	23.53	23.7
15	16QAM	36	0	22.50	22.47	22.29	
15	16QAM	36	20	22.50	22.50	22.35	
15	16QAM	36	39	22.65	22.48	22.34	23.7
15	16QAM	75	0	22.58	22.49	22.33	
15	64QAM	1	0	22.67	22.52	22.41	
15	64QAM	1	37	22.68	22.59	22.34	23.7
15	64QAM	1	74	22.80	22.60	22.41	
15	64QAM	36	0	21.49	21.41	21.38	
15	64QAM	36	20	21.66	21.55	21.32	22.7
15	64QAM	36	39	21.64	21.48	21.35	
15	64QAM	75	0	21.61	21.42	21.33	
Channel				20800	21100	21400	Tune-up limit (dBm)
Frequency (MHz)				2505	2535	2565	
10	QPSK	1	0	24.42	24.34	24.18	25.7
10	QPSK	1	25	24.48	24.37	24.08	
10	QPSK	1	49	24.42	24.34	24.20	
10	QPSK	25	0	23.43	23.29	23.24	24.7
10	QPSK	25	12	23.58	23.44	23.25	
10	QPSK	25	25	23.58	23.38	23.31	
10	QPSK	50	0	23.49	23.34	23.26	24.7
10	16QAM	1	0	23.85	23.57	23.43	
10	16QAM	1	25	23.81	23.62	23.38	
10	16QAM	1	49	23.72	23.72	23.47	23.7
10	16QAM	25	0	22.49	22.47	22.26	
10	16QAM	25	12	22.51	22.43	22.25	
10	16QAM	25	25	22.59	22.47	22.31	23.7
10	16QAM	50	0	22.57	22.46	22.24	
10	64QAM	1	0	22.65	22.45	22.36	
10	64QAM	1	25	22.68	22.53	22.25	23.7
10	64QAM	1	49	22.80	22.54	22.33	
10	64QAM	25	0	21.47	21.36	21.29	
10	64QAM	25	12	21.56	21.52	21.23	22.7
10	64QAM	25	25	21.52	21.45	21.33	
10	64QAM	50	0	21.61	21.33	21.23	
Channel				20775	21100	21425	Tune-up limit (dBm)
Frequency (MHz)				2502.5	2535	2567.5	
5	QPSK	1	0	24.45	24.33	24.22	25.7
5	QPSK	1	12	24.43	24.36	24.11	
5	QPSK	1	24	24.41	24.32	24.15	
5	QPSK	12	0	23.47	23.38	23.18	24.7
5	QPSK	12	7	23.62	23.39	23.31	
5	QPSK	12	13	23.61	23.38	23.24	
5	QPSK	25	0	23.48	23.32	23.26	24.7
5	16QAM	1	0	23.67	23.61	23.44	
5	16QAM	1	12	23.81	23.56	23.45	
5	16QAM	1	24	23.72	23.69	23.43	23.7
5	16QAM	12	0	22.47	22.45	22.20	
5	16QAM	12	7	22.56	22.41	22.33	
5	16QAM	12	13	22.62	22.48	22.25	23.7
5	16QAM	25	0	22.56	22.44	22.26	
5	64QAM	1	0	22.63	22.44	22.37	
5	64QAM	1	12	22.63	22.49	22.32	23.7
5	64QAM	1	24	22.78	22.55	22.37	
5	64QAM	12	0	21.41	21.34	21.30	
5	64QAM	12	7	21.83	21.52	21.24	22.7
5	64QAM	12	13	21.62	21.42	21.34	
5	64QAM	25	0	21.52	21.39	21.29	



Band 12							
Ant 1							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				23060	23095	23130	
Frequency (MHz)				704	707.5	711	
10	QPSK	1	0	23.86	23.82	23.80	25.7
10	QPSK	1	25	23.75	23.85	23.77	
10	QPSK	1	49	23.89	23.88	23.81	
10	QPSK	25	0	22.95	22.92	22.90	24.7
10	QPSK	25	12	23.03	22.92	22.98	
10	QPSK	25	25	23.01	22.94	22.95	
10	QPSK	50	0	22.97	22.99	22.97	24.7
10	16QAM	1	0	23.25	23.19	23.14	
10	16QAM	1	25	23.25	23.24	23.19	
10	16QAM	1	49	23.30	23.28	23.19	23.7
10	16QAM	25	0	21.94	21.92	21.86	
10	16QAM	25	12	22.01	21.86	21.92	
10	16QAM	25	25	21.88	22.00	21.87	23.7
10	16QAM	50	0	22.02	21.94	21.88	
10	64QAM	1	0	22.58	22.53	22.58	
10	64QAM	1	25	22.63	22.67	22.64	23.7
10	64QAM	1	49	22.68	22.68	22.58	
10	64QAM	25	0	21.49	21.44	21.40	
10	64QAM	25	12	21.58	21.43	21.57	22.7
10	64QAM	25	25	21.47	21.47	21.41	
10	64QAM	50	0	21.59	21.45	21.45	
Channel				23035	23095	23155	Tune-up limit (dBm)
Frequency (MHz)				701.5	707.5	713.5	
5	QPSK	1	0	23.88	23.80	23.79	25.7
5	QPSK	1	12	23.88	23.84	23.84	
5	QPSK	1	24	23.78	23.82	23.80	
5	QPSK	12	0	22.91	22.93	22.91	24.7
5	QPSK	12	7	23.00	22.86	22.96	
5	QPSK	12	13	22.93	22.94	22.85	
5	QPSK	25	0	22.99	22.87	22.91	24.7
5	16QAM	1	0	23.20	23.22	23.09	
5	16QAM	1	12	23.14	23.21	23.15	
5	16QAM	1	24	23.14	23.15	23.09	23.7
5	16QAM	12	0	21.99	21.98	21.94	
5	16QAM	12	7	21.98	21.89	21.93	
5	16QAM	12	13	21.96	21.92	21.87	23.7
5	16QAM	25	0	21.94	21.98	21.92	
5	64QAM	1	0	22.69	22.61	22.58	
5	64QAM	1	12	22.59	22.54	22.60	23.7
5	64QAM	1	24	22.66	22.63	22.56	
5	64QAM	12	0	21.51	21.50	21.41	
5	64QAM	12	7	21.50	21.45	21.50	22.7
5	64QAM	12	13	21.52	21.45	21.42	
5	64QAM	25	0	21.44	21.45	21.39	
Channel				23025	23095	23165	Tune-up limit (dBm)
Frequency (MHz)				700.5	707.5	714.5	
3	QPSK	1	0	23.84	23.80	23.81	25.7
3	QPSK	1	8	23.85	23.84	23.80	
3	QPSK	1	14	23.85	23.83	23.77	
3	QPSK	8	0	23.01	22.94	22.90	24.7
3	QPSK	8	4	22.92	22.95	22.91	
3	QPSK	8	7	22.90	22.87	22.84	
3	QPSK	15	0	22.90	22.92	22.84	24.7
3	16QAM	1	0	23.24	23.15	23.17	
3	16QAM	1	8	23.19	23.23	23.16	
3	16QAM	1	14	23.23	23.22	23.18	23.7
3	16QAM	8	0	22.06	21.94	21.94	
3	16QAM	8	4	22.01	22.06	22.01	
3	16QAM	8	7	22.03	21.92	21.88	23.7
3	16QAM	15	0	22.01	21.86	21.86	
3	64QAM	1	0	22.70	22.60	22.53	
3	64QAM	1	8	22.68	22.72	22.60	23.7
3	64QAM	1	14	22.66	22.60	22.57	
3	64QAM	8	0	21.60	21.44	21.47	
3	64QAM	8	4	21.60	21.50	21.53	22.7
3	64QAM	8	7	21.47	21.45	21.41	
3	64QAM	15	0	21.45	21.39	21.36	
Channel				23017	23095	23173	Tune-up limit (dBm)
Frequency (MHz)				699.7	707.5	715.3	
1.4	QPSK	1	0	23.80	23.74	23.79	25.7
1.4	QPSK	1	3	23.81	23.79	23.77	
1.4	QPSK	1	5	23.80	23.74	23.70	
1.4	QPSK	3	0	23.82	23.73	23.71	24.7
1.4	QPSK	3	1	23.84	23.75	23.79	
1.4	QPSK	3	3	23.78	23.75	23.71	
1.4	QPSK	6	0	22.97	22.78	22.79	24.7
1.4	16QAM	1	0	23.15	23.06	23.09	
1.4	16QAM	1	3	23.18	23.21	23.09	
1.4	16QAM	1	5	23.08	23.08	22.98	24.7
1.4	16QAM	3	0	22.96	22.81	22.80	
1.4	16QAM	3	1	22.96	22.87	22.88	
1.4	16QAM	3	3	22.92	22.88	22.78	23.7
1.4	16QAM	6	0	21.94	21.86	21.82	
1.4	64QAM	1	0	22.59	22.48	22.43	
1.4	64QAM	1	3	22.69	22.57	22.48	23.7
1.4	64QAM	1	5	22.55	22.46	22.43	
1.4	64QAM	3	0	22.57	22.51	22.45	
1.4	64QAM	3	1	22.55	22.45	22.53	22.7
1.4	64QAM	3	3	22.55	22.57	22.46	
1.4	64QAM	6	0	21.40	21.32	21.31	



Band 13							
Ant 1							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				23230			
Frequency (MHz)				782			
10	QPSK	1	0	23.80			25.2
10	QPSK	1	25	23.47			
10	QPSK	1	49	23.51			
10	QPSK	25	0	22.58			24.2
10	QPSK	25	12	22.65			
10	QPSK	25	25	22.56			
10	QPSK	50	0	22.58			24.2
10	16QAM	1	0	22.75			
10	16QAM	1	25	22.82			
10	16QAM	1	49	22.78			23.2
10	16QAM	25	0	21.59			
10	16QAM	25	12	21.62			
10	16QAM	25	25	21.61			23.2
10	16QAM	50	0	21.57			
10	64QAM	1	0	23.07			
10	64QAM	1	25	23.04			23.2
10	64QAM	1	49	23.01			
10	64QAM	25	0	22.07			
10	64QAM	25	12	22.06			22.2
10	64QAM	25	25	22.02			
10	64QAM	50	0	22.04			
Channel				23206 23230 23255			Tune-up limit (dBm)
Frequency (MHz)				779.5 782 784.5			
5	QPSK	1	0	23.50	23.45	23.49	25.2
5	QPSK	1	12	23.45	23.54	23.52	
5	QPSK	1	24	23.50	23.51	23.52	
5	QPSK	12	0	22.63	22.56	22.61	24.2
5	QPSK	12	7	22.67	22.64	22.57	
5	QPSK	12	13	22.67	22.62	22.52	
5	QPSK	25	0	22.64	22.57	22.55	24.2
5	16QAM	1	0	22.71	22.71	22.78	
5	16QAM	1	12	22.78	22.85	22.79	
5	16QAM	1	24	22.82	22.85	22.72	23.2
5	16QAM	12	0	21.70	21.62	21.68	
5	16QAM	12	7	21.68	21.57	21.60	
5	16QAM	12	13	21.69	21.60	21.70	23.2
5	16QAM	25	0	21.63	21.64	21.54	
5	64QAM	1	0	22.14	22.25	22.17	
5	64QAM	1	12	22.26	22.30	22.21	23.2
5	64QAM	1	24	22.26	22.23	22.15	
5	64QAM	12	0	21.19	21.11	21.20	
5	64QAM	12	7	21.24	21.14	21.08	22.2
5	64QAM	12	13	21.15	21.17	21.08	
5	64QAM	25	0	21.21	21.11	21.10	



Band 14							
Ant 1							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				23330	23330		
Frequency (MHz)				793	793		
10	QPSK	1	0	24.23			25.7
10	QPSK	1	25	24.12			
10	QPSK	1	49	24.04			
10	QPSK	25	0	23.11			
10	QPSK	25	12	23.16			24.7
10	QPSK	25	25	23.16			
10	QPSK	50	0	23.15			
10	16QAM	1	0	23.49			24.7
10	16QAM	1	25	23.41			
10	16QAM	1	49	23.37			
10	16QAM	25	0	22.10			
10	16QAM	25	12	22.09			23.7
10	16QAM	25	25	22.19			
10	16QAM	50	0	22.16			
10	64QAM	1	0	22.81			23.7
10	64QAM	1	25	22.86			
10	64QAM	1	49	22.73			
10	64QAM	25	0	21.72			
10	64QAM	25	12	21.81			22.7
10	64QAM	25	25	21.67			
10	64QAM	50	0	21.66			
Channel				23306	23330	23356	Tune-up limit (dBm)
Frequency (MHz)				790.5	793	795.5	
5	QPSK	1	0	23.98	24.04	24.05	
5	QPSK	1	12	24.14	24.19	24.14	25.7
5	QPSK	1	24	24.08	24.07	24.05	
5	QPSK	12	0	23.13	23.12	23.08	
5	QPSK	12	7	23.21	23.21	23.14	24.7
5	QPSK	12	13	23.14	23.16	23.12	
5	QPSK	25	0	23.11	23.12	23.03	
5	16QAM	1	0	23.40	23.37	23.34	
5	16QAM	1	12	23.47	23.44	23.43	24.7
5	16QAM	1	24	23.45	23.34	23.39	
5	16QAM	12	0	22.13	22.09	22.10	
5	16QAM	12	7	22.24	22.13	22.18	23.7
5	16QAM	12	13	22.15	22.19	22.15	
5	16QAM	25	0	22.17	22.07	22.08	
5	64QAM	1	0	22.75	22.83	22.82	
5	64QAM	1	12	22.89	22.72	22.82	23.7
5	64QAM	1	24	22.71	22.80	22.80	
5	64QAM	12	0	21.63	21.70	21.65	
5	64QAM	12	7	21.69	21.72	21.71	22.7
5	64QAM	12	13	21.75	21.67	21.65	
5	64QAM	25	0	21.71	21.66	21.61	



Band 17							
Ant 1							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch./	Power Middle Ch./	Power High Ch./	Tune-up limit (dBm)
Channel				23780	23790	23800	
Frequency (MHz)				709	710	711	
10	QPSK	1	0	24.25	24.20	24.11	25.7
10	QPSK	1	25	24.30	24.35	24.15	
10	QPSK	1	49	24.30	24.21	24.20	
10	QPSK	25	0	23.29	23.30	23.28	24.7
10	QPSK	25	12	23.40	23.30	23.28	
10	QPSK	25	25	23.38	23.36	23.44	
10	QPSK	50	0	23.35	23.29	23.30	24.7
10	16QAM	1	0	23.62	23.59	23.59	
10	16QAM	1	25	23.66	23.61	23.58	
10	16QAM	1	49	23.60	23.63	23.62	23.7
10	16QAM	25	0	22.29	22.27	22.30	
10	16QAM	25	12	22.41	22.37	22.28	
10	16QAM	25	25	22.44	22.35	22.45	23.7
10	16QAM	50	0	22.37	22.35	22.25	
10	64QAM	1	0	23.01	22.91	22.99	
10	64QAM	1	25	23.11	23.02	23.01	23.7
10	64QAM	1	49	23.05	23.02	22.93	
10	64QAM	25	0	21.81	21.82	21.78	
10	64QAM	25	12	21.95	21.88	21.82	22.7
10	64QAM	25	25	21.89	21.92	21.97	
10	64QAM	50	0	21.95	21.82	21.85	
Channel				23765	23790	23825	Tune-up limit (dBm)
Frequency (MHz)				706.5	710	713.5	
5	QPSK	1	0	24.16	24.23	24.17	25.7
5	QPSK	1	12	24.32	24.33	24.24	
5	QPSK	1	24	24.30	24.32	24.28	
5	QPSK	12	0	23.28	23.30	23.29	24.7
5	QPSK	12	7	23.31	23.30	23.32	
5	QPSK	12	13	23.40	23.37	23.34	
5	QPSK	25	0	23.34	23.27	23.38	24.7
5	16QAM	1	0	23.61	23.57	23.51	
5	16QAM	1	12	23.64	23.63	23.59	
5	16QAM	1	24	23.62	23.61	23.59	23.7
5	16QAM	12	0	22.38	22.40	22.27	
5	16QAM	12	7	22.39	22.35	22.30	
5	16QAM	12	13	22.34	22.35	22.30	23.7
5	16QAM	25	0	22.35	22.38	22.37	
5	64QAM	1	0	22.79	22.83	23.01	
5	64QAM	1	12	23.01	23.08	22.96	23.7
5	64QAM	1	24	23.04	23.07	22.97	
5	64QAM	12	0	21.93	21.92	21.91	
5	64QAM	12	7	21.96	21.91	21.94	22.7
5	64QAM	12	13	21.92	21.96	21.92	
5	64QAM	25	0	21.86	21.84	21.91	



Band 25							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch /	Power Middle Ch /	Power High Ch /	Tune-up limit (dBm)
Channel				26140	26340	26590	
Frequency (MHz)				1860	1880	1905	
20	QPSK	1	0	24.37	24.06	23.99	25.7
20	QPSK	1	49	24.17	24.10	24.01	
20	QPSK	1	99	24.09	24.05	23.83	
20	QPSK	50	0	23.28	23.27	23.08	24.7
20	QPSK	50	24	23.33	23.30	23.12	
20	QPSK	50	50	23.27	23.29	23.14	
20	QPSK	100	0	23.28	23.29	23.17	24.7
20	16QAM	1	0	23.53	23.42	23.39	
20	16QAM	1	49	23.52	23.45	23.38	
20	16QAM	1	99	23.42	23.47	23.21	23.7
20	16QAM	50	0	22.25	22.27	22.14	
20	16QAM	50	24	22.33	22.33	22.11	
20	16QAM	50	50	22.28	22.24	22.22	23.7
20	16QAM	100	0	22.28	22.27	22.13	
20	64QAM	1	0	22.41	22.30	22.21	
20	64QAM	1	49	22.31	22.32	21.92	23.7
20	64QAM	1	99	22.39	22.38	21.70	
20	64QAM	50	0	21.29	21.27	20.87	
20	64QAM	50	24	21.33	21.30	20.90	22.7
20	64QAM	50	50	21.35	21.35	20.70	
20	64QAM	100	0	21.29	21.35	20.71	
Channel				28115	28340	28615	Tune-up limit (dBm)
Frequency (MHz)				1857.5	1880	1907.5	
15	QPSK	1	0	24.24	24.13	24.06	25.7
15	QPSK	1	37	24.11	24.17	24.07	
15	QPSK	1	74	24.19	24.20	23.81	
15	QPSK	36	0	23.36	23.25	23.15	24.7
15	QPSK	36	20	23.38	23.38	23.14	
15	QPSK	36	39	23.27	23.27	23.17	
15	QPSK	75	0	23.32	23.26	23.15	24.7
15	16QAM	1	0	23.46	23.50	23.39	
15	16QAM	1	37	23.44	23.50	23.30	
15	16QAM	1	74	23.42	23.50	23.19	23.7
15	16QAM	36	0	22.34	22.29	22.14	
15	16QAM	36	20	22.32	22.29	22.20	
15	16QAM	36	39	22.32	22.27	22.14	23.7
15	16QAM	75	0	22.27	22.28	22.24	
15	64QAM	1	0	22.42	22.33	21.77	
15	64QAM	1	37	22.35	22.38	21.86	23.7
15	64QAM	1	74	22.33	22.45	21.71	
15	64QAM	36	0	21.39	21.25	20.88	
15	64QAM	36	20	21.36	21.30	20.96	22.7
15	64QAM	36	39	21.33	21.28	20.71	
15	64QAM	75	0	21.33	21.34	20.70	
Channel				26090	26340	26640	Tune-up limit (dBm)
Frequency (MHz)				1855	1880	1910	
10	QPSK	1	0	24.16	24.13	24.06	25.7
10	QPSK	1	25	24.18	24.14	24.06	
10	QPSK	1	49	24.22	24.21	23.78	
10	QPSK	25	0	23.35	23.33	23.04	24.7
10	QPSK	25	12	23.32	23.27	23.25	
10	QPSK	25	25	23.28	23.32	23.17	
10	QPSK	50	0	23.29	23.26	23.18	24.7
10	16QAM	1	0	23.60	23.57	23.34	
10	16QAM	1	25	23.54	23.53	23.43	
10	16QAM	1	49	23.58	23.54	23.19	23.7
10	16QAM	25	0	22.31	22.28	22.05	
10	16QAM	25	12	22.33	22.29	22.16	
10	16QAM	25	25	22.35	22.27	22.12	23.7
10	16QAM	50	0	22.35	22.28	22.09	
10	64QAM	1	0	22.54	22.39	22.01	
10	64QAM	1	25	22.52	22.42	21.87	23.7
10	64QAM	1	49	22.41	22.48	21.75	
10	64QAM	25	0	21.31	21.33	20.78	
10	64QAM	25	12	21.42	21.36	20.85	22.7
10	64QAM	25	25	21.40	21.37	20.64	
10	64QAM	50	0	21.33	21.40	20.52	
Channel				26055	26340	26655	Tune-up limit (dBm)
Frequency (MHz)				1852.5	1880	1912.5	
5	QPSK	1	0	24.26	24.17	24.08	25.7
5	QPSK	1	12	24.23	24.21	24.04	
5	QPSK	1	24	24.29	24.19	23.74	
5	QPSK	12	0	23.23	23.22	23.18	24.7
5	QPSK	12	7	23.32	23.29	23.20	
5	QPSK	12	13	23.34	23.34	23.00	
5	QPSK	25	0	23.30	23.30	23.10	24.7
5	16QAM	1	0	23.57	23.48	23.36	
5	16QAM	1	12	23.60	23.55	23.41	
5	16QAM	1	24	23.60	23.55	23.14	23.7
5	16QAM	12	0	22.27	22.26	22.14	
5	16QAM	12	7	22.37	22.30	22.21	
5	16QAM	12	13	22.42	22.39	22.17	23.7
5	16QAM	25	0	22.36	22.28	22.13	
5	64QAM	1	0	22.42	22.44	21.76	
5	64QAM	1	12	22.41	22.39	21.78	23.7
5	64QAM	1	24	22.53	22.43	21.73	
5	64QAM	12	0	21.37	21.38	20.72	
5	64QAM	12	7	21.42	21.35	20.55	22.7
5	64QAM	12	13	21.42	21.34	20.38	
5	64QAM	25	0	21.29	21.32	20.45	
Channel				26055	26340	26675	Tune-up limit (dBm)
Frequency (MHz)				1851.5	1880	1913.5	
3	QPSK	1	0	24.15	24.03	24.06	25.7
3	QPSK	1	8	24.29	24.32	23.94	
3	QPSK	1	14	24.31	24.28	23.76	
3	QPSK	8	0	23.29	23.22	23.13	24.7
3	QPSK	8	4	23.31	23.33	23.06	
3	QPSK	8	7	23.31	23.37	22.84	
3	QPSK	15	0	23.28	23.32	22.90	24.7
3	16QAM	1	0	23.48	23.44	23.28	
3	16QAM	1	8	23.65	23.61	23.22	
3	16QAM	1	14	23.57	23.60	22.97	23.7
3	16QAM	8	0	22.29	22.31	22.20	
3	16QAM	8	4	22.41	22.31	22.13	
3	16QAM	8	7	22.34	22.42	22.10	23.7
3	16QAM	15	0	22.35	22.31	22.09	
3	64QAM	1	0	22.36	22.26	21.77	
3	64QAM	1	8	22.49	22.52	21.79	23.7
3	64QAM	1	14	22.57	22.51	21.75	
3	64QAM	8	0	21.29	21.29	21.66	
3	64QAM	8	4	21.41	21.39	20.42	22.7
3	64QAM	8	7	21.47	21.37	20.21	
3	64QAM	15	0	21.39	21.36	20.34	
Channel				26047	26340	26683	Tune-up limit (dBm)
Frequency (MHz)				1850.7	1880	1914.3	
1.4	QPSK	1	0	24.13	24.06	23.93	25.7
1.4	QPSK	1	3	24.16	24.35	23.79	
1.4	QPSK	1	5	24.34	24.22	23.73	
1.4	QPSK	3	0	24.22	24.20	23.75	24.7
1.4	QPSK	3	1	24.29	24.30	23.75	
1.4	QPSK	3	3	24.24	24.17	23.74	
1.4	QPSK	6	0	23.28	23.21	22.91	24.7
1.4	16QAM	1	0	23.55	23.46	23.10	
1.4	16QAM	1	3	23.58	23.49	23.18	
1.4	16QAM	1	5	23.52	23.46	22.88	24.7
1.4	16QAM	3	0	23.31	23.28	22.98	
1.4	16QAM	3	1	23.36	23.25	22.91	
1.4	16QAM	3	3	23.38	23.25	22.81	23.7
1.4	16QAM	6	0	22.28	22.41	22.00	
1.4	64QAM	1	0	22.36	22.44	21.74	
1.4	64QAM	1	3	22.51	22.58	21.78	23.7
1.4	64QAM	1	5	22.58	22.33	21.72	
1.4	64QAM	3	0	22.40	22.41	21.75	
1.4	64QAM	3	1	22.50	22.44	21.77	23.7
1.4	64QAM	3	3	22.38	22.43	21.70	
1.4	64QAM	6	0	21.23	21.35	20.78	



Band 26							
Ant 1							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				26765	26865	26965	
Frequency (MHz)				821.5	831.5	841.5	
15	QPSK	1	0	24.04	24.05	24.03	25.7
15	QPSK	1	37	23.98	24.02	24.02	
15	QPSK	1	74	24.10	24.33	23.96	
15	QPSK	36	0	23.17	23.22	23.18	
15	QPSK	36	20	23.23	23.18	23.12	24.7
15	QPSK	36	39	23.19	23.19	23.15	
15	QPSK	75	0	23.23	23.17	23.12	
15	16QAM	1	0	23.36	23.36	23.39	24.7
15	16QAM	1	37	23.38	23.42	23.42	
15	16QAM	1	74	23.43	23.44	23.29	
15	16QAM	36	0	22.16	22.22	22.16	
15	16QAM	36	20	22.17	22.15	22.16	23.7
15	16QAM	36	39	22.14	22.17	22.23	
15	16QAM	75	0	22.17	22.15	22.22	
15	64QAM	1	0	22.79	22.70	22.74	23.7
15	64QAM	1	37	22.72	22.50	22.79	
15	64QAM	1	74	22.80	22.76	22.16	
15	64QAM	36	0	21.64	21.76	21.77	
15	64QAM	36	20	21.66	21.73	21.65	22.7
15	64QAM	36	39	21.67	21.70	21.78	
15	64QAM	75	0	21.76	21.65	21.77	
Channel				26740	26865	26990	Tune-up limit (dBm)
Frequency (MHz)				819	831.5	844	
10	QPSK	1	0	24.13	24.13	24.21	25.7
10	QPSK	1	25	24.03	24.13	24.12	
10	QPSK	1	49	24.09	24.17	24.09	
10	QPSK	25	0	23.22	23.12	23.21	24.7
10	QPSK	25	12	23.20	23.20	23.20	
10	QPSK	25	25	23.16	23.23	23.20	
10	QPSK	50	0	23.23	23.14	23.16	
10	16QAM	1	0	23.45	23.52	23.59	24.7
10	16QAM	1	25	23.55	23.51	23.52	
10	16QAM	1	49	23.53	23.49	23.45	
10	16QAM	25	0	22.22	22.20	22.21	23.7
10	16QAM	25	12	22.23	22.21	22.15	
10	16QAM	25	25	22.17	22.23	22.08	
10	16QAM	50	0	22.20	22.19	22.19	
10	64QAM	1	0	22.96	22.76	22.91	23.7
10	64QAM	1	25	22.81	22.91	22.98	
10	64QAM	1	49	22.93	22.91	22.96	
10	64QAM	25	0	21.76	21.73	21.76	22.7
10	64QAM	25	12	21.62	21.75	21.78	
10	64QAM	25	25	21.70	21.75	21.48	
10	64QAM	50	0	21.74	21.68	21.72	
Channel				26715	26865	27015	Tune-up limit (dBm)
Frequency (MHz)				816.5	831.5	846.5	
5	QPSK	1	0	24.31	24.13	24.11	25.7
5	QPSK	1	19	24.24	24.19	24.09	
5	QPSK	1	24	24.07	24.24	24.16	
5	QPSK	12	0	23.33	23.23	23.21	24.7
5	QPSK	12	7	23.27	23.27	23.22	
5	QPSK	12	13	23.26	23.24	23.11	
5	QPSK	25	0	23.28	23.13	23.20	24.7
5	16QAM	1	0	23.63	23.43	23.45	
5	16QAM	1	12	23.43	23.51	23.32	
5	16QAM	1	24	23.44	23.49	23.31	
5	16QAM	12	0	22.38	22.22	22.22	23.7
5	16QAM	12	7	22.32	22.24	22.21	
5	16QAM	12	13	22.21	22.25	22.18	
5	16QAM	25	0	22.22	22.21	22.21	23.7
5	64QAM	1	0	23.02	22.85	22.89	
5	64QAM	1	12	22.84	22.89	22.19	
5	64QAM	1	24	22.68	22.92	22.34	
5	64QAM	12	0	21.90	21.84	21.65	22.7
5	64QAM	12	7	21.89	21.81	21.18	
5	64QAM	12	13	21.75	21.82	21.02	
5	64QAM	25	0	21.82	21.69	21.56	
Channel				26705	26865	27025	Tune-up limit (dBm)
Frequency (MHz)				815.5	831.5	847.5	
3	QPSK	1	0	24.19	24.16	24.20	25.7
3	QPSK	1	8	24.24	24.27	24.13	
3	QPSK	1	14	24.07	24.18	24.11	
3	QPSK	8	0	23.34	23.18	23.17	24.7
3	QPSK	8	4	23.25	23.25	23.22	
3	QPSK	8	7	23.29	23.24	23.10	
3	QPSK	15	0	23.24	23.18	23.13	
3	16QAM	1	0	23.53	23.45	23.50	24.7
3	16QAM	1	8	23.59	23.51	23.39	
3	16QAM	1	14	23.50	23.53	23.35	
3	16QAM	8	0	22.35	22.23	22.26	23.7
3	16QAM	8	4	22.30	22.37	22.25	
3	16QAM	8	7	22.27	22.33	22.13	
3	16QAM	15	0	22.38	22.17	22.16	
3	64QAM	1	0	22.92	22.87	22.25	23.7
3	64QAM	1	8	23.00	22.93	22.12	
3	64QAM	1	14	22.89	22.94	22.30	
3	64QAM	8	0	21.87	21.79	21.08	22.7
3	64QAM	8	4	21.84	21.88	21.07	
3	64QAM	8	7	21.88	21.80	21.14	
3	64QAM	15	0	21.81	21.79	21.12	
Channel				26697	26865	27033	Tune-up limit (dBm)
Frequency (MHz)				814.7	831.5	848.3	
1.4	QPSK	1	0	24.16	24.04	24.05	25.7
1.4	QPSK	1	3	24.24	24.13	24.07	
1.4	QPSK	1	5	24.12	24.08	23.93	
1.4	QPSK	3	0	24.23	24.06	24.02	
1.4	QPSK	3	1	24.21	24.05	24.03	
1.4	QPSK	3	3	24.16	24.14	23.99	24.7
1.4	QPSK	6	0	23.25	23.20	23.04	
1.4	16QAM	1	0	23.52	23.37	23.36	24.7
1.4	16QAM	1	3	23.54	23.47	23.35	
1.4	16QAM	1	5	23.41	23.39	23.29	
1.4	16QAM	3	0	23.23	23.16	23.12	
1.4	16QAM	3	1	23.23	23.20	23.14	
1.4	16QAM	3	3	23.27	23.11	23.09	23.7
1.4	16QAM	6	0	22.34	22.26	22.14	
1.4	64QAM	1	0	22.85	22.81	22.16	
1.4	64QAM	1	3	22.96	22.89	22.39	
1.4	64QAM	1	5	22.79	22.75	22.41	23.7
1.4	64QAM	3	0	22.92	22.75	22.11	
1.4	64QAM	3	1	22.90	22.81	22.20	
1.4	64QAM	3	3	22.84	22.75	22.38	
1.4	64QAM	6	0	21.75	21.73	21.14	22.7



Band 30							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				27710			
Frequency (MHz)				2310			
10	QPSK	1	0	22.60			23.7
10	QPSK	1	25	22.96			
10	QPSK	1	49	22.57			
10	QPSK	25	0	21.40			
10	QPSK	25	12	21.84			22.7
10	QPSK	25	25	21.51			
10	QPSK	50	0	21.63			
10	16QAM	1	0	21.91			22.7
10	16QAM	1	25	21.92			
10	16QAM	1	49	21.84			
10	16QAM	25	0	20.46			
10	16QAM	25	12	20.53			21.7
10	16QAM	25	25	20.45			
10	16QAM	50	0	20.55			
10	64QAM	1	0	20.66			21.7
10	64QAM	1	25	20.70			
10	64QAM	1	49	20.62			
10	64QAM	25	0	19.46			
10	64QAM	25	12	19.81			20.7
10	64QAM	25	25	19.67			
10	64QAM	50	0	19.60			
Channel				27685	27710	27735	Tune-up limit (dBm)
Frequency (MHz)				2307.5	2310	2312.5	
5	QPSK	1	0	22.40	22.33	22.46	23.7
5	QPSK	1	12	22.50	22.59	22.53	
5	QPSK	1	24	22.58	22.42	22.56	
5	QPSK	12	0	21.52	21.63	21.49	22.7
5	QPSK	12	7	21.58	21.57	21.60	
5	QPSK	12	13	21.55	21.61	21.44	
5	QPSK	25	0	21.68	21.45	21.51	
5	16QAM	1	0	21.71	21.78	21.72	22.7
5	16QAM	1	12	21.80	21.73	21.86	
5	16QAM	1	24	22.01	21.70	21.78	
5	16QAM	12	0	20.58	20.56	20.55	21.7
5	16QAM	12	7	20.71	20.64	20.67	
5	16QAM	12	13	20.59	20.54	20.63	
5	16QAM	25	0	20.66	20.60	20.51	
5	64QAM	1	0	20.71	20.69	20.64	21.7
5	64QAM	1	12	20.68	20.73	20.64	
5	64QAM	1	24	20.85	20.83	20.70	
5	64QAM	12	0	19.64	19.66	19.68	20.7
5	64QAM	12	7	19.70	19.57	19.60	
5	64QAM	12	13	19.73	19.66	19.69	
5	64QAM	25	0	19.73	19.66	19.62	



Band 66							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				132072	132322	132572	
Frequency (MHz)				1720	1745	1770	
20	QPSK	1	0	24.30	24.23	24.29	25.7
20	QPSK	1	48	24.09	24.16	24.12	
20	QPSK	1	99	24.24	24.20	24.16	
20	QPSK	50	0	23.14	23.07	23.15	24.7
20	QPSK	50	24	23.18	22.94	23.14	
20	QPSK	50	50	23.21	23.00	23.03	
20	QPSK	100	0	23.14	23.16	23.11	24.7
20	16QAM	1	0	23.42	23.47	23.37	
20	16QAM	1	49	23.34	23.24	23.20	
20	16QAM	1	99	23.33	23.34	23.10	23.7
20	16QAM	50	0	22.13	21.98	22.08	
20	16QAM	50	24	22.19	21.98	22.18	
20	16QAM	50	50	22.17	22.04	22.12	23.7
20	16QAM	100	0	22.18	22.06	22.23	
20	64QAM	1	0	22.36	22.29	22.16	
20	64QAM	1	49	22.09	22.08	22.17	23.7
20	64QAM	1	99	22.31	22.25	22.10	
20	64QAM	50	0	21.13	21.16	21.03	
20	64QAM	50	24	21.28	21.17	21.23	22.7
20	64QAM	50	50	21.14	21.10	21.14	
20	64QAM	100	0	21.14	21.10	21.14	
Channel				132047	132322	132597	Tune-up limit (dBm)
Frequency (MHz)				1717.5	1745	1772.5	
15	QPSK	1	0	24.18	23.94	24.08	25.7
15	QPSK	1	37	23.89	23.88	23.85	
15	QPSK	1	74	24.10	24.10	23.90	
15	QPSK	36	0	23.05	23.14	23.03	24.7
15	QPSK	36	20	23.08	23.15	23.05	
15	QPSK	36	39	23.19	23.16	23.01	
15	QPSK	75	0	23.06	23.10	23.01	24.7
15	16QAM	1	0	23.38	23.35	23.32	
15	16QAM	1	37	23.28	23.30	23.22	
15	16QAM	1	74	23.40	23.34	23.17	23.7
15	16QAM	36	0	22.03	22.04	21.98	
15	16QAM	36	20	22.28	22.03	22.08	
15	16QAM	36	39	22.18	22.01	22.20	23.7
15	16QAM	75	0	22.08	22.23	21.94	
15	64QAM	1	0	22.32	22.16	22.18	
15	64QAM	1	37	22.13	22.17	22.07	23.7
15	64QAM	1	74	22.25	22.20	22.21	
15	64QAM	36	0	21.01	21.05	21.11	
15	64QAM	36	20	21.06	21.19	21.05	22.7
15	64QAM	36	39	21.16	21.05	21.09	
15	64QAM	75	0	21.19	21.16	21.06	
Channel				132022	132322	132622	Tune-up limit (dBm)
Frequency (MHz)				1715	1745	1775	
10	QPSK	1	0	24.11	24.02	24.01	25.7
10	QPSK	1	25	24.01	23.94	24.10	
10	QPSK	1	49	24.07	23.97	24.06	
10	QPSK	25	0	23.22	23.02	23.12	24.7
10	QPSK	25	12	23.19	23.15	23.12	
10	QPSK	25	25	23.24	23.22	23.21	
10	QPSK	50	0	23.25	23.23	23.16	24.7
10	16QAM	1	0	23.42	23.36	23.38	
10	16QAM	1	25	23.46	23.36	23.37	
10	16QAM	1	49	23.38	23.45	23.49	23.7
10	16QAM	25	0	22.24	22.00	22.16	
10	16QAM	25	12	22.31	22.25	22.08	
10	16QAM	25	25	22.14	22.10	22.08	23.7
10	16QAM	50	0	22.23	22.25	22.09	
10	64QAM	1	0	22.28	22.20	22.25	
10	64QAM	1	25	22.32	22.28	22.40	23.7
10	64QAM	1	49	22.40	22.41	22.24	
10	64QAM	25	0	21.15	21.09	21.10	
10	64QAM	25	12	21.29	21.12	21.10	22.7
10	64QAM	25	25	21.24	21.22	21.21	
10	64QAM	50	0	21.19	21.25	21.18	
Channel				131997	132322	132647	Tune-up limit (dBm)
Frequency (MHz)				1712.5	1745	1777.5	
5	QPSK	1	0	24.08	24.07	24.01	25.7
5	QPSK	1	12	24.22	24.06	24.12	
5	QPSK	1	24	24.15	24.17	24.01	
5	QPSK	12	0	23.15	23.10	23.13	24.7
5	QPSK	12	7	23.11	23.27	23.24	
5	QPSK	12	13	23.29	23.19	23.27	
5	QPSK	25	0	23.13	23.20	23.14	24.7
5	16QAM	1	0	23.51	23.45	23.47	
5	16QAM	1	12	23.59	23.49	23.41	
5	16QAM	1	24	23.47	23.46	23.30	23.7
5	16QAM	12	0	22.30	22.11	22.26	
5	16QAM	12	7	22.29	22.28	22.26	
5	16QAM	12	13	22.18	22.28	22.25	23.7
5	16QAM	25	0	22.21	22.09	22.27	
5	64QAM	1	0	22.40	22.30	22.30	
5	64QAM	1	12	22.47	22.38	22.33	23.7
5	64QAM	1	24	22.42	22.35	22.32	
5	64QAM	12	0	21.39	21.26	21.33	
5	64QAM	12	7	21.19	21.19	21.33	22.7
5	64QAM	12	13	21.24	21.27	21.30	
5	64QAM	25	0	21.16	21.25	21.08	
Channel				131987	132322	132657	Tune-up limit (dBm)
Frequency (MHz)				1711.5	1745	1776.5	
3	QPSK	1	0	24.06	24.06	24.00	25.7
3	QPSK	1	8	24.25	24.06	24.07	
3	QPSK	1	14	24.05	24.10	24.03	
3	QPSK	8	0	23.18	23.09	23.20	24.7
3	QPSK	8	4	23.21	23.21	23.13	
3	QPSK	8	7	23.18	23.10	23.05	
3	QPSK	15	0	23.12	23.22	23.17	24.7
3	16QAM	1	0	23.51	23.27	23.27	
3	16QAM	1	8	23.50	23.58	23.48	
3	16QAM	1	14	23.41	23.39	23.44	23.7
3	16QAM	8	0	22.20	22.29	22.27	
3	16QAM	8	4	22.39	22.27	22.24	
3	16QAM	8	7	22.24	22.12	22.11	23.7
3	16QAM	15	0	22.25	22.18	22.27	
3	64QAM	1	0	22.32	22.37	22.38	
3	64QAM	1	8	22.51	22.33	22.42	23.7
3	64QAM	1	14	22.47	22.29	22.31	
3	64QAM	8	0	21.36	21.20	21.26	
3	64QAM	8	4	21.25	21.16	21.20	22.7
3	64QAM	8	7	21.20	21.32	21.16	
3	64QAM	15	0	21.18	21.17	21.27	
Channel				131979	132322	132655	Tune-up limit (dBm)
Frequency (MHz)				1710.7	1745	1779.3	
1.4	QPSK	1	0	24.01	24.08	23.94	25.7
1.4	QPSK	1	3	24.15	23.99	24.13	
1.4	QPSK	1	5	23.95	23.98	23.92	
1.4	QPSK	3	0	24.16	23.99	24.11	24.7
1.4	QPSK	3	1	24.08	24.06	24.13	
1.4	QPSK	3	3	23.98	24.03	24.03	
1.4	QPSK	6	0	23.18	23.00	23.09	24.7
1.4	16QAM	1	0	23.42	23.24	23.22	
1.4	16QAM	1	3	23.42	23.46	23.43	
1.4	16QAM	1	5	23.33	23.35	23.22	24.7
1.4	16QAM	3	0	23.19	23.17	23.10	
1.4	16QAM	3	1	23.20	23.08	23.07	
1.4	16QAM	3	3	23.11	23.09	23.01	23.7
1.4	16QAM	6	0	22.24	22.15	22.08	
1.4	64QAM	1	0	22.39	22.20	22.35	
1.4	64QAM	1	3	22.41	22.31	22.32	23.7
1.4	64QAM	1	5	22.39	22.29	22.32	
1.4	64QAM	3	0	22.19	22.20	22.22	
1.4	64QAM	3	1	22.40	22.38	22.37	23.7
1.4	64QAM	3	3	22.36	22.12	22.21	
1.4	64QAM	6	0	21.27	21.06	21.17	



Band 71							
Ant 1							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				133222	133322	133372	
Frequency (MHz)				673	683	688	
20	QPSK	1	0	24.35	24.17	24.20	25.7
20	QPSK	1	49	24.15	24.16	24.15	
20	QPSK	1	99	24.12	24.09	24.08	
20	QPSK	50	0	23.28	23.24	23.26	24.7
20	QPSK	50	24	23.33	23.28	23.17	
20	QPSK	50	50	23.32	23.27	23.27	
20	QPSK	100	0	23.33	23.32	23.28	24.7
20	16QAM	1	0	23.68	23.52	23.53	
20	16QAM	1	49	23.58	23.54	23.49	
20	16QAM	1	99	23.49	23.49	23.45	23.7
20	16QAM	50	0	22.34	22.30	22.30	
20	16QAM	50	24	22.34	22.27	22.24	
20	16QAM	50	50	22.30	22.25	22.28	23.7
20	16QAM	100	0	22.32	22.30	22.26	
20	64QAM	1	0	22.18	22.70	23.01	
20	64QAM	1	49	22.76	22.59	22.38	23.7
20	64QAM	1	99	23.01	22.51	22.88	
20	64QAM	50	0	20.82	21.86	21.50	
20	64QAM	50	24	21.49	21.70	21.76	22.7
20	64QAM	50	50	21.96	21.50	21.85	
20	64QAM	100	0	21.50	21.89	21.87	
Channel				133197	133287	133387	Tune-up limit (dBm)
Frequency (MHz)				670.5	680.5	690.5	
15	QPSK	1	0	24.33	24.17	24.13	25.7
15	QPSK	1	37	24.01	24.14	24.11	
15	QPSK	1	74	24.16	24.11	24.11	
15	QPSK	36	0	23.24	23.26	23.27	24.7
15	QPSK	36	20	23.29	23.26	23.37	
15	QPSK	36	39	23.31	23.33	23.26	
15	QPSK	75	0	23.34	23.30	23.20	24.7
15	16QAM	1	0	23.56	23.53	23.49	
15	16QAM	1	37	23.28	23.50	23.41	
15	16QAM	1	74	23.38	23.43	23.38	23.7
15	16QAM	36	0	22.15	22.31	22.26	
15	16QAM	36	20	22.31	22.25	22.34	
15	16QAM	36	39	22.38	22.33	22.28	23.7
15	16QAM	75	0	22.37	22.19	22.18	
15	64QAM	1	0	22.13	22.80	22.90	
15	64QAM	1	37	21.73	23.04	23.04	23.7
15	64QAM	1	74	22.53	22.63	22.97	
15	64QAM	36	0	20.81	21.92	21.51	
15	64QAM	36	20	20.88	21.74	21.92	22.7
15	64QAM	36	39	21.49	21.44	21.86	
15	64QAM	75	0	21.38	21.79	21.77	
Channel				133172	133272	133422	Tune-up limit (dBm)
Frequency (MHz)				668	678	683	
10	QPSK	1	0	24.30	24.14	24.17	25.7
10	QPSK	1	25	24.11	24.10	24.12	
10	QPSK	1	49	24.13	24.14	24.01	
10	QPSK	25	0	23.36	23.26	23.22	24.7
10	QPSK	25	12	23.13	23.25	23.22	
10	QPSK	25	25	23.19	23.31	23.23	
10	QPSK	50	0	23.29	23.18	23.16	24.7
10	16QAM	1	0	23.62	23.47	23.53	
10	16QAM	1	25	23.47	23.51	23.45	
10	16QAM	1	49	23.46	23.44	23.39	23.7
10	16QAM	25	0	22.05	22.17	22.16	
10	16QAM	25	12	22.07	22.24	22.20	
10	16QAM	25	25	22.00	22.24	22.19	23.7
10	16QAM	50	0	22.28	22.17	22.22	
10	64QAM	1	0	21.83	22.96	22.99	
10	64QAM	1	25	21.88	23.08	23.07	23.7
10	64QAM	1	49	22.12	22.23	22.55	
10	64QAM	25	0	20.70	21.87	21.82	
10	64QAM	25	12	20.70	21.74	21.85	22.7
10	64QAM	25	25	20.68	21.37	21.72	
10	64QAM	50	0	20.79	21.60	21.80	
Channel				133147	133247	133447	Tune-up limit (dBm)
Frequency (MHz)				665.5	675.5	695.5	
5	QPSK	1	0	24.03	24.23	24.23	25.7
5	QPSK	1	12	24.13	24.24	24.12	
5	QPSK	1	24	24.11	24.10	24.10	
5	QPSK	12	0	23.15	23.26	23.19	24.7
5	QPSK	12	7	23.15	23.32	23.26	
5	QPSK	12	13	23.13	23.22	23.16	
5	QPSK	25	0	23.15	23.26	23.20	24.7
5	16QAM	1	0	23.29	23.53	23.62	
5	16QAM	1	12	23.38	23.54	23.50	
5	16QAM	1	24	23.40	23.49	23.42	23.7
5	16QAM	12	0	22.04	22.36	22.29	
5	16QAM	12	7	22.12	22.30	22.29	
5	16QAM	12	13	22.25	22.25	22.21	23.7
5	16QAM	25	0	22.06	22.21	22.22	
5	64QAM	1	0	21.70	22.98	23.00	
5	64QAM	1	12	21.82	22.93	22.81	23.7
5	64QAM	1	24	22.03	22.71	22.37	
5	64QAM	12	0	20.74	21.93	21.85	
5	64QAM	12	7	20.91	21.89	21.91	22.7
5	64QAM	12	13	20.87	21.70	21.89	
5	64QAM	25	0	20.69	21.73	21.61	



Band 2							
Ant 2							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch.	Power Mid Ch.	Power High Ch.	Tune-up limit (dbm)
Channel				18700	18900	19100	
Frequency (MHz)				1860	1880	1900	
20	QPSK	1	0	24.49	24.54	24.52	25.7
20	QPSK	1	49	24.45	24.53	24.43	
20	QPSK	1	99	24.45	24.47	24.40	
20	QPSK	50	0	23.55	23.99	23.58	24.7
20	QPSK	50	24	23.64	23.63	23.99	
20	QPSK	50	50	23.62	23.57	23.99	
20	QPSK	100	0	23.65	23.58	23.99	24.7
20	16QAM	1	0	23.84	23.86	23.82	
20	16QAM	1	49	23.83	23.86	23.76	
20	16QAM	1	99	23.75	23.82	23.70	23.7
20	16QAM	50	0	22.56	22.60	22.61	
20	16QAM	50	24	22.66	22.64	22.61	
20	16QAM	50	50	22.65	22.60	22.59	23.7
20	16QAM	100	0	22.62	22.59	22.59	
20	64QAM	1	0	22.68	22.77	22.74	
20	64QAM	1	49	22.73	22.73	22.40	22.7
20	64QAM	1	99	22.66	22.67	22.63	
20	64QAM	50	0	21.59	21.61	21.60	
20	64QAM	50	24	21.68	21.66	21.56	Tune-up limit (dbm)
20	64QAM	50	50	21.66	21.61	21.61	
20	64QAM	100	0	21.65	21.64	21.59	
Channel				1867.5	18900	19125	
Frequency (MHz)				1857.5	1880	1902.5	
15	QPSK	1	0	24.51	24.52	24.50	25.7
15	QPSK	1	37	24.47	24.53	24.39	
15	QPSK	1	74	24.50	24.52	24.46	
15	QPSK	36	0	23.51	23.57	23.54	24.7
15	QPSK	36	20	23.61	23.63	23.58	
15	QPSK	36	39	23.60	23.60	23.57	
15	QPSK	75	0	23.61	23.60	23.55	24.7
15	16QAM	1	0	23.73	23.84	23.80	
15	16QAM	1	37	23.78	23.83	23.74	
15	16QAM	1	74	23.79	23.81	23.72	23.7
15	16QAM	36	0	22.53	22.59	22.54	
15	16QAM	36	20	22.62	22.62	22.56	
15	16QAM	36	39	22.61	22.61	22.57	23.7
15	16QAM	75	0	22.62	22.61	22.58	
15	64QAM	1	0	22.68	22.76	22.69	
15	64QAM	1	37	22.71	22.82	22.47	22.7
15	64QAM	1	74	22.70	22.66	22.66	
15	64QAM	36	0	21.57	21.64	21.42	
15	64QAM	36	20	21.66	21.66	21.60	Tune-up limit (dbm)
15	64QAM	36	39	21.70	21.67	21.59	
15	64QAM	75	0	21.65	21.62	21.59	
Channel				18650	18900	19150	
Frequency (MHz)				1855	1880	1905	
10	QPSK	1	0	24.43	24.53	24.44	25.7
10	QPSK	1	25	24.44	24.49	24.38	
10	QPSK	1	49	24.45	24.50	24.43	
10	QPSK	25	0	23.55	23.55	23.49	24.7
10	QPSK	25	12	23.59	23.59	23.55	
10	QPSK	25	25	23.60	23.58	23.58	
10	QPSK	50	0	23.59	23.59	23.55	24.7
10	16QAM	1	0	23.83	23.86	23.79	
10	16QAM	1	25	23.81	23.93	23.77	
10	16QAM	1	49	23.80	23.87	23.76	23.7
10	16QAM	25	0	22.57	22.55	22.82	
10	16QAM	25	12	22.61	22.62	22.53	
10	16QAM	25	25	22.54	22.59	22.56	23.7
10	16QAM	50	0	22.59	22.57	22.95	
10	64QAM	1	0	22.67	22.71	22.48	
10	64QAM	1	25	22.75	22.79	22.68	22.7
10	64QAM	1	49	22.71	22.72	22.70	
10	64QAM	25	0	21.60	21.59	21.51	
10	64QAM	25	12	21.63	21.64	21.58	Tune-up limit (dbm)
10	64QAM	25	25	21.62	21.62	21.59	
10	64QAM	50	0	21.64	21.64	21.55	
Channel				1862.5	18900	19175	
Frequency (MHz)				1852.5	1880	1907.5	
5	QPSK	1	0	24.42	24.45	24.43	25.7
5	QPSK	1	12	24.45	24.50	24.48	
5	QPSK	1	24	24.48	24.49	24.46	
5	QPSK	12	0	23.54	23.54	23.50	24.7
5	QPSK	12	7	23.55	23.59	23.53	
5	QPSK	12	13	23.59	23.63	23.52	
5	QPSK	25	0	23.56	23.57	23.50	24.7
5	16QAM	1	0	23.77	23.88	23.68	
5	16QAM	1	12	23.83	23.90	23.75	
5	16QAM	1	24	23.82	23.92	23.78	23.7
5	16QAM	12	0	22.57	22.59	22.63	
5	16QAM	12	7	22.61	22.62	22.65	
5	16QAM	12	13	22.56	22.67	22.56	23.7
5	16QAM	25	0	22.56	22.59	22.65	
5	64QAM	1	0	22.73	22.76	22.69	
5	64QAM	1	12	22.72	22.79	22.70	22.7
5	64QAM	1	24	22.73	22.82	22.72	
5	64QAM	12	0	21.62	21.66	21.56	
5	64QAM	12	7	21.65	21.66	21.59	Tune-up limit (dbm)
5	64QAM	12	13	21.64	21.69	21.60	
5	64QAM	25	0	21.59	21.58	21.56	
Channel				18615	18900	19185	
Frequency (MHz)				1851.5	1880	1906.5	
3	QPSK	1	0	24.46	24.46	24.35	25.7
3	QPSK	1	8	24.46	24.49	24.49	
3	QPSK	1	14	24.47	24.53	24.44	
3	QPSK	8	0	23.55	23.58	23.47	24.7
3	QPSK	8	4	23.56	23.67	23.50	
3	QPSK	8	7	23.51	23.60	23.48	
3	QPSK	15	0	23.55	23.57	23.49	24.7
3	16QAM	1	0	23.78	23.79	23.68	
3	16QAM	1	8	23.89	23.96	23.80	
3	16QAM	1	14	23.82	23.89	23.77	23.7
3	16QAM	8	0	22.62	22.61	22.65	
3	16QAM	8	4	22.63	22.73	22.59	
3	16QAM	8	7	22.61	22.69	22.56	23.7
3	16QAM	15	0	22.56	22.59	22.53	
3	64QAM	1	0	22.71	22.74	22.66	
3	64QAM	1	8	22.78	22.89	22.76	22.7
3	64QAM	1	14	22.72	22.82	22.70	
3	64QAM	8	0	21.61	21.60	21.56	
3	64QAM	8	4	21.61	21.69	21.62	Tune-up limit (dbm)
3	64QAM	8	7	21.62	21.66	21.58	
3	64QAM	15	0	21.58	21.58	21.53	
Channel				18607	18900	19193	
Frequency (MHz)				1850.7	1880	1909.3	
1.4	QPSK	1	0	24.40	24.46	24.32	25.7
1.4	QPSK	1	3	24.45	24.52	24.41	
1.4	QPSK	1	5	24.38	24.46	24.33	
1.4	QPSK	3	0	24.44	24.53	24.36	24.7
1.4	QPSK	3	1	24.47	24.50	24.41	
1.4	QPSK	3	3	24.43	24.51	24.37	
1.4	QPSK	6	0	23.48	23.57	23.40	24.7
1.4	16QAM	1	0	23.72	23.77	23.63	
1.4	16QAM	1	3	23.76	23.87	23.74	
1.4	16QAM	1	5	23.71	23.80	23.64	24.7
1.4	16QAM	3	0	23.50	23.58	23.42	
1.4	16QAM	3	1	23.58	23.65	23.50	
1.4	16QAM	3	3	23.51	23.59	23.43	23.7
1.4	16QAM	6	0	22.53	22.60	22.47	
1.4	64QAM	1	0	22.65	22.73	22.56	
1.4	64QAM	1	3	22.72	22.81	22.67	23.7
1.4	64QAM	1	5	22.67	22.72	22.60	
1.4	64QAM	3	0	22.60	22.68	22.56	
1.4	64QAM	3	1	22.68	22.75	22.63	22.7
1.4	64QAM	3	3	22.62	22.70	22.55	
1.4	64QAM	6	0	21.50	21.57	21.43	



Band 4							
Ant 2							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				20050	20175	20300	
Frequency (MHz)				1720	1732.5	1745	
20	QPSK	1	0	24.31	24.32	24.35	25.7
20	QPSK	1	49	24.20	24.17	24.08	
20	QPSK	1	99	24.21	24.16	24.12	
20	QPSK	50	0	23.35	23.32	23.29	24.7
20	QPSK	50	24	23.41	23.41	23.23	
20	QPSK	50	50	23.36	23.25	23.23	
20	QPSK	100	0	23.29	23.38	23.24	24.7
20	16QAM	1	0	23.69	23.65	23.64	
20	16QAM	1	49	23.51	23.46	23.46	
20	16QAM	1	99	23.57	23.42	23.43	23.7
20	16QAM	50	0	22.31	22.31	22.35	
20	16QAM	50	24	22.39	22.32	22.32	
20	16QAM	50	50	22.34	22.25	22.23	23.7
20	16QAM	100	0	22.35	22.45	22.24	
20	64QAM	1	0	22.29	22.61	22.11	
20	64QAM	1	49	22.41	22.33	22.34	23.7
20	64QAM	1	99	22.41	22.04	22.43	
20	64QAM	50	0	21.33	21.42	21.09	
20	64QAM	50	24	21.42	21.38	21.28	22.7
20	64QAM	50	50	21.29	21.12	21.25	
20	64QAM	100	0	21.41	21.42	21.25	
Channel				20225	20175	20325	Tune-up limit (dBm)
Frequency (MHz)				1717.5	1732.5	1747.5	
15	QPSK	1	0	24.34	24.33	24.33	25.7
15	QPSK	1	37	24.12	24.14	24.11	
15	QPSK	1	74	24.21	24.22	24.14	
15	QPSK	36	0	23.38	23.29	23.31	24.7
15	QPSK	36	20	23.38	23.33	23.20	
15	QPSK	36	39	23.34	23.33	23.30	
15	QPSK	75	0	23.36	23.42	23.23	24.7
15	16QAM	1	0	23.56	23.59	23.62	
15	16QAM	1	37	23.47	23.50	23.44	
15	16QAM	1	74	23.53	23.47	23.42	23.7
15	16QAM	36	0	22.39	22.39	22.33	
15	16QAM	36	20	22.31	22.37	22.30	
15	16QAM	36	39	22.29	22.34	22.22	23.7
15	16QAM	75	0	22.36	22.41	22.24	
15	64QAM	1	0	22.33	22.52	22.27	
15	64QAM	1	37	22.48	22.46	22.44	23.7
15	64QAM	1	74	22.42	22.13	22.33	
15	64QAM	36	0	21.42	21.36	21.34	
15	64QAM	36	20	21.33	21.48	21.30	22.7
15	64QAM	36	39	21.35	21.07	21.28	
15	64QAM	75	0	21.36	21.36	21.30	
Channel				20000	20175	20350	Tune-up limit (dBm)
Frequency (MHz)				1715	1732.5	1750	
10	QPSK	1	0	24.20	24.24	24.21	25.7
10	QPSK	1	25	24.18	24.16	24.15	
10	QPSK	1	49	24.29	24.23	24.22	
10	QPSK	25	0	23.29	23.31	23.21	24.7
10	QPSK	25	12	23.34	23.38	23.22	
10	QPSK	25	25	23.30	23.41	23.29	
10	QPSK	50	0	23.32	23.37	23.21	24.7
10	16QAM	1	0	23.60	23.63	23.56	
10	16QAM	1	25	23.54	23.60	23.51	
10	16QAM	1	49	23.64	23.53	23.60	23.7
10	16QAM	25	0	22.31	22.31	22.27	
10	16QAM	25	12	22.35	22.38	22.27	
10	16QAM	25	25	22.37	22.38	22.30	23.7
10	16QAM	50	0	22.34	22.35	22.29	
10	64QAM	1	0	22.16	22.45	22.40	
10	64QAM	1	25	22.54	22.49	22.42	23.7
10	64QAM	1	49	22.49	22.12	22.47	
10	64QAM	25	0	21.35	21.31	21.24	
10	64QAM	25	12	21.43	21.40	21.26	22.7
10	64QAM	25	25	21.32	21.17	21.38	
10	64QAM	50	0	21.39	21.32	21.29	
Channel				19975	20175	20375	Tune-up limit (dBm)
Frequency (MHz)				1712.5	1732.5	1752.5	
5	QPSK	1	0	24.21	24.19	24.17	25.7
5	QPSK	1	12	24.27	24.26	24.18	
5	QPSK	1	24	24.24	24.25	24.16	
5	QPSK	12	0	23.35	23.31	23.23	24.7
5	QPSK	12	7	23.39	23.36	23.32	
5	QPSK	12	13	23.41	23.39	23.24	
5	QPSK	25	0	23.27	23.38	23.20	24.7
5	16QAM	1	0	23.50	23.54	23.53	
5	16QAM	1	12	23.62	23.63	23.56	
5	16QAM	1	24	23.57	23.57	23.50	23.7
5	16QAM	12	0	22.41	22.32	22.34	
5	16QAM	12	7	22.39	22.37	22.28	
5	16QAM	12	13	22.37	22.42	22.36	23.7
5	16QAM	25	0	22.39	22.31	22.29	
5	64QAM	1	0	22.20	22.51	22.47	
5	64QAM	1	12	22.43	22.47	22.50	23.7
5	64QAM	1	24	22.55	22.09	22.44	
5	64QAM	12	0	21.17	21.28	21.39	
5	64QAM	12	7	21.40	21.46	21.31	22.7
5	64QAM	12	13	21.38	21.22	21.36	
5	64QAM	25	0	21.32	21.44	21.24	
Channel				19965	20175	20385	Tune-up limit (dBm)
Frequency (MHz)				1711.5	1732.5	1753.5	
3	QPSK	1	0	24.24	24.20	24.22	25.7
3	QPSK	1	8	24.32	24.34	24.24	
3	QPSK	1	14	24.27	24.24	24.18	
3	QPSK	8	0	23.29	23.24	23.23	24.7
3	QPSK	8	4	23.35	23.37	23.32	
3	QPSK	8	7	23.42	23.34	23.21	
3	QPSK	15	0	23.36	23.37	23.31	24.7
3	16QAM	1	0	23.64	23.49	23.51	
3	16QAM	1	8	23.63	23.59	23.61	
3	16QAM	1	14	23.55	23.57	23.54	23.7
3	16QAM	8	0	22.41	22.35	22.29	
3	16QAM	8	4	22.41	22.41	22.32	
3	16QAM	8	7	22.37	22.48	22.27	23.7
3	16QAM	15	0	22.34	22.36	22.28	
3	64QAM	1	0	22.28	22.53	22.39	
3	64QAM	1	8	22.47	22.65	22.52	23.7
3	64QAM	1	14	22.49	22.32	22.46	
3	64QAM	8	0	21.18	21.35	21.33	
3	64QAM	8	4	21.37	21.41	21.39	22.7
3	64QAM	8	7	21.34	21.34	21.31	
3	64QAM	15	0	21.32	21.40	21.33	
Channel				19957	20175	20393	Tune-up limit (dBm)
Frequency (MHz)				1710.7	1732.5	1754.3	
1.4	QPSK	1	0	24.15	24.15	24.12	25.7
1.4	QPSK	1	3	24.27	24.30	24.13	
1.4	QPSK	1	5	24.24	24.23	24.07	
1.4	QPSK	3	0	24.25	24.18	24.10	24.7
1.4	QPSK	3	1	24.28	24.31	24.17	
1.4	QPSK	3	3	24.15	24.24	24.12	
1.4	QPSK	6	0	23.25	23.26	23.20	24.7
1.4	16QAM	1	0	23.48	23.49	23.36	
1.4	16QAM	1	3	23.59	23.55	23.50	
1.4	16QAM	1	5	23.56	23.47	23.50	24.7
1.4	16QAM	3	0	23.42	23.33	23.23	
1.4	16QAM	3	1	23.32	23.36	23.29	
1.4	16QAM	3	3	23.28	23.32	23.20	23.7
1.4	16QAM	6	0	22.34	22.32	22.27	
1.4	64QAM	1	0	22.12	22.45	22.36	
1.4	64QAM	1	3	22.21	22.54	22.48	23.7
1.4	64QAM	1	5	22.22	22.44	22.32	
1.4	64QAM	3	0	22.18	22.38	22.37	
1.4	64QAM	3	1	22.29	22.43	22.43	22.7
1.4	64QAM	3	3	22.28	22.37	22.38	
1.4	64QAM	6	0	21.06	21.28	21.17	



Band 5							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				20450	20525	20600	
Frequency (MHz)				829	836.5	844	
10	QPSK	1	0	24.43	24.42	24.42	25.7
10	QPSK	1	25	24.34	24.44	24.43	
10	QPSK	1	49	24.44	24.54	24.29	
10	QPSK	25	0	23.47	23.49	23.49	24.7
10	QPSK	25	12	23.52	23.58	23.57	
10	QPSK	25	25	23.49	23.58	23.47	
10	QPSK	50	0	23.54	23.49	23.60	24.7
10	16QAM	1	0	23.81	23.83	23.86	
10	16QAM	1	25	23.70	23.84	23.83	
10	16QAM	1	49	23.81	23.92	23.71	23.7
10	16QAM	25	0	22.45	22.59	22.54	
10	16QAM	25	12	22.53	22.52	22.54	
10	16QAM	25	25	22.56	22.55	22.57	23.7
10	16QAM	50	0	22.51	22.50	22.49	
10	64QAM	1	0	22.59	22.66	22.64	
10	64QAM	1	25	22.70	22.74	22.76	23.7
10	64QAM	1	49	22.67	22.37	21.72	
10	64QAM	25	0	21.54	21.61	21.55	
10	64QAM	25	12	21.62	21.62	21.60	22.7
10	64QAM	25	25	21.53	21.61	20.86	
10	64QAM	50	0	21.53	21.59	21.28	
Channel				20425	20525	20625	Tune-up limit (dBm)
Frequency (MHz)				826.5	836.5	846.5	
5	QPSK	1	0	24.47	24.51	24.50	25.7
5	QPSK	1	12	24.47	24.45	24.31	
5	QPSK	1	24	24.41	24.52	24.20	
5	QPSK	12	0	23.55	23.64	23.59	24.7
5	QPSK	12	7	23.52	23.57	23.34	
5	QPSK	12	13	23.54	23.56	23.16	
5	QPSK	25	0	23.47	23.56	23.52	24.7
5	16QAM	1	0	23.83	23.83	23.79	
5	16QAM	1	12	23.77	23.83	23.57	
5	16QAM	1	24	23.68	23.85	23.46	23.7
5	16QAM	12	0	22.66	22.51	22.52	
5	16QAM	12	7	22.53	22.60	22.45	
5	16QAM	12	13	22.48	22.61	22.27	23.7
5	16QAM	25	0	22.56	22.52	22.56	
5	64QAM	1	0	22.75	22.73	22.50	
5	64QAM	1	12	22.64	22.69	21.78	23.7
5	64QAM	1	24	22.75	22.55	21.74	
5	64QAM	12	0	21.65	21.66	21.30	
5	64QAM	12	7	21.54	21.63	20.70	22.7
5	64QAM	12	13	21.51	21.61	20.71	
5	64QAM	25	0	21.58	21.61	20.70	
Channel				20415	20525	20635	Tune-up limit (dBm)
Frequency (MHz)				825.5	836.5	847.5	
3	QPSK	1	0	24.47	24.41	24.18	25.7
3	QPSK	1	8	24.50	24.48	24.04	
3	QPSK	1	14	24.40	24.49	24.13	
3	QPSK	8	0	23.54	23.58	23.04	24.7
3	QPSK	8	4	23.49	23.62	23.07	
3	QPSK	8	7	23.50	23.55	23.20	
3	QPSK	15	0	23.57	23.53	23.08	24.7
3	16QAM	1	0	23.83	23.81	23.53	
3	16QAM	1	8	23.83	23.86	23.38	
3	16QAM	1	14	23.69	23.78	23.46	23.7
3	16QAM	8	0	22.64	22.58	22.31	
3	16QAM	8	4	22.60	22.65	22.23	
3	16QAM	8	7	22.57	22.60	22.28	23.7
3	16QAM	15	0	22.60	22.62	22.19	
3	64QAM	1	0	22.63	22.73	21.70	
3	64QAM	1	8	22.75	22.75	21.72	23.7
3	64QAM	1	14	22.63	22.50	21.71	
3	64QAM	8	0	21.65	21.56	20.70	
3	64QAM	8	4	21.58	21.67	20.70	22.7
3	64QAM	8	7	21.49	21.63	20.74	
3	64QAM	15	0	21.53	21.62	20.71	
Channel				20407	20525	20643	Tune-up limit (dBm)
Frequency (MHz)				824.7	836.5	848.3	
1.4	QPSK	1	0	24.39	24.32	23.95	25.7
1.4	QPSK	1	3	24.42	24.47	24.10	
1.4	QPSK	1	5	24.29	24.38	24.09	
1.4	QPSK	3	0	24.41	24.36	24.12	24.7
1.4	QPSK	3	1	24.47	24.40	24.12	
1.4	QPSK	3	3	24.41	24.44	24.37	
1.4	QPSK	6	0	23.42	23.57	23.18	24.7
1.4	16QAM	1	0	23.68	23.69	23.34	
1.4	16QAM	1	3	23.69	23.85	23.50	
1.4	16QAM	1	5	23.61	23.69	23.58	24.7
1.4	16QAM	3	0	23.51	23.51	23.12	
1.4	16QAM	3	1	23.49	23.54	23.29	
1.4	16QAM	3	3	23.42	23.48	23.42	23.7
1.4	16QAM	6	0	22.55	22.62	22.27	
1.4	64QAM	1	0	22.60	22.60	21.70	
1.4	64QAM	1	3	22.68	22.75	21.72	23.7
1.4	64QAM	1	5	22.60	22.59	21.71	
1.4	64QAM	3	0	22.63	22.63	21.70	
1.4	64QAM	3	1	22.65	22.62	21.72	23.7
1.4	64QAM	3	3	22.55	22.58	21.71	
1.4	64QAM	6	0	21.45	21.48	20.72	



Band 7							
Ant 2							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch./	Power Middle Ch./	Power High Ch./	Tune-up limit (dBm)
Channel				20850	21100	21350	
Frequency (MHz)				2510	2535	2560	
20	QPSK	1	0	24.42	24.46	24.29	25.7
20	QPSK	1	49	24.47	24.42	24.26	
20	QPSK	1	99	24.57	24.45	24.26	
20	QPSK	50	0	23.70	23.47	23.46	24.7
20	QPSK	50	24	23.67	23.48	23.39	
20	QPSK	50	50	23.63	23.56	23.41	
20	QPSK	100	0	23.65	23.54	23.41	24.7
20	16QAM	1	0	23.78	23.66	23.64	
20	16QAM	1	49	23.90	23.75	23.62	
20	16QAM	1	99	23.92	23.90	23.63	23.7
20	16QAM	50	0	22.63	22.47	22.42	
20	16QAM	50	24	22.62	22.52	22.45	
20	16QAM	50	50	22.67	22.54	22.47	23.7
20	16QAM	100	0	22.62	22.54	22.39	
20	64QAM	1	0	22.62	22.55	22.54	
20	64QAM	1	49	22.70	22.68	21.98	23.7
20	64QAM	1	99	22.80	22.64	22.33	
20	64QAM	50	0	21.70	21.49	21.27	
20	64QAM	50	24	21.76	21.56	21.21	22.7
20	64QAM	50	50	21.74	21.62	21.38	
20	64QAM	100	0	21.65	21.55	21.21	
Channel				20925	21100	21375	Tune-up limit (dBm)
Frequency (MHz)				2507.5	2535	2562.5	
15	QPSK	1	0	24.47	24.39	24.28	25.7
15	QPSK	1	37	24.53	24.47	24.21	
15	QPSK	1	74	24.56	24.48	24.31	
15	QPSK	36	0	23.55	23.46	23.42	24.7
15	QPSK	36	20	23.69	23.35	23.43	
15	QPSK	36	39	23.66	23.56	23.40	
15	QPSK	75	0	23.65	23.50	23.38	24.7
15	16QAM	1	0	23.77	23.74	23.63	
15	16QAM	1	37	23.89	23.87	23.62	
15	16QAM	1	74	23.87	23.81	23.66	23.7
15	16QAM	36	0	22.59	22.45	22.39	
15	16QAM	36	20	22.59	22.55	22.46	
15	16QAM	36	39	22.68	22.50	22.37	23.7
15	16QAM	75	0	22.62	22.50	22.40	
15	64QAM	1	0	22.74	22.60	22.49	
15	64QAM	1	37	22.76	22.74	22.01	23.7
15	64QAM	1	74	22.86	22.71	22.47	
15	64QAM	36	0	21.65	21.50	21.05	
15	64QAM	36	20	21.74	21.56	21.23	22.7
15	64QAM	36	39	21.74	21.62	21.47	
15	64QAM	75	0	21.73	21.57	21.18	
Channel				20800	21100	21400	Tune-up limit (dBm)
Frequency (MHz)				2505	2535	2565	
10	QPSK	1	0	24.39	24.39	24.21	25.7
10	QPSK	1	25	24.48	24.35	24.11	
10	QPSK	1	49	24.51	24.44	24.22	
10	QPSK	25	0	23.61	23.41	23.33	24.7
10	QPSK	25	12	23.67	23.45	23.39	
10	QPSK	25	25	23.63	23.54	23.38	
10	QPSK	50	0	23.58	23.48	23.27	24.7
10	16QAM	1	0	23.85	23.89	23.46	
10	16QAM	1	25	23.77	23.77	23.48	
10	16QAM	1	49	23.87	23.78	23.54	23.7
10	16QAM	25	0	22.56	22.38	22.28	
10	16QAM	25	12	22.65	22.45	22.36	
10	16QAM	25	25	22.66	22.51	22.30	23.7
10	16QAM	50	0	22.66	22.46	22.26	
10	64QAM	1	0	22.74	22.61	22.24	
10	64QAM	1	25	22.74	22.65	22.46	23.7
10	64QAM	1	49	22.82	22.67	22.50	
10	64QAM	25	0	21.64	21.45	21.27	
10	64QAM	25	12	21.63	21.57	21.34	22.7
10	64QAM	25	25	21.55	21.51	21.31	
10	64QAM	50	0	21.60	21.53	21.29	
Channel				20775	21100	21425	Tune-up limit (dBm)
Frequency (MHz)				2502.5	2535	2567.5	
5	QPSK	1	0	24.52	24.31	24.15	25.7
5	QPSK	1	12	24.53	24.50	24.27	
5	QPSK	1	24	24.51	24.44	24.20	
5	QPSK	12	0	23.55	23.47	23.28	24.7
5	QPSK	12	7	23.56	23.53	23.25	
5	QPSK	12	13	23.62	23.61	23.32	
5	QPSK	25	0	23.66	23.52	23.29	24.7
5	16QAM	1	0	23.79	23.64	23.45	
5	16QAM	1	12	23.80	23.76	23.46	
5	16QAM	1	24	23.90	23.74	23.55	23.7
5	16QAM	12	0	22.62	22.56	22.33	
5	16QAM	12	7	22.65	22.52	22.34	
5	16QAM	12	13	22.70	22.65	22.31	23.7
5	16QAM	25	0	22.67	22.57	22.33	
5	64QAM	1	0	22.81	22.68	22.42	
5	64QAM	1	12	22.79	22.69	22.40	23.7
5	64QAM	1	24	22.81	22.77	22.44	
5	64QAM	12	0	21.67	21.59	21.37	
5	64QAM	12	7	21.68	21.57	21.37	22.7
5	64QAM	12	13	21.74	21.63	21.40	
5	64QAM	25	0	21.68	21.48	21.35	



Band 12							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				23060	23095	23130	
Frequency (MHz)				704	707.5	711	
10	QPSK	1	0	24.34	24.12	24.24	25.7
10	QPSK	1	25	24.15	24.15	24.14	
10	QPSK	1	49	24.31	24.24	24.14	
10	QPSK	25	0	23.27	23.33	23.32	24.7
10	QPSK	25	12	23.38	23.34	23.35	
10	QPSK	25	25	23.31	23.30	23.35	
10	QPSK	50	0	23.34	23.28	23.32	24.7
10	16QAM	1	0	23.55	23.49	23.56	
10	16QAM	1	25	23.61	23.61	23.59	
10	16QAM	1	49	23.66	23.60	23.54	23.7
10	16QAM	25	0	22.32	22.28	22.33	
10	16QAM	25	12	22.40	22.35	22.36	
10	16QAM	25	25	22.37	22.36	22.34	23.7
10	16QAM	50	0	22.39	22.31	22.33	
10	64QAM	1	0	22.43	22.31	22.39	
10	64QAM	1	25	22.52	22.42	22.25	23.7
10	64QAM	1	49	22.61	22.54	22.53	
10	64QAM	25	0	21.31	21.33	21.22	
10	64QAM	25	12	21.46	21.39	21.33	22.7
10	64QAM	25	25	21.37	21.41	21.37	
10	64QAM	50	0	21.36	21.34	21.37	
Channel				23035	23095	23155	Tune-up limit (dBm)
Frequency (MHz)				701.5	707.5	713.5	
5	QPSK	1	0	24.27	24.18	24.20	25.7
5	QPSK	1	12	24.27	24.28	24.27	
5	QPSK	1	24	24.23	24.21	24.24	
5	QPSK	12	0	23.38	23.32	23.26	24.7
5	QPSK	12	7	23.33	23.26	23.25	
5	QPSK	12	13	23.33	23.26	23.27	
5	QPSK	25	0	23.36	23.28	23.20	24.7
5	16QAM	1	0	23.59	23.56	23.50	
5	16QAM	1	12	23.60	23.59	23.55	
5	16QAM	1	24	23.61	23.61	23.60	23.7
5	16QAM	12	0	22.36	22.32	22.28	
5	16QAM	12	7	22.39	22.34	22.36	
5	16QAM	12	13	22.32	22.35	22.28	23.7
5	16QAM	25	0	22.40	22.35	22.32	
5	64QAM	1	0	22.37	22.24	22.40	
5	64QAM	1	12	22.51	22.44	22.40	22.7
5	64QAM	1	24	22.35	22.48	22.45	
5	64QAM	12	0	21.39	21.41	21.38	
5	64QAM	12	7	21.34	21.35	21.34	22.7
5	64QAM	12	13	21.43	21.38	21.28	
5	64QAM	25	0	21.42	21.39	21.32	
Channel				23025	23095	23165	Tune-up limit (dBm)
Frequency (MHz)				700.5	707.5	714.5	
3	QPSK	1	0	24.31	24.21	24.28	25.7
3	QPSK	1	8	24.32	24.30	24.30	
3	QPSK	1	14	24.28	24.27	24.18	
3	QPSK	8	0	23.35	23.27	23.30	24.7
3	QPSK	8	4	23.37	23.40	23.35	
3	QPSK	8	7	23.38	23.38	23.25	
3	QPSK	15	0	23.39	23.28	23.21	24.7
3	16QAM	1	0	23.71	23.62	23.52	
3	16QAM	1	8	23.56	23.59	23.60	
3	16QAM	1	14	23.60	23.56	23.46	23.7
3	16QAM	8	0	22.42	22.42	22.32	
3	16QAM	8	4	22.41	22.40	22.36	
3	16QAM	8	7	22.33	22.41	22.27	23.7
3	16QAM	15	0	22.37	22.31	22.30	
3	64QAM	1	0	22.48	22.41	22.47	
3	64QAM	1	8	22.64	22.55	22.45	23.7
3	64QAM	1	14	22.47	22.49	22.43	
3	64QAM	8	0	21.41	21.39	21.36	
3	64QAM	8	4	21.44	21.51	21.40	22.7
3	64QAM	8	7	21.34	21.40	21.36	
3	64QAM	15	0	21.37	21.34	21.24	
Channel				23017	23095	23173	Tune-up limit (dBm)
Frequency (MHz)				699.7	707.5	715.3	
1.4	QPSK	1	0	24.18	24.13	24.08	25.7
1.4	QPSK	1	3	24.23	24.21	24.18	
1.4	QPSK	1	5	24.19	24.20	24.02	
1.4	QPSK	3	0	24.26	24.09	24.18	24.7
1.4	QPSK	3	1	24.25	24.22	24.19	
1.4	QPSK	3	3	24.21	24.22	24.13	
1.4	QPSK	6	0	23.32	23.26	23.12	24.7
1.4	16QAM	1	0	23.60	23.49	23.46	
1.4	16QAM	1	3	23.57	23.57	23.48	
1.4	16QAM	1	5	23.53	23.52	23.43	24.7
1.4	16QAM	3	0	23.34	23.24	23.26	
1.4	16QAM	3	1	23.38	23.30	23.31	
1.4	16QAM	3	3	23.31	23.24	23.13	23.7
1.4	16QAM	6	0	22.32	22.23	22.22	
1.4	64QAM	1	0	22.48	22.42	22.38	
1.4	64QAM	1	3	22.46	22.50	22.42	23.7
1.4	64QAM	1	5	22.46	22.36	22.34	
1.4	64QAM	3	0	22.37	22.38	22.39	
1.4	64QAM	3	1	22.41	22.38	22.32	23.7
1.4	64QAM	3	3	22.40	22.38	22.31	
1.4	64QAM	6	0	21.27	21.21	21.21	



Band 13							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				23230			
Frequency (MHz)				762			
10	QPSK	1	0	23.83			25.2
10	QPSK	1	25	23.84			
10	QPSK	1	49	23.87			
10	QPSK	25	0	22.96			24.2
10	QPSK	25	12	23.01			
10	QPSK	25	25	22.91			
10	QPSK	50	0	23.01			24.2
10	16QAM	1	0	23.16			
10	16QAM	1	25	23.15			
10	16QAM	1	49	23.15			23.2
10	16QAM	25	0	21.97			
10	16QAM	25	12	22.03			
10	16QAM	25	25	21.93			23.2
10	16QAM	50	0	21.95			
10	64QAM	1	0	22.01			
10	64QAM	1	25	22.13			23.2
10	64QAM	1	49	22.04			
10	64QAM	25	0	21.02			
10	64QAM	25	12	21.00			22.2
10	64QAM	25	25	21.04			
10	64QAM	50	0	20.96			
Channel				23206 23230 23255			
Frequency (MHz)				779.5 762 784.5			Tune-up limit (dBm)
5	QPSK	1	0	23.75	23.76	23.86	25.2
5	QPSK	1	12	23.88	23.84	23.87	
5	QPSK	1	24	23.87	23.86	23.87	
5	QPSK	12	0	22.89	22.92	22.92	24.2
5	QPSK	12	7	22.83	22.97	22.83	
5	QPSK	12	13	23.02	23.01	22.92	
5	QPSK	25	0	23.01	22.99	22.91	24.2
5	16QAM	1	0	23.08	23.05	23.08	
5	16QAM	1	12	23.16	23.14	23.09	
5	16QAM	1	24	23.16	23.10	23.03	23.2
5	16QAM	12	0	21.99	21.97	21.98	
5	16QAM	12	7	22.05	21.96	21.96	
5	16QAM	12	13	22.02	21.94	21.97	23.2
5	16QAM	25	0	22.03	21.94	21.88	
5	64QAM	1	0	22.00	22.13	21.98	
5	64QAM	1	12	22.13	22.06	22.08	23.2
5	64QAM	1	24	22.07	22.15	22.00	
5	64QAM	12	0	21.03	21.06	20.99	
5	64QAM	12	7	21.07	21.01	20.92	22.2
5	64QAM	12	13	20.98	21.05	20.97	
5	64QAM	25	0	20.96	20.95	20.88	



Band 14							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				23330			
Frequency (MHz)				793			
10	QPSK	1	0	24.44			25.7
10	QPSK	1	25	24.49			
10	QPSK	1	49	24.32			
10	QPSK	25	0	23.51			24.7
10	QPSK	25	12	23.50			
10	QPSK	25	25	23.48			
10	QPSK	50	0	23.42			24.7
10	16QAM	1	0	23.87			
10	16QAM	1	25	23.84			
10	16QAM	1	49	23.71			23.7
10	16QAM	25	0	22.44			
10	16QAM	25	12	22.54			
10	16QAM	25	25	22.55			23.7
10	16QAM	50	0	22.44			
10	64QAM	1	0	22.75			
10	64QAM	1	25	22.58			23.7
10	64QAM	1	49	22.65			
10	64QAM	25	0	21.50			
10	64QAM	25	12	21.33			22.7
10	64QAM	25	25	21.48			
10	64QAM	50	0	21.55			
Channel				23306 23330 23355			Tune-up limit (dBm)
Frequency (MHz)				790.5 793 795.5			
5	QPSK	1	0	24.48	24.40	24.42	25.7
5	QPSK	1	12	24.48	24.48	24.47	
5	QPSK	1	24	24.47	24.44	24.42	
5	QPSK	12	0	23.54	23.49	23.41	24.7
5	QPSK	12	7	23.60	23.52	23.47	
5	QPSK	12	13	23.50	23.55	23.45	
5	QPSK	25	0	23.59	23.48	23.43	24.7
5	16QAM	1	0	23.74	23.78	23.68	
5	16QAM	1	12	23.78	23.80	23.80	
5	16QAM	1	24	23.80	23.72	23.71	23.7
5	16QAM	12	0	22.51	22.57	22.48	
5	16QAM	12	7	22.52	22.60	22.49	
5	16QAM	12	13	22.59	22.55	22.51	23.7
5	16QAM	25	0	22.57	22.52	22.50	
5	64QAM	1	0	22.71	22.62	22.36	
5	64QAM	1	12	22.78	22.24	22.53	23.7
5	64QAM	1	24	22.33	22.27	22.70	
5	64QAM	12	0	21.61	21.26	21.18	
5	64QAM	12	7	21.68	21.24	21.54	22.7
5	64QAM	12	13	21.36	21.23	21.61	
5	64QAM	25	0	21.64	21.16	21.49	



Band 17							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch./	Power Middle Ch./	Power High Ch./	Tune-up limit (dBm)
Channel				23780	23790	23800	
Frequency (MHz)				709	710	711	
10	QPSK	1	0	24.38	24.29	24.27	25.7
10	QPSK	1	25	24.35	24.27	24.31	
10	QPSK	1	49	24.33	24.40	24.28	
10	QPSK	25	0	23.34	23.36	23.37	24.7
10	QPSK	25	12	23.51	23.39	23.43	
10	QPSK	25	25	23.50	23.51	23.46	
10	QPSK	50	0	23.44	23.37	23.34	24.7
10	16QAM	1	0	23.64	23.67	23.59	
10	16QAM	1	25	23.73	23.67	23.67	
10	16QAM	1	49	23.70	23.70	23.73	23.7
10	16QAM	25	0	22.35	22.28	22.38	
10	16QAM	25	12	22.43	22.42	22.36	
10	16QAM	25	25	22.40	22.45	22.42	23.7
10	16QAM	50	0	22.50	22.35	22.41	
10	64QAM	1	0	22.59	22.53	22.57	
10	64QAM	1	25	22.67	22.66	22.50	23.7
10	64QAM	1	49	22.65	22.65	22.58	
10	64QAM	25	0	21.36	21.43	21.41	
10	64QAM	25	12	21.47	21.43	21.46	22.7
10	64QAM	25	25	21.51	21.55	21.51	
10	64QAM	50	0	21.54	21.40	21.44	
Channel				23765	23790	23825	Tune-up limit (dBm)
Frequency (MHz)				706.5	710	713.5	
5	QPSK	1	0	24.24	24.27	24.26	25.7
5	QPSK	1	12	24.31	24.37	24.39	
5	QPSK	1	24	24.38	24.39	24.31	
5	QPSK	12	0	23.43	23.34	23.35	24.7
5	QPSK	12	7	23.48	23.47	23.43	
5	QPSK	12	13	23.46	23.44	23.40	
5	QPSK	25	0	23.49	23.45	23.42	24.7
5	16QAM	1	0	23.57	23.61	23.61	
5	16QAM	1	12	23.61	23.69	23.63	
5	16QAM	1	24	23.73	23.76	23.68	23.7
5	16QAM	12	0	22.40	22.39	22.36	
5	16QAM	12	7	22.45	22.40	22.38	
5	16QAM	12	13	22.51	22.44	22.43	23.7
5	16QAM	25	0	22.43	22.44	22.49	
5	64QAM	1	0	22.41	22.31	22.54	
5	64QAM	1	12	22.59	22.50	22.51	23.7
5	64QAM	1	24	22.61	22.53	22.49	
5	64QAM	12	0	21.43	21.40	21.44	
5	64QAM	12	7	21.47	21.45	21.53	22.7
5	64QAM	12	13	21.53	21.55	21.51	
5	64QAM	25	0	21.45	21.36	21.40	



Band 25							
Ant 2							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				26140	26340	26590	
Frequency (MHz)				1860	1880	1905	
20	QPSK	1	0	24.56	24.54	24.48	25.7
20	QPSK	1	49	24.46	24.52	24.36	
20	QPSK	1	99	24.44	24.45	24.39	
20	QPSK	50	0	23.63	23.64	23.50	24.7
20	QPSK	50	24	23.70	23.69	23.51	
20	QPSK	50	50	23.65	23.65	23.58	
20	QPSK	100	0	23.70	23.67	23.51	24.7
20	16QAM	1	0	23.53	23.50	23.79	
20	16QAM	1	49	23.55	23.55	23.74	
20	16QAM	1	99	23.76	23.84	23.69	23.7
20	16QAM	50	0	22.65	22.65	22.53	
20	16QAM	50	24	22.72	22.71	22.53	
20	16QAM	50	50	22.65	22.67	22.57	23.7
20	16QAM	100	0	22.68	22.69	22.50	
20	64QAM	1	0	22.74	22.72	22.64	
20	64QAM	1	49	22.69	22.71	22.65	23.7
20	64QAM	1	99	22.68	22.71	22.47	
20	64QAM	50	0	21.65	21.66	21.56	
20	64QAM	50	24	21.72	21.76	21.55	22.7
20	64QAM	50	50	21.67	21.68	21.59	
20	64QAM	100	0	21.70	21.73	21.54	
Channel				26115	26340	26515	Tune-up limit (dBm)
Frequency (MHz)				1857.5	1880	1907.5	
15	QPSK	1	0	24.55	24.55	24.44	25.7
15	QPSK	1	37	24.50	24.55	24.44	
15	QPSK	1	74	24.51	24.53	24.41	
15	QPSK	36	0	23.69	23.63	23.52	24.7
15	QPSK	36	20	23.69	23.67	23.59	
15	QPSK	36	39	23.64	23.63	23.54	
15	QPSK	75	0	23.65	23.68	23.49	24.7
15	16QAM	1	0	23.81	23.91	23.73	
15	16QAM	1	37	23.84	23.83	23.73	
15	16QAM	1	74	23.82	23.85	23.74	23.7
15	16QAM	36	0	22.69	22.63	22.51	
15	16QAM	36	20	22.67	22.70	22.59	
15	16QAM	36	39	22.61	22.65	22.55	23.7
15	16QAM	75	0	22.68	22.70	22.51	
15	64QAM	1	0	22.72	22.76	22.59	
15	64QAM	1	37	22.73	22.79	22.67	23.7
15	64QAM	1	74	22.70	22.76	22.48	
15	64QAM	36	0	21.74	21.64	21.51	
15	64QAM	36	20	21.72	21.73	21.61	22.7
15	64QAM	36	39	21.71	21.70	21.64	
15	64QAM	75	0	21.69	21.70	21.52	
Channel				26090	26340	26640	Tune-up limit (dBm)
Frequency (MHz)				1855	1880	1910	
10	QPSK	1	0	24.51	24.48	24.35	25.7
10	QPSK	1	25	24.48	24.50	24.39	
10	QPSK	1	49	24.45	24.48	24.39	
10	QPSK	25	0	23.62	23.56	23.52	24.7
10	QPSK	25	12	23.68	23.67	23.59	
10	QPSK	25	25	23.67	23.68	23.60	
10	QPSK	50	0	23.67	23.67	23.58	24.7
10	16QAM	1	0	23.80	23.87	23.74	
10	16QAM	1	25	23.84	23.86	23.80	
10	16QAM	1	49	23.87	23.89	23.79	23.7
10	16QAM	25	0	22.64	22.59	22.54	
10	16QAM	25	12	22.69	22.69	22.58	
10	16QAM	25	25	22.62	22.68	22.52	23.7
10	16QAM	50	0	22.65	22.69	22.56	
10	64QAM	1	0	22.77	22.74	22.64	
10	64QAM	1	25	22.82	22.79	22.72	23.7
10	64QAM	1	49	22.79	22.78	22.51	
10	64QAM	25	0	21.65	21.60	21.57	
10	64QAM	25	12	21.72	21.71	21.62	22.7
10	64QAM	25	25	21.69	21.70	21.63	
10	64QAM	50	0	21.65	21.70	21.62	
Channel				26055	26340	26655	Tune-up limit (dBm)
Frequency (MHz)				1852.5	1880	1912.5	
5	QPSK	1	0	24.49	24.44	24.40	25.7
5	QPSK	1	12	24.55	24.54	24.43	
5	QPSK	1	24	24.53	24.50	24.42	
5	QPSK	12	0	23.60	23.62	23.49	24.7
5	QPSK	12	7	23.69	23.65	23.55	
5	QPSK	12	13	23.64	23.69	23.56	
5	QPSK	25	0	23.62	23.64	23.55	24.7
5	16QAM	1	0	23.85	23.82	23.74	
5	16QAM	1	12	23.80	23.86	23.73	
5	16QAM	1	24	23.88	23.93	23.72	23.7
5	16QAM	12	0	22.63	22.65	22.50	
5	16QAM	12	7	22.68	22.71	22.58	
5	16QAM	12	13	22.67	22.71	22.56	23.7
5	16QAM	25	0	22.67	22.67	22.52	
5	64QAM	1	0	22.79	22.75	22.69	
5	64QAM	1	12	22.74	22.77	22.61	23.7
5	64QAM	1	24	22.71	22.79	22.23	
5	64QAM	12	0	21.67	21.67	21.55	
5	64QAM	12	7	21.74	21.78	21.61	22.7
5	64QAM	12	13	21.74	21.75	21.30	
5	64QAM	25	0	21.65	21.67	21.47	
Channel				26055	26340	26675	Tune-up limit (dBm)
Frequency (MHz)				1851.5	1880	1913.5	
3	QPSK	1	0	24.41	24.39	24.35	25.7
3	QPSK	1	8	24.50	24.49	24.48	
3	QPSK	1	14	24.52	24.51	24.45	
3	QPSK	8	0	23.57	23.62	23.47	24.7
3	QPSK	8	4	23.67	23.66	23.55	
3	QPSK	8	7	23.65	23.66	23.57	
3	QPSK	15	0	23.63	23.62	23.53	24.7
3	16QAM	1	0	23.79	23.71	23.69	
3	16QAM	1	8	23.93	23.95	23.81	
3	16QAM	1	14	23.90	23.91	23.76	23.7
3	16QAM	8	0	22.66	22.65	22.53	
3	16QAM	8	4	22.74	22.75	22.61	
3	16QAM	8	7	22.73	22.75	22.62	23.7
3	16QAM	15	0	22.68	22.66	22.54	
3	64QAM	1	0	22.70	22.66	22.56	
3	64QAM	1	8	22.82	22.87	22.44	23.7
3	64QAM	1	14	22.80	22.83	22.21	
3	64QAM	8	0	21.66	21.67	21.53	
3	64QAM	8	4	21.74	21.75	21.37	22.7
3	64QAM	8	7	21.72	21.75	21.25	
3	64QAM	15	0	21.66	21.67	21.36	
Channel				26047	26340	26683	Tune-up limit (dBm)
Frequency (MHz)				1850.7	1880	1914.3	
1.4	QPSK	1	0	24.41	24.36	24.29	25.7
1.4	QPSK	1	3	24.51	24.52	24.36	
1.4	QPSK	1	5	24.45	24.48	24.34	
1.4	QPSK	3	0	24.46	24.47	24.30	24.7
1.4	QPSK	3	1	24.53	24.50	24.37	
1.4	QPSK	3	3	24.49	24.48	24.36	
1.4	QPSK	6	0	23.57	23.59	23.43	24.7
1.4	16QAM	1	0	23.76	23.67	23.61	
1.4	16QAM	1	3	23.88	23.85	23.73	
1.4	16QAM	1	5	23.83	23.81	23.65	24.7
1.4	16QAM	3	0	23.63	23.55	23.36	
1.4	16QAM	3	1	23.62	23.62	23.45	
1.4	16QAM	3	3	23.54	23.58	23.39	23.7
1.4	16QAM	6	0	22.62	22.65	22.49	
1.4	64QAM	1	0	22.63	22.58	22.20	
1.4	64QAM	1	3	22.72	22.76	22.17	23.7
1.4	64QAM	1	5	22.69	22.72	22.10	
1.4	64QAM	3	0	22.64	22.65	22.19	
1.4	64QAM	3	1	22.72	22.72	22.28	23.7
1.4	64QAM	3	3	22.69	22.69	22.12	
1.4	64QAM	6	0	21.57	21.58	21.10	



Band 26							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				26765	26865	26965	
Frequency (MHz)				821.5	831.5	841.5	
15	QPSK	1	0	24.28	24.16	24.24	25.7
15	QPSK	1	37	24.14	24.24	24.21	
15	QPSK	1	74	24.27	24.52	24.13	
15	QPSK	36	0	23.38	23.39	23.34	24.7
15	QPSK	36	20	23.40	23.31	23.37	
15	QPSK	36	39	23.33	23.34	23.29	
15	QPSK	75	0	23.39	23.35	23.35	24.7
15	16QAM	1	0	23.55	23.58	23.61	
15	16QAM	1	37	23.54	23.54	23.60	
15	16QAM	1	74	23.56	23.63	23.47	23.7
15	16QAM	36	0	22.36	22.42	22.34	
15	16QAM	36	20	22.34	22.33	22.30	
15	16QAM	36	39	22.36	22.36	22.33	23.7
15	16QAM	75	0	22.42	22.38	22.33	
15	64QAM	1	0	22.48	22.42	22.41	
15	64QAM	1	37	22.45	22.49	22.41	23.7
15	64QAM	1	74	22.48	22.48	21.70	
15	64QAM	36	0	21.43	21.45	21.41	
15	64QAM	36	20	21.47	21.43	21.37	22.7
15	64QAM	36	39	21.38	21.44	21.49	
15	64QAM	75	0	21.47	21.36	21.42	
Channel				26740	26865	26990	Tune-up limit (dBm)
Frequency (MHz)				819	831.5	844	
10	QPSK	1	0	24.38	24.29	24.37	25.7
10	QPSK	1	25	24.22	24.25	24.23	
10	QPSK	1	49	24.28	24.29	24.20	
10	QPSK	25	0	23.50	23.36	23.44	24.7
10	QPSK	25	12	23.50	23.41	23.37	
10	QPSK	25	25	23.40	23.42	23.37	
10	QPSK	50	0	23.38	23.41	23.42	24.7
10	16QAM	1	0	23.77	23.60	23.75	
10	16QAM	1	25	23.61	23.73	23.64	
10	16QAM	1	49	23.64	23.67	23.62	23.7
10	16QAM	25	0	22.48	22.36	22.37	
10	16QAM	25	12	22.45	22.42	22.36	
10	16QAM	25	25	22.30	22.44	22.38	22.7
10	16QAM	50	0	22.46	22.37	22.33	
10	64QAM	1	0	22.64	22.51	22.57	
10	64QAM	1	25	22.54	22.66	22.66	23.7
10	64QAM	1	49	22.56	22.60	22.05	
10	64QAM	25	0	21.44	21.42	21.43	
10	64QAM	25	12	21.50	21.47	21.48	22.7
10	64QAM	25	25	21.37	21.41	21.28	
10	64QAM	50	0	21.47	21.37	21.36	
Channel				26715	26865	27015	Tune-up limit (dBm)
Frequency (MHz)				616.5	631.5	646.5	
5	QPSK	1	0	24.45	24.32	24.35	25.7
5	QPSK	1	12	24.38	24.36	24.33	
5	QPSK	1	24	24.30	24.37	24.26	
5	QPSK	12	0	23.50	23.37	23.40	24.7
5	QPSK	12	7	23.51	23.41	23.44	
5	QPSK	12	13	23.44	23.36	23.33	
5	QPSK	25	0	23.44	23.40	23.38	24.7
5	16QAM	1	0	23.78	23.60	23.73	
5	16QAM	1	12	23.72	23.66	23.60	
5	16QAM	1	24	23.66	23.72	23.58	23.7
5	16QAM	12	0	22.49	22.38	22.41	
5	16QAM	12	7	22.45	22.45	22.41	
5	16QAM	12	13	22.44	22.37	22.30	23.7
5	16QAM	25	0	22.43	22.36	22.40	
5	64QAM	1	0	22.73	22.56	22.53	
5	64QAM	1	12	22.54	22.59	21.87	23.7
5	64QAM	1	24	22.56	22.57	21.82	
5	64QAM	12	0	21.58	21.56	21.51	
5	64QAM	12	7	21.59	21.50	20.86	22.7
5	64QAM	12	13	21.54	21.45	20.56	
5	64QAM	25	0	21.50	21.39	21.68	
Channel				26705	26865	27025	Tune-up limit (dBm)
Frequency (MHz)				815.5	831.5	847.5	
3	QPSK	1	0	24.43	24.37	24.37	25.7
3	QPSK	1	8	24.41	24.37	24.32	
3	QPSK	1	14	24.30	24.35	24.26	
3	QPSK	8	0	23.51	23.43	23.27	24.7
3	QPSK	8	4	23.54	23.46	23.33	
3	QPSK	8	7	23.40	23.41	23.37	
3	QPSK	15	0	23.42	23.35	23.30	24.7
3	16QAM	1	0	23.79	23.62	23.67	
3	16QAM	1	8	23.80	23.76	23.49	
3	16QAM	1	14	23.68	23.71	23.56	23.7
3	16QAM	8	0	22.53	22.44	22.45	
3	16QAM	8	4	22.59	22.47	22.41	
3	16QAM	8	7	22.46	22.49	22.36	23.7
3	16QAM	15	0	22.56	22.36	22.37	
3	64QAM	1	0	22.61	22.57	21.91	
3	64QAM	1	8	22.68	22.58	21.70	23.7
3	64QAM	1	14	22.58	22.61	21.71	
3	64QAM	8	0	21.59	21.49	20.70	
3	64QAM	8	4	21.55	21.54	20.57	22.7
3	64QAM	8	7	21.49	21.52	20.57	
3	64QAM	15	0	21.50	21.48	20.64	
Channel				26697	26865	27033	Tune-up limit (dBm)
Frequency (MHz)				814.7	831.5	848.3	
1.4	QPSK	1	0	24.37	24.27	24.21	25.7
1.4	QPSK	1	3	24.42	24.30	24.23	
1.4	QPSK	1	5	24.36	24.21	24.15	
1.4	QPSK	3	0	24.41	24.23	24.20	24.7
1.4	QPSK	3	1	24.41	24.33	24.21	
1.4	QPSK	3	3	24.40	24.32	24.20	
1.4	QPSK	6	0	23.41	23.38	23.30	24.7
1.4	16QAM	1	0	23.71	23.59	23.46	
1.4	16QAM	1	3	23.72	23.62	23.59	
1.4	16QAM	1	5	23.63	23.59	23.46	24.7
1.4	16QAM	3	0	23.56	23.29	23.30	
1.4	16QAM	3	1	23.60	23.39	23.30	
1.4	16QAM	3	3	23.50	23.35	23.24	23.7
1.4	16QAM	6	0	22.50	22.46	22.33	
1.4	64QAM	1	0	22.68	22.47	21.74	
1.4	64QAM	1	3	22.68	22.61	21.70	23.7
1.4	64QAM	1	5	22.62	22.46	21.71	
1.4	64QAM	3	0	22.64	22.46	21.72	
1.4	64QAM	3	1	22.57	22.47	21.71	22.7
1.4	64QAM	3	3	22.56	22.51	21.80	
1.4	64QAM	6	0	21.43	21.42	20.70	



Band 30							
Ant 2							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				27710			
Frequency (MHz)				2310			
10	QPSK	1	0	22.18			23.7
10	QPSK	1	25	22.07			
10	QPSK	1	49	22.09			
10	QPSK	25	0	21.18			22.7
10	QPSK	25	12	21.14			
10	QPSK	25	25	21.23			
10	QPSK	50	0	21.14			22.7
10	16QAM	1	0	21.51			
10	16QAM	1	25	21.44			
10	16QAM	1	49	21.52			21.7
10	16QAM	25	0	20.18			
10	16QAM	25	12	20.25			
10	16QAM	25	25	20.19			21.7
10	16QAM	50	0	20.23			
10	64QAM	1	0	20.35			
10	64QAM	1	25	20.42			21.7
10	64QAM	1	49	20.39			
10	64QAM	25	0	19.24			
10	64QAM	25	12	19.21			20.7
10	64QAM	25	25	19.22			
10	64QAM	50	0	19.21			
Channel				27685 27710 27735			Tune-up limit (dBm)
Frequency (MHz)				2307.5 2310 2312.5			
5	QPSK	1	0	22.04	22.08	22.10	23.7
5	QPSK	1	12	22.18	22.10	22.13	
5	QPSK	1	24	22.11	22.12	22.14	
5	QPSK	12	0	21.14	21.18	21.17	22.7
5	QPSK	12	7	21.27	21.18	21.20	
5	QPSK	12	13	21.32	21.23	21.13	
5	QPSK	25	0	21.24	21.15	21.21	22.7
5	16QAM	1	0	21.36	21.35	21.42	
5	16QAM	1	12	21.47	21.47	21.42	
5	16QAM	1	24	21.55	21.44	21.44	21.7
5	16QAM	12	0	20.15	20.21	20.17	
5	16QAM	12	7	20.20	20.25	20.29	
5	16QAM	12	13	20.22	20.20	20.19	21.7
5	16QAM	25	0	20.24	20.17	20.23	
5	64QAM	1	0	20.27	20.34	20.47	
5	64QAM	1	12	20.39	20.35	20.37	21.7
5	64QAM	1	24	20.53	20.37	20.31	
5	64QAM	12	0	19.25	19.27	19.23	
5	64QAM	12	7	19.29	19.22	19.33	20.7
5	64QAM	12	13	19.31	19.33	19.25	
5	64QAM	25	0	19.27	19.21	19.27	



Band 66							
Ant 2							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				132072	132322	132572	
Frequency (MHz)				1720	1745	1770	
20	QPSK	1	0	24.14	24.20	24.01	25.7
20	QPSK	1	48	24.00	23.99	23.95	
20	QPSK	1	99	24.13	24.01	23.91	
20	QPSK	50	0	23.15	23.19	23.14	24.7
20	QPSK	50	24	23.24	23.14	23.17	
20	QPSK	50	50	23.23	23.13	23.13	
20	QPSK	100	0	23.22	23.22	23.17	24.7
20	16QAM	1	0	23.49	23.42	23.32	
20	16QAM	1	49	23.38	23.24	23.23	
20	16QAM	1	99	23.49	23.28	23.19	23.7
20	16QAM	50	0	22.19	22.20	22.09	
20	16QAM	50	24	22.29	22.15	22.23	
20	16QAM	50	50	22.29	22.19	22.19	23.7
20	16QAM	100	0	22.28	22.13	22.25	
20	64QAM	1	0	22.35	22.30	22.29	
20	64QAM	1	49	22.23	22.15	22.21	23.7
20	64QAM	1	99	22.34	22.29	22.09	
20	64QAM	50	0	21.15	21.16	21.21	
20	64QAM	50	24	21.23	21.15	21.15	22.7
20	64QAM	50	50	21.25	21.16	21.13	
20	64QAM	100	0	21.34	21.22	21.24	
Channel				132047	132322	132597	Tune-up limit (dBm)
Frequency (MHz)				1717.5	1745	1772.5	
15	QPSK	1	0	24.10	24.08	24.03	25.7
15	QPSK	1	37	24.06	24.00	23.96	
15	QPSK	1	74	24.13	24.11	23.95	
15	QPSK	36	0	23.14	23.19	23.11	24.7
15	QPSK	36	20	23.18	23.25	23.14	
15	QPSK	36	39	23.19	23.16	23.14	
15	QPSK	75	0	23.20	23.21	23.04	24.7
15	16QAM	1	0	23.37	23.39	23.40	
15	16QAM	1	37	23.33	23.32	23.31	
15	16QAM	1	74	23.45	23.30	23.25	23.7
15	16QAM	36	0	22.19	22.19	22.07	
15	16QAM	36	20	22.22	22.14	22.13	
15	16QAM	36	39	22.22	22.17	22.16	23.7
15	16QAM	75	0	22.24	22.19	22.06	
15	64QAM	1	0	22.26	22.22	22.19	
15	64QAM	1	37	22.30	22.29	22.15	22.7
15	64QAM	1	74	22.36	22.26	22.18	
15	64QAM	36	0	21.20	21.19	21.11	
15	64QAM	36	20	21.22	21.20	21.13	22.7
15	64QAM	36	39	21.22	21.18	21.12	
15	64QAM	75	0	21.23	21.16	21.07	
Channel				132022	132322	132622	Tune-up limit (dBm)
Frequency (MHz)				1715	1745	1775	
10	QPSK	1	0	24.09	24.03	24.07	25.7
10	QPSK	1	25	24.08	24.07	24.06	
10	QPSK	1	49	24.14	24.08	24.07	
10	QPSK	25	0	23.16	23.15	23.15	24.7
10	QPSK	25	12	23.19	23.22	23.13	
10	QPSK	25	25	23.19	23.19	23.14	
10	QPSK	50	0	23.20	23.23	23.06	24.7
10	16QAM	1	0	23.59	23.46	23.51	
10	16QAM	1	25	23.44	23.45	23.45	
10	16QAM	1	49	23.54	23.39	23.44	23.7
10	16QAM	25	0	22.18	22.16	22.08	
10	16QAM	25	12	22.23	22.16	22.11	
10	16QAM	25	25	22.21	22.20	22.21	23.7
10	16QAM	50	0	22.23	22.25	22.08	
10	64QAM	1	0	22.37	22.29	22.29	
10	64QAM	1	25	22.42	22.34	22.40	23.7
10	64QAM	1	49	22.36	22.38	22.34	
10	64QAM	25	0	21.20	21.18	21.19	
10	64QAM	25	12	21.30	21.22	21.19	22.7
10	64QAM	25	25	21.24	21.21	21.19	
10	64QAM	50	0	21.30	21.24	21.13	
Channel				131997	132322	132647	Tune-up limit (dBm)
Frequency (MHz)				1712.5	1745	1777.5	
5	QPSK	1	0	24.07	24.10	24.08	25.7
5	QPSK	1	12	24.12	24.06	24.05	
5	QPSK	1	24	24.09	24.11	24.08	
5	QPSK	12	0	23.22	23.13	23.12	24.7
5	QPSK	12	7	23.25	23.15	23.14	
5	QPSK	12	13	23.17	23.22	23.17	
5	QPSK	25	0	23.16	23.20	23.17	24.7
5	16QAM	1	0	23.46	23.36	23.34	
5	16QAM	1	12	23.53	23.43	23.47	
5	16QAM	1	24	23.47	23.38	23.32	23.7
5	16QAM	12	0	22.24	22.17	22.17	
5	16QAM	12	7	22.24	22.21	22.29	
5	16QAM	12	13	22.25	22.23	22.16	23.7
5	16QAM	25	0	22.18	22.22	22.14	
5	64QAM	1	0	22.35	22.31	22.33	
5	64QAM	1	12	22.38	22.36	22.34	23.7
5	64QAM	1	24	22.45	22.31	22.32	
5	64QAM	12	0	21.28	21.19	21.23	
5	64QAM	12	7	21.23	21.28	21.28	22.7
5	64QAM	12	13	21.32	21.21	21.23	
5	64QAM	25	0	21.20	21.22	21.19	
Channel				131987	132322	132657	Tune-up limit (dBm)
Frequency (MHz)				1711.5	1745	1776.5	
3	QPSK	1	0	24.10	24.13	24.08	25.7
3	QPSK	1	8	24.11	24.12	24.16	
3	QPSK	1	14	24.15	24.07	24.11	
3	QPSK	8	0	23.23	23.12	23.17	24.7
3	QPSK	8	4	23.22	23.20	23.19	
3	QPSK	8	7	23.28	23.20	23.12	
3	QPSK	15	0	23.16	23.23	23.18	24.7
3	16QAM	1	0	23.52	23.35	23.45	
3	16QAM	1	8	23.54	23.53	23.47	
3	16QAM	1	14	23.49	23.45	23.45	23.7
3	16QAM	8	0	22.25	22.14	22.17	
3	16QAM	8	4	22.35	22.21	22.20	
3	16QAM	8	7	22.29	22.23	22.22	23.7
3	16QAM	15	0	22.32	22.19	22.16	
3	64QAM	1	0	22.36	22.32	22.35	
3	64QAM	1	8	22.54	22.45	22.38	23.7
3	64QAM	1	14	22.42	22.35	22.40	
3	64QAM	8	0	21.26	21.15	21.14	
3	64QAM	8	4	21.36	21.27	21.20	22.7
3	64QAM	8	7	21.31	21.27	21.24	
3	64QAM	15	0	21.21	21.17	21.23	
Channel				131979	132322	132655	Tune-up limit (dBm)
Frequency (MHz)				1710.7	1745	1779.3	
1.4	QPSK	1	0	24.12	23.98	23.97	25.7
1.4	QPSK	1	3	24.17	24.09	24.04	
1.4	QPSK	1	5	24.10	24.08	24.05	
1.4	QPSK	3	0	24.11	24.14	24.09	24.7
1.4	QPSK	3	1	24.19	24.12	24.10	
1.4	QPSK	3	3	24.17	24.07	24.04	
1.4	QPSK	6	0	23.18	23.09	23.19	24.7
1.4	16QAM	1	0	23.47	23.39	23.37	
1.4	16QAM	1	3	23.52	23.43	23.46	
1.4	16QAM	1	5	23.42	23.36	23.32	24.7
1.4	16QAM	3	0	23.24	23.20	23.16	
1.4	16QAM	3	1	23.28	23.19	23.24	
1.4	16QAM	3	3	23.24	23.18	23.14	23.7
1.4	16QAM	6	0	22.25	22.21	22.24	
1.4	64QAM	1	0	22.27	22.36	22.33	
1.4	64QAM	1	3	22.46	22.33	22.41	23.7
1.4	64QAM	1	5	22.37	22.27	22.25	
1.4	64QAM	3	0	22.34	22.34	22.25	
1.4	64QAM	3	1	22.33	22.34	22.29	23.7
1.4	64QAM	3	3	22.27	22.27	22.22	
1.4	64QAM	6	0	21.18	21.12	21.08	



Band 71							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch./	Power Middle Ch./	Power High Ch./	Tune-up limit (dBm)
Channel				133222	133322	133372	
Frequency (MHz)				673	683	688	
20	QPSK	1	0	24.39	24.32	24.28	25.7
20	QPSK	1	49	24.21	24.25	24.28	
20	QPSK	1	99	24.24	24.21	24.14	
20	QPSK	50	0	23.39	23.37	23.38	24.7
20	QPSK	50	24	23.50	23.42	23.32	
20	QPSK	50	50	23.45	23.39	23.33	
20	QPSK	100	0	23.46	23.30	23.37	24.7
20	16QAM	1	0	23.69	23.66	23.66	
20	16QAM	1	49	23.58	23.55	23.57	
20	16QAM	1	99	23.61	23.58	23.54	23.7
20	16QAM	50	0	22.46	22.32	22.40	
20	16QAM	50	24	22.42	22.33	22.39	
20	16QAM	50	50	22.42	22.39	22.39	23.7
20	16QAM	100	0	22.46	22.34	22.42	
20	64QAM	1	0	21.79	22.29	22.62	
20	64QAM	1	49	22.23	22.43	21.81	23.7
20	64QAM	1	99	22.50	22.00	22.43	
20	64QAM	50	0	20.70	21.36	21.01	
20	64QAM	50	24	20.85	21.40	21.15	22.7
20	64QAM	50	50	21.49	21.04	21.37	
20	64QAM	100	0	21.05	21.36	21.45	
Channel				133197	133297	133397	Tune-up limit (dBm)
Frequency (MHz)				670.5	680.5	690.5	
15	QPSK	1	0	24.23	24.27	24.23	25.7
15	QPSK	1	37	24.23	24.18	24.22	
15	QPSK	1	74	24.28	24.28	24.14	
15	QPSK	36	0	23.41	23.31	23.37	24.7
15	QPSK	36	20	23.45	23.30	23.34	
15	QPSK	36	39	23.38	23.40	23.35	
15	QPSK	75	0	23.36	23.35	23.34	24.7
15	16QAM	1	0	23.68	23.64	23.56	
15	16QAM	1	37	23.38	23.54	23.52	
15	16QAM	1	74	23.54	23.51	23.54	23.7
15	16QAM	36	0	22.28	22.39	22.28	
15	16QAM	36	20	22.31	22.34	22.43	
15	16QAM	36	39	22.45	22.37	22.38	23.7
15	16QAM	75	0	22.45	22.32	22.35	
15	64QAM	1	0	21.71	22.45	22.43	
15	64QAM	1	37	21.70	22.51	22.51	23.7
15	64QAM	1	74	22.41	22.16	22.49	
15	64QAM	36	0	20.70	21.34	20.97	
15	64QAM	36	20	20.44	21.43	21.36	22.7
15	64QAM	36	39	21.00	20.91	21.37	
15	64QAM	75	0	20.86	21.39	21.33	
Channel				133172	133272	133422	Tune-up limit (dBm)
Frequency (MHz)				668	678	683	
10	QPSK	1	0	24.27	24.17	24.29	25.7
10	QPSK	1	25	24.19	24.16	24.20	
10	QPSK	1	49	24.17	24.27	24.18	
10	QPSK	25	0	23.33	23.31	23.33	24.7
10	QPSK	25	12	23.33	23.43	23.26	
10	QPSK	25	25	23.24	23.30	23.27	
10	QPSK	50	0	23.41	23.40	23.26	24.7
10	16QAM	1	0	23.71	23.36	23.60	
10	16QAM	1	25	23.62	23.63	23.53	
10	16QAM	1	49	23.62	23.61	23.47	23.7
10	16QAM	25	0	22.27	22.28	22.30	
10	16QAM	25	12	22.28	22.38	22.33	
10	16QAM	25	25	22.14	22.38	22.23	23.7
10	16QAM	50	0	22.32	22.42	22.24	
10	64QAM	1	0	21.75	21.80	22.44	
10	64QAM	1	25	21.73	22.52	22.48	23.7
10	64QAM	1	49	21.70	22.46	22.13	
10	64QAM	25	0	20.70	21.34	21.35	
10	64QAM	25	12	20.33	21.41	21.36	22.7
10	64QAM	25	25	20.40	21.38	21.31	
10	64QAM	50	0	20.33	21.36	21.30	
Channel				133147	133247	133447	Tune-up limit (dBm)
Frequency (MHz)				665.5	675.5	695.5	
5	QPSK	1	0	24.07	24.21	24.21	25.7
5	QPSK	1	12	24.33	24.20	24.17	
5	QPSK	1	24	24.22	24.20	24.18	
5	QPSK	12	0	23.33	23.35	23.25	24.7
5	QPSK	12	7	23.30	23.36	23.33	
5	QPSK	12	13	23.32	23.30	23.28	
5	QPSK	25	0	23.32	23.37	23.25	24.7
5	16QAM	1	0	23.51	23.53	23.67	
5	16QAM	1	12	23.51	23.55	23.55	
5	16QAM	1	24	23.48	23.53	23.47	23.7
5	16QAM	12	0	22.16	22.40	22.33	
5	16QAM	12	7	22.31	22.37	22.34	
5	16QAM	12	13	22.38	22.34	22.27	23.7
5	16QAM	25	0	22.24	22.39	22.29	
5	64QAM	1	0	21.78	21.74	22.47	
5	64QAM	1	12	21.72	22.51	22.39	23.7
5	64QAM	1	24	21.70	22.56	21.87	
5	64QAM	12	0	20.70	21.16	21.31	
5	64QAM	12	7	20.42	21.41	21.39	22.7
5	64QAM	12	13	20.40	21.40	21.19	
5	64QAM	25	0	20.23	21.10	21.23	



Band 2							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch.	Power Mid Ch.	Power High Ch.	Tune-up limit (dbm)
Channel				18700	18900	19100	
Frequency (MHz)				1860	1880	1900	
20	QPSK	1	0	24.25	24.10	24.15	25.7
20	QPSK	1	49	24.12	24.04	24.04	
20	QPSK	1	99	24.03	24.11	24.05	
20	QPSK	50	0	23.18	23.10	23.15	24.7
20	QPSK	50	24	23.34	23.19	23.14	
20	QPSK	50	50	23.22	23.21	23.22	
20	QPSK	100	0	23.29	23.27	23.18	24.7
20	16QAM	1	0	23.43	23.43	23.45	
20	16QAM	1	49	23.41	23.40	23.35	
20	16QAM	1	99	23.34	23.43	23.47	23.7
20	16QAM	50	0	22.18	22.17	22.17	
20	16QAM	50	24	22.26	22.28	22.18	
20	16QAM	50	50	22.32	22.24	22.22	23.7
20	16QAM	100	0	22.21	22.24	22.13	
20	64QAM	1	0	22.35	22.29	22.33	
20	64QAM	1	49	22.35	22.31	21.77	22.7
20	64QAM	1	99	22.27	22.31	21.86	
20	64QAM	50	0	21.19	21.19	21.00	
20	64QAM	50	24	21.28	21.32	20.92	Tune-up limit (dbm)
20	64QAM	50	50	21.26	21.24	20.90	
20	64QAM	100	0	21.25	21.25	20.96	
Channel				1867.5	18900	19125	
Frequency (MHz)				1857.5	1880	1902.5	
15	QPSK	1	0	24.14	24.04	24.06	25.7
15	QPSK	1	37	24.08	24.01	23.95	
15	QPSK	1	74	24.01	24.03	23.97	
15	QPSK	36	0	23.10	23.05	23.10	24.7
15	QPSK	36	20	23.33	23.16	23.34	
15	QPSK	36	39	23.12	23.11	23.16	
15	QPSK	75	0	23.20	23.25	23.10	24.7
15	16QAM	1	0	23.37	23.35	23.40	
15	16QAM	1	37	23.37	23.33	23.30	
15	16QAM	1	74	23.27	23.38	23.46	23.7
15	16QAM	36	0	22.13	22.07	22.14	
15	16QAM	36	20	22.17	22.18	22.14	
15	16QAM	36	39	22.25	22.16	22.13	23.7
15	16QAM	75	0	22.20	22.19	22.08	
15	64QAM	1	0	22.31	22.23	22.29	
15	64QAM	1	37	22.31	22.26	21.73	22.7
15	64QAM	1	74	22.20	22.24	21.77	
15	64QAM	36	0	21.16	21.19	20.97	
15	64QAM	36	20	21.28	21.24	20.88	Tune-up limit (dbm)
15	64QAM	36	39	21.20	21.18	20.85	
15	64QAM	75	0	21.22	21.16	20.87	
Channel				18650	18900	19150	
Frequency (MHz)				1855	1880	1905	
10	QPSK	1	0	24.19	24.06	24.13	25.7
10	QPSK	1	25	24.12	24.03	23.95	
10	QPSK	1	49	24.01	24.05	23.99	
10	QPSK	25	0	23.13	23.10	23.05	24.7
10	QPSK	25	12	23.30	23.13	23.10	
10	QPSK	25	25	23.14	23.17	23.17	
10	QPSK	50	0	23.19	23.22	23.09	24.7
10	16QAM	1	0	23.38	23.42	23.42	
10	16QAM	1	25	23.35	23.32	23.28	
10	16QAM	1	49	23.31	23.40	23.42	23.7
10	16QAM	25	0	22.17	22.07	22.12	
10	16QAM	25	12	22.23	22.20	22.13	
10	16QAM	25	25	22.32	22.21	22.15	23.7
10	16QAM	50	0	22.19	22.24	22.12	
10	64QAM	1	0	22.29	22.22	22.28	
10	64QAM	1	25	22.31	22.29	21.70	22.7
10	64QAM	1	49	22.24	22.31	21.84	
10	64QAM	25	0	21.10	21.13	20.94	
10	64QAM	25	12	21.18	21.32	20.92	Tune-up limit (dbm)
10	64QAM	25	25	21.18	21.21	20.88	
10	64QAM	50	0	21.25	21.20	20.89	
Channel				1862.5	18900	19175	
Frequency (MHz)				1852.5	1880	1907.5	
5	QPSK	1	0	24.15	24.05	24.07	25.7
5	QPSK	1	12	24.20	24.15	24.18	
5	QPSK	1	24	24.13	24.16	24.16	
5	QPSK	12	0	23.23	23.13	23.24	24.7
5	QPSK	12	7	23.38	23.28	23.21	
5	QPSK	12	13	23.27	23.27	23.21	
5	QPSK	25	0	23.28	23.21	23.20	24.7
5	16QAM	1	0	23.44	23.30	23.38	
5	16QAM	1	12	23.48	23.48	23.46	
5	16QAM	1	24	23.54	23.47	23.42	23.7
5	16QAM	12	0	22.32	22.24	22.21	
5	16QAM	12	7	22.32	22.35	22.31	
5	16QAM	12	13	22.27	22.27	22.24	23.7
5	16QAM	25	0	22.30	22.28	22.20	
5	64QAM	1	0	22.47	22.31	21.86	
5	64QAM	1	12	22.35	22.36	21.97	23.7
5	64QAM	1	24	22.36	22.44	21.87	
5	64QAM	12	0	21.32	21.23	20.86	
5	64QAM	12	7	21.35	21.36	20.95	22.7
5	64QAM	12	13	21.39	21.40	20.89	
5	64QAM	25	0	21.30	21.33	20.83	
Channel				18615	18900	19185	
Frequency (MHz)				1851.5	1880	1906.5	
3	QPSK	1	0	24.21	24.11	24.09	25.7
3	QPSK	1	8	24.24	24.24	24.16	
3	QPSK	1	14	24.23	24.19	24.07	
3	QPSK	8	0	23.29	23.29	23.24	24.7
3	QPSK	8	4	23.36	23.24	23.26	
3	QPSK	8	7	23.31	23.21	23.18	
3	QPSK	15	0	23.34	23.24	23.16	24.7
3	16QAM	1	0	23.45	23.41	23.42	
3	16QAM	1	8	23.55	23.51	23.43	
3	16QAM	1	14	23.51	23.43	23.48	23.7
3	16QAM	8	0	22.29	22.37	22.28	
3	16QAM	8	4	22.37	22.38	22.32	
3	16QAM	8	7	22.34	22.32	22.25	23.7
3	16QAM	15	0	22.35	22.29	22.31	
3	64QAM	1	0	22.45	22.37	21.95	
3	64QAM	1	8	22.50	22.46	22.02	23.7
3	64QAM	1	14	22.50	22.48	21.92	
3	64QAM	8	0	21.38	21.32	20.88	
3	64QAM	8	4	21.37	21.43	20.88	22.7
3	64QAM	8	7	21.37	21.36	20.81	
3	64QAM	15	0	21.34	21.35	20.84	
Channel				18607	18900	19193	
Frequency (MHz)				1850.7	1880	1909.3	
1.4	QPSK	1	0	24.11	23.99	23.98	25.7
1.4	QPSK	1	3	24.20	24.14	24.13	
1.4	QPSK	1	5	24.15	24.04	24.07	
1.4	QPSK	3	0	24.11	24.06	23.99	24.7
1.4	QPSK	3	1	24.20	24.13	24.15	
1.4	QPSK	3	3	24.19	24.06	24.01	
1.4	QPSK	6	0	23.26	23.13	23.13	24.7
1.4	16QAM	1	0	23.46	23.42	23.35	
1.4	16QAM	1	3	23.55	23.53	23.49	
1.4	16QAM	1	5	23.52	23.43	23.36	24.7
1.4	16QAM	3	0	23.20	23.13	23.16	
1.4	16QAM	3	1	23.33	23.24	23.14	
1.4	16QAM	3	3	23.18	23.16	23.06	23.7
1.4	16QAM	6	0	22.30	22.30	22.26	
1.4	64QAM	1	0	22.38	22.35	21.94	
1.4	64QAM	1	3	22.43	22.42	22.00	23.7
1.4	64QAM	1	5	22.36	22.41	21.89	
1.4	64QAM	3	0	22.30	22.24	21.89	
1.4	64QAM	3	1	22.37	22.35	22.05	23.7
1.4	64QAM	3	3	22.37	22.34	21.96	
1.4	64QAM	6	0	21.28	21.25	20.78	



Band 4							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				20050	20175	20300	
Frequency (MHz)				1720	1732.5	1745	
20	QPSK	1	0	24.19	24.13	24.23	25.7
20	QPSK	1	49	24.02	23.94	23.98	
20	QPSK	1	99	24.06	24.04	24.04	
20	QPSK	50	0	23.20	23.16	23.22	24.7
20	QPSK	50	24	23.27	23.16	23.16	
20	QPSK	50	50	23.13	23.10	23.11	
20	QPSK	100	0	23.18	23.23	23.06	24.7
20	16QAM	1	0	23.51	23.50	23.48	
20	16QAM	1	49	23.40	23.51	23.32	
20	16QAM	1	99	23.47	23.33	23.32	23.7
20	16QAM	50	0	22.25	22.22	22.17	
20	16QAM	50	24	22.27	22.17	22.14	
20	16QAM	50	50	22.20	22.15	22.19	23.7
20	16QAM	100	0	22.17	22.27	22.13	
20	64QAM	1	0	22.32	22.36	22.07	
20	64QAM	1	49	22.21	22.20	22.29	23.7
20	64QAM	1	99	22.28	22.04	22.25	
20	64QAM	50	0	21.18	21.26	21.24	
20	64QAM	50	24	21.29	21.20	21.10	22.7
20	64QAM	50	50	21.20	21.13	21.14	
20	64QAM	100	0	21.22	21.24	21.19	
Channel				20250	20175	20325	
Frequency (MHz)				1717.5	1732.5	1747.5	
15	QPSK	1	0	24.21	24.17	24.22	25.7
15	QPSK	1	37	24.07	24.08	24.05	
15	QPSK	1	74	24.04	24.09	24.08	
15	QPSK	36	0	23.33	23.31	23.16	24.7
15	QPSK	36	20	23.27	23.26	23.10	
15	QPSK	36	39	23.27	23.16	23.14	
15	QPSK	75	0	23.24	23.22	23.15	24.7
15	16QAM	1	0	23.49	23.51	23.55	
15	16QAM	1	37	23.41	23.39	23.38	
15	16QAM	1	74	23.48	23.39	23.31	23.7
15	16QAM	36	0	22.30	22.16	22.24	
15	16QAM	36	20	22.20	22.25	22.12	
15	16QAM	36	39	22.20	22.20	22.17	23.7
15	16QAM	75	0	22.23	22.28	22.14	
15	64QAM	1	0	22.43	22.38	22.34	
15	64QAM	1	37	22.30	22.18	22.26	23.7
15	64QAM	1	74	22.37	22.07	22.20	
15	64QAM	36	0	21.27	21.29	21.27	
15	64QAM	36	20	21.25	21.13	21.21	22.7
15	64QAM	36	39	21.27	21.05	21.20	
15	64QAM	75	0	21.32	21.21	21.20	
Channel				20000	20175	20350	
Frequency (MHz)				1715	1732.5	1750	
10	QPSK	1	0	24.16	24.09	24.14	25.7
10	QPSK	1	25	24.14	24.09	24.08	
10	QPSK	1	49	24.15	24.17	24.10	
10	QPSK	25	0	23.24	23.19	23.15	24.7
10	QPSK	25	12	23.31	23.27	23.19	
10	QPSK	25	25	23.30	23.29	23.28	
10	QPSK	50	0	23.32	23.25	23.15	24.7
10	16QAM	1	0	23.87	23.84	23.47	
10	16QAM	1	25	23.43	23.51	23.45	
10	16QAM	1	49	23.52	23.45	23.56	23.7
10	16QAM	25	0	22.25	22.14	22.15	
10	16QAM	25	12	22.27	22.25	22.16	
10	16QAM	25	25	22.24	22.23	22.24	23.7
10	16QAM	50	0	22.31	22.29	22.14	
10	64QAM	1	0	22.36	22.33	22.38	
10	64QAM	1	25	22.46	22.28	22.46	23.7
10	64QAM	1	49	22.42	22.07	22.45	
10	64QAM	25	0	21.30	21.23	21.23	
10	64QAM	25	12	21.30	21.14	21.25	22.7
10	64QAM	25	25	21.35	20.96	21.26	
10	64QAM	50	0	21.30	21.11	21.23	
Channel				19975	20175	20375	
Frequency (MHz)				1712.5	1732.5	1752.5	
5	QPSK	1	0	24.19	24.12	24.06	25.7
5	QPSK	1	12	24.19	24.19	24.16	
5	QPSK	1	24	24.22	24.12	24.15	
5	QPSK	12	0	23.28	23.19	23.19	24.7
5	QPSK	12	7	23.36	23.29	23.23	
5	QPSK	12	13	23.28	23.23	23.14	
5	QPSK	25	0	23.30	23.24	23.23	24.7
5	16QAM	1	0	23.53	23.36	23.43	
5	16QAM	1	12	23.55	23.48	23.47	
5	16QAM	1	24	23.56	23.45	23.44	23.7
5	16QAM	12	0	22.25	22.15	22.29	
5	16QAM	12	7	22.32	22.31	22.21	
5	16QAM	12	13	22.28	22.32	22.28	23.7
5	16QAM	25	0	22.28	22.29	22.26	
5	64QAM	1	0	22.32	22.38	22.44	
5	64QAM	1	12	22.47	22.29	22.39	23.7
5	64QAM	1	24	22.55	22.04	22.40	
5	64QAM	12	0	21.33	21.25	21.33	
5	64QAM	12	7	21.35	21.25	21.29	22.7
5	64QAM	12	13	21.36	21.12	21.27	
5	64QAM	25	0	21.32	21.08	21.24	
Channel				19965	20175	20385	
Frequency (MHz)				1711.5	1732.5	1753.5	
3	QPSK	1	0	24.14	24.04	24.07	25.7
3	QPSK	1	8	24.23	24.20	24.15	
3	QPSK	1	14	24.19	24.20	24.10	
3	QPSK	8	0	23.25	23.18	23.17	24.7
3	QPSK	8	4	23.28	23.26	23.28	
3	QPSK	8	7	23.26	23.29	23.18	
3	QPSK	15	0	23.31	23.31	23.21	24.7
3	16QAM	1	0	23.51	23.42	23.42	
3	16QAM	1	8	23.59	23.56	23.46	
3	16QAM	1	14	23.49	23.41	23.43	23.7
3	16QAM	8	0	22.30	22.21	22.21	
3	16QAM	8	4	22.39	22.33	22.33	
3	16QAM	8	7	22.37	22.27	22.25	23.7
3	16QAM	15	0	22.32	22.22	22.26	
3	64QAM	1	0	22.37	22.24	22.33	
3	64QAM	1	8	22.57	22.26	22.45	23.7
3	64QAM	1	14	22.53	22.19	22.42	
3	64QAM	8	0	21.36	21.16	21.30	
3	64QAM	8	4	21.37	21.17	21.27	22.7
3	64QAM	8	7	21.35	21.09	21.26	
3	64QAM	15	0	21.29	21.14	21.20	
Channel				19957	20175	20393	
Frequency (MHz)				1710.7	1732.5	1754.3	
1.4	QPSK	1	0	24.02	24.07	24.05	25.7
1.4	QPSK	1	3	24.21	24.16	24.08	
1.4	QPSK	1	5	24.09	24.07	23.98	
1.4	QPSK	3	0	24.17	24.02	24.08	24.7
1.4	QPSK	3	1	24.17	24.16	24.09	
1.4	QPSK	3	3	24.14	24.12	24.09	
1.4	QPSK	6	0	23.12	23.14	23.06	24.7
1.4	16QAM	1	0	23.47	23.39	23.37	
1.4	16QAM	1	3	23.50	23.42	23.44	
1.4	16QAM	1	5	23.45	23.41	23.37	24.7
1.4	16QAM	3	0	23.22	23.16	23.13	
1.4	16QAM	3	1	23.22	23.26	23.24	
1.4	16QAM	3	3	23.23	23.16	23.13	23.7
1.4	16QAM	6	0	22.26	22.21	22.14	
1.4	64QAM	1	0	22.34	22.31	22.28	
1.4	64QAM	1	3	22.37	22.28	22.42	23.7
1.4	64QAM	1	5	22.34	22.21	22.33	
1.4	64QAM	3	0	22.36	22.28	22.22	
1.4	64QAM	3	1	22.36	22.34	22.30	23.7
1.4	64QAM	3	3	22.34	22.21	22.23	
1.4	64QAM	6	0	21.25	21.11	21.06	



Band 5							
Ant 1							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch./	Power Middle Ch./	Power High Ch./	Tune-up limit (dBm)
Channel				20450	20525	20600	
Frequency (MHz)				829	836.5	844	
10	QPSK	1	0	23.09	23.04	23.08	24.6
10	QPSK	1	25	22.99	23.05	22.97	
10	QPSK	1	49	23.08	23.02	22.94	
10	QPSK	25	0	23.10	23.16	23.11	24.1
10	QPSK	25	12	23.20	23.14	23.12	
10	QPSK	25	25	23.18	23.17	23.13	
10	QPSK	50	0	23.21	23.16	23.10	24.1
10	16QAM	1	0	23.49	23.43	23.46	
10	16QAM	1	25	23.41	23.43	23.40	
10	16QAM	1	49	23.47	23.37	23.35	23.6
10	16QAM	25	0	22.97	23.05	23.02	
10	16QAM	25	12	23.06	23.06	23.04	
10	16QAM	25	25	23.04	23.09	23.05	23.6
10	16QAM	50	0	23.07	23.07	23.02	
10	64QAM	1	0	23.18	23.15	23.22	
10	64QAM	1	25	23.22	23.28	23.05	23.6
10	64QAM	1	49	23.24	23.02	22.76	
10	64QAM	25	0	21.98	22.13	22.08	
10	64QAM	25	12	22.14	22.12	22.06	23.1
10	64QAM	25	25	22.08	22.12	21.41	
10	64QAM	50	0	22.11	22.11	22.00	
Channel				20425	20525	20625	Tune-up limit (dBm)
Frequency (MHz)				826.5	836.5	846.5	
5	QPSK	1	0	23.05	22.65	22.60	24.6
5	QPSK	1	12	22.91	22.64	22.66	
5	QPSK	1	24	23.04	22.67	22.60	
5	QPSK	12	0	23.03	22.58	22.53	24.1
5	QPSK	12	7	23.15	22.62	22.46	
5	QPSK	12	13	23.14	22.57	22.46	
5	QPSK	25	0	23.14	22.51	22.45	24.1
5	16QAM	1	0	23.47	22.89	22.79	
5	16QAM	1	12	23.39	22.85	22.78	
5	16QAM	1	24	23.38	22.80	22.70	23.6
5	16QAM	12	0	22.96	22.59	22.42	
5	16QAM	12	7	23.04	22.54	22.41	
5	16QAM	12	13	23.04	22.49	22.40	23.6
5	16QAM	25	0	23.03	22.47	22.38	
5	64QAM	1	0	23.09	22.66	22.20	
5	64QAM	1	12	23.17	22.64	21.74	23.6
5	64QAM	1	24	23.20	22.64	21.90	
5	64QAM	12	0	21.97	21.60	21.87	
5	64QAM	12	7	22.08	21.59	21.63	23.1
5	64QAM	12	13	22.04	21.54	21.67	
5	64QAM	25	0	22.05	21.46	21.70	
Channel				20415	20525	20635	Tune-up limit (dBm)
Frequency (MHz)				825.5	836.5	847.5	
3	QPSK	1	0	22.80	22.75	22.80	24.6
3	QPSK	1	8	22.79	22.84	22.76	
3	QPSK	1	14	22.70	22.76	22.82	
3	QPSK	8	0	22.91	22.85	22.81	24.1
3	QPSK	8	4	22.85	22.87	22.80	
3	QPSK	8	7	22.82	22.84	22.72	
3	QPSK	15	0	22.83	22.83	22.77	24.1
3	16QAM	1	0	23.18	23.15	23.12	
3	16QAM	1	8	23.19	23.20	23.12	
3	16QAM	1	14	23.09	23.11	22.96	23.6
3	16QAM	8	0	22.80	22.85	22.81	
3	16QAM	8	4	22.80	22.88	22.79	
3	16QAM	8	7	22.74	22.83	22.71	23.6
3	16QAM	15	0	22.79	22.77	22.75	
3	64QAM	1	0	22.94	22.93	21.97	
3	64QAM	1	8	22.96	23.01	22.20	23.6
3	64QAM	1	14	22.85	22.90	22.28	
3	64QAM	8	0	21.82	21.83	21.85	
3	64QAM	8	4	21.79	21.86	21.96	23.1
3	64QAM	8	7	21.75	21.85	22.16	
3	64QAM	15	0	21.73	21.80	22.06	
Channel				20407	20525	20643	Tune-up limit (dBm)
Frequency (MHz)				824.7	836.5	848.3	
1.4	QPSK	1	0	22.70	22.66	22.61	24.6
1.4	QPSK	1	3	22.73	22.74	22.68	
1.4	QPSK	1	5	22.68	22.70	22.60	
1.4	QPSK	3	0	22.75	22.70	22.64	24.1
1.4	QPSK	3	1	22.78	22.73	22.69	
1.4	QPSK	3	3	22.73	22.74	22.64	
1.4	QPSK	6	0	22.81	22.73	22.69	24.1
1.4	16QAM	1	0	23.07	23.02	22.97	
1.4	16QAM	1	3	23.10	23.12	23.00	
1.4	16QAM	1	5	23.03	23.05	22.93	24.1
1.4	16QAM	3	0	22.88	22.78	22.76	
1.4	16QAM	3	1	22.89	22.84	22.80	
1.4	16QAM	3	3	22.82	22.84	22.70	23.6
1.4	16QAM	6	0	22.72	22.75	22.68	
1.4	64QAM	1	0	22.85	22.80	22.29	
1.4	64QAM	1	3	22.91	22.92	22.47	23.6
1.4	64QAM	1	5	22.82	22.96	22.49	
1.4	64QAM	3	0	22.85	22.77	22.25	
1.4	64QAM	3	1	22.86	22.83	22.37	23.1
1.4	64QAM	3	3	22.79	22.84	22.44	
1.4	64QAM	6	0	21.69	21.68	21.30	



Band 7							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch./	Power Middle Ch./	Power High Ch./	Tune-up limit (dBm)
Channel				20850	21100	21350	
Frequency (MHz)				2510	2535	2560	
20	QPSK	1	0	24.43	24.33	24.16	25.7
20	QPSK	1	49	24.40	24.36	24.21	
20	QPSK	1	99	24.53	24.43	24.20	
20	QPSK	50	0	23.60	23.46	23.37	24.7
20	QPSK	50	24	23.62	23.47	23.35	
20	QPSK	50	50	23.58	23.49	23.38	
20	QPSK	100	0	23.57	23.49	23.30	24.7
20	16QAM	1	0	23.72	23.69	23.53	
20	16QAM	1	49	23.76	23.65	23.47	
20	16QAM	1	99	23.89	23.74	23.52	23.7
20	16QAM	50	0	22.64	22.40	22.33	
20	16QAM	50	24	22.66	22.46	22.32	
20	16QAM	50	50	22.66	22.45	22.30	23.7
20	16QAM	100	0	22.58	22.45	22.32	
20	64QAM	1	0	22.63	22.49	22.44	
20	64QAM	1	49	22.62	22.55	22.46	23.7
20	64QAM	1	99	22.70	22.63	22.38	
20	64QAM	50	0	21.65	21.44	21.35	
20	64QAM	50	24	21.69	21.52	21.43	22.7
20	64QAM	50	50	21.66	21.44	21.39	
20	64QAM	100	0	21.67	21.51	21.40	
Channel				20925	21100	21375	Tune-up limit (dBm)
Frequency (MHz)				2507.5	2535	2562.5	
15	QPSK	1	0	24.41	24.35	24.22	25.7
15	QPSK	1	37	24.50	24.38	24.11	
15	QPSK	1	74	24.49	24.42	24.24	
15	QPSK	36	0	23.49	23.39	23.27	24.7
15	QPSK	36	20	23.64	23.46	23.32	
15	QPSK	36	39	23.64	23.46	23.32	
15	QPSK	75	0	23.58	23.40	23.35	24.7
15	16QAM	1	0	23.72	23.67	23.49	
15	16QAM	1	37	23.83	23.64	23.48	
15	16QAM	1	74	23.80	23.78	23.53	23.7
15	16QAM	36	0	22.50	22.47	22.29	
15	16QAM	36	20	22.50	22.50	22.35	
15	16QAM	36	39	22.65	22.48	22.34	23.7
15	16QAM	75	0	22.58	22.49	22.33	
15	64QAM	1	0	22.67	22.52	22.41	
15	64QAM	1	37	22.68	22.59	22.34	23.7
15	64QAM	1	74	22.80	22.60	22.41	
15	64QAM	36	0	21.49	21.41	21.38	
15	64QAM	36	20	21.66	21.55	21.32	22.7
15	64QAM	36	39	21.64	21.48	21.35	
15	64QAM	75	0	21.61	21.42	21.33	
Channel				20800	21100	21400	Tune-up limit (dBm)
Frequency (MHz)				2505	2535	2565	
10	QPSK	1	0	24.42	24.34	24.18	25.7
10	QPSK	1	25	24.48	24.37	24.08	
10	QPSK	1	49	24.42	24.34	24.20	
10	QPSK	25	0	23.43	23.29	23.24	24.7
10	QPSK	25	12	23.58	23.44	23.25	
10	QPSK	25	25	23.58	23.38	23.31	
10	QPSK	50	0	23.49	23.34	23.26	24.7
10	16QAM	1	0	23.65	23.57	23.43	
10	16QAM	1	25	23.81	23.62	23.38	
10	16QAM	1	49	23.72	23.72	23.47	23.7
10	16QAM	25	0	22.49	22.47	22.26	
10	16QAM	25	12	22.51	22.43	22.25	
10	16QAM	25	25	22.59	22.47	22.31	23.7
10	16QAM	50	0	22.57	22.46	22.24	
10	64QAM	1	0	22.65	22.45	22.36	
10	64QAM	1	25	22.68	22.53	22.25	23.7
10	64QAM	1	49	22.80	22.54	22.33	
10	64QAM	25	0	21.47	21.36	21.29	
10	64QAM	25	12	21.56	21.52	21.23	22.7
10	64QAM	25	25	21.52	21.45	21.33	
10	64QAM	50	0	21.61	21.33	21.23	
Channel				20775	21100	21425	Tune-up limit (dBm)
Frequency (MHz)				2502.5	2535	2567.5	
5	QPSK	1	0	24.45	24.33	24.22	25.7
5	QPSK	1	12	24.43	24.36	24.11	
5	QPSK	1	24	24.41	24.32	24.15	
5	QPSK	12	0	23.47	23.38	23.18	24.7
5	QPSK	12	7	23.62	23.39	23.31	
5	QPSK	12	13	23.61	23.38	23.24	
5	QPSK	25	0	23.48	23.32	23.26	24.7
5	16QAM	1	0	23.67	23.61	23.44	
5	16QAM	1	12	23.81	23.56	23.45	
5	16QAM	1	24	23.72	23.69	23.43	23.7
5	16QAM	12	0	22.47	22.45	22.20	
5	16QAM	12	7	22.56	22.41	22.33	
5	16QAM	12	13	22.62	22.48	22.25	23.7
5	16QAM	25	0	22.56	22.44	22.26	
5	64QAM	1	0	22.63	22.44	22.37	
5	64QAM	1	12	22.63	22.49	22.32	23.7
5	64QAM	1	24	22.78	22.55	22.37	
5	64QAM	12	0	21.41	21.34	21.30	
5	64QAM	12	7	21.63	21.52	21.24	22.7
5	64QAM	12	13	21.62	21.42	21.34	
5	64QAM	25	0	21.52	21.39	21.29	



Band 12							
Ant 1							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low [dBm]	Power Middle [dBm]	Power High [dBm]	Tune-up limit [dBm]
Channel				23060	23095	23130	
Frequency (MHz)				704	707.5	711	
10	QPSK	1	0	23.76	23.70	23.73	25.7
10	QPSK	1	25	23.71	23.76	23.75	
10	QPSK	1	49	23.81	23.85	23.79	
10	QPSK	25	0	23.45	23.47	23.47	
10	QPSK	25	12	23.54	23.47	23.46	24.7
10	QPSK	25	25	23.52	23.54	23.54	
10	QPSK	50	0	23.53	23.47	23.46	
10	16QAM	1	0	23.74	23.68	23.67	24.7
10	16QAM	1	25	23.70	23.73	23.71	
10	16QAM	1	49	23.79	23.79	23.72	
10	16QAM	25	0	22.43	22.48	22.46	
10	16QAM	25	12	22.51	22.49	22.46	23.7
10	16QAM	25	25	22.47	22.52	22.56	
10	16QAM	50	0	22.53	22.45	22.45	
10	64QAM	1	0	22.55	22.51	22.54	23.7
10	64QAM	1	25	22.63	22.56	22.67	
10	64QAM	1	49	22.69	22.73	22.65	
10	64QAM	25	0	21.46	21.46	21.49	
10	64QAM	25	12	21.55	21.51	21.49	22.7
10	64QAM	25	25	21.53	21.57	21.56	
10	64QAM	50	0	21.53	21.51	21.52	
Channel				23035	23095	23155	Tune-up limit [dBm]
Frequency (MHz)				701.5	707.5	713.5	
5	QPSK	1	0	23.78	23.76	23.74	25.7
5	QPSK	1	12	23.77	23.82	23.80	
5	QPSK	1	24	23.78	23.83	23.82	
5	QPSK	12	0	23.43	23.46	23.51	24.7
5	QPSK	12	7	23.48	23.46	23.50	
5	QPSK	12	13	23.47	23.48	23.47	
5	QPSK	25	0	23.46	23.44	23.46	
5	16QAM	1	0	23.75	23.70	23.65	24.7
5	16QAM	1	12	23.73	23.73	23.75	
5	16QAM	1	24	23.70	23.72	23.72	
5	16QAM	12	0	22.50	22.52	22.51	23.7
5	16QAM	12	7	22.49	22.47	22.52	
5	16QAM	12	13	22.48	22.52	22.49	
5	16QAM	25	0	22.52	22.47	22.46	
5	64QAM	1	0	22.60	22.59	22.60	23.7
5	64QAM	1	12	22.61	22.64	22.66	
5	64QAM	1	24	22.65	22.70	22.66	
5	64QAM	12	0	21.54	21.54	21.54	22.7
5	64QAM	12	7	21.55	21.54	21.54	
5	64QAM	12	13	21.53	21.57	21.52	
5	64QAM	25	0	21.51	21.50	21.48	
Channel				23025	23095	23165	Tune-up limit [dBm]
Frequency (MHz)				700.5	707.5	714.5	
3	QPSK	1	0	23.82	23.77	23.79	25.7
3	QPSK	1	8	23.80	23.86	23.82	
3	QPSK	1	14	23.73	23.78	23.76	
3	QPSK	8	0	23.51	23.44	23.47	24.7
3	QPSK	8	4	23.48	23.50	23.49	
3	QPSK	8	7	23.42	23.49	23.47	
3	QPSK	15	0	23.49	23.42	23.45	24.7
3	16QAM	1	0	23.77	23.70	23.75	
3	16QAM	1	8	23.75	23.82	23.79	
3	16QAM	1	14	23.66	23.73	23.68	23.7
3	16QAM	8	0	22.55	22.53	22.51	
3	16QAM	8	4	22.55	22.61	22.57	
3	16QAM	8	7	22.53	22.55	22.53	
3	16QAM	15	0	22.54	22.49	22.46	23.7
3	64QAM	1	0	22.66	22.56	22.68	23.7
3	64QAM	1	8	22.71	22.70	22.69	
3	64QAM	1	14	22.64	22.66	22.61	
3	64QAM	8	0	21.58	21.52	21.54	22.7
3	64QAM	8	4	21.54	21.62	21.56	
3	64QAM	8	7	21.50	21.55	21.53	
3	64QAM	15	0	21.52	21.45	21.47	
Channel				23017	23095	23173	Tune-up limit [dBm]
Frequency (MHz)				699.7	707.5	715.3	
1.4	QPSK	1	0	23.73	23.69	23.71	25.7
1.4	QPSK	1	3	23.75	23.76	23.74	
1.4	QPSK	1	5	23.69	23.73	23.68	
1.4	QPSK	3	0	23.75	23.70	23.73	24.7
1.4	QPSK	3	1	23.78	23.75	23.77	
1.4	QPSK	3	3	23.69	23.73	23.70	
1.4	QPSK	6	0	23.40	23.43	23.40	24.7
1.4	16QAM	1	0	23.65	23.58	23.64	24.7
1.4	16QAM	1	3	23.69	23.71	23.71	
1.4	16QAM	1	5	23.61	23.64	23.60	
1.4	16QAM	3	0	23.43	23.41	23.41	23.7
1.4	16QAM	3	1	23.50	23.44	23.47	
1.4	16QAM	3	3	23.40	23.41	23.39	
1.4	16QAM	6	0	22.46	22.49	22.46	23.7
1.4	64QAM	1	0	22.57	22.53	22.57	23.7
1.4	64QAM	1	3	22.61	22.65	22.62	
1.4	64QAM	1	5	22.53	22.56	22.50	
1.4	64QAM	3	0	22.54	22.50	22.55	23.7
1.4	64QAM	3	1	22.58	22.55	22.58	
1.4	64QAM	3	3	22.52	22.55	22.51	
1.4	64QAM	6	0	21.44	21.44	21.44	22.7



Band 13							
Ant 1							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				23230			
Frequency (MHz)				782			
10	QPSK	1	0	23.80			25.2
10	QPSK	1	25	23.47			
10	QPSK	1	49	23.51			
10	QPSK	25	0	22.58			24.2
10	QPSK	25	12	22.65			
10	QPSK	25	25	22.56			
10	QPSK	50	0	22.58			24.2
10	16QAM	1	0	22.75			
10	16QAM	1	25	22.82			
10	16QAM	1	49	22.78			23.2
10	16QAM	25	0	21.59			
10	16QAM	25	12	21.62			
10	16QAM	25	25	21.61			23.2
10	16QAM	50	0	21.57			
10	64QAM	1	0	23.07			
10	64QAM	1	25	23.04			23.2
10	64QAM	1	49	23.01			
10	64QAM	25	0	22.07			
10	64QAM	25	12	22.06			22.2
10	64QAM	25	25	22.02			
10	64QAM	50	0	22.04			
Channel				23206 23230 23255			
Frequency (MHz)				779.5 782 784.5			Tune-up limit (dBm)
5	QPSK	1	0	23.50	23.45	23.49	25.2
5	QPSK	1	12	23.45	23.54	23.52	
5	QPSK	1	24	23.50	23.51	23.52	
5	QPSK	12	0	22.63	22.56	22.61	24.2
5	QPSK	12	7	22.67	22.64	22.57	
5	QPSK	12	13	22.67	22.62	22.52	
5	QPSK	25	0	22.64	22.57	22.55	24.2
5	16QAM	1	0	22.71	22.71	22.78	
5	16QAM	1	12	22.78	22.85	22.79	
5	16QAM	1	24	22.82	22.85	22.72	23.2
5	16QAM	12	0	21.70	21.62	21.68	
5	16QAM	12	7	21.68	21.57	21.60	
5	16QAM	12	13	21.69	21.60	21.70	23.2
5	16QAM	25	0	21.63	21.64	21.54	
5	64QAM	1	0	22.14	22.25	22.17	
5	64QAM	1	12	22.26	22.30	22.21	23.2
5	64QAM	1	24	22.26	22.23	22.15	
5	64QAM	12	0	21.19	21.11	21.20	
5	64QAM	12	7	21.24	21.14	21.08	22.2
5	64QAM	12	13	21.15	21.17	21.08	
5	64QAM	25	0	21.21	21.11	21.10	



Band 14							
Ant 1							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit [dBm]
Channel				23330	23330	23330	
Frequency (MHz)				793	793	793	
10	QPSK	1	0	23.99			25.7
10	QPSK	1	25	23.82			
10	QPSK	1	49	23.76			
10	QPSK	25	0	23.69			
10	QPSK	25	12	23.69			24.7
10	QPSK	25	25	23.75			
10	QPSK	50	0	23.68			
10	16QAM	1	0	23.82			24.7
10	16QAM	1	25	23.85			
10	16QAM	1	49	23.85			
10	16QAM	25	0	22.70			
10	16QAM	25	12	22.70			23.7
10	16QAM	25	25	22.72			
10	16QAM	50	0	22.71			
10	64QAM	1	0	22.84			23.7
10	64QAM	1	25	22.80			
10	64QAM	1	49	22.88			
10	64QAM	25	0	21.73			
10	64QAM	25	12	21.72			22.7
10	64QAM	25	25	21.76			
10	64QAM	50	0	21.72			
Channel				23305	23330	23355	Tune-up limit [dBm]
Frequency (MHz)				790.5	793	795.5	
5	QPSK	1	0	23.76	23.70	23.70	
5	QPSK	1	12	23.81	23.79	23.83	25.7
5	QPSK	1	24	23.77	23.74	23.70	
5	QPSK	12	0	23.67	23.62	23.56	
5	QPSK	12	7	23.68	23.66	23.63	24.7
5	QPSK	12	13	23.63	23.65	23.58	
5	QPSK	25	0	23.63	23.57	23.54	
5	16QAM	1	0	23.90	23.83	23.80	
5	16QAM	1	12	23.90	23.90	23.89	24.7
5	16QAM	1	24	23.86	23.86	23.82	
5	16QAM	12	0	22.70	22.63	22.59	
5	16QAM	12	7	22.71	22.65	22.68	23.7
5	16QAM	12	13	22.68	22.64	22.63	
5	16QAM	25	0	22.70	22.59	22.57	
5	64QAM	1	0	22.80	22.76	22.77	
5	64QAM	1	12	22.86	22.87	22.85	23.7
5	64QAM	1	24	22.88	22.83	22.78	
5	64QAM	12	0	21.75	21.68	21.65	
5	64QAM	12	7	21.76	21.69	21.71	22.7
5	64QAM	12	13	21.71	21.69	21.67	
5	64QAM	25	0	21.67	21.61	21.58	



Band 17							
Ant 1							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				23780	23790	23800	
Frequency (MHz)				709	710	711	
10	QPSK	1	0	23.74	23.72	23.73	25.7
10	QPSK	1	25	23.78	23.79	23.78	
10	QPSK	1	49	23.81	23.82	23.82	
10	QPSK	25	0	23.42	23.44	23.42	24.7
10	QPSK	25	12	23.57	23.59	23.59	
10	QPSK	25	25	23.59	23.60	23.59	
10	QPSK	50	0	23.57	23.47	23.47	24.7
10	16QAM	1	0	23.71	23.69	23.71	
10	16QAM	1	25	23.79	23.81	23.80	
10	16QAM	1	49	23.88	23.88	23.82	23.7
10	16QAM	25	0	22.43	22.45	22.46	
10	16QAM	25	12	22.58	22.51	22.60	
10	16QAM	25	25	22.63	22.54	22.56	23.7
10	16QAM	50	0	22.54	22.48	22.44	
10	64QAM	1	0	22.55	22.56	22.57	
10	64QAM	1	25	22.71	22.71	22.71	23.7
10	64QAM	1	49	22.76	22.79	22.73	
10	64QAM	25	0	21.48	21.48	21.48	
10	64QAM	25	12	21.64	21.56	21.63	22.7
10	64QAM	25	25	21.61	21.64	21.63	
10	64QAM	50	0	21.60	21.54	21.54	
Channel				23765	23790	23825	Tune-up limit (dBm)
Frequency (MHz)				706.5	710	713.5	
5	QPSK	1	0	23.75	23.74	23.77	25.7
5	QPSK	1	12	23.85	23.86	23.87	
5	QPSK	1	24	23.89	23.89	23.90	
5	QPSK	12	0	23.46	23.46	23.48	24.7
5	QPSK	12	7	23.53	23.59	23.53	
5	QPSK	12	13	23.52	23.54	23.55	
5	QPSK	25	0	23.51	23.51	23.53	24.7
5	16QAM	1	0	23.71	23.68	23.68	
5	16QAM	1	12	23.74	23.75	23.77	
5	16QAM	1	24	23.80	23.81	23.82	23.7
5	16QAM	12	0	22.50	22.51	22.52	
5	16QAM	12	7	22.55	22.57	22.56	
5	16QAM	12	13	22.54	22.59	22.58	23.7
5	16QAM	25	0	22.54	22.49	22.51	
5	64QAM	1	0	22.63	22.61	22.65	
5	64QAM	1	12	22.66	22.69	22.69	23.7
5	64QAM	1	24	22.73	22.76	22.74	
5	64QAM	12	0	21.52	21.56	21.55	
5	64QAM	12	7	21.63	21.65	21.57	22.7
5	64QAM	12	13	21.59	21.65	21.63	
5	64QAM	25	0	21.55	21.53	21.57	



Band 25							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				26140	26340	26590	
Frequency (MHz)				1860	1880	1905	
20	QPSK	1	0	24.37	24.11	23.99	25.7
20	QPSK	1	49	24.17	24.10	24.01	
20	QPSK	1	99	24.09	24.05	23.83	
20	QPSK	50	0	23.28	23.27	23.08	24.7
20	QPSK	50	24	23.33	23.30	23.12	
20	QPSK	50	50	23.27	23.29	23.14	
20	QPSK	100	0	23.28	23.29	23.17	24.7
20	16QAM	1	0	23.53	23.42	23.39	
20	16QAM	1	49	23.52	23.45	23.38	
20	16QAM	1	99	23.42	23.47	23.21	23.7
20	16QAM	50	0	22.25	22.27	22.14	
20	16QAM	50	24	22.33	22.33	22.11	
20	16QAM	50	50	22.28	22.24	22.22	22.7
20	16QAM	100	0	22.28	22.27	22.13	
20	64QAM	1	0	22.41	22.30	22.21	
20	64QAM	1	49	22.31	22.32	21.92	23.7
20	64QAM	1	99	22.39	22.38	21.70	
20	64QAM	50	0	21.29	21.27	20.87	
20	64QAM	50	24	21.33	21.30	20.90	22.7
20	64QAM	50	50	21.35	21.35	20.70	
20	64QAM	100	0	21.29	21.35	20.71	
Channel				26115	26340	26615	Tune-up limit (dBm)
Frequency (MHz)				1857.5	1880	1907.5	
15	QPSK	1	0	24.24	24.13	24.06	25.7
15	QPSK	1	37	24.11	24.17	24.07	
15	QPSK	1	74	24.19	24.20	23.81	
15	QPSK	36	0	23.36	23.25	23.15	24.7
15	QPSK	36	20	23.38	23.38	23.14	
15	QPSK	36	39	23.27	23.27	23.17	
15	QPSK	75	0	23.32	23.26	23.15	24.7
15	16QAM	1	0	23.46	23.50	23.39	
15	16QAM	1	37	23.44	23.50	23.30	
15	16QAM	1	74	23.42	23.50	23.19	23.7
15	16QAM	36	0	22.34	22.29	22.14	
15	16QAM	36	20	22.32	22.29	22.20	
15	16QAM	36	39	22.32	22.27	22.14	23.7
15	16QAM	75	0	22.27	22.28	22.24	
15	64QAM	1	0	22.42	22.33	21.77	
15	64QAM	1	37	22.35	22.38	21.86	23.7
15	64QAM	1	74	22.33	22.45	21.71	
15	64QAM	36	0	21.39	21.25	20.88	
15	64QAM	36	20	21.36	21.30	20.96	22.7
15	64QAM	36	39	21.33	21.28	20.71	
15	64QAM	75	0	21.33	21.34	20.70	
Channel				26090	26340	26640	Tune-up limit (dBm)
Frequency (MHz)				1855	1880	1910	
10	QPSK	1	0	24.16	24.13	24.06	25.7
10	QPSK	1	25	24.18	24.14	24.06	
10	QPSK	1	49	24.22	24.21	23.78	
10	QPSK	25	0	23.35	23.33	23.04	24.7
10	QPSK	25	12	23.32	23.27	23.25	
10	QPSK	25	25	23.28	23.32	23.17	
10	QPSK	50	0	23.29	23.26	23.18	24.7
10	16QAM	1	0	23.60	23.57	23.34	
10	16QAM	1	25	23.54	23.53	23.43	
10	16QAM	1	49	23.58	23.54	23.19	23.7
10	16QAM	25	0	22.31	22.28	22.05	
10	16QAM	25	12	22.33	22.29	22.16	
10	16QAM	25	25	22.35	22.27	22.12	23.7
10	16QAM	50	0	22.35	22.36	22.09	
10	64QAM	1	0	22.54	22.39	22.01	
10	64QAM	1	25	22.52	22.42	21.87	23.7
10	64QAM	1	49	22.41	22.48	21.75	
10	64QAM	25	0	21.31	21.33	20.78	
10	64QAM	25	12	21.42	21.36	20.85	22.7
10	64QAM	25	25	21.40	21.37	20.64	
10	64QAM	50	0	21.33	21.40	20.52	
Channel				26055	26340	26655	Tune-up limit (dBm)
Frequency (MHz)				1852.5	1880	1912.5	
5	QPSK	1	0	24.26	24.17	24.08	25.7
5	QPSK	1	12	24.23	24.21	24.04	
5	QPSK	1	24	24.29	24.19	23.74	
5	QPSK	12	0	23.23	23.22	23.18	24.7
5	QPSK	12	7	23.32	23.29	23.20	
5	QPSK	12	13	23.34	23.34	23.00	
5	QPSK	25	0	23.30	23.30	23.10	24.7
5	16QAM	1	0	23.57	23.48	23.36	
5	16QAM	1	12	23.60	23.55	23.41	
5	16QAM	1	24	23.60	23.55	23.14	23.7
5	16QAM	12	0	22.27	22.26	22.14	
5	16QAM	12	7	22.37	22.30	22.21	
5	16QAM	12	13	22.42	22.39	22.17	23.7
5	16QAM	25	0	22.36	22.28	22.13	
5	64QAM	1	0	22.42	22.44	21.76	
5	64QAM	1	12	22.41	22.39	21.78	23.7
5	64QAM	1	24	22.53	22.43	21.73	
5	64QAM	12	0	21.37	21.38	20.72	
5	64QAM	12	7	21.42	21.35	20.55	22.7
5	64QAM	12	13	21.42	21.34	20.38	
5	64QAM	25	0	21.29	21.32	20.45	
Channel				26055	26340	26675	Tune-up limit (dBm)
Frequency (MHz)				1851.5	1880	1913.5	
3	QPSK	1	0	24.15	24.03	24.06	25.7
3	QPSK	1	8	24.29	24.32	23.94	
3	QPSK	1	14	24.31	24.28	23.76	
3	QPSK	8	0	23.29	23.22	23.13	24.7
3	QPSK	8	4	23.31	23.33	23.06	
3	QPSK	8	7	23.31	23.37	22.84	
3	QPSK	15	0	23.28	23.32	22.90	24.7
3	16QAM	1	0	23.48	23.44	23.28	
3	16QAM	1	8	23.65	23.61	23.22	
3	16QAM	1	14	23.57	23.60	22.97	23.7
3	16QAM	8	0	22.29	22.31	22.20	
3	16QAM	8	4	22.41	22.31	22.13	
3	16QAM	8	7	22.34	22.42	22.10	23.7
3	16QAM	15	0	22.35	22.31	22.09	
3	64QAM	1	0	22.36	22.26	21.77	
3	64QAM	1	8	22.49	22.52	21.79	23.7
3	64QAM	1	14	22.57	22.51	21.75	
3	64QAM	8	0	21.29	21.29	21.66	
3	64QAM	8	4	21.41	21.39	20.42	22.7
3	64QAM	8	7	21.47	21.37	20.21	
3	64QAM	15	0	21.39	21.36	20.34	
Channel				26047	26340	26683	Tune-up limit (dBm)
Frequency (MHz)				1850.7	1880	1914.3	
1.4	QPSK	1	0	24.13	24.06	23.93	25.7
1.4	QPSK	1	3	24.16	24.35	23.79	
1.4	QPSK	1	5	24.34	24.22	23.73	
1.4	QPSK	3	0	24.22	24.20	23.75	24.7
1.4	QPSK	3	1	24.29	24.30	23.75	
1.4	QPSK	3	3	24.24	24.17	23.74	
1.4	QPSK	6	0	23.28	23.21	22.91	24.7
1.4	16QAM	1	0	23.55	23.46	23.10	
1.4	16QAM	1	3	23.58	23.49	23.18	
1.4	16QAM	1	5	23.52	23.46	22.88	24.7
1.4	16QAM	3	0	23.31	23.28	22.98	
1.4	16QAM	3	1	23.36	23.25	22.91	
1.4	16QAM	3	3	23.38	23.25	22.81	23.7
1.4	16QAM	6	0	22.28	22.41	22.00	
1.4	64QAM	1	0	22.36	22.44	21.74	
1.4	64QAM	1	3	22.51	22.58	21.78	23.7
1.4	64QAM	1	5	22.58	22.33	21.72	
1.4	64QAM	3	0	22.40	22.41	21.75	
1.4	64QAM	3	1	22.50	22.44	21.77	22.7
1.4	64QAM	3	3	22.38	22.43	21.70	
1.4	64QAM	6	0	21.23	21.35	20.78	



Band 26							
Ant 1							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				26765	26865	26965	
Frequency (MHz)				821.5	831.5	841.5	
15	QPSK	1	0	22.76	22.65	22.66	24.6
15	QPSK	1	37	22.68	22.65	22.61	
15	QPSK	1	74	22.63	22.63	22.80	
15	QPSK	36	0	22.80	22.75	22.75	24.1
15	QPSK	36	20	22.86	22.80	22.74	
15	QPSK	36	39	22.77	22.77	22.73	
15	QPSK	75	0	22.84	22.82	22.73	24.1
15	16QAM	1	0	23.29	22.97	23.03	
15	16QAM	1	37	22.96	22.97	22.98	
15	16QAM	1	74	22.94	22.95	22.83	23.6
15	16QAM	36	0	22.73	22.70	22.70	
15	16QAM	36	20	22.74	22.70	22.62	
15	16QAM	36	39	22.68	22.68	22.65	23.6
15	16QAM	75	0	22.75	22.72	22.68	
15	64QAM	1	0	22.82	22.71	22.71	
15	64QAM	1	37	22.78	22.78	22.78	23.6
15	64QAM	1	74	22.74	22.72	22.43	
15	64QAM	36	0	21.51	21.72	21.72	
15	64QAM	36	20	21.78	21.79	21.68	23.1
15	64QAM	36	39	21.74	21.72	21.72	
15	64QAM	75	0	21.75	21.72	21.67	
Channel				26740	26855	26950	Tune-up limit (dBm)
Frequency (MHz)				819	831.5	844	
10	QPSK	1	0	22.81	22.76	22.80	24.6
10	QPSK	1	25	22.68	22.70	22.70	
10	QPSK	1	49	22.65	22.68	22.82	
10	QPSK	25	0	22.89	22.80	22.81	24.1
10	QPSK	25	12	22.84	22.78	22.81	
10	QPSK	25	25	22.77	22.78	22.77	
10	QPSK	50	0	22.82	22.84	22.74	24.1
10	16QAM	1	0	23.17	23.08	23.11	
10	16QAM	1	25	23.10	23.06	23.07	
10	16QAM	1	49	23.05	23.01	22.96	23.6
10	16QAM	25	0	22.78	22.66	22.66	
10	16QAM	25	12	22.78	22.65	22.65	
10	16QAM	25	25	22.66	22.67	22.62	23.6
10	16QAM	50	0	22.75	22.71	22.66	
10	64QAM	1	0	22.97	22.84	22.90	
10	64QAM	1	25	22.74	22.92	22.92	23.6
10	64QAM	1	49	22.86	22.84	22.83	
10	64QAM	25	0	21.50	21.69	21.70	
10	64QAM	25	12	21.50	21.69	21.74	23.1
10	64QAM	25	25	21.70	21.72	21.48	
10	64QAM	50	0	21.66	21.75	21.69	
Channel				26715	26865	27015	Tune-up limit (dBm)
Frequency (MHz)				616.5	631.5	646.5	
5	QPSK	1	0	22.85	22.71	22.75	24.6
5	QPSK	1	12	22.78	22.78	22.76	
5	QPSK	1	24	22.70	22.74	22.82	
5	QPSK	12	0	22.92	22.80	22.84	24.1
5	QPSK	12	7	22.89	22.86	22.79	
5	QPSK	12	13	22.81	22.78	22.73	
5	QPSK	25	0	22.88	22.84	22.79	24.1
5	16QAM	1	0	23.21	23.01	23.05	
5	16QAM	1	12	23.14	23.04	23.00	
5	16QAM	1	24	23.06	23.07	22.93	23.6
5	16QAM	12	0	22.84	22.68	22.70	
5	16QAM	12	7	22.84	22.71	22.73	
5	16QAM	12	13	22.75	22.66	22.62	23.6
5	16QAM	25	0	22.80	22.75	22.68	
5	64QAM	1	0	22.77	22.84	22.75	
5	64QAM	1	12	22.59	22.85	22.11	23.6
5	64QAM	1	24	22.45	22.87	22.44	
5	64QAM	12	0	21.70	21.77	21.30	
5	64QAM	12	7	21.59	21.80	21.12	23.1
5	64QAM	12	13	21.43	21.72	21.28	
5	64QAM	25	0	21.49	21.70	21.23	
Channel				26705	26855	27025	Tune-up limit (dBm)
Frequency (MHz)				815.5	831.5	847.5	
3	QPSK	1	0	22.87	22.72	22.72	24.6
3	QPSK	1	8	22.84	22.79	22.71	
3	QPSK	1	14	22.72	22.76	22.64	
3	QPSK	8	0	22.92	22.83	22.76	24.1
3	QPSK	8	4	22.89	22.86	22.78	
3	QPSK	8	7	22.86	22.80	22.71	
3	QPSK	15	0	22.89	22.85	22.75	24.1
3	16QAM	1	0	23.22	23.00	23.03	
3	16QAM	1	8	23.20	23.09	23.05	
3	16QAM	1	14	23.07	23.05	22.96	23.6
3	16QAM	8	0	22.88	22.76	22.73	
3	16QAM	8	4	22.88	22.79	22.70	
3	16QAM	8	7	22.84	22.75	22.64	23.6
3	16QAM	15	0	22.83	22.72	22.70	
3	64QAM	1	0	22.80	22.83	22.28	
3	64QAM	1	8	22.83	22.92	22.34	23.6
3	64QAM	1	14	22.98	22.86	22.48	
3	64QAM	8	0	21.77	21.75	21.10	
3	64QAM	8	4	21.76	21.83	21.27	23.1
3	64QAM	8	7	21.64	21.75	21.48	
3	64QAM	15	0	21.68	21.78	21.33	
Channel				26697	26865	27033	Tune-up limit (dBm)
Frequency (MHz)				814.7	831.5	848.3	
1.4	QPSK	1	0	22.74	22.62	22.61	24.6
1.4	QPSK	1	3	22.62	22.71	22.62	
1.4	QPSK	1	5	22.74	22.65	22.62	
1.4	QPSK	3	0	22.80	22.66	22.61	24.1
1.4	QPSK	3	1	22.80	22.70	22.62	
1.4	QPSK	3	3	22.75	22.89	22.68	
1.4	QPSK	6	0	22.84	22.76	22.67	24.1
1.4	16QAM	1	0	23.12	22.90	22.91	
1.4	16QAM	1	3	23.17	23.04	22.95	
1.4	16QAM	1	5	23.02	22.93	22.80	24.1
1.4	16QAM	3	0	22.91	22.72	22.68	
1.4	16QAM	3	1	22.92	22.76	22.73	
1.4	16QAM	3	3	22.82	22.73	22.63	23.6
1.4	16QAM	6	0	22.82	22.70	22.62	
1.4	64QAM	1	0	22.93	22.77	22.51	
1.4	64QAM	1	3	22.86	22.85	22.68	23.6
1.4	64QAM	1	5	22.80	22.73	22.64	
1.4	64QAM	3	0	22.85	22.73	22.52	
1.4	64QAM	3	1	22.92	22.77	22.67	23.1
1.4	64QAM	3	3	22.79	22.74	22.66	
1.4	64QAM	6	0	21.78	21.66	21.58	



Band 30							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				27710			
Frequency (MHz)				2310			
10	QPSK	1	0	22.60			23.7
10	QPSK	1	25	22.56			
10	QPSK	1	49	22.57			
10	QPSK	25	0	21.40			
10	QPSK	25	12	21.64			22.7
10	QPSK	25	25	21.51			
10	QPSK	50	0	21.63			
10	16QAM	1	0	21.91			22.7
10	16QAM	1	25	21.92			
10	16QAM	1	49	21.84			
10	16QAM	25	0	20.46			
10	16QAM	25	12	20.53			21.7
10	16QAM	25	25	20.45			
10	16QAM	50	0	20.55			
10	64QAM	1	0	20.66			21.7
10	64QAM	1	25	20.70			
10	64QAM	1	49	20.62			
10	64QAM	25	0	19.46			
10	64QAM	25	12	19.81			20.7
10	64QAM	25	25	19.67			
10	64QAM	50	0	19.60			
Channel				27685	27710	27735	Tune-up limit (dBm)
Frequency (MHz)				2307.5	2310	2312.5	
5	QPSK	1	0	22.40	22.33	22.46	23.7
5	QPSK	1	12	22.50	22.59	22.53	
5	QPSK	1	24	22.58	22.42	22.56	
5	QPSK	12	0	21.52	21.63	21.49	
5	QPSK	12	7	21.56	21.57	21.60	22.7
5	QPSK	12	13	21.55	21.61	21.44	
5	QPSK	25	0	21.68	21.45	21.51	
5	16QAM	1	0	21.71	21.78	21.72	22.7
5	16QAM	1	12	21.80	21.73	21.86	
5	16QAM	1	24	22.01	21.70	21.78	
5	16QAM	12	0	20.58	20.56	20.55	21.7
5	16QAM	12	7	20.71	20.64	20.67	
5	16QAM	12	13	20.59	20.54	20.63	
5	16QAM	25	0	20.66	20.60	20.51	
5	64QAM	1	0	20.71	20.69	20.64	21.7
5	64QAM	1	12	20.68	20.73	20.64	
5	64QAM	1	24	20.85	20.83	20.70	
5	64QAM	12	0	19.64	19.66	19.68	20.7
5	64QAM	12	7	19.70	19.57	19.60	
5	64QAM	12	13	19.73	19.66	19.69	
5	64QAM	25	0	19.73	19.66	19.62	



Band 66							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				132072	132322	132572	
Frequency (MHz)				1720	1745	1770	
20	QPSK	1	0	24.30	24.23	24.29	25.7
20	QPSK	1	48	24.09	24.16	24.12	
20	QPSK	1	99	24.24	24.20	24.16	
20	QPSK	50	0	23.14	23.07	23.15	24.7
20	QPSK	50	24	23.18	22.94	23.14	
20	QPSK	50	50	23.21	23.00	23.03	
20	QPSK	100	0	23.14	23.16	23.11	24.7
20	16QAM	1	0	23.42	23.47	23.37	
20	16QAM	1	49	23.34	23.24	23.20	
20	16QAM	1	99	23.33	23.34	23.10	23.7
20	16QAM	50	0	22.13	21.98	22.08	
20	16QAM	50	24	22.19	21.98	22.18	
20	16QAM	50	50	22.17	22.04	22.12	23.7
20	16QAM	100	0	22.18	22.06	22.23	
20	64QAM	1	0	22.36	22.29	22.16	
20	64QAM	1	49	22.09	22.08	22.17	23.7
20	64QAM	1	99	22.31	22.25	22.10	
20	64QAM	50	0	21.13	21.16	21.03	
20	64QAM	50	24	21.28	21.17	21.23	22.7
20	64QAM	50	50	21.14	21.10	21.14	
20	64QAM	100	0	21.14	21.10	21.14	
Channel				132047	132322	132597	Tune-up limit (dBm)
Frequency (MHz)				1717.5	1745	1772.5	
15	QPSK	1	0	24.18	23.94	24.08	25.7
15	QPSK	1	37	23.89	23.88	23.85	
15	QPSK	1	74	24.10	24.10	23.90	
15	QPSK	36	0	23.05	23.14	23.03	24.7
15	QPSK	36	20	23.09	23.15	23.05	
15	QPSK	36	39	23.19	23.18	23.01	
15	QPSK	75	0	23.06	23.10	23.01	24.7
15	16QAM	1	0	23.38	23.35	23.32	
15	16QAM	1	37	23.28	23.30	23.22	
15	16QAM	1	74	23.40	23.34	23.17	23.7
15	16QAM	36	0	22.03	22.04	21.98	
15	16QAM	36	20	22.28	22.03	22.08	
15	16QAM	36	39	22.18	22.01	22.20	23.7
15	16QAM	75	0	22.08	22.23	21.94	
15	64QAM	1	0	22.32	22.16	22.18	
15	64QAM	1	37	22.13	22.17	22.07	23.7
15	64QAM	1	74	22.25	22.20	22.21	
15	64QAM	36	0	21.01	21.05	21.11	
15	64QAM	36	20	21.06	21.19	21.05	22.7
15	64QAM	36	39	21.16	21.05	21.09	
15	64QAM	75	0	21.19	21.16	21.06	
Channel				132022	132322	132622	Tune-up limit (dBm)
Frequency (MHz)				1715	1745	1775	
10	QPSK	1	0	24.11	24.02	24.01	25.7
10	QPSK	1	25	24.01	23.94	24.10	
10	QPSK	1	49	24.07	23.97	24.06	
10	QPSK	25	0	23.22	23.02	23.12	24.7
10	QPSK	25	12	23.19	23.15	23.12	
10	QPSK	25	25	23.24	23.22	23.21	
10	QPSK	50	0	23.25	23.23	23.16	24.7
10	16QAM	1	0	23.42	23.36	23.38	
10	16QAM	1	25	23.46	23.36	23.37	
10	16QAM	1	49	23.38	23.45	23.49	23.7
10	16QAM	25	0	22.24	22.00	22.16	
10	16QAM	25	12	22.31	22.25	22.08	
10	16QAM	25	25	22.14	22.10	22.08	23.7
10	16QAM	50	0	22.23	22.25	22.09	
10	64QAM	1	0	22.28	22.20	22.25	
10	64QAM	1	25	22.32	22.28	22.40	23.7
10	64QAM	1	49	22.40	22.41	22.24	
10	64QAM	25	0	21.15	21.09	21.10	
10	64QAM	25	12	21.29	21.12	21.10	22.7
10	64QAM	25	25	21.24	21.22	21.21	
10	64QAM	50	0	21.19	21.25	21.18	
Channel				131997	132322	132647	Tune-up limit (dBm)
Frequency (MHz)				1712.5	1745	1777.5	
5	QPSK	1	0	24.08	24.07	24.01	25.7
5	QPSK	1	12	24.22	24.06	24.12	
5	QPSK	1	24	24.15	24.17	24.01	
5	QPSK	12	0	23.15	23.10	23.13	24.7
5	QPSK	12	7	23.11	23.27	23.24	
5	QPSK	12	13	23.29	23.19	23.27	
5	QPSK	25	0	23.13	23.20	23.14	24.7
5	16QAM	1	0	23.51	23.45	23.47	
5	16QAM	1	12	23.59	23.49	23.41	
5	16QAM	1	24	23.47	23.46	23.30	23.7
5	16QAM	12	0	22.30	22.11	22.26	
5	16QAM	12	7	22.29	22.28	22.26	
5	16QAM	12	13	22.18	22.28	22.25	23.7
5	16QAM	25	0	22.21	22.09	22.27	
5	64QAM	1	0	22.40	22.30	22.30	
5	64QAM	1	12	22.47	22.38	22.33	23.7
5	64QAM	1	24	22.42	22.35	22.32	
5	64QAM	12	0	21.39	21.26	21.33	
5	64QAM	12	7	21.19	21.19	21.33	22.7
5	64QAM	12	13	21.24	21.27	21.30	
5	64QAM	25	0	21.16	21.25	21.08	
Channel				131987	132322	132657	Tune-up limit (dBm)
Frequency (MHz)				1711.5	1745	1776.5	
3	QPSK	1	0	24.06	24.06	24.00	25.7
3	QPSK	1	8	24.25	24.06	24.07	
3	QPSK	1	14	24.05	24.10	24.03	
3	QPSK	8	0	23.18	23.09	23.20	24.7
3	QPSK	8	4	23.21	23.21	23.13	
3	QPSK	8	7	23.18	23.10	23.05	
3	QPSK	15	0	23.12	23.22	23.17	24.7
3	16QAM	1	0	23.51	23.27	23.27	
3	16QAM	1	8	23.50	23.58	23.48	
3	16QAM	1	14	23.41	23.39	23.44	23.7
3	16QAM	8	0	22.20	22.29	22.27	
3	16QAM	8	4	22.39	22.27	22.24	
3	16QAM	8	7	22.24	22.12	22.11	23.7
3	16QAM	15	0	22.25	22.16	22.27	
3	64QAM	1	0	22.32	22.37	22.38	
3	64QAM	1	8	22.51	22.33	22.42	23.7
3	64QAM	1	14	22.47	22.29	22.31	
3	64QAM	8	0	21.36	21.20	21.26	
3	64QAM	8	4	21.25	21.16	21.20	22.7
3	64QAM	8	7	21.20	21.32	21.16	
3	64QAM	15	0	21.18	21.17	21.27	
Channel				131979	132322	132655	Tune-up limit (dBm)
Frequency (MHz)				1710.7	1745	1779.3	
1.4	QPSK	1	0	24.01	24.08	23.94	25.7
1.4	QPSK	1	3	24.15	23.99	24.13	
1.4	QPSK	1	5	23.95	23.98	23.92	
1.4	QPSK	3	0	24.16	23.99	24.11	24.7
1.4	QPSK	3	1	24.08	24.06	24.13	
1.4	QPSK	3	3	23.98	24.03	24.03	
1.4	QPSK	6	0	23.18	23.00	23.09	24.7
1.4	16QAM	1	0	23.42	23.24	23.22	
1.4	16QAM	1	3	23.42	23.46	23.43	
1.4	16QAM	1	5	23.33	23.35	23.22	24.7
1.4	16QAM	3	0	23.19	23.17	23.10	
1.4	16QAM	3	1	23.20	23.06	23.07	
1.4	16QAM	3	3	23.11	23.09	23.01	23.7
1.4	16QAM	6	0	22.24	22.15	22.08	
1.4	64QAM	1	0	22.39	22.20	22.35	
1.4	64QAM	1	3	22.41	22.31	22.32	23.7
1.4	64QAM	1	5	22.39	22.29	22.32	
1.4	64QAM	3	0	22.19	22.20	22.22	
1.4	64QAM	3	1	22.40	22.38	22.37	23.7
1.4	64QAM	3	3	22.36	22.12	22.21	
1.4	64QAM	6	0	21.27	21.06	21.17	



Band 71							
Ant 1							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch./	Power Middle Ch./	Power High Ch./	Tune-up limit (dBm)
Channel				133222	133322	133372	
Frequency (MHz)				673	683	688	
20	QPSK	1	0	24.35	24.17	24.20	25.7
20	QPSK	1	49	24.15	24.16	24.15	
20	QPSK	1	99	24.12	24.09	24.08	
20	QPSK	50	0	23.28	23.24	23.26	24.7
20	QPSK	50	24	23.33	23.28	23.17	
20	QPSK	50	50	23.32	23.27	23.27	
20	QPSK	100	0	23.33	23.32	23.28	24.7
20	16QAM	1	0	23.68	23.52	23.53	
20	16QAM	1	49	23.58	23.54	23.49	
20	16QAM	1	99	23.49	23.49	23.45	23.7
20	16QAM	50	0	22.34	22.30	22.30	
20	16QAM	50	24	22.34	22.27	22.24	
20	16QAM	50	50	22.30	22.25	22.28	23.7
20	16QAM	100	0	22.32	22.30	22.26	
20	64QAM	1	0	22.18	22.70	23.01	
20	64QAM	1	49	22.76	22.59	22.38	23.7
20	64QAM	1	99	23.01	22.51	22.88	
20	64QAM	50	0	20.82	21.86	21.50	
20	64QAM	50	24	21.49	21.70	21.76	22.7
20	64QAM	50	50	21.96	21.50	21.85	
20	64QAM	100	0	21.50	21.89	21.87	
Channel				133197	133287	133387	Tune-up limit (dBm)
Frequency (MHz)				670.5	680.5	690.5	
15	QPSK	1	0	24.33	24.17	24.13	25.7
15	QPSK	1	37	24.01	24.14	24.11	
15	QPSK	1	74	24.16	24.11	24.11	
15	QPSK	36	0	23.24	23.26	23.27	24.7
15	QPSK	36	20	23.49	23.26	23.37	
15	QPSK	36	39	23.31	23.33	23.26	
15	QPSK	75	0	23.34	23.30	23.20	24.7
15	16QAM	1	0	23.56	23.53	23.49	
15	16QAM	1	37	23.28	23.50	23.41	
15	16QAM	1	74	23.38	23.43	23.38	23.7
15	16QAM	36	0	22.15	22.31	22.26	
15	16QAM	36	20	22.31	22.25	22.34	
15	16QAM	36	39	22.38	22.33	22.28	23.7
15	16QAM	75	0	22.37	22.19	22.18	
15	64QAM	1	0	22.13	22.80	22.90	
15	64QAM	1	37	21.73	23.04	23.04	23.7
15	64QAM	1	74	22.53	22.63	22.97	
15	64QAM	36	0	20.81	21.92	21.51	
15	64QAM	36	20	20.88	21.74	21.92	22.7
15	64QAM	36	39	21.49	21.44	21.86	
15	64QAM	75	0	21.38	21.79	21.77	
Channel				133172	133272	133422	Tune-up limit (dBm)
Frequency (MHz)				668	678	683	
10	QPSK	1	0	24.30	24.14	24.17	25.7
10	QPSK	1	25	24.11	24.10	24.12	
10	QPSK	1	49	24.13	24.14	24.01	
10	QPSK	25	0	23.36	23.26	23.22	24.7
10	QPSK	25	12	23.13	23.25	23.22	
10	QPSK	25	25	23.19	23.31	23.23	
10	QPSK	50	0	23.29	23.18	23.16	24.7
10	16QAM	1	0	23.62	23.47	23.53	
10	16QAM	1	25	23.47	23.51	23.45	
10	16QAM	1	49	23.46	23.44	23.39	23.7
10	16QAM	25	0	22.05	22.17	22.16	
10	16QAM	25	12	22.07	22.24	22.20	
10	16QAM	25	25	22.00	22.24	22.19	23.7
10	16QAM	50	0	22.28	22.17	22.22	
10	64QAM	1	0	21.83	22.96	22.99	
10	64QAM	1	25	21.88	23.08	23.07	23.7
10	64QAM	1	49	22.12	22.23	22.55	
10	64QAM	25	0	20.70	21.87	21.82	
10	64QAM	25	12	20.70	21.74	21.85	22.7
10	64QAM	25	25	20.68	21.37	21.72	
10	64QAM	50	0	20.79	21.60	21.80	
Channel				133147	133247	133447	Tune-up limit (dBm)
Frequency (MHz)				665.5	675.5	695.5	
5	QPSK	1	0	24.03	24.23	24.23	25.7
5	QPSK	1	12	24.13	24.24	24.12	
5	QPSK	1	24	24.11	24.10	24.10	
5	QPSK	12	0	23.15	23.26	23.19	24.7
5	QPSK	12	7	23.15	23.32	23.26	
5	QPSK	12	13	23.13	23.22	23.16	
5	QPSK	25	0	23.15	23.26	23.20	24.7
5	16QAM	1	0	23.29	23.53	23.62	
5	16QAM	1	12	23.38	23.54	23.50	
5	16QAM	1	24	23.40	23.49	23.42	23.7
5	16QAM	12	0	22.04	22.36	22.29	
5	16QAM	12	7	22.12	22.30	22.29	
5	16QAM	12	13	22.25	22.25	22.21	23.7
5	16QAM	25	0	22.06	22.21	22.22	
5	64QAM	1	0	21.70	22.98	23.00	
5	64QAM	1	12	21.82	22.93	22.81	23.7
5	64QAM	1	24	22.03	22.71	22.37	
5	64QAM	12	0	20.74	21.93	21.85	
5	64QAM	12	7	20.91	21.89	21.91	22.7
5	64QAM	12	13	20.87	21.70	21.89	
5	64QAM	25	0	20.69	21.73	21.61	



Band 2							
Ant 2							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch.	Power Mid Ch.	Power High Ch.	Tune-up limit (dbm)
Channel				18700	18900	19100	
Frequency (MHz)				1860	1880	1900	
20	QPSK	1	0	23.00	23.12	23.16	24.6
20	QPSK	1	49	23.01	23.13	23.07	
20	QPSK	1	99	23.03	23.15	23.10	
20	QPSK	50	0	23.07	23.17	23.24	24.6
20	QPSK	50	24	23.19	23.22	23.26	
20	QPSK	50	50	23.23	23.23	23.29	
20	QPSK	100	0	23.21	23.22	23.27	24.6
20	16QAM	1	0	23.33	23.45	23.51	
20	16QAM	1	49	23.38	23.50	23.47	
20	16QAM	1	99	23.33	23.49	23.43	23.7
20	16QAM	50	0	22.20	22.30	22.35	
20	16QAM	50	24	22.31	22.35	22.38	
20	16QAM	50	50	22.32	22.38	22.38	23.7
20	16QAM	100	0	22.30	22.35	22.37	
20	64QAM	1	0	22.32	22.42	22.48	
20	64QAM	1	49	22.30	22.47	22.19	22.7
20	64QAM	1	99	22.37	22.42	22.37	
20	64QAM	50	0	21.21	21.32	21.38	
20	64QAM	50	24	21.33	21.37	21.38	Tune-up limit (dbm)
20	64QAM	50	50	21.35	21.38	21.40	
20	64QAM	100	0	21.31	21.33	21.38	
Channel				1867.5	18900	19125	
Frequency (MHz)				1857.5	1880	1902.5	
15	QPSK	1	0	22.92	23.11	23.09	24.6
15	QPSK	1	37	22.95	23.10	23.00	
15	QPSK	1	74	23.00	23.14	23.04	
15	QPSK	36	0	22.97	23.16	23.16	24.6
15	QPSK	36	20	23.15	23.20	23.24	
15	QPSK	36	39	23.22	23.19	23.25	
15	QPSK	75	0	23.17	23.13	23.19	24.6
15	16QAM	1	0	23.28	23.35	23.47	
15	16QAM	1	37	23.34	23.49	23.37	
15	16QAM	1	74	23.33	23.45	23.35	23.7
15	16QAM	36	0	22.13	22.24	22.29	
15	16QAM	36	20	22.26	22.28	22.37	
15	16QAM	36	39	22.25	22.35	22.33	23.7
15	16QAM	75	0	22.26	22.26	22.35	
15	64QAM	1	0	22.31	22.41	22.48	
15	64QAM	1	37	22.28	22.38	22.11	22.7
15	64QAM	1	74	22.33	22.40	22.28	
15	64QAM	36	0	21.16	21.27	21.31	
15	64QAM	36	20	21.29	21.33	21.29	Tune-up limit (dbm)
15	64QAM	36	39	21.33	21.36	21.30	
15	64QAM	75	0	21.31	21.27	21.35	
Channel				18650	18900	19150	
Frequency (MHz)				1855	1880	1905	
10	QPSK	1	0	22.99	23.03	23.06	24.6
10	QPSK	1	25	22.99	23.11	23.03	
10	QPSK	1	49	23.02	23.08	23.09	
10	QPSK	25	0	22.99	23.12	23.15	24.6
10	QPSK	25	12	23.18	23.17	23.22	
10	QPSK	25	25	23.18	23.15	23.20	
10	QPSK	50	0	23.15	23.15	23.22	24.6
10	16QAM	1	0	23.23	23.43	23.42	
10	16QAM	1	25	23.29	23.49	23.47	
10	16QAM	1	49	23.33	23.47	23.42	23.7
10	16QAM	25	0	22.15	22.24	22.27	
10	16QAM	25	12	22.28	22.32	22.36	
10	16QAM	25	25	22.25	22.35	22.36	23.7
10	16QAM	50	0	22.29	22.26	22.32	
10	64QAM	1	0	22.25	22.35	22.39	
10	64QAM	1	25	22.22	22.39	22.18	22.7
10	64QAM	1	49	22.28	22.42	22.31	
10	64QAM	25	0	21.20	21.26	21.29	
10	64QAM	25	12	21.25	21.27	21.29	Tune-up limit (dbm)
10	64QAM	25	25	21.27	21.38	21.33	
10	64QAM	50	0	21.22	21.24	21.38	
Channel				1862.5	18900	19175	
Frequency (MHz)				1852.5	1880	1907.5	
5	QPSK	1	0	23.00	23.10	23.07	24.6
5	QPSK	1	12	22.93	23.06	23.03	
5	QPSK	1	24	22.94	23.07	23.01	
5	QPSK	12	0	23.07	23.11	23.14	24.6
5	QPSK	12	7	23.19	23.15	23.22	
5	QPSK	12	13	23.17	23.17	23.22	
5	QPSK	25	0	23.16	23.21	23.18	24.6
5	16QAM	1	0	23.32	23.37	23.44	
5	16QAM	1	12	23.29	23.50	23.43	
5	16QAM	1	24	23.27	23.41	23.39	23.7
5	16QAM	12	0	22.15	22.26	22.30	
5	16QAM	12	7	22.24	22.30	22.31	
5	16QAM	12	13	22.27	22.34	22.30	23.7
5	16QAM	25	0	22.29	22.34	22.30	
5	64QAM	1	0	22.25	22.41	22.46	
5	64QAM	1	12	22.25	22.40	22.13	22.7
5	64QAM	1	24	22.37	22.36	22.27	
5	64QAM	12	0	21.14	21.26	21.30	
5	64QAM	12	7	21.30	21.33	21.34	Tune-up limit (dbm)
5	64QAM	12	13	21.35	21.32	21.32	
5	64QAM	25	0	21.30	21.26	21.31	
Channel				18615	18900	19185	
Frequency (MHz)				1851.5	1880	1906.5	
3	QPSK	1	0	22.99	23.04	23.07	24.6
3	QPSK	1	8	22.98	23.06	22.99	
3	QPSK	1	14	23.02	23.11	23.09	
3	QPSK	8	0	22.98	23.10	23.22	24.6
3	QPSK	8	4	23.19	23.13	23.26	
3	QPSK	8	7	23.15	23.21	23.22	
3	QPSK	15	0	23.14	23.19	23.21	24.6
3	16QAM	1	0	23.26	23.39	23.44	
3	16QAM	1	8	23.32	23.44	23.44	
3	16QAM	1	14	23.30	23.40	23.37	23.7
3	16QAM	8	0	22.15	22.26	22.25	
3	16QAM	8	4	22.28	22.25	22.29	
3	16QAM	8	7	22.28	22.32	22.38	23.7
3	16QAM	15	0	22.22	22.26	22.35	
3	64QAM	1	0	22.23	22.32	22.48	
3	64QAM	1	8	22.21	22.37	22.10	22.7
3	64QAM	1	14	22.33	22.35	22.28	
3	64QAM	8	0	21.13	21.27	21.29	
3	64QAM	8	4	21.27	21.33	21.37	Tune-up limit (dbm)
3	64QAM	8	7	21.26	21.34	21.40	
3	64QAM	15	0	21.27	21.24	21.28	
Channel				18607	18900	19193	
Frequency (MHz)				1850.7	1880	1909.3	
1.4	QPSK	1	0	22.88	23.08	22.98	24.6
1.4	QPSK	1	3	22.90	23.14	23.06	
1.4	QPSK	1	5	22.85	23.09	23.00	
1.4	QPSK	3	0	22.92	23.14	23.04	24.6
1.4	QPSK	3	1	22.95	23.17	23.11	
1.4	QPSK	3	3	22.91	23.12	23.06	
1.4	QPSK	6	0	22.97	23.19	23.12	24.6
1.4	16QAM	1	0	23.18	23.40	23.33	
1.4	16QAM	1	3	23.30	23.49	23.40	
1.4	16QAM	1	5	23.25	23.42	23.33	24.6
1.4	16QAM	3	0	22.99	23.21	23.12	
1.4	16QAM	3	1	23.06	23.26	23.15	
1.4	16QAM	3	3	23.00	23.20	23.11	23.7
1.4	16QAM	6	0	22.14	22.39	22.30	
1.4	64QAM	1	0	22.28	22.47	22.36	
1.4	64QAM	1	3	22.30	22.50	22.44	23.7
1.4	64QAM	1	5	22.28	22.45	22.36	
1.4	64QAM	3	0	22.22	22.40	22.35	
1.4	64QAM	3	1	22.29	22.46	22.39	22.7
1.4	64QAM	3	3	22.21	22.41	22.34	
1.4	64QAM	6	0	21.09	21.34	21.26	



Band 4							
Ant 2							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				20050	20175	20300	
Frequency (MHz)				1720	1732.5	1745	
20	QPSK	1	0	23.83	24.08	23.86	25.7
20	QPSK	1	49	23.72	23.70	23.71	
20	QPSK	1	99	23.73	23.71	23.72	
20	QPSK	50	0	23.37	23.36	23.27	24.7
20	QPSK	50	24	23.43	23.38	23.26	
20	QPSK	50	50	23.35	23.27	23.20	
20	QPSK	100	0	23.36	23.43	23.15	24.7
20	16QAM	1	0	23.65	23.66	23.60	
20	16QAM	1	49	23.52	23.46	23.28	
20	16QAM	1	99	23.59	23.44	23.32	23.7
20	16QAM	50	0	22.37	22.38	22.28	
20	16QAM	50	24	22.40	22.39	22.28	
20	16QAM	50	50	22.35	22.31	22.20	23.7
20	16QAM	100	0	22.37	22.41	22.17	
20	64QAM	1	0	22.48	22.50	22.44	
20	64QAM	1	49	22.37	22.38	22.27	23.7
20	64QAM	1	99	22.50	22.37	22.31	
20	64QAM	50	0	21.39	21.40	21.30	
20	64QAM	50	24	21.41	21.41	21.29	22.7
20	64QAM	50	50	21.37	21.30	21.22	
20	64QAM	100	0	21.42	21.38	21.22	
Channel				20225	20175	20325	Tune-up limit (dBm)
Frequency (MHz)				1717.5	1732.5	1747.5	
15	QPSK	1	0	23.72	23.74	23.70	25.7
15	QPSK	1	37	23.74	23.72	23.70	
15	QPSK	1	74	23.72	23.70	23.71	
15	QPSK	36	0	23.39	23.40	23.23	24.7
15	QPSK	36	20	23.39	23.35	23.16	
15	QPSK	36	39	23.35	23.28	23.16	
15	QPSK	75	0	23.38	23.40	23.18	24.7
15	16QAM	1	0	23.64	23.65	23.55	
15	16QAM	1	37	23.50	23.47	23.39	
15	16QAM	1	74	23.55	23.45	23.33	23.7
15	16QAM	36	0	22.43	22.36	22.24	
15	16QAM	36	20	22.37	22.34	22.16	
15	16QAM	36	39	22.34	22.28	22.20	23.7
15	16QAM	75	0	22.38	22.41	22.18	
15	64QAM	1	0	22.52	22.49	22.43	
15	64QAM	1	37	22.42	22.36	22.31	23.7
15	64QAM	1	74	22.43	22.38	22.25	
15	64QAM	36	0	21.44	21.44	21.27	
15	64QAM	36	20	21.38	21.43	21.19	22.7
15	64QAM	36	39	21.38	21.32	21.21	
15	64QAM	75	0	21.40	21.38	21.19	
Channel				20000	20175	20350	Tune-up limit (dBm)
Frequency (MHz)				1715	1732.5	1750	
10	QPSK	1	0	23.74	23.74	23.70	25.7
10	QPSK	1	25	23.71	23.71	23.70	
10	QPSK	1	49	23.73	23.74	23.70	
10	QPSK	25	0	23.34	23.29	23.10	24.7
10	QPSK	25	12	23.38	23.39	23.16	
10	QPSK	25	25	23.38	23.38	23.21	
10	QPSK	50	0	23.40	23.36	23.17	24.7
10	16QAM	1	0	23.65	23.61	23.49	
10	16QAM	1	25	23.61	23.59	23.44	
10	16QAM	1	49	23.65	23.60	23.47	23.7
10	16QAM	25	0	22.35	22.25	22.12	
10	16QAM	25	12	22.40	22.40	22.17	
10	16QAM	25	25	22.38	22.31	22.22	23.7
10	16QAM	50	0	22.38	22.37	22.16	
10	64QAM	1	0	22.52	22.49	22.35	
10	64QAM	1	25	22.51	22.52	22.38	23.7
10	64QAM	1	49	22.57	22.50	22.35	
10	64QAM	25	0	21.36	21.32	21.16	
10	64QAM	25	12	21.43	21.45	21.19	22.7
10	64QAM	25	25	21.42	21.39	21.26	
10	64QAM	50	0	21.43	21.42	21.22	
Channel				19975	20175	20375	Tune-up limit (dBm)
Frequency (MHz)				1712.5	1732.5	1752.5	
5	QPSK	1	0	23.74	23.71	23.70	25.7
5	QPSK	1	12	23.72	23.70	23.70	
5	QPSK	1	24	23.70	23.74	23.72	
5	QPSK	12	0	23.37	23.30	23.20	24.7
5	QPSK	12	7	23.39	23.37	23.21	
5	QPSK	12	13	23.37	23.36	23.21	
5	QPSK	25	0	23.35	23.37	23.22	24.7
5	16QAM	1	0	23.61	23.53	23.44	
5	16QAM	1	12	23.63	23.58	23.45	
5	16QAM	1	24	23.65	23.60	23.45	23.7
5	16QAM	12	0	22.38	22.29	22.21	
5	16QAM	12	7	22.45	22.38	22.23	
5	16QAM	12	13	22.41	22.38	22.20	23.7
5	16QAM	25	0	22.40	22.37	22.22	
5	64QAM	1	0	22.53	22.49	22.35	
5	64QAM	1	12	22.55	22.50	22.34	23.7
5	64QAM	1	24	22.60	22.54	22.36	
5	64QAM	12	0	21.45	21.35	21.27	
5	64QAM	12	7	21.45	21.44	21.30	22.7
5	64QAM	12	13	21.47	21.39	21.27	
5	64QAM	25	0	21.39	21.39	21.21	
Channel				19965	20175	20385	Tune-up limit (dBm)
Frequency (MHz)				1711.5	1732.5	1753.5	
3	QPSK	1	0	23.70	23.71	23.72	25.7
3	QPSK	1	8	23.70	23.70	23.70	
3	QPSK	1	14	23.70	23.71	23.72	
3	QPSK	8	0	23.28	23.24	23.19	24.7
3	QPSK	8	4	23.29	23.36	23.20	
3	QPSK	8	7	23.33	23.28	23.13	
3	QPSK	15	0	23.31	23.35	23.13	24.7
3	16QAM	1	0	23.59	23.46	23.43	
3	16QAM	1	8	23.53	23.58	23.44	
3	16QAM	1	14	23.63	23.60	23.39	23.7
3	16QAM	8	0	22.30	22.27	22.14	
3	16QAM	8	4	22.35	22.35	22.20	
3	16QAM	8	7	22.31	22.31	22.20	23.7
3	16QAM	15	0	22.37	22.32	22.15	
3	64QAM	1	0	22.50	22.41	22.28	
3	64QAM	1	8	22.49	22.48	22.27	23.7
3	64QAM	1	14	22.54	22.46	22.31	
3	64QAM	8	0	21.36	21.27	21.17	
3	64QAM	8	4	21.43	21.38	21.21	22.7
3	64QAM	8	7	21.38	21.36	21.25	
3	64QAM	15	0	21.39	21.35	21.18	
Channel				19957	20175	20393	Tune-up limit (dBm)
Frequency (MHz)				1710.7	1732.5	1754.3	
1.4	QPSK	1	0	23.72	23.70	23.70	25.7
1.4	QPSK	1	3	23.73	23.71	23.71	
1.4	QPSK	1	5	23.72	23.71	23.70	
1.4	QPSK	3	0	23.73	23.70	23.70	24.7
1.4	QPSK	3	1	23.75	23.71	23.72	
1.4	QPSK	3	3	23.74	23.74	23.71	
1.4	QPSK	6	0	23.24	23.17	23.01	24.7
1.4	16QAM	1	0	23.46	23.46	23.27	
1.4	16QAM	1	3	23.53	23.54	23.34	
1.4	16QAM	1	5	23.47	23.45	23.28	24.7
1.4	16QAM	3	0	23.25	23.27	23.07	
1.4	16QAM	3	1	23.31	23.26	23.12	
1.4	16QAM	3	3	23.24	23.24	23.08	23.7
1.4	16QAM	6	0	22.26	22.28	22.12	
1.4	64QAM	1	0	22.38	22.36	22.21	
1.4	64QAM	1	3	22.46	22.41	22.27	23.7
1.4	64QAM	1	5	22.39	22.36	22.21	
1.4	64QAM	3	0	22.39	22.32	22.16	
1.4	64QAM	3	1	22.42	22.39	22.26	23.7
1.4	64QAM	3	3	22.37	22.39	22.20	
1.4	64QAM	6	0	21.22	21.22	21.03	



Band 5							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				20450	20525	20600	
Frequency (MHz)				829	836.5	844	
10	QPSK	1	0	24.43	24.42	24.42	25.7
10	QPSK	1	25	24.34	24.44	24.43	
10	QPSK	1	49	24.44	24.54	24.29	
10	QPSK	25	0	23.47	23.49	23.49	24.7
10	QPSK	25	12	23.52	23.56	23.57	
10	QPSK	25	25	23.49	23.58	23.47	
10	QPSK	50	0	23.54	23.49	23.60	24.7
10	16QAM	1	0	23.81	23.83	23.86	
10	16QAM	1	25	23.70	23.84	23.83	
10	16QAM	1	49	23.81	23.92	23.71	23.7
10	16QAM	25	0	22.45	22.59	22.54	
10	16QAM	25	12	22.53	22.52	22.54	
10	16QAM	25	25	22.56	22.55	22.57	23.7
10	16QAM	50	0	22.51	22.50	22.49	
10	64QAM	1	0	22.59	22.66	22.64	
10	64QAM	1	25	22.70	22.74	22.76	23.7
10	64QAM	1	49	22.67	22.37	21.72	
10	64QAM	25	0	21.54	21.61	21.55	
10	64QAM	25	12	21.62	21.62	21.60	22.7
10	64QAM	25	25	21.53	21.61	20.86	
10	64QAM	50	0	21.53	21.59	21.28	
Channel				20425	20525	20625	Tune-up limit (dBm)
Frequency (MHz)				826.5	836.5	846.5	
5	QPSK	1	0	24.47	24.51	24.50	25.7
5	QPSK	1	12	24.47	24.45	24.31	
5	QPSK	1	24	24.41	24.52	24.20	
5	QPSK	12	0	23.55	23.64	23.59	24.7
5	QPSK	12	7	23.52	23.57	23.34	
5	QPSK	12	13	23.54	23.55	23.16	
5	QPSK	25	0	23.47	23.56	23.52	24.7
5	16QAM	1	0	23.83	23.83	23.79	
5	16QAM	1	12	23.77	23.83	23.57	
5	16QAM	1	24	23.68	23.85	23.46	23.7
5	16QAM	12	0	22.66	22.51	22.52	
5	16QAM	12	7	22.53	22.60	22.45	
5	16QAM	12	13	22.48	22.61	22.27	23.7
5	16QAM	25	0	22.56	22.52	22.56	
5	64QAM	1	0	22.75	22.73	22.50	
5	64QAM	1	12	22.64	22.69	21.78	23.7
5	64QAM	1	24	22.75	22.55	21.74	
5	64QAM	12	0	21.65	21.66	21.30	
5	64QAM	12	7	21.54	21.63	20.70	22.7
5	64QAM	12	13	21.51	21.61	20.71	
5	64QAM	25	0	21.58	21.61	20.70	
Channel				20415	20525	20635	Tune-up limit (dBm)
Frequency (MHz)				825.5	836.5	847.5	
3	QPSK	1	0	24.47	24.41	24.18	25.7
3	QPSK	1	8	24.50	24.48	24.04	
3	QPSK	1	14	24.40	24.49	24.13	
3	QPSK	8	0	23.54	23.58	23.04	24.7
3	QPSK	8	4	23.49	23.62	23.07	
3	QPSK	8	7	23.50	23.55	23.20	
3	QPSK	15	0	23.57	23.53	23.08	24.7
3	16QAM	1	0	23.83	23.81	23.53	
3	16QAM	1	8	23.83	23.86	23.38	
3	16QAM	1	14	23.69	23.78	23.46	23.7
3	16QAM	8	0	22.64	22.58	22.31	
3	16QAM	8	4	22.60	22.65	22.23	
3	16QAM	8	7	22.57	22.60	22.28	23.7
3	16QAM	15	0	22.60	22.62	22.19	
3	64QAM	1	0	22.63	22.73	21.70	
3	64QAM	1	8	22.75	22.75	21.72	23.7
3	64QAM	1	14	22.63	22.50	21.71	
3	64QAM	8	0	21.65	21.56	20.70	
3	64QAM	8	4	21.58	21.67	20.70	22.7
3	64QAM	8	7	21.49	21.63	20.74	
3	64QAM	15	0	21.53	21.62	20.71	
Channel				20407	20525	20643	Tune-up limit (dBm)
Frequency (MHz)				824.7	836.5	848.3	
1.4	QPSK	1	0	24.39	24.32	23.95	25.7
1.4	QPSK	1	3	24.42	24.47	24.10	
1.4	QPSK	1	5	24.29	24.38	24.09	
1.4	QPSK	3	0	24.41	24.36	24.12	24.7
1.4	QPSK	3	1	24.47	24.40	24.12	
1.4	QPSK	3	3	24.41	24.44	24.37	
1.4	QPSK	6	0	23.42	23.57	23.18	24.7
1.4	16QAM	1	0	23.68	23.69	23.34	
1.4	16QAM	1	3	23.69	23.85	23.50	
1.4	16QAM	1	5	23.61	23.69	23.58	24.7
1.4	16QAM	3	0	23.51	23.51	23.12	
1.4	16QAM	3	1	23.49	23.54	23.29	
1.4	16QAM	3	3	23.42	23.48	23.42	23.7
1.4	16QAM	6	0	22.55	22.62	22.27	
1.4	64QAM	1	0	22.60	22.60	21.70	
1.4	64QAM	1	3	22.68	22.75	21.72	23.7
1.4	64QAM	1	5	22.60	22.59	21.71	
1.4	64QAM	3	0	22.63	22.63	21.70	
1.4	64QAM	3	1	22.65	22.62	21.72	23.7
1.4	64QAM	3	3	22.55	22.58	21.71	
1.4	64QAM	6	0	21.45	21.48	20.72	



Band 7							
Ant 2							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch./	Power Middle Ch./	Power High Ch./	Tune-up limit (dBm)
Channel				20850	21100	21350	
Frequency (MHz)				2510	2535	2560	
20	QPSK	1	0	23.26	23.31	23.30	25.2
20	QPSK	1	49	23.28	23.39	23.30	
20	QPSK	1	99	23.29	23.42	23.40	
20	QPSK	50	0	23.28	23.44	23.41	24.2
20	QPSK	50	24	23.29	23.48	23.43	
20	QPSK	50	50	23.32	23.56	23.44	
20	QPSK	100	0	23.29	23.45	23.41	24.2
20	16QAM	1	0	23.47	23.66	23.64	
20	16QAM	1	49	23.50	23.71	23.68	
20	16QAM	1	99	23.55	23.77	23.65	23.2
20	16QAM	50	0	22.61	22.79	22.73	
20	16QAM	50	24	22.64	22.76	22.72	
20	16QAM	50	50	22.62	22.84	22.76	22.2
20	16QAM	100	0	22.61	22.75	22.74	
20	64QAM	1	0	22.71	22.87	22.18	
20	64QAM	1	49	22.72	22.90	22.31	23.2
20	64QAM	1	99	22.74	22.90	22.40	
20	64QAM	50	0	21.66	21.82	21.15	
20	64QAM	50	24	21.68	21.83	21.29	22.2
20	64QAM	50	50	21.70	21.86	21.31	
20	64QAM	100	0	21.62	21.79	21.11	
Channel				20925	21100	21375	Tune-up limit (dBm)
Frequency (MHz)				2507.5	2535	2562.5	
15	QPSK	1	0	23.20	23.34	23.38	25.2
15	QPSK	1	37	23.23	23.40	23.37	
15	QPSK	1	74	23.31	23.49	23.40	
15	QPSK	36	0	23.25	23.43	23.44	24.2
15	QPSK	36	20	23.39	23.49	23.50	
15	QPSK	36	39	23.40	23.57	23.49	
15	QPSK	75	0	23.37	23.47	23.51	24.2
15	16QAM	1	0	23.47	23.65	23.68	
15	16QAM	1	37	23.53	23.74	23.49	
15	16QAM	1	74	23.62	23.81	23.69	23.2
15	16QAM	36	0	22.55	22.72	22.71	
15	16QAM	36	20	22.68	22.75	22.82	
15	16QAM	36	39	22.68	22.87	22.78	23.2
15	16QAM	75	0	22.65	22.78	22.81	
15	64QAM	1	0	22.65	22.76	22.20	
15	64QAM	1	37	22.75	22.90	21.52	22.2
15	64QAM	1	74	22.78	22.90	22.25	
15	64QAM	36	0	21.68	21.76	20.78	
15	64QAM	36	20	21.70	21.80	20.89	22.2
15	64QAM	36	39	21.74	21.89	21.10	
15	64QAM	75	0	21.67	21.77	20.84	
Channel				20800	21100	21400	Tune-up limit (dBm)
Frequency (MHz)				2505	2535	2565	
10	QPSK	1	0	23.22	23.29	23.22	25.2
10	QPSK	1	25	23.20	23.39	23.25	
10	QPSK	1	49	23.20	23.37	23.27	
10	QPSK	25	0	23.28	23.41	23.37	24.2
10	QPSK	25	12	23.33	23.44	23.39	
10	QPSK	25	25	23.34	23.53	23.44	
10	QPSK	50	0	23.33	23.46	23.39	24.2
10	16QAM	1	0	23.49	23.67	23.62	
10	16QAM	1	25	23.50	23.71	23.70	
10	16QAM	1	49	23.58	23.78	23.68	23.2
10	16QAM	25	0	22.58	22.70	22.68	
10	16QAM	25	12	22.64	22.76	22.69	
10	16QAM	25	25	22.61	22.83	22.74	23.2
10	16QAM	50	0	22.60	22.75	22.67	
10	64QAM	1	0	22.69	22.82	21.86	
10	64QAM	1	25	22.70	22.90	22.34	23.2
10	64QAM	1	49	22.79	22.90	22.61	
10	64QAM	25	0	21.61	21.75	20.84	
10	64QAM	25	12	21.65	21.79	21.05	22.2
10	64QAM	25	25	21.65	21.86	21.23	
10	64QAM	50	0	21.65	21.77	20.89	
Channel				20775	21100	21425	Tune-up limit (dBm)
Frequency (MHz)				2502.5	2535	2567.5	
5	QPSK	1	0	23.26	23.31	23.30	25.2
5	QPSK	1	12	23.28	23.39	23.30	
5	QPSK	1	24	23.29	23.42	23.29	
5	QPSK	12	0	23.28	23.44	23.41	24.2
5	QPSK	12	7	23.29	23.46	23.43	
5	QPSK	12	13	23.32	23.56	23.42	
5	QPSK	25	0	23.29	23.45	23.41	24.2
5	16QAM	1	0	23.47	23.66	23.64	
5	16QAM	1	12	23.50	23.71	23.68	
5	16QAM	1	24	23.55	23.77	23.65	23.2
5	16QAM	12	0	22.61	22.79	22.73	
5	16QAM	12	7	22.64	22.76	22.72	
5	16QAM	12	13	22.62	22.84	22.76	23.2
5	16QAM	25	0	22.61	22.75	22.74	
5	64QAM	1	0	22.71	22.87	22.18	
5	64QAM	1	12	22.72	22.90	22.31	23.2
5	64QAM	1	24	22.74	22.90	22.40	
5	64QAM	12	0	21.66	21.82	21.15	
5	64QAM	12	7	21.68	21.83	21.29	22.2
5	64QAM	12	13	21.70	21.86	21.31	
5	64QAM	25	0	21.62	21.79	21.11	



Band 12							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				23060	23095	23130	
Frequency (MHz)				704	707.5	711	
10	QPSK	1	0	24.34	24.12	24.24	25.7
10	QPSK	1	25	24.15	24.15	24.14	
10	QPSK	1	49	24.31	24.24	24.14	
10	QPSK	25	0	23.27	23.33	23.32	24.7
10	QPSK	25	12	23.38	23.34	23.35	
10	QPSK	25	25	23.31	23.30	23.35	
10	QPSK	50	0	23.34	23.28	23.32	24.7
10	16QAM	1	0	23.55	23.49	23.56	
10	16QAM	1	25	23.61	23.61	23.59	
10	16QAM	1	49	23.66	23.60	23.54	23.7
10	16QAM	25	0	22.32	22.28	22.33	
10	16QAM	25	12	22.40	22.35	22.36	
10	16QAM	25	25	22.37	22.36	22.34	23.7
10	16QAM	50	0	22.39	22.31	22.33	
10	64QAM	1	0	22.43	22.31	22.39	
10	64QAM	1	25	22.52	22.42	22.25	23.7
10	64QAM	1	49	22.61	22.54	22.53	
10	64QAM	25	0	21.31	21.33	21.22	
10	64QAM	25	12	21.46	21.39	21.33	22.7
10	64QAM	25	25	21.37	21.41	21.37	
10	64QAM	50	0	21.36	21.34	21.37	
Channel				23035	23095	23155	Tune-up limit (dBm)
Frequency (MHz)				701.5	707.5	713.5	
5	QPSK	1	0	24.27	24.18	24.20	25.7
5	QPSK	1	12	24.27	24.28	24.27	
5	QPSK	1	24	24.23	24.21	24.24	
5	QPSK	12	0	23.38	23.32	23.26	24.7
5	QPSK	12	7	23.33	23.26	23.25	
5	QPSK	12	13	23.33	23.26	23.27	
5	QPSK	25	0	23.36	23.28	23.20	24.7
5	16QAM	1	0	23.59	23.56	23.50	
5	16QAM	1	12	23.60	23.59	23.55	
5	16QAM	1	24	23.61	23.61	23.60	23.7
5	16QAM	12	0	22.36	22.32	22.28	
5	16QAM	12	7	22.39	22.34	22.36	
5	16QAM	12	13	22.32	22.35	22.28	23.7
5	16QAM	25	0	22.40	22.35	22.32	
5	64QAM	1	0	22.37	22.24	22.40	
5	64QAM	1	12	22.51	22.44	22.40	22.7
5	64QAM	1	24	22.35	22.48	22.45	
5	64QAM	12	0	21.39	21.41	21.38	
5	64QAM	12	7	21.34	21.35	21.34	22.7
5	64QAM	12	13	21.43	21.38	21.28	
5	64QAM	25	0	21.42	21.39	21.32	
Channel				23025	23095	23165	Tune-up limit (dBm)
Frequency (MHz)				700.5	707.5	714.5	
3	QPSK	1	0	24.31	24.21	24.28	25.7
3	QPSK	1	8	24.32	24.30	24.30	
3	QPSK	1	14	24.28	24.27	24.18	
3	QPSK	8	0	23.35	23.27	23.30	24.7
3	QPSK	8	4	23.37	23.40	23.35	
3	QPSK	8	7	23.38	23.38	23.25	
3	QPSK	15	0	23.39	23.28	23.21	24.7
3	16QAM	1	0	23.71	23.62	23.52	
3	16QAM	1	8	23.56	23.59	23.60	
3	16QAM	1	14	23.60	23.56	23.46	23.7
3	16QAM	8	0	22.42	22.42	22.32	
3	16QAM	8	4	22.41	22.40	22.36	
3	16QAM	8	7	22.33	22.41	22.27	23.7
3	16QAM	15	0	22.37	22.31	22.30	
3	64QAM	1	0	22.48	22.41	22.47	
3	64QAM	1	8	22.64	22.55	22.45	23.7
3	64QAM	1	14	22.47	22.49	22.43	
3	64QAM	8	0	21.41	21.39	21.36	
3	64QAM	8	4	21.44	21.51	21.40	22.7
3	64QAM	8	7	21.34	21.40	21.36	
3	64QAM	15	0	21.37	21.34	21.24	
Channel				23017	23095	23173	Tune-up limit (dBm)
Frequency (MHz)				699.7	707.5	715.3	
1.4	QPSK	1	0	24.18	24.13	24.08	25.7
1.4	QPSK	1	3	24.23	24.21	24.18	
1.4	QPSK	1	5	24.19	24.20	24.02	
1.4	QPSK	3	0	24.26	24.09	24.18	24.7
1.4	QPSK	3	1	24.25	24.22	24.19	
1.4	QPSK	3	3	24.21	24.22	24.13	
1.4	QPSK	6	0	23.32	23.26	23.12	24.7
1.4	16QAM	1	0	23.60	23.49	23.46	
1.4	16QAM	1	3	23.57	23.57	23.48	
1.4	16QAM	1	5	23.53	23.52	23.43	24.7
1.4	16QAM	3	0	23.34	23.24	23.26	
1.4	16QAM	3	1	23.38	23.30	23.31	
1.4	16QAM	3	3	23.31	23.24	23.13	23.7
1.4	16QAM	6	0	22.32	22.23	22.22	
1.4	64QAM	1	0	22.48	22.42	22.38	
1.4	64QAM	1	3	22.46	22.50	22.42	23.7
1.4	64QAM	1	5	22.46	22.36	22.34	
1.4	64QAM	3	0	22.37	22.38	22.39	
1.4	64QAM	3	1	22.41	22.38	22.32	23.7
1.4	64QAM	3	3	22.40	22.38	22.31	
1.4	64QAM	6	0	21.27	21.21	21.21	



Band 13							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				23230			
Frequency (MHz)				762			
10	QPSK	1	0	23.83			25.2
10	QPSK	1	25	23.84			
10	QPSK	1	49	23.87			
10	QPSK	25	0	22.96			24.2
10	QPSK	25	12	23.01			
10	QPSK	25	25	22.91			
10	QPSK	50	0	23.01			24.2
10	16QAM	1	0	23.16			
10	16QAM	1	25	23.15			
10	16QAM	1	49	23.15			23.2
10	16QAM	25	0	21.97			
10	16QAM	25	12	22.03			
10	16QAM	25	25	21.93			23.2
10	16QAM	50	0	21.95			
10	64QAM	1	0	22.01			
10	64QAM	1	25	22.13			23.2
10	64QAM	1	49	22.04			
10	64QAM	25	0	21.02			
10	64QAM	25	12	21.00			22.2
10	64QAM	25	25	21.04			
10	64QAM	50	0	20.96			
Channel				23206 23230 23255			Tune-up limit (dBm)
Frequency (MHz)				779.5 762 784.5			
5	QPSK	1	0	23.75	23.76	23.86	25.2
5	QPSK	1	12	23.88	23.84	23.87	
5	QPSK	1	24	23.87	23.86	23.87	
5	QPSK	12	0	22.89	22.92	22.92	24.2
5	QPSK	12	7	22.83	22.97	22.83	
5	QPSK	12	13	23.02	23.01	22.92	
5	QPSK	25	0	23.01	22.99	22.91	24.2
5	16QAM	1	0	23.08	23.05	23.08	
5	16QAM	1	12	23.16	23.14	23.09	
5	16QAM	1	24	23.16	23.10	23.03	23.2
5	16QAM	12	0	21.99	21.97	21.98	
5	16QAM	12	7	22.05	21.96	21.96	
5	16QAM	12	13	22.02	21.94	21.97	23.2
5	16QAM	25	0	22.03	21.94	21.88	
5	64QAM	1	0	22.00	22.13	21.98	
5	64QAM	1	12	22.13	22.06	22.08	23.2
5	64QAM	1	24	22.07	22.15	22.00	
5	64QAM	12	0	21.03	21.06	20.99	
5	64QAM	12	7	21.07	21.01	20.92	22.2
5	64QAM	12	13	20.98	21.05	20.97	
5	64QAM	25	0	20.96	20.95	20.88	



Band 14							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				23330	23330		
Frequency (MHz)				793			
10	QPSK	1	0	24.44			25.7
10	QPSK	1	25	24.49			
10	QPSK	1	49	24.32			
10	QPSK	25	0	23.51			
10	QPSK	25	12	23.50			24.7
10	QPSK	25	25	23.48			
10	QPSK	50	0	23.42			
10	16QAM	1	0	23.87			24.7
10	16QAM	1	25	23.84			
10	16QAM	1	49	23.71			
10	16QAM	25	0	22.44			
10	16QAM	25	12	22.54			23.7
10	16QAM	25	25	22.55			
10	16QAM	50	0	22.44			
10	64QAM	1	0	22.75			23.7
10	64QAM	1	25	22.58			
10	64QAM	1	49	22.65			
10	64QAM	25	0	21.50			
10	64QAM	25	12	21.33			22.7
10	64QAM	25	25	21.48			
10	64QAM	50	0	21.55			
Channel				23306	23330	23356	Tune-up limit (dBm)
Frequency (MHz)				790.5	793	795.5	
5	QPSK	1	0	24.48	24.40	24.42	25.7
5	QPSK	1	12	24.48	24.48	24.47	
5	QPSK	1	24	24.47	24.44	24.42	
5	QPSK	12	0	23.54	23.49	23.41	24.7
5	QPSK	12	7	23.60	23.52	23.47	
5	QPSK	12	13	23.50	23.55	23.45	
5	QPSK	25	0	23.59	23.48	23.43	
5	16QAM	1	0	23.74	23.78	23.68	24.7
5	16QAM	1	12	23.78	23.80	23.80	
5	16QAM	1	24	23.80	23.72	23.71	
5	16QAM	12	0	22.51	22.57	22.48	23.7
5	16QAM	12	7	22.62	22.60	22.49	
5	16QAM	12	13	22.59	22.55	22.51	
5	16QAM	25	0	22.57	22.52	22.50	
5	64QAM	1	0	22.71	22.62	22.36	23.7
5	64QAM	1	12	22.78	22.24	22.53	
5	64QAM	1	24	22.33	22.27	22.70	
5	64QAM	12	0	21.61	21.26	21.18	22.7
5	64QAM	12	7	21.68	21.24	21.54	
5	64QAM	12	13	21.36	21.23	21.61	
5	64QAM	25	0	21.64	21.16	21.49	



Band 17							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch./	Power Middle Ch./	Power High Ch./	Tune-up limit (dBm)
Channel				23780	23790	23800	
Frequency (MHz)				709	710	711	
10	QPSK	1	0	24.38	24.29	24.27	25.7
10	QPSK	1	25	24.35	24.27	24.31	
10	QPSK	1	49	24.33	24.40	24.28	
10	QPSK	25	0	23.34	23.36	23.37	24.7
10	QPSK	25	12	23.51	23.39	23.43	
10	QPSK	25	25	23.50	23.51	23.46	
10	QPSK	50	0	23.44	23.37	23.34	24.7
10	16QAM	1	0	23.64	23.67	23.59	
10	16QAM	1	25	23.73	23.67	23.67	
10	16QAM	1	49	23.70	23.70	23.73	23.7
10	16QAM	25	0	22.35	22.28	22.38	
10	16QAM	25	12	22.43	22.42	22.36	
10	16QAM	25	25	22.40	22.45	22.42	23.7
10	16QAM	50	0	22.50	22.35	22.41	
10	64QAM	1	0	22.59	22.53	22.57	
10	64QAM	1	25	22.67	22.66	22.50	23.7
10	64QAM	1	49	22.65	22.65	22.58	
10	64QAM	25	0	21.36	21.43	21.41	
10	64QAM	25	12	21.47	21.43	21.46	22.7
10	64QAM	25	25	21.51	21.55	21.51	
10	64QAM	50	0	21.54	21.40	21.44	
Channel				23765	23790	23825	Tune-up limit (dBm)
Frequency (MHz)				706.5	710	713.5	
5	QPSK	1	0	24.24	24.27	24.26	25.7
5	QPSK	1	12	24.31	24.37	24.39	
5	QPSK	1	24	24.38	24.39	24.31	
5	QPSK	12	0	23.43	23.34	23.35	24.7
5	QPSK	12	7	23.48	23.47	23.43	
5	QPSK	12	13	23.46	23.44	23.40	
5	QPSK	25	0	23.49	23.45	23.42	24.7
5	16QAM	1	0	23.57	23.61	23.61	
5	16QAM	1	12	23.61	23.69	23.63	
5	16QAM	1	24	23.73	23.76	23.68	23.7
5	16QAM	12	0	22.40	22.39	22.36	
5	16QAM	12	7	22.45	22.40	22.38	
5	16QAM	12	13	22.51	22.44	22.43	23.7
5	16QAM	25	0	22.43	22.44	22.49	
5	64QAM	1	0	22.41	22.31	22.54	
5	64QAM	1	12	22.59	22.50	22.51	23.7
5	64QAM	1	24	22.61	22.53	22.49	
5	64QAM	12	0	21.43	21.40	21.44	
5	64QAM	12	7	21.47	21.45	21.53	22.7
5	64QAM	12	13	21.53	21.55	21.51	
5	64QAM	25	0	21.45	21.36	21.40	



Band 25							
Ant 2							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				26140	26340	26590	
Frequency (MHz)				1860	1880	1905	
20	QPSK	1	0	22.86	22.93	22.90	24.6
20	QPSK	1	48	22.85	22.94	22.86	
20	QPSK	1	99	22.86	22.99	22.92	
20	QPSK	50	0	22.96	23.04	22.96	24.6
20	QPSK	50	24	23.04	23.12	22.98	
20	QPSK	50	50	23.01	23.11	23.07	
20	QPSK	100	0	23.06	23.11	22.98	24.6
20	16QAM	1	0	23.18	23.29	23.26	
20	16QAM	1	49	23.18	23.29	23.20	
20	16QAM	1	99	23.17	23.33	23.25	23.7
20	16QAM	50	0	22.07	22.15	22.08	
20	16QAM	50	24	22.16	22.23	22.10	
20	16QAM	50	50	22.15	22.22	22.17	23.7
20	16QAM	100	0	22.15	22.21	22.10	
20	64QAM	1	0	22.18	22.21	22.22	
20	64QAM	1	49	22.08	22.26	22.22	23.7
20	64QAM	1	99	22.18	22.29	22.03	
20	64QAM	50	0	21.09	21.16	21.10	
20	64QAM	50	24	21.19	21.26	21.13	22.7
20	64QAM	50	50	21.16	21.24	21.19	
20	64QAM	100	0	21.17	21.24	21.11	
Channel				26115	26340	26515	Tune-up limit (dBm)
Frequency (MHz)				1857.5	1880	1907.5	
15	QPSK	1	0	22.82	22.90	22.80	24.6
15	QPSK	1	37	22.83	22.94	22.79	
15	QPSK	1	74	22.86	22.98	22.86	
15	QPSK	36	0	22.95	23.02	22.93	24.6
15	QPSK	36	20	22.94	23.06	22.97	
15	QPSK	36	39	22.96	23.05	22.97	
15	QPSK	75	0	23.06	23.05	22.97	24.6
15	16QAM	1	0	23.16	23.27	23.25	
15	16QAM	1	37	23.14	23.23	23.15	
15	16QAM	1	74	23.09	23.31	23.18	23.7
15	16QAM	36	0	22.00	22.06	22.01	
15	16QAM	36	20	22.14	22.15	22.03	
15	16QAM	36	39	22.12	22.18	22.11	22.7
15	16QAM	75	0	22.12	22.21	22.07	
15	64QAM	1	0	22.13	22.17	22.14	
15	64QAM	1	37	22.07	22.23	22.22	23.7
15	64QAM	1	74	22.18	22.27	21.95	
15	64QAM	36	0	21.09	21.16	21.10	
15	64QAM	36	20	21.19	21.26	21.09	22.7
15	64QAM	36	39	21.06	21.19	21.18	
15	64QAM	75	0	21.09	21.24	21.01	
Channel				26090	26340	26640	Tune-up limit (dBm)
Frequency (MHz)				1855	1880	1910	
10	QPSK	1	0	22.77	22.91	22.80	24.6
10	QPSK	1	25	22.80	22.89	22.85	
10	QPSK	1	49	22.86	22.91	22.86	
10	QPSK	25	0	22.90	22.97	22.96	24.6
10	QPSK	25	12	23.04	23.02	22.93	
10	QPSK	25	25	22.97	23.05	23.01	
10	QPSK	50	0	22.96	23.08	22.97	24.6
10	16QAM	1	0	23.12	23.24	23.22	
10	16QAM	1	25	23.11	23.28	23.18	
10	16QAM	1	49	23.10	23.32	23.25	23.7
10	16QAM	25	0	22.06	22.05	22.07	
10	16QAM	25	12	22.07	22.19	22.03	
10	16QAM	25	25	22.15	22.16	22.12	23.7
10	16QAM	50	0	22.11	22.17	22.01	
10	64QAM	1	0	22.11	22.21	22.19	
10	64QAM	1	25	22.01	22.26	22.17	23.7
10	64QAM	1	49	22.12	22.19	22.00	
10	64QAM	25	0	21.06	21.06	21.06	
10	64QAM	25	12	21.12	21.24	21.10	22.7
10	64QAM	25	25	21.15	21.20	21.17	
10	64QAM	50	0	21.17	21.23	21.07	
Channel				26055	26340	26655	Tune-up limit (dBm)
Frequency (MHz)				1852.5	1880	1912.5	
5	QPSK	1	0	22.82	22.93	22.84	24.6
5	QPSK	1	12	22.79	22.94	22.84	
5	QPSK	1	24	22.82	22.99	22.82	
5	QPSK	12	0	22.92	23.03	22.88	24.6
5	QPSK	12	7	22.96	23.09	22.93	
5	QPSK	12	13	22.95	23.09	23.03	
5	QPSK	25	0	22.99	23.05	22.94	24.6
5	16QAM	1	0	23.10	23.26	23.22	
5	16QAM	1	12	23.09	23.22	23.14	
5	16QAM	1	24	23.12	23.28	23.19	23.7
5	16QAM	12	0	21.87	22.05	22.05	
5	16QAM	12	7	22.14	22.17	22.10	
5	16QAM	12	13	22.13	22.20	22.15	23.7
5	16QAM	25	0	22.06	22.11	22.03	
5	64QAM	1	0	22.18	22.15	22.18	
5	64QAM	1	12	22.00	22.16	22.18	23.7
5	64QAM	1	24	22.11	22.19	21.98	
5	64QAM	12	0	21.08	21.10	21.08	
5	64QAM	12	7	21.13	21.24	21.03	22.7
5	64QAM	12	13	21.12	21.17	21.18	
5	64QAM	25	0	21.08	21.15	21.10	
Channel				26055	26340	26675	Tune-up limit (dBm)
Frequency (MHz)				1851.5	1880	1913.5	
3	QPSK	1	0	22.77	22.90	22.84	24.6
3	QPSK	1	8	22.75	22.92	22.87	
3	QPSK	1	14	22.79	22.90	22.83	
3	QPSK	8	0	22.89	22.98	22.86	24.6
3	QPSK	8	4	23.02	23.06	22.90	
3	QPSK	8	7	22.96	23.11	23.02	
3	QPSK	15	0	23.04	23.06	22.96	24.6
3	16QAM	1	0	23.11	23.24	23.22	
3	16QAM	1	8	23.13	23.26	23.10	
3	16QAM	1	14	23.17	23.31	23.25	23.7
3	16QAM	8	0	22.06	22.09	22.08	
3	16QAM	8	4	22.14	22.22	22.09	
3	16QAM	8	7	22.09	22.17	22.17	23.7
3	16QAM	15	0	22.05	22.16	22.09	
3	64QAM	1	0	22.16	22.12	22.14	
3	64QAM	1	8	22.02	22.20	22.22	23.7
3	64QAM	1	14	22.13	22.28	21.98	
3	64QAM	8	0	21.02	21.10	21.02	
3	64QAM	8	4	21.10	21.22	21.05	22.7
3	64QAM	8	7	21.14	21.16	21.12	
3	64QAM	15	0	21.08	21.19	21.10	
Channel				26047	26340	26683	Tune-up limit (dBm)
Frequency (MHz)				1850.7	1880	1914.3	
1.4	QPSK	1	0	22.72	22.78	22.79	24.6
1.4	QPSK	1	3	22.83	22.98	22.90	
1.4	QPSK	1	5	22.81	22.95	22.85	
1.4	QPSK	3	0	22.76	22.92	22.82	24.6
1.4	QPSK	3	1	22.81	22.97	22.86	
1.4	QPSK	3	3	22.79	22.93	22.87	
1.4	QPSK	6	0	22.84	23.00	22.90	24.6
1.4	16QAM	1	0	23.00	23.12	23.05	
1.4	16QAM	1	3	23.10	23.29	23.22	
1.4	16QAM	1	5	23.04	23.24	23.17	24.6
1.4	16QAM	3	0	22.82	22.96	22.86	
1.4	16QAM	3	1	22.90	23.02	22.93	
1.4	16QAM	3	3	22.86	23.00	22.89	23.7
1.4	16QAM	6	0	22.01	22.16	22.06	
1.4	64QAM	1	0	22.03	22.18	21.82	
1.4	64QAM	1	3	22.14	22.34	21.81	23.7
1.4	64QAM	1	5	22.08	22.29	21.71	
1.4	64QAM	3	0	22.04	22.22	21.81	
1.4	64QAM	3	1	22.12	22.29	21.92	23.7
1.4	64QAM	3	3	22.07	22.27	21.81	
1.4	64QAM	6	0	20.96	21.11	20.76	



Band 26							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch./	Power Middle Ch./	Power High Ch./	Tune-up limit (dBm)
Channel				26765	26865	26965	
Frequency (MHz)				821.5	831.5	841.5	
15	QPSK	1	0	24.28	24.16	24.24	25.7
15	QPSK	1	37	24.14	24.24	24.21	
15	QPSK	1	74	24.27	24.52	24.13	
15	QPSK	36	0	23.38	23.39	23.34	24.7
15	QPSK	36	20	23.40	23.31	23.37	
15	QPSK	36	39	23.33	23.34	23.29	
15	QPSK	75	0	23.39	23.35	23.35	24.7
15	16QAM	1	0	23.55	23.58	23.61	
15	16QAM	1	37	23.54	23.54	23.60	
15	16QAM	1	74	23.56	23.63	23.47	23.7
15	16QAM	36	0	22.36	22.42	22.34	
15	16QAM	36	20	22.34	22.33	22.30	
15	16QAM	36	39	22.36	22.36	22.33	23.7
15	16QAM	75	0	22.42	22.38	22.33	
15	64QAM	1	0	22.48	22.42	22.41	
15	64QAM	1	37	22.45	22.49	22.41	23.7
15	64QAM	1	74	22.48	22.48	21.70	
15	64QAM	36	0	21.43	21.45	21.41	
15	64QAM	36	20	21.47	21.43	21.37	22.7
15	64QAM	36	39	21.38	21.44	21.49	
15	64QAM	75	0	21.47	21.36	21.42	
Channel				26740	26865	26990	Tune-up limit (dBm)
Frequency (MHz)				819	831.5	844	
10	QPSK	1	0	24.38	24.29	24.37	25.7
10	QPSK	1	25	24.22	24.25	24.23	
10	QPSK	1	49	24.28	24.29	24.20	
10	QPSK	25	0	23.50	23.36	23.44	24.7
10	QPSK	25	12	23.50	23.41	23.37	
10	QPSK	25	25	23.40	23.42	23.37	
10	QPSK	50	0	23.38	23.41	23.42	24.7
10	16QAM	1	0	23.77	23.60	23.75	
10	16QAM	1	25	23.61	23.73	23.64	
10	16QAM	1	49	23.64	23.67	23.62	23.7
10	16QAM	25	0	22.48	22.36	22.37	
10	16QAM	25	12	22.45	22.42	22.36	
10	16QAM	25	25	22.30	22.44	22.38	22.7
10	16QAM	50	0	22.46	22.37	22.33	
10	64QAM	1	0	22.64	22.51	22.57	
10	64QAM	1	25	22.54	22.66	22.66	23.7
10	64QAM	1	49	22.56	22.60	22.05	
10	64QAM	25	0	21.44	21.42	21.43	
10	64QAM	25	12	21.50	21.47	21.48	22.7
10	64QAM	25	25	21.37	21.41	21.28	
10	64QAM	50	0	21.47	21.37	21.36	
Channel				26715	26865	27015	Tune-up limit (dBm)
Frequency (MHz)				816.5	831.5	846.5	
5	QPSK	1	0	24.45	24.32	24.35	25.7
5	QPSK	1	12	24.38	24.38	24.33	
5	QPSK	1	24	24.30	24.37	24.26	
5	QPSK	12	0	23.50	23.37	23.40	24.7
5	QPSK	12	7	23.51	23.41	23.44	
5	QPSK	12	13	23.44	23.36	23.33	
5	QPSK	25	0	23.44	23.40	23.38	24.7
5	16QAM	1	0	23.78	23.60	23.73	
5	16QAM	1	12	23.72	23.66	23.60	
5	16QAM	1	24	23.66	23.72	23.58	23.7
5	16QAM	12	0	22.49	22.38	22.41	
5	16QAM	12	7	22.45	22.45	22.41	
5	16QAM	12	13	22.44	22.37	22.30	23.7
5	16QAM	25	0	22.43	22.36	22.40	
5	64QAM	1	0	22.73	22.56	22.53	
5	64QAM	1	12	22.54	22.59	21.87	23.7
5	64QAM	1	24	22.56	22.57	21.82	
5	64QAM	12	0	21.58	21.56	21.51	
5	64QAM	12	7	21.59	21.50	20.86	22.7
5	64QAM	12	13	21.54	21.45	20.56	
5	64QAM	25	0	21.50	21.39	21.68	
Channel				26705	26865	27025	Tune-up limit (dBm)
Frequency (MHz)				815.5	831.5	847.5	
3	QPSK	1	0	24.43	24.37	24.37	25.7
3	QPSK	1	8	24.41	24.37	24.32	
3	QPSK	1	14	24.30	24.35	24.26	
3	QPSK	8	0	23.51	23.43	23.27	24.7
3	QPSK	8	4	23.54	23.46	23.33	
3	QPSK	8	7	23.40	23.41	23.37	
3	QPSK	15	0	23.42	23.35	23.30	24.7
3	16QAM	1	0	23.79	23.62	23.67	
3	16QAM	1	8	23.80	23.76	23.49	
3	16QAM	1	14	23.68	23.71	23.56	23.7
3	16QAM	8	0	22.53	22.44	22.45	
3	16QAM	8	4	22.59	22.47	22.41	
3	16QAM	8	7	22.46	22.49	22.36	23.7
3	16QAM	15	0	22.56	22.36	22.37	
3	64QAM	1	0	22.61	22.57	21.91	
3	64QAM	1	8	22.68	22.58	21.70	23.7
3	64QAM	1	14	22.58	22.61	21.71	
3	64QAM	8	0	21.59	21.49	20.70	
3	64QAM	8	4	21.55	21.54	20.57	22.7
3	64QAM	8	7	21.49	21.52	20.57	
3	64QAM	15	0	21.50	21.48	20.64	
Channel				26697	26865	27033	Tune-up limit (dBm)
Frequency (MHz)				814.7	831.5	848.3	
1.4	QPSK	1	0	24.37	24.27	24.21	25.7
1.4	QPSK	1	3	24.42	24.30	24.23	
1.4	QPSK	1	5	24.36	24.21	24.15	
1.4	QPSK	3	0	24.41	24.23	24.20	24.7
1.4	QPSK	3	1	24.41	24.33	24.21	
1.4	QPSK	3	3	24.40	24.32	24.20	
1.4	QPSK	6	0	23.41	23.38	23.30	24.7
1.4	16QAM	1	0	23.71	23.59	23.46	
1.4	16QAM	1	3	23.72	23.62	23.59	
1.4	16QAM	1	5	23.63	23.59	23.46	24.7
1.4	16QAM	3	0	23.56	23.29	23.30	
1.4	16QAM	3	1	23.60	23.39	23.30	
1.4	16QAM	3	3	23.50	23.35	23.24	23.7
1.4	16QAM	6	0	22.50	22.46	22.33	
1.4	64QAM	1	0	22.68	22.47	21.74	
1.4	64QAM	1	3	22.68	22.61	21.70	23.7
1.4	64QAM	1	5	22.62	22.46	21.71	
1.4	64QAM	3	0	22.64	22.46	21.72	
1.4	64QAM	3	1	22.57	22.47	21.71	22.7
1.4	64QAM	3	3	22.56	22.51	21.80	
1.4	64QAM	6	0	21.43	21.42	20.70	



Band 30							
Ant 2							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				27710			
Frequency (MHz)				2310			
10	QPSK	1	0	22.18			23.7
10	QPSK	1	25	22.07			
10	QPSK	1	49	22.09			
10	QPSK	25	0	21.18			22.7
10	QPSK	25	12	21.14			
10	QPSK	25	25	21.23			
10	QPSK	50	0	21.14			22.7
10	16QAM	1	0	21.51			
10	16QAM	1	25	21.44			
10	16QAM	1	49	21.52			21.7
10	16QAM	25	0	20.18			
10	16QAM	25	12	20.25			
10	16QAM	25	25	20.19			21.7
10	16QAM	50	0	20.23			
10	64QAM	1	0	20.35			
10	64QAM	1	25	20.42			21.7
10	64QAM	1	49	20.39			
10	64QAM	25	0	19.24			
10	64QAM	25	12	19.21			20.7
10	64QAM	25	25	19.22			
10	64QAM	50	0	19.21			
Channel				27735			
Frequency (MHz)				2315			
5	QPSK	1	0	22.04	22.08	22.10	23.7
5	QPSK	1	12	22.18	22.10	22.13	
5	QPSK	1	24	22.11	22.12	22.14	
5	QPSK	12	0	21.14	21.18	21.17	22.7
5	QPSK	12	7	21.27	21.18	21.20	
5	QPSK	12	13	21.32	21.23	21.13	
5	QPSK	25	0	21.24	21.15	21.21	22.7
5	16QAM	1	0	21.38	21.35	21.42	
5	16QAM	1	12	21.47	21.47	21.42	
5	16QAM	1	24	21.55	21.44	21.44	21.7
5	16QAM	12	0	20.15	20.21	20.17	
5	16QAM	12	7	20.20	20.25	20.29	
5	16QAM	12	13	20.22	20.20	20.19	21.7
5	16QAM	25	0	20.24	20.17	20.23	
5	64QAM	1	0	20.27	20.34	20.47	
5	64QAM	1	12	20.39	20.35	20.37	21.7
5	64QAM	1	24	20.53	20.37	20.31	
5	64QAM	12	0	19.25	19.27	19.23	
5	64QAM	12	7	19.29	19.22	19.33	20.7
5	64QAM	12	13	19.31	19.33	19.25	
5	64QAM	25	0	19.27	19.21	19.27	



Band 66							
Ant 2							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				132072	132322	132572	
Frequency (MHz)				1720	1745	1770	
20	QPSK	1	0	23.95	23.87	23.78	25.7
20	QPSK	1	49	23.82	23.71	23.70	
20	QPSK	1	99	23.60	23.75	23.72	
20	QPSK	50	0	23.58	23.46	23.44	24.7
20	QPSK	50	24	23.65	23.51	23.52	
20	QPSK	50	50	23.64	23.48	23.46	
20	QPSK	100	0	23.66	23.48	23.44	24.7
20	16QAM	1	0	23.84	23.76	23.74	
20	16QAM	1	49	23.78	23.55	23.60	
20	16QAM	1	99	23.86	23.63	23.54	23.7
20	16QAM	50	0	22.59	22.47	22.48	
20	16QAM	50	24	22.67	22.52	22.52	
20	16QAM	50	50	22.63	22.46	22.47	23.7
20	16QAM	100	0	22.64	22.49	22.45	
20	64QAM	1	0	22.73	22.62	22.56	
20	64QAM	1	49	22.68	22.49	22.53	23.7
20	64QAM	1	99	22.74	22.56	22.48	
20	64QAM	50	0	21.61	21.49	21.49	
20	64QAM	50	24	21.67	21.52	21.53	22.7
20	64QAM	50	50	21.66	21.49	21.49	
20	64QAM	100	0	21.67	21.50	21.44	
Channel				132047	132322	132597	Tune-up limit (dBm)
Frequency (MHz)				1717.5	1745	1772.5	
15	QPSK	1	0	23.91	23.81	23.79	25.7
15	QPSK	1	37	23.81	23.70	23.70	
15	QPSK	1	74	23.94	23.74	23.74	
15	QPSK	36	0	23.67	23.46	23.45	24.7
15	QPSK	36	20	23.65	23.46	23.42	
15	QPSK	36	39	23.62	23.44	23.47	
15	QPSK	75	0	23.65	23.50	23.46	24.7
15	16QAM	1	0	23.82	23.70	23.73	
15	16QAM	1	37	23.74	23.60	23.64	
15	16QAM	1	74	23.85	23.63	23.61	23.7
15	16QAM	36	0	22.66	22.45	22.45	
15	16QAM	36	20	22.65	22.48	22.42	
15	16QAM	36	39	22.63	22.47	22.43	23.7
15	16QAM	75	0	22.65	22.51	22.45	
15	64QAM	1	0	22.66	22.61	22.53	
15	64QAM	1	37	22.62	22.50	22.49	23.7
15	64QAM	1	74	22.74	22.57	22.53	
15	64QAM	36	0	21.66	21.50	21.53	
15	64QAM	36	20	21.66	21.49	21.46	22.7
15	64QAM	36	39	21.68	21.50	21.50	
15	64QAM	75	0	21.66	21.51	21.47	
Channel				132022	132322	132622	Tune-up limit (dBm)
Frequency (MHz)				1715	1745	1775	
10	QPSK	1	0	23.94	23.77	23.81	25.7
10	QPSK	1	25	23.89	23.76	23.79	
10	QPSK	1	49	23.92	23.75	23.80	
10	QPSK	25	0	23.63	23.43	23.44	24.7
10	QPSK	25	12	23.64	23.50	23.44	
10	QPSK	25	25	23.65	23.47	23.52	
10	QPSK	50	0	23.67	23.52	23.48	24.7
10	16QAM	1	0	23.83	23.79	23.80	
10	16QAM	1	25	23.89	23.73	23.77	
10	16QAM	1	49	23.89	23.71	23.78	23.7
10	16QAM	25	0	22.61	22.43	22.44	
10	16QAM	25	12	22.70	22.52	22.47	
10	16QAM	25	25	22.62	22.46	22.51	23.7
10	16QAM	50	0	22.65	22.45	22.45	
10	64QAM	1	0	22.79	22.63	22.61	
10	64QAM	1	25	22.82	22.63	22.70	23.7
10	64QAM	1	49	22.84	22.64	22.67	
10	64QAM	25	0	21.66	21.48	21.49	
10	64QAM	25	12	21.70	21.54	21.50	22.7
10	64QAM	25	25	21.64	21.50	21.55	
10	64QAM	50	0	21.68	21.55	21.49	
Channel				131997	132322	132647	Tune-up limit (dBm)
Frequency (MHz)				1712.5	1745	1777.5	
5	QPSK	1	0	23.94	23.73	23.81	25.7
5	QPSK	1	12	23.94	23.80	23.85	
5	QPSK	1	24	23.93	23.75	23.79	
5	QPSK	12	0	23.63	23.42	23.50	24.7
5	QPSK	12	7	23.69	23.52	23.52	
5	QPSK	12	13	23.64	23.46	23.47	
5	QPSK	25	0	23.63	23.45	23.60	24.7
5	16QAM	1	0	23.86	23.71	23.76	
5	16QAM	1	12	23.89	23.74	23.75	
5	16QAM	1	24	23.86	23.71	23.75	23.7
5	16QAM	12	0	22.67	22.46	22.54	
5	16QAM	12	7	22.69	22.50	22.56	
5	16QAM	12	13	22.66	22.52	22.54	23.7
5	16QAM	25	0	22.68	22.52	22.54	
5	64QAM	1	0	22.82	22.63	22.72	
5	64QAM	1	12	22.82	22.64	22.68	23.7
5	64QAM	1	24	22.84	22.64	22.67	
5	64QAM	12	0	21.71	21.50	21.59	
5	64QAM	12	7	21.72	21.57	21.62	22.7
5	64QAM	12	13	21.73	21.52	21.59	
5	64QAM	25	0	21.66	21.50	21.54	
Channel				131967	132322	132657	Tune-up limit (dBm)
Frequency (MHz)				1711.5	1745	1776.5	
3	QPSK	1	0	23.88	23.73	23.77	25.7
3	QPSK	1	8	23.83	23.74	23.83	
3	QPSK	1	14	23.84	23.73	23.74	
3	QPSK	8	0	23.67	23.35	23.45	24.7
3	QPSK	8	4	23.64	23.45	23.46	
3	QPSK	8	7	23.61	23.43	23.40	
3	QPSK	15	0	23.63	23.36	23.47	24.7
3	16QAM	1	0	23.77	23.61	23.73	
3	16QAM	1	8	23.83	23.64	23.70	
3	16QAM	1	14	23.79	23.61	23.74	23.7
3	16QAM	8	0	22.66	22.38	22.52	
3	16QAM	8	4	22.64	22.40	22.54	
3	16QAM	8	7	22.59	22.49	22.50	23.7
3	16QAM	15	0	22.68	22.50	22.47	
3	64QAM	1	0	22.73	22.55	22.71	
3	64QAM	1	8	22.77	22.62	22.59	23.7
3	64QAM	1	14	22.84	22.54	22.65	
3	64QAM	8	0	21.71	21.48	21.56	
3	64QAM	8	4	21.66	21.51	21.56	22.7
3	64QAM	8	7	21.71	21.47	21.58	
3	64QAM	15	0	21.56	21.45	21.51	
Channel				131979	132322	132665	Tune-up limit (dBm)
Frequency (MHz)				1710.7	1745	1779.3	
1.4	QPSK	1	0	23.85	23.74	23.70	25.7
1.4	QPSK	1	3	23.86	23.72	23.77	
1.4	QPSK	1	5	23.84	23.76	23.72	
1.4	QPSK	3	0	23.88	23.71	23.78	24.7
1.4	QPSK	3	1	23.91	23.74	23.80	
1.4	QPSK	3	3	23.82	23.71	23.74	
1.4	QPSK	6	0	23.54	23.38	23.40	24.7
1.4	16QAM	1	0	23.73	23.60	23.68	
1.4	16QAM	1	3	23.82	23.66	23.76	
1.4	16QAM	1	5	23.73	23.62	23.67	24.7
1.4	16QAM	3	0	23.54	23.34	23.43	
1.4	16QAM	3	1	23.60	23.46	23.46	
1.4	16QAM	3	3	23.53	23.43	23.44	23.7
1.4	16QAM	6	0	22.58	22.43	22.51	
1.4	64QAM	1	0	22.70	22.57	22.60	
1.4	64QAM	1	3	22.75	22.62	22.63	23.7
1.4	64QAM	1	5	22.67	22.54	22.57	
1.4	64QAM	3	0	22.67	22.54	22.58	
1.4	64QAM	3	1	22.71	22.57	22.61	23.7
1.4	64QAM	3	3	22.67	22.51	22.56	
1.4	64QAM	6	0	21.57	21.39	21.44	



Band 71							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				133222	133322	133372	
Frequency (MHz)				673	683	688	
20	QPSK	1	0	24.39	24.32	24.28	25.7
20	QPSK	1	49	24.21	24.25	24.28	
20	QPSK	1	99	24.24	24.21	24.14	
20	QPSK	50	0	23.39	23.37	23.38	24.7
20	QPSK	50	24	23.50	23.42	23.32	
20	QPSK	50	50	23.45	23.39	23.33	
20	QPSK	100	0	23.46	23.30	23.37	24.7
20	16QAM	1	0	23.69	23.66	23.66	
20	16QAM	1	49	23.58	23.55	23.57	
20	16QAM	1	99	23.61	23.58	23.54	23.7
20	16QAM	50	0	22.46	22.32	22.40	
20	16QAM	50	24	22.42	22.33	22.39	
20	16QAM	50	50	22.42	22.39	22.39	23.7
20	16QAM	100	0	22.46	22.34	22.42	
20	64QAM	1	0	21.79	22.29	22.52	
20	64QAM	1	49	22.23	22.43	21.81	23.7
20	64QAM	1	99	22.50	22.00	22.43	
20	64QAM	50	0	20.70	21.36	21.01	
20	64QAM	50	24	20.85	21.40	21.15	22.7
20	64QAM	50	50	21.49	21.04	21.37	
20	64QAM	100	0	21.05	21.36	21.45	
Channel				133197	133297	133397	Tune-up limit (dBm)
Frequency (MHz)				670.5	680.5	690.5	
15	QPSK	1	0	24.23	24.27	24.23	25.7
15	QPSK	1	37	24.23	24.18	24.22	
15	QPSK	1	74	24.28	24.28	24.14	
15	QPSK	36	0	23.41	23.31	23.37	24.7
15	QPSK	36	20	23.45	23.30	23.34	
15	QPSK	36	39	23.38	23.40	23.35	
15	QPSK	75	0	23.36	23.35	23.34	24.7
15	16QAM	1	0	23.68	23.64	23.56	
15	16QAM	1	37	23.38	23.54	23.52	
15	16QAM	1	74	23.54	23.51	23.54	23.7
15	16QAM	36	0	22.28	22.39	22.28	
15	16QAM	36	20	22.31	22.34	22.43	
15	16QAM	36	39	22.45	22.37	22.38	23.7
15	16QAM	75	0	22.45	22.32	22.35	
15	64QAM	1	0	21.71	22.45	22.43	
15	64QAM	1	37	21.70	22.51	22.51	23.7
15	64QAM	1	74	22.41	22.16	22.49	
15	64QAM	36	0	20.70	21.34	20.97	
15	64QAM	36	20	20.44	21.43	21.36	22.7
15	64QAM	36	39	21.00	20.91	21.37	
15	64QAM	75	0	20.86	21.39	21.33	
Channel				133172	133272	133422	Tune-up limit (dBm)
Frequency (MHz)				668	678	683	
10	QPSK	1	0	24.27	24.17	24.29	25.7
10	QPSK	1	25	24.19	24.16	24.20	
10	QPSK	1	49	24.17	24.27	24.18	
10	QPSK	25	0	23.33	23.31	23.33	24.7
10	QPSK	25	12	23.33	23.43	23.26	
10	QPSK	25	25	23.24	23.30	23.27	
10	QPSK	50	0	23.41	23.40	23.26	24.7
10	16QAM	1	0	23.71	23.36	23.60	
10	16QAM	1	25	23.62	23.63	23.53	
10	16QAM	1	49	23.62	23.61	23.47	23.7
10	16QAM	25	0	22.27	22.28	22.30	
10	16QAM	25	12	22.28	22.38	22.33	
10	16QAM	25	25	22.14	22.38	22.23	23.7
10	16QAM	50	0	22.32	22.42	22.24	
10	64QAM	1	0	21.75	21.80	22.44	
10	64QAM	1	25	21.73	22.52	22.48	23.7
10	64QAM	1	49	21.70	22.46	22.13	
10	64QAM	25	0	20.70	21.34	21.35	
10	64QAM	25	12	20.33	21.41	21.36	22.7
10	64QAM	25	25	20.40	21.38	21.31	
10	64QAM	50	0	20.33	21.36	21.30	
Channel				133147	133247	133447	Tune-up limit (dBm)
Frequency (MHz)				665.5	675.5	695.5	
5	QPSK	1	0	24.07	24.21	24.21	25.7
5	QPSK	1	12	24.33	24.20	24.17	
5	QPSK	1	24	24.22	24.20	24.18	
5	QPSK	12	0	23.33	23.35	23.25	24.7
5	QPSK	12	7	23.30	23.36	23.33	
5	QPSK	12	13	23.32	23.30	23.28	
5	QPSK	25	0	23.32	23.37	23.25	24.7
5	16QAM	1	0	23.51	23.53	23.67	
5	16QAM	1	12	23.51	23.55	23.55	
5	16QAM	1	24	23.48	23.53	23.47	23.7
5	16QAM	12	0	22.16	22.40	22.33	
5	16QAM	12	7	22.31	22.37	22.34	
5	16QAM	12	13	22.38	22.34	22.27	23.7
5	16QAM	25	0	22.24	22.39	22.29	
5	64QAM	1	0	21.78	21.74	22.47	
5	64QAM	1	12	21.72	22.51	22.39	23.7
5	64QAM	1	24	21.70	22.56	21.87	
5	64QAM	12	0	20.70	21.16	21.31	
5	64QAM	12	7	20.42	21.41	21.39	22.7
5	64QAM	12	13	20.40	21.40	21.19	
5	64QAM	25	0	20.23	21.10	21.23	



Band 2							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch.	Power Mid Ch.	Power High Ch.	Tune-up limit (dbm)
Channel				18700	18900	19100	
Frequency (MHz)				1860	1880	1900	
20	QPSK	1	0	18.50	18.46	18.43	19.7
20	QPSK	1	49	18.36	18.44	18.35	
20	QPSK	1	99	18.39	18.43	18.39	
20	QPSK	50	0	18.48	18.50	18.53	19.7
20	QPSK	50	24	18.58	18.57	18.54	
20	QPSK	50	50	18.56	18.55	18.55	
20	QPSK	100	0	18.58	18.52	18.55	19.7
20	16QAM	1	0	18.76	18.81	18.78	
20	16QAM	1	49	18.74	18.83	18.70	
20	16QAM	1	99	18.69	18.80	18.70	19.7
20	16QAM	50	0	18.48	18.53	18.53	
20	16QAM	50	24	18.58	18.56	18.55	
20	16QAM	50	50	18.58	18.56	18.57	19.7
20	16QAM	100	0	18.55	18.53	18.50	
20	64QAM	1	0	18.67	18.67	18.71	
20	64QAM	1	49	18.65	18.67	18.61	19.7
20	64QAM	1	99	18.67	18.63	18.63	
20	64QAM	50	0	18.51	18.53	18.57	
20	64QAM	50	24	18.61	18.61	18.56	19.7
20	64QAM	50	50	18.60	18.61	18.57	
20	64QAM	100	0	18.56	18.57	18.53	
Channel				1867.5	18900	19125	Tune-up limit (dbm)
Frequency (MHz)				1857.5	1880	1902.5	
15	QPSK	1	0	18.50	18.41	18.34	19.7
15	QPSK	1	37	18.29	18.40	18.33	
15	QPSK	1	74	18.34	18.33	18.30	
15	QPSK	36	0	18.48	18.49	18.48	19.7
15	QPSK	36	20	18.49	18.57	18.52	
15	QPSK	36	39	18.55	18.54	18.46	
15	QPSK	75	0	18.54	18.44	18.52	19.7
15	16QAM	1	0	18.66	18.76	18.69	
15	16QAM	1	37	18.68	18.73	18.65	
15	16QAM	1	74	18.62	18.80	18.68	19.7
15	16QAM	36	0	18.39	18.43	18.53	
15	16QAM	36	20	18.54	18.54	18.49	
15	16QAM	36	39	18.52	18.49	18.56	19.7
15	16QAM	75	0	18.52	18.44	18.45	
15	64QAM	1	0	18.67	18.60	18.62	
15	64QAM	1	37	18.64	18.67	18.52	19.7
15	64QAM	1	74	18.67	18.53	18.61	
15	64QAM	36	0	18.47	18.51	18.51	
15	64QAM	36	20	18.61	18.51	18.48	19.7
15	64QAM	36	39	18.54	18.61	18.47	
15	64QAM	75	0	18.55	18.56	18.53	
Channel				18650	18900	19150	Tune-up limit (dbm)
Frequency (MHz)				1855	1880	1905	
10	QPSK	1	0	18.44	18.37	18.43	19.7
10	QPSK	1	25	18.33	18.41	18.25	
10	QPSK	1	49	18.30	18.38	18.36	
10	QPSK	25	0	18.39	18.48	18.53	19.7
10	QPSK	25	12	18.62	18.53	18.47	
10	QPSK	25	25	18.53	18.46	18.55	
10	QPSK	50	0	18.48	18.42	18.45	19.7
10	16QAM	1	0	18.75	18.79	18.74	
10	16QAM	1	25	18.66	18.79	18.61	
10	16QAM	1	49	18.69	18.74	18.68	19.7
10	16QAM	25	0	18.40	18.46	18.52	
10	16QAM	25	12	18.48	18.46	18.55	
10	16QAM	25	25	18.54	18.51	18.56	19.7
10	16QAM	50	0	18.47	18.45	18.41	
10	64QAM	1	0	18.63	18.66	18.64	
10	64QAM	1	25	18.64	18.61	18.53	19.7
10	64QAM	1	49	18.58	18.61	18.58	
10	64QAM	25	0	18.48	18.49	18.54	
10	64QAM	25	12	18.55	18.61	18.53	19.7
10	64QAM	25	25	18.58	18.57	18.55	
10	64QAM	50	0	18.55	18.54	18.49	
Channel				1862.5	18900	19175	Tune-up limit (dbm)
Frequency (MHz)				1852.5	1880	1907.5	
5	QPSK	1	0	18.42	18.37	18.34	19.7
5	QPSK	1	12	18.31	18.36	18.30	
5	QPSK	1	24	18.36	18.39	18.37	
5	QPSK	12	0	18.42	18.50	18.50	19.7
5	QPSK	12	7	18.56	18.53	18.46	
5	QPSK	12	13	18.54	18.46	18.46	
5	QPSK	25	0	18.55	18.45	18.55	19.7
5	16QAM	1	0	18.71	18.76	18.70	
5	16QAM	1	12	18.71	18.83	18.62	
5	16QAM	1	24	18.68	18.76	18.64	19.7
5	16QAM	12	0	18.39	18.52	18.53	
5	16QAM	12	7	18.53	18.50	18.55	
5	16QAM	12	13	18.55	18.52	18.52	19.7
5	16QAM	25	0	18.55	18.53	18.44	
5	64QAM	1	0	18.67	18.67	18.71	
5	64QAM	1	12	18.65	18.57	18.57	19.7
5	64QAM	1	24	18.57	18.57	18.56	
5	64QAM	12	0	18.49	18.48	18.51	
5	64QAM	12	7	18.52	18.56	18.56	19.7
5	64QAM	12	13	18.57	18.51	18.47	
5	64QAM	25	0	18.52	18.47	18.53	
Channel				18615	18900	19185	Tune-up limit (dbm)
Frequency (MHz)				1851.5	1880	1906.5	
3	QPSK	1	0	18.45	18.39	18.36	19.7
3	QPSK	1	8	18.30	18.44	18.34	
3	QPSK	1	14	18.29	18.38	18.31	
3	QPSK	8	0	18.39	18.42	18.45	19.7
3	QPSK	8	4	18.50	18.54	18.53	
3	QPSK	8	7	18.56	18.53	18.53	
3	QPSK	15	0	18.55	18.47	18.52	19.7
3	16QAM	1	0	18.74	18.81	18.70	
3	16QAM	1	8	18.73	18.75	18.64	
3	16QAM	1	14	18.69	18.76	18.66	19.7
3	16QAM	8	0	18.44	18.45	18.46	
3	16QAM	8	4	18.54	18.50	18.48	
3	16QAM	8	7	18.48	18.48	18.48	19.7
3	16QAM	15	0	18.47	18.52	18.45	
3	64QAM	1	0	18.62	18.65	18.65	
3	64QAM	1	8	18.60	18.57	18.51	19.7
3	64QAM	1	14	18.61	18.59	18.53	
3	64QAM	8	0	18.50	18.49	18.49	
3	64QAM	8	4	18.57	18.53	18.52	19.7
3	64QAM	8	7	18.59	18.59	18.56	
3	64QAM	15	0	18.55	18.49	18.48	
Channel				18607	18900	19193	Tune-up limit (dbm)
Frequency (MHz)				1850.7	1880	1909.3	
1.4	QPSK	1	0	18.31	18.40	18.29	19.7
1.4	QPSK	1	3	18.36	18.43	18.34	
1.4	QPSK	1	5	18.30	18.41	18.25	
1.4	QPSK	3	0	18.35	18.45	18.30	19.7
1.4	QPSK	3	1	18.41	18.50	18.34	
1.4	QPSK	3	3	18.36	18.43	18.30	
1.4	QPSK	6	0	18.39	18.50	18.37	19.7
1.4	16QAM	1	0	18.62	18.74	18.60	
1.4	16QAM	1	3	18.70	18.79	18.70	
1.4	16QAM	1	5	18.63	18.73	18.61	19.7
1.4	16QAM	3	0	18.41	18.52	18.39	
1.4	16QAM	3	1	18.50	18.58	18.44	
1.4	16QAM	3	3	18.40	18.51	18.40	19.7
1.4	16QAM	6	0	18.50	18.60	18.48	
1.4	64QAM	1	0	18.72	18.68	18.54	
1.4	64QAM	1	3	18.68	18.73	18.60	19.7
1.4	64QAM	1	5	18.58	18.66	18.53	
1.4	64QAM	3	0	18.54	18.64	18.53	
1.4	64QAM	3	1	18.60	18.67	18.56	19.7
1.4	64QAM	3	3	18.56	18.65	18.53	
1.4	64QAM	6	0	18.45	18.55	18.41	



Band 4							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				20050	20175	20300	
Frequency (MHz)				1720	1732.5	1745	
20	QPSK	1	0	20.05	20.09	19.99	21.9
20	QPSK	1	49	19.93	19.92	19.91	
20	QPSK	1	99	19.95	19.92	19.90	
20	QPSK	50	0	20.10	20.09	20.01	21.9
20	QPSK	50	24	20.16	20.08	20.00	
20	QPSK	50	50	20.07	20.01	19.96	
20	QPSK	100	0	20.11	20.13	19.90	21.9
20	16QAM	1	0	20.39	20.41	20.33	
20	16QAM	1	49	20.28	20.23	20.16	
20	16QAM	1	99	20.30	20.17	20.07	21.9
20	16QAM	50	0	20.13	20.11	20.02	
20	16QAM	50	24	20.15	20.13	20.05	
20	16QAM	50	50	20.10	20.04	19.96	21.9
20	16QAM	100	0	20.12	20.11	19.96	
20	64QAM	1	0	20.21	20.25	20.19	
20	64QAM	1	49	20.13	20.07	20.08	21.9
20	64QAM	1	99	20.16	20.09	20.11	
20	64QAM	50	0	20.14	20.16	20.07	
20	64QAM	50	24	20.15	20.11	20.07	21.9
20	64QAM	50	50	20.09	20.04	19.99	
20	64QAM	100	0	20.12	20.10	19.96	
Channel				20225	20175	20325	Tune-up limit (dBm)
Frequency (MHz)				1717.5	1732.5	1747.5	
15	QPSK	1	0	20.03	20.00	19.92	21.9
15	QPSK	1	37	19.93	19.91	19.90	
15	QPSK	1	74	19.95	19.92	19.92	
15	QPSK	36	0	20.08	20.01	19.93	21.9
15	QPSK	36	20	20.11	20.02	19.90	
15	QPSK	36	39	19.99	19.96	19.90	
15	QPSK	75	0	20.02	20.12	19.91	21.9
15	16QAM	1	0	20.39	20.32	20.23	
15	16QAM	1	37	20.26	20.23	20.06	
15	16QAM	1	74	20.23	20.10	20.00	21.9
15	16QAM	36	0	20.03	20.06	20.01	
15	16QAM	36	20	20.14	20.09	20.01	
15	16QAM	36	39	20.05	20.04	19.91	21.9
15	16QAM	75	0	20.09	20.05	19.96	
15	64QAM	1	0	20.12	20.20	20.14	
15	64QAM	1	37	20.04	19.98	19.98	21.9
15	64QAM	1	74	20.14	20.04	20.07	
15	64QAM	36	0	20.07	20.06	20.01	
15	64QAM	36	20	20.10	20.10	19.98	21.9
15	64QAM	36	39	20.04	20.03	19.96	
15	64QAM	75	0	20.08	20.03	19.90	
Channel				20000	20175	20350	Tune-up limit (dBm)
Frequency (MHz)				1715	1732.5	1750	
10	QPSK	1	0	20.01	20.03	19.98	21.9
10	QPSK	1	25	19.91	19.92	19.93	
10	QPSK	1	49	19.90	19.94	19.91	
10	QPSK	25	0	20.08	20.02	19.91	21.9
10	QPSK	25	12	20.07	19.99	19.91	
10	QPSK	25	25	19.98	20.00	19.96	
10	QPSK	50	0	20.10	20.05	19.92	21.9
10	16QAM	1	0	20.34	20.32	20.27	
10	16QAM	1	25	20.17	20.21	20.05	
10	16QAM	1	49	20.20	20.11	20.06	21.9
10	16QAM	25	0	20.12	20.01	19.98	
10	16QAM	25	12	20.05	20.05	20.01	
10	16QAM	25	25	20.10	19.95	19.92	21.9
10	16QAM	50	0	20.05	20.07	19.93	
10	64QAM	1	0	20.16	20.19	20.13	
10	64QAM	1	25	20.10	19.99	20.01	21.9
10	64QAM	1	49	20.07	20.05	20.07	
10	64QAM	25	0	20.14	20.12	20.04	
10	64QAM	25	12	20.06	20.04	20.00	21.9
10	64QAM	25	25	20.02	20.04	19.93	
10	64QAM	50	0	20.02	20.10	19.94	
Channel				19275	20175	20375	Tune-up limit (dBm)
Frequency (MHz)				1712.5	1732.5	1752.5	
5	QPSK	1	0	19.95	20.09	19.90	21.9
5	QPSK	1	12	19.95	19.92	19.90	
5	QPSK	1	24	19.94	19.92	19.91	
5	QPSK	12	0	20.04	20.01	19.93	21.9
5	QPSK	12	7	20.07	19.99	19.97	
5	QPSK	12	13	20.00	19.95	19.92	
5	QPSK	25	0	20.10	20.06	19.91	21.9
5	16QAM	1	0	20.37	20.41	20.30	
5	16QAM	1	12	20.24	20.16	20.12	
5	16QAM	1	24	20.27	20.15	19.97	21.9
5	16QAM	12	0	20.08	20.06	19.97	
5	16QAM	12	7	20.10	20.10	19.96	
5	16QAM	12	13	20.07	19.95	19.90	21.9
5	16QAM	25	0	20.07	20.06	19.93	
5	64QAM	1	0	20.15	20.25	20.16	
5	64QAM	1	12	20.03	20.01	20.08	21.9
5	64QAM	1	24	20.13	20.03	20.08	
5	64QAM	12	0	20.10	20.15	19.99	
5	64QAM	12	7	20.15	20.03	20.05	21.9
5	64QAM	12	13	20.00	20.02	19.95	
5	64QAM	25	0	20.08	20.08	19.90	
Channel				19965	20175	20385	Tune-up limit (dBm)
Frequency (MHz)				1711.5	1732.5	1753.5	
3	QPSK	1	0	19.98	20.07	19.95	21.9
3	QPSK	1	8	19.94	19.91	19.92	
3	QPSK	1	14	19.94	19.91	19.90	
3	QPSK	8	0	20.01	20.05	19.99	21.9
3	QPSK	8	4	20.12	19.96	20.00	
3	QPSK	8	7	20.04	19.96	19.93	
3	QPSK	15	0	20.03	20.12	19.91	21.9
3	16QAM	1	0	20.33	20.36	20.26	
3	16QAM	1	8	20.17	20.14	20.14	
3	16QAM	1	14	20.22	20.10	20.01	21.9
3	16QAM	8	0	20.06	20.05	19.96	
3	16QAM	8	4	20.11	20.07	20.01	
3	16QAM	8	7	20.06	19.95	19.90	21.9
3	16QAM	15	0	20.04	20.06	19.95	
3	64QAM	1	0	20.14	20.25	20.16	
3	64QAM	1	8	20.06	19.97	20.07	21.9
3	64QAM	1	14	20.14	20.06	20.05	
3	64QAM	8	0	20.07	20.14	20.01	
3	64QAM	8	4	20.14	20.01	20.03	21.9
3	64QAM	8	7	20.04	19.97	19.96	
3	64QAM	15	0	20.04	20.07	19.91	
Channel				19957	20175	20393	Tune-up limit (dBm)
Frequency (MHz)				1710.7	1732.5	1754.3	
1.4	QPSK	1	0	19.95	19.93	19.92	21.9
1.4	QPSK	1	3	20.01	19.97	19.94	
1.4	QPSK	1	5	19.91	19.94	19.90	
1.4	QPSK	3	0	19.98	19.91	19.90	21.9
1.4	QPSK	3	1	20.02	19.95	19.90	
1.4	QPSK	3	3	19.99	19.90	19.92	
1.4	QPSK	6	0	20.04	20.00	19.92	21.9
1.4	16QAM	1	0	20.27	20.16	20.10	
1.4	16QAM	1	3	20.30	20.25	20.15	
1.4	16QAM	1	5	20.25	20.21	20.08	21.9
1.4	16QAM	3	0	20.02	19.95	19.93	
1.4	16QAM	3	1	20.05	20.01	19.96	
1.4	16QAM	3	3	20.01	19.94	19.91	21.9
1.4	16QAM	6	0	20.12	20.03	19.96	
1.4	64QAM	1	0	20.23	20.17	20.02	
1.4	64QAM	1	3	20.27	20.20	20.04	21.9
1.4	64QAM	1	5	20.22	20.13	19.94	
1.4	64QAM	3	0	20.18	20.12	19.98	
1.4	64QAM	3	1	20.23	20.18	20.04	21.9
1.4	64QAM	3	3	20.17	20.13	19.98	
1.4	64QAM	6	0	20.04	20.00	19.90	



Band 5							
Ant 1							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch./	Power Middle Ch./	Power High Ch./	Tune-up limit (dBm)
Channel				20450	20525	20600	
Frequency (MHz)				829	836.5	844	
10	QPSK	1	0	24.09	24.12	24.20	25.7
10	QPSK	1	25	23.99	24.14	24.15	
10	QPSK	1	49	24.18	24.24	24.16	
10	QPSK	25	0	23.22	23.22	23.21	24.7
10	QPSK	25	12	23.27	23.24	23.31	
10	QPSK	25	25	23.26	23.28	23.27	
10	QPSK	50	0	23.24	23.26	23.25	24.7
10	16QAM	1	0	23.42	23.48	23.50	
10	16QAM	1	25	23.44	23.49	23.59	
10	16QAM	1	49	23.55	23.64	23.48	23.7
10	16QAM	25	0	22.17	22.28	22.24	
10	16QAM	25	12	22.32	22.27	22.30	
10	16QAM	25	25	22.19	22.25	22.38	23.7
10	16QAM	50	0	22.31	22.26	22.33	
10	64QAM	1	0	22.88	22.77	22.86	
10	64QAM	1	25	22.95	22.74	22.89	23.7
10	64QAM	1	49	22.95	22.56	22.14	
10	64QAM	25	0	21.70	21.80	21.65	
10	64QAM	25	12	21.81	21.83	21.85	22.7
10	64QAM	25	25	21.83	21.79	21.64	
10	64QAM	50	0	21.88	21.80	21.51	
Channel				20425	20525	20625	Tune-up limit (dBm)
Frequency (MHz)				826.5	836.5	846.5	
5	QPSK	1	0	24.19	24.13	24.18	25.7
5	QPSK	1	12	24.09	24.21	23.89	
5	QPSK	1	24	24.08	24.12	23.96	
5	QPSK	12	0	23.30	23.27	23.23	24.7
5	QPSK	12	7	23.23	23.30	23.00	
5	QPSK	12	13	23.14	23.25	23.05	
5	QPSK	25	0	23.22	23.21	23.15	24.7
5	16QAM	1	0	23.57	23.50	23.47	
5	16QAM	1	12	23.39	23.54	23.21	
5	16QAM	1	24	23.39	23.55	23.17	23.7
5	16QAM	12	0	22.26	22.34	22.26	
5	16QAM	12	7	22.20	22.31	22.18	
5	16QAM	12	13	22.19	22.30	22.22	23.7
5	16QAM	25	0	22.26	22.22	22.30	
5	64QAM	1	0	22.94	22.94	22.53	
5	64QAM	1	12	22.83	22.89	21.92	23.7
5	64QAM	1	24	22.81	22.82	21.84	
5	64QAM	12	0	21.84	21.90	21.19	
5	64QAM	12	7	21.75	21.81	20.82	22.7
5	64QAM	12	13	21.78	21.83	21.71	
5	64QAM	25	0	21.70	21.81	20.89	
Channel				20415	20525	20635	Tune-up limit (dBm)
Frequency (MHz)				825.5	836.5	847.5	
3	QPSK	1	0	24.12	24.15	23.99	25.7
3	QPSK	1	8	24.17	24.20	23.99	
3	QPSK	1	14	24.08	24.13	24.04	
3	QPSK	8	0	23.28	23.24	22.89	24.7
3	QPSK	8	4	23.19	23.27	23.03	
3	QPSK	8	7	23.25	23.23	23.20	
3	QPSK	15	0	23.20	23.22	23.02	24.7
3	16QAM	1	0	23.50	23.43	23.20	
3	16QAM	1	8	23.50	23.53	23.21	
3	16QAM	1	14	23.41	23.51	23.27	23.7
3	16QAM	8	0	22.33	22.29	22.05	
3	16QAM	8	4	22.23	22.39	22.15	
3	16QAM	8	7	22.24	22.33	22.19	23.7
3	16QAM	15	0	22.30	22.30	22.10	
3	64QAM	1	0	22.91	22.86	21.84	
3	64QAM	1	8	22.90	23.03	21.82	23.7
3	64QAM	1	14	22.90	22.88	21.79	
3	64QAM	8	0	21.75	21.80	21.63	
3	64QAM	8	4	21.83	21.88	21.73	22.7
3	64QAM	8	7	21.76	21.80	20.75	
3	64QAM	15	0	21.78	21.85	20.77	
Channel				20407	20525	20643	Tune-up limit (dBm)
Frequency (MHz)				824.7	836.5	848.3	
1.4	QPSK	1	0	24.11	24.14	24.03	25.7
1.4	QPSK	1	3	24.10	24.10	24.15	
1.4	QPSK	1	5	23.95	24.09	24.02	
1.4	QPSK	3	0	24.15	24.08	24.06	24.7
1.4	QPSK	3	1	24.10	24.13	24.19	
1.4	QPSK	3	3	24.09	24.08	24.12	
1.4	QPSK	6	0	23.11	23.27	23.23	24.7
1.4	16QAM	1	0	23.38	23.40	23.32	
1.4	16QAM	1	3	23.38	23.55	23.53	
1.4	16QAM	1	5	23.33	23.42	23.39	24.7
1.4	16QAM	3	0	23.15	23.20	23.11	
1.4	16QAM	3	1	23.22	23.29	23.23	
1.4	16QAM	3	3	23.13	23.20	23.15	23.7
1.4	16QAM	6	0	22.19	22.29	22.31	
1.4	64QAM	1	0	22.79	22.85	21.81	
1.4	64QAM	1	3	22.82	22.95	21.84	23.7
1.4	64QAM	1	5	22.75	22.82	21.98	
1.4	64QAM	3	0	22.75	22.76	21.77	
1.4	64QAM	3	1	22.79	22.89	21.84	23.7
1.4	64QAM	3	3	22.74	22.88	22.00	
1.4	64QAM	6	0	21.70	21.79	21.65	



Band 7							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				20850	21100	21350	
Frequency (MHz)				2510	2535	2560	
20	QPSK	1	0	20.46	20.57	20.58	22.4
20	QPSK	1	49	20.52	20.66	20.62	
20	QPSK	1	99	20.62	20.72	20.63	
20	QPSK	50	0	20.58	20.71	20.69	22.4
20	QPSK	50	24	20.68	20.75	20.72	
20	QPSK	50	50	20.69	20.84	20.76	
20	QPSK	100	0	20.69	20.73	20.70	22.4
20	16QAM	1	0	20.80	20.89	20.96	
20	16QAM	1	49	20.88	21.02	20.95	
20	16QAM	1	99	21.02	21.11	21.00	22.4
20	16QAM	50	0	20.56	20.72	20.70	
20	16QAM	50	24	20.73	20.76	20.73	
20	16QAM	50	50	20.71	20.85	20.80	22.4
20	16QAM	100	0	20.67	20.73	20.70	
20	64QAM	1	0	20.61	20.70	20.76	
20	64QAM	1	49	20.73	20.82	20.79	22.4
20	64QAM	1	99	20.90	20.96	20.88	
20	64QAM	50	0	20.59	20.71	20.69	
20	64QAM	50	24	20.71	20.76	20.73	21.9
20	64QAM	50	50	20.73	20.84	20.77	
20	64QAM	100	0	20.71	20.75	20.69	
Channel				20925	21100	21375	Tune-up limit (dBm)
Frequency (MHz)				2507.5	2535	2562.5	
15	QPSK	1	0	20.47	20.42	20.43	22.4
15	QPSK	1	37	20.41	20.48	20.45	
15	QPSK	1	74	20.40	20.55	20.48	
15	QPSK	36	0	20.44	20.52	20.49	22.4
15	QPSK	36	20	20.49	20.56	20.63	
15	QPSK	36	39	20.50	20.63	20.57	
15	QPSK	75	0	20.45	20.54	20.58	22.4
15	16QAM	1	0	20.63	20.78	20.73	
15	16QAM	1	37	20.68	20.82	20.75	
15	16QAM	1	74	20.75	20.89	20.78	22.4
15	16QAM	36	0	20.46	20.53	20.49	
15	16QAM	36	20	20.49	20.55	20.58	
15	16QAM	36	39	20.48	20.64	20.57	22.4
15	16QAM	75	0	20.46	20.56	20.59	
15	64QAM	1	0	20.49	20.59	20.62	
15	64QAM	1	37	20.57	20.74	20.67	22.4
15	64QAM	1	74	20.59	20.78	20.70	
15	64QAM	36	0	20.39	20.56	20.62	
15	64QAM	36	20	20.52	20.59	20.59	21.9
15	64QAM	36	39	20.51	20.68	20.58	
15	64QAM	75	0	20.47	20.56	20.56	
Channel				20800	21100	21400	Tune-up limit (dBm)
Frequency (MHz)				2505	2535	2565	
10	QPSK	1	0	20.43	20.40	20.47	22.4
10	QPSK	1	25	20.45	20.40	20.46	
10	QPSK	1	49	20.53	20.48	20.40	
10	QPSK	25	0	20.43	20.52	20.47	22.4
10	QPSK	25	12	20.45	20.53	20.48	
10	QPSK	25	25	20.46	20.59	20.54	
10	QPSK	50	0	20.44	20.55	20.47	22.4
10	16QAM	1	0	20.62	20.74	20.71	
10	16QAM	1	25	20.64	20.81	20.73	
10	16QAM	1	49	20.67	20.85	20.77	22.4
10	16QAM	25	0	20.41	20.49	20.45	
10	16QAM	25	12	20.45	20.54	20.47	
10	16QAM	25	25	20.44	20.60	20.52	22.4
10	16QAM	50	0	20.45	20.52	20.47	
10	64QAM	1	0	20.52	20.62	20.61	
10	64QAM	1	25	20.56	20.76	20.70	22.4
10	64QAM	1	49	20.56	20.76	20.72	
10	64QAM	25	0	20.42	20.57	20.49	
10	64QAM	25	12	20.48	20.61	20.55	21.9
10	64QAM	25	25	20.46	20.66	20.59	
10	64QAM	50	0	20.47	20.59	20.53	
Channel				20775	21100	21425	Tune-up limit (dBm)
Frequency (MHz)				2502.5	2535	2567.5	
5	QPSK	1	0	20.40	20.40	20.40	22.4
5	QPSK	1	12	20.40	20.48	20.41	
5	QPSK	1	24	20.40	20.48	20.40	
5	QPSK	12	0	20.41	20.54	20.52	22.4
5	QPSK	12	7	20.47	20.53	20.54	
5	QPSK	12	13	20.44	20.61	20.51	
5	QPSK	25	0	20.44	20.55	20.52	22.4
5	16QAM	1	0	20.68	20.75	20.73	
5	16QAM	1	12	20.62	20.73	20.70	
5	16QAM	1	24	20.68	20.80	20.73	22.4
5	16QAM	12	0	20.49	20.56	20.56	
5	16QAM	12	7	20.46	20.54	20.51	
5	16QAM	12	13	20.43	20.66	20.52	22.4
5	16QAM	25	0	20.42	20.55	20.55	
5	64QAM	1	0	20.52	20.68	20.65	
5	64QAM	1	12	20.50	20.75	20.65	22.4
5	64QAM	1	24	20.54	20.74	20.65	
5	64QAM	12	0	20.49	20.65	20.60	
5	64QAM	12	7	20.48	20.60	20.58	21.9
5	64QAM	12	13	20.48	20.67	20.57	
5	64QAM	25	0	20.43	20.59	20.57	



Band 12							
Ant 1							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low [dB]	Power Middle [dB]	Power High [dB]	Tune-up limit [dBm]
Channel				23060	23095	23130	
Frequency (MHz)				704	707.5	711	
10	QPSK	1	0	23.86	23.82	23.80	25.7
10	QPSK	1	25	23.75	23.85	23.77	
10	QPSK	1	49	23.89	23.88	23.81	
10	QPSK	25	0	22.95	22.92	22.90	
10	QPSK	25	12	23.03	22.92	22.98	24.7
10	QPSK	25	25	23.01	22.94	22.95	
10	QPSK	50	0	22.97	22.99	22.97	
10	16QAM	1	0	23.25	23.19	23.14	24.7
10	16QAM	1	25	23.25	23.24	23.19	
10	16QAM	1	49	23.30	23.28	23.19	
10	16QAM	25	0	21.94	21.92	21.86	
10	16QAM	25	12	22.01	21.86	21.92	23.7
10	16QAM	25	25	21.88	22.00	21.87	
10	16QAM	50	0	22.02	21.94	21.88	
10	64QAM	1	0	22.58	22.53	22.58	23.7
10	64QAM	1	25	22.63	22.67	22.64	
10	64QAM	1	49	22.68	22.68	22.58	
10	64QAM	25	0	21.49	21.44	21.40	
10	64QAM	25	12	21.58	21.43	21.57	22.7
10	64QAM	25	25	21.47	21.47	21.41	
10	64QAM	50	0	21.59	21.45	21.45	
Channel				23035	23095	23155	Tune-up limit [dBm]
Frequency (MHz)				701.5	707.5	713.5	
5	QPSK	1	0	23.88	23.80	23.79	
5	QPSK	1	12	23.88	23.84	23.84	25.7
5	QPSK	1	24	23.78	23.82	23.80	
5	QPSK	12	0	22.91	22.93	22.91	
5	QPSK	12	7	23.00	22.86	22.96	24.7
5	QPSK	12	13	22.93	22.94	22.85	
5	QPSK	25	0	22.99	22.87	22.91	
5	16QAM	1	0	23.20	23.22	23.09	24.7
5	16QAM	1	12	23.14	23.21	23.15	
5	16QAM	1	24	23.14	23.15	23.09	
5	16QAM	12	0	21.99	21.98	21.94	
5	16QAM	12	7	21.98	21.89	21.93	23.7
5	16QAM	12	13	21.96	21.92	21.87	
5	16QAM	25	0	21.94	21.98	21.92	
5	64QAM	1	0	22.69	22.61	22.58	
5	64QAM	1	12	22.59	22.54	22.60	23.7
5	64QAM	1	24	22.66	22.63	22.56	
5	64QAM	12	0	21.51	21.50	21.41	
5	64QAM	12	7	21.50	21.45	21.50	22.7
5	64QAM	12	13	21.52	21.45	21.42	
5	64QAM	25	0	21.44	21.45	21.39	
Channel				23025	23095	23165	Tune-up limit [dBm]
Frequency (MHz)				700.5	707.5	714.5	
3	QPSK	1	0	23.84	23.80	23.81	25.7
3	QPSK	1	8	23.85	23.84	23.80	
3	QPSK	1	14	23.85	23.83	23.77	
3	QPSK	8	0	23.01	22.94	22.90	
3	QPSK	8	4	22.92	22.95	22.91	24.7
3	QPSK	8	7	22.90	22.87	22.84	
3	QPSK	15	0	22.90	22.92	22.84	
3	16QAM	1	0	23.24	23.15	23.17	24.7
3	16QAM	1	8	23.19	23.23	23.16	
3	16QAM	1	14	23.23	23.22	23.18	
3	16QAM	8	0	22.06	21.94	21.94	
3	16QAM	8	4	22.01	22.06	22.01	23.7
3	16QAM	8	7	22.03	21.92	21.88	
3	16QAM	15	0	22.01	21.86	21.86	
3	64QAM	1	0	22.70	22.60	22.53	23.7
3	64QAM	1	8	22.68	22.72	22.60	
3	64QAM	1	14	22.66	22.60	22.57	
3	64QAM	8	0	21.60	21.44	21.47	
3	64QAM	8	4	21.60	21.50	21.53	22.7
3	64QAM	8	7	21.47	21.45	21.41	
3	64QAM	15	0	21.45	21.39	21.36	
Channel				23017	23095	23173	Tune-up limit [dBm]
Frequency (MHz)				699.7	707.5	715.3	
1.4	QPSK	1	0	23.80	23.74	23.79	
1.4	QPSK	1	3	23.81	23.79	23.77	25.7
1.4	QPSK	1	5	23.80	23.74	23.70	
1.4	QPSK	3	0	23.82	23.73	23.71	
1.4	QPSK	3	1	23.84	23.75	23.79	
1.4	QPSK	3	3	23.78	23.75	23.71	
1.4	QPSK	6	0	22.97	22.78	22.79	24.7
1.4	16QAM	1	0	23.15	23.06	23.09	
1.4	16QAM	1	3	23.18	23.21	23.09	
1.4	16QAM	1	5	23.08	23.08	22.98	24.7
1.4	16QAM	3	0	22.96	22.81	22.80	
1.4	16QAM	3	1	22.96	22.87	22.88	
1.4	16QAM	3	3	22.92	22.88	22.78	23.7
1.4	16QAM	6	0	21.94	21.86	21.82	
1.4	64QAM	1	0	22.59	22.48	22.43	
1.4	64QAM	1	3	22.69	22.57	22.48	
1.4	64QAM	1	5	22.55	22.46	22.43	23.7
1.4	64QAM	3	0	22.57	22.51	22.45	
1.4	64QAM	3	1	22.55	22.45	22.53	
1.4	64QAM	3	3	22.55	22.57	22.46	
1.4	64QAM	6	0	21.40	21.32	21.31	22.7



Band 13							
Ant 1							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				23230			
Frequency (MHz)				762			
10	QPSK	1	0	23.60			25.2
10	QPSK	1	25	23.47			
10	QPSK	1	49	23.51			
10	QPSK	25	0	22.58			24.2
10	QPSK	25	12	22.65			
10	QPSK	25	25	22.56			
10	QPSK	50	0	22.58			24.2
10	16QAM	1	0	22.75			
10	16QAM	1	25	22.82			
10	16QAM	1	49	22.78			23.2
10	16QAM	25	0	21.59			
10	16QAM	25	12	21.62			
10	16QAM	25	25	21.61			23.2
10	16QAM	50	0	21.57			
10	64QAM	1	0	23.07			
10	64QAM	1	25	23.04			23.2
10	64QAM	1	49	23.01			
10	64QAM	25	0	22.07			
10	64QAM	25	12	22.06			22.2
10	64QAM	25	25	22.02			
10	64QAM	50	0	22.04			
Channel				23206 23230 23255			Tune-up limit (dBm)
Frequency (MHz)				779.5 762 784.5			
5	QPSK	1	0	23.50	23.45	23.49	25.2
5	QPSK	1	12	23.45	23.54	23.52	
5	QPSK	1	24	23.50	23.51	23.52	
5	QPSK	12	0	22.63	22.56	22.61	24.2
5	QPSK	12	7	22.67	22.64	22.57	
5	QPSK	12	13	22.67	22.62	22.52	
5	QPSK	25	0	22.64	22.57	22.55	24.2
5	16QAM	1	0	22.71	22.71	22.78	
5	16QAM	1	12	22.78	22.85	22.79	
5	16QAM	1	24	22.82	22.85	22.72	23.2
5	16QAM	12	0	21.70	21.62	21.68	
5	16QAM	12	7	21.68	21.57	21.60	
5	16QAM	12	13	21.69	21.60	21.70	23.2
5	16QAM	25	0	21.63	21.64	21.54	
5	64QAM	1	0	22.14	22.25	22.17	
5	64QAM	1	12	22.26	22.30	22.21	23.2
5	64QAM	1	24	22.26	22.23	22.15	
5	64QAM	12	0	21.19	21.11	21.20	
5	64QAM	12	7	21.24	21.14	21.08	22.2
5	64QAM	12	13	21.15	21.17	21.08	
5	64QAM	25	0	21.21	21.11	21.10	



Band 14							
Ant 1							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				23330	23330		
Frequency (MHz)				793			
10	QPSK	1	0	24.23			25.7
10	QPSK	1	25	24.12			
10	QPSK	1	49	24.04			
10	QPSK	25	0	23.11			
10	QPSK	25	12	23.16			24.7
10	QPSK	25	25	23.16			
10	QPSK	50	0	23.15			
10	16QAM	1	0	23.49			24.7
10	16QAM	1	25	23.41			
10	16QAM	1	49	23.37			
10	16QAM	25	0	22.10			
10	16QAM	25	12	22.09			23.7
10	16QAM	25	25	22.19			
10	16QAM	50	0	22.16			
10	64QAM	1	0	22.81			23.7
10	64QAM	1	25	22.86			
10	64QAM	1	49	22.73			
10	64QAM	25	0	21.72			
10	64QAM	25	12	21.81			22.7
10	64QAM	25	25	21.67			
10	64QAM	50	0	21.66			
Channel				23306	23330	23356	Tune-up limit (dBm)
Frequency (MHz)				790.5	793	795.5	
5	QPSK	1	0	23.98	24.04	24.05	
5	QPSK	1	12	24.14	24.19	24.14	25.7
5	QPSK	1	24	24.08	24.07	24.05	
5	QPSK	12	0	23.13	23.12	23.08	
5	QPSK	12	7	23.21	23.21	23.14	24.7
5	QPSK	12	13	23.14	23.16	23.12	
5	QPSK	25	0	23.11	23.12	23.03	
5	16QAM	1	0	23.40	23.37	23.34	
5	16QAM	1	12	23.47	23.44	23.43	24.7
5	16QAM	1	24	23.45	23.34	23.39	
5	16QAM	12	0	22.13	22.09	22.10	
5	16QAM	12	7	22.24	22.13	22.18	23.7
5	16QAM	12	13	22.15	22.19	22.15	
5	16QAM	25	0	22.17	22.07	22.08	
5	64QAM	1	0	22.75	22.83	22.82	
5	64QAM	1	12	22.89	22.72	22.82	23.7
5	64QAM	1	24	22.71	22.80	22.80	
5	64QAM	12	0	21.63	21.70	21.65	
5	64QAM	12	7	21.69	21.72	21.71	22.7
5	64QAM	12	13	21.75	21.67	21.65	
5	64QAM	25	0	21.71	21.66	21.61	



Band 17							
Ant 1							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch./	Power Middle Ch./	Power High Ch./	Tune-up limit (dBm)
Channel				23780	23790	23800	
Frequency (MHz)				709	710	711	
10	QPSK	1	0	24.25	24.20	24.11	25.7
10	QPSK	1	25	24.30	24.35	24.15	
10	QPSK	1	49	24.30	24.21	24.20	
10	QPSK	25	0	23.29	23.30	23.28	24.7
10	QPSK	25	12	23.40	23.30	23.28	
10	QPSK	25	25	23.38	23.36	23.44	
10	QPSK	50	0	23.35	23.29	23.30	24.7
10	16QAM	1	0	23.62	23.59	23.59	
10	16QAM	1	25	23.66	23.61	23.58	
10	16QAM	1	49	23.60	23.63	23.62	23.7
10	16QAM	25	0	22.29	22.27	22.30	
10	16QAM	25	12	22.41	22.37	22.28	
10	16QAM	25	25	22.44	22.35	22.45	23.7
10	16QAM	50	0	22.37	22.35	22.25	
10	64QAM	1	0	23.01	22.91	22.99	
10	64QAM	1	25	23.11	23.02	23.01	23.7
10	64QAM	1	49	23.05	23.02	22.93	
10	64QAM	25	0	21.81	21.82	21.78	
10	64QAM	25	12	21.95	21.88	21.82	22.7
10	64QAM	25	25	21.89	21.92	21.97	
10	64QAM	50	0	21.95	21.82	21.85	
Channel				23765	23790	23825	Tune-up limit (dBm)
Frequency (MHz)				706.5	710	713.5	
5	QPSK	1	0	24.16	24.23	24.17	25.7
5	QPSK	1	12	24.32	24.33	24.24	
5	QPSK	1	24	24.30	24.32	24.28	
5	QPSK	12	0	23.28	23.30	23.29	24.7
5	QPSK	12	7	23.31	23.30	23.32	
5	QPSK	12	13	23.40	23.37	23.34	
5	QPSK	25	0	23.34	23.27	23.38	24.7
5	16QAM	1	0	23.61	23.57	23.51	
5	16QAM	1	12	23.64	23.63	23.59	
5	16QAM	1	24	23.62	23.61	23.59	23.7
5	16QAM	12	0	22.38	22.40	22.27	
5	16QAM	12	7	22.39	22.35	22.30	
5	16QAM	12	13	22.34	22.35	22.30	23.7
5	16QAM	25	0	22.35	22.38	22.37	
5	64QAM	1	0	22.79	22.83	23.01	
5	64QAM	1	12	23.01	23.08	22.96	23.7
5	64QAM	1	24	23.04	23.07	22.97	
5	64QAM	12	0	21.93	21.92	21.91	
5	64QAM	12	7	21.96	21.91	21.94	22.7
5	64QAM	12	13	21.92	21.96	21.92	
5	64QAM	25	0	21.86	21.84	21.91	



Band 25							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				26140	26340	26590	
Frequency (MHz)				1860	1880	1905	
20	QPSK	1	0	17.99	18.00	17.88	
20	QPSK	1	48	17.89	17.95	17.84	19.7
20	QPSK	1	99	17.02	17.94	17.86	
20	QPSK	50	0	18.04	18.02	17.93	
20	QPSK	50	24	18.09	18.14	17.93	
20	QPSK	50	50	18.05	18.08	17.92	19.7
20	QPSK	100	0	18.11	18.11	17.95	
20	16QAM	1	0	18.35	18.39	18.24	
20	16QAM	1	49	18.30	18.33	18.17	19.7
20	16QAM	1	99	18.27	18.34	18.22	
20	16QAM	50	0	18.05	18.07	17.96	
20	16QAM	50	24	18.12	18.15	17.98	19.7
20	16QAM	50	50	18.08	18.12	18.03	
20	16QAM	100	0	18.09	18.11	17.93	
20	64QAM	1	0	18.18	18.16	18.06	
20	64QAM	1	49	18.07	18.17	18.06	19.7
20	64QAM	1	99	18.14	18.18	18.16	
20	64QAM	50	0	18.08	18.07	17.98	
20	64QAM	50	24	18.15	18.15	17.97	19.7
20	64QAM	50	50	18.08	18.11	18.05	
20	64QAM	100	0	18.10	18.10	17.97	
Channel				26115	26340	26615	Tune-up limit (dBm)
Frequency (MHz)				1857.5	1880	1907.5	
15	QPSK	1	0	17.93	17.95	17.81	
15	QPSK	1	37	17.83	17.89	17.77	19.7
15	QPSK	1	74	17.91	17.84	17.83	
15	QPSK	36	0	18.00	18.02	17.88	
15	QPSK	36	20	18.08	18.06	17.87	19.7
15	QPSK	36	39	17.95	18.07	17.98	
15	QPSK	75	0	18.03	18.06	17.95	
15	16QAM	1	0	18.31	18.29	18.14	
15	16QAM	1	37	18.29	18.24	18.12	19.7
15	16QAM	1	74	18.27	18.27	18.14	
15	16QAM	36	0	17.99	17.98	17.93	
15	16QAM	36	20	18.05	18.09	17.93	19.7
15	16QAM	36	39	18.03	18.11	17.99	
15	16QAM	75	0	18.03	18.04	17.89	
15	64QAM	1	0	18.11	18.13	18.05	
15	64QAM	1	37	18.00	18.07	18.03	19.7
15	64QAM	1	74	18.10	18.13	18.11	
15	64QAM	36	0	18.05	18.05	17.94	
15	64QAM	36	20	18.05	18.13	17.94	19.7
15	64QAM	36	39	18.03	18.06	18.00	
15	64QAM	75	0	18.06	18.02	17.91	
Channel				26090	26340	26640	Tune-up limit (dBm)
Frequency (MHz)				1855	1880	1910	
10	QPSK	1	0	17.85	17.96	17.87	
10	QPSK	1	25	17.87	17.90	17.84	19.7
10	QPSK	1	49	17.82	17.90	17.75	
10	QPSK	25	0	18.02	17.95	17.91	
10	QPSK	25	12	18.01	18.04	17.90	19.7
10	QPSK	25	25	18.05	18.02	18.01	
10	QPSK	50	0	18.10	18.02	17.90	
10	16QAM	1	0	18.35	18.30	18.17	
10	16QAM	1	25	18.29	18.27	18.18	19.7
10	16QAM	1	49	18.19	18.27	18.14	
10	16QAM	25	0	18.04	18.06	17.94	
10	16QAM	25	12	18.08	18.11	17.98	19.7
10	16QAM	25	25	18.08	18.08	17.98	
10	16QAM	50	0	18.09	18.02	17.90	
10	64QAM	1	0	18.17	18.15	18.03	
10	64QAM	1	25	17.98	18.11	18.03	19.7
10	64QAM	1	49	18.13	18.11	18.16	
10	64QAM	25	0	18.02	18.06	17.94	
10	64QAM	25	12	18.11	18.07	17.95	19.7
10	64QAM	25	25	18.08	18.04	18.02	
10	64QAM	50	0	18.09	18.09	17.95	
Channel				26055	26340	26655	Tune-up limit (dBm)
Frequency (MHz)				1852.5	1880	1912.5	
5	QPSK	1	0	17.95	17.94	17.87	
5	QPSK	1	12	17.86	17.86	17.84	19.7
5	QPSK	1	24	17.90	17.84	17.77	
5	QPSK	12	0	17.96	17.99	17.89	
5	QPSK	12	7	18.09	18.10	17.92	19.7
5	QPSK	12	13	18.04	18.03	17.98	
5	QPSK	25	0	18.09	18.07	17.90	
5	16QAM	1	0	18.35	18.37	18.17	
5	16QAM	1	12	18.29	18.25	18.12	19.7
5	16QAM	1	24	18.17	18.27	18.14	
5	16QAM	12	0	17.99	18.02	17.93	
5	16QAM	12	7	18.06	18.14	17.89	19.7
5	16QAM	12	13	18.04	18.04	17.95	
5	16QAM	25	0	18.01	18.07	17.83	
5	64QAM	1	0	18.11	18.10	18.01	
5	64QAM	1	12	18.01	18.13	18.06	19.7
5	64QAM	1	24	18.04	18.12	18.06	
5	64QAM	12	0	18.08	18.01	17.93	
5	64QAM	12	7	18.05	18.13	17.93	19.7
5	64QAM	12	13	18.05	18.08	17.97	
5	64QAM	25	0	18.00	18.00	17.88	
Channel				26055	26340	26675	Tune-up limit (dBm)
Frequency (MHz)				1851.5	1880	1913.5	
3	QPSK	1	0	17.86	17.91	17.86	
3	QPSK	1	8	17.88	17.90	17.78	19.7
3	QPSK	1	14	17.84	17.93	17.84	
3	QPSK	8	0	17.94	17.94	17.87	
3	QPSK	8	4	18.03	18.06	17.86	19.7
3	QPSK	8	7	18.05	18.04	17.94	
3	QPSK	15	0	18.02	18.01	17.94	
3	16QAM	1	0	18.31	18.34	18.20	
3	16QAM	1	8	18.23	18.32	18.13	19.7
3	16QAM	1	14	18.18	18.31	18.14	
3	16QAM	8	0	17.98	18.02	17.87	
3	16QAM	8	4	18.02	18.07	17.96	19.7
3	16QAM	8	7	18.06	18.09	18.02	
3	16QAM	15	0	18.04	18.09	17.90	
3	64QAM	1	0	18.11	18.07	18.03	
3	64QAM	1	8	18.04	18.17	17.97	19.7
3	64QAM	1	14	18.10	18.15	18.06	
3	64QAM	8	0	18.03	18.03	17.93	
3	64QAM	8	4	18.06	18.10	17.90	19.7
3	64QAM	8	7	18.02	18.11	18.02	
3	64QAM	15	0	18.07	18.04	17.91	
Channel				26047	26340	26683	Tune-up limit (dBm)
Frequency (MHz)				1850.7	1880	1914.3	
1.4	QPSK	1	0	17.87	17.86	17.76	
1.4	QPSK	1	3	18.00	18.03	17.88	19.7
1.4	QPSK	1	5	17.94	17.99	17.83	
1.4	QPSK	3	0	17.81	17.92	17.78	
1.4	QPSK	3	1	17.82	18.05	17.81	
1.4	QPSK	3	3	17.97	18.00	17.85	
1.4	QPSK	6	0	18.02	18.02	17.88	19.7
1.4	16QAM	1	0	18.16	18.13	18.04	
1.4	16QAM	1	3	18.32	18.33	18.17	
1.4	16QAM	1	5	18.21	18.26	18.11	19.7
1.4	16QAM	3	0	17.94	17.95	17.87	
1.4	16QAM	3	1	18.00	18.03	17.92	
1.4	16QAM	3	3	17.98	18.02	17.90	
1.4	16QAM	6	0	18.10	18.12	17.97	19.7
1.4	64QAM	1	0	18.10	18.06	18.00	
1.4	64QAM	1	3	18.19	18.21	18.07	
1.4	64QAM	1	5	18.14	18.14	18.01	19.7
1.4	64QAM	3	0	18.08	18.10	18.00	
1.4	64QAM	3	1	18.18	18.18	18.04	
1.4	64QAM	3	3	18.13	18.16	18.05	
1.4	64QAM	6	0	18.00	18.01	17.91	19.7



Band 26							
Ant 1							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				26765	26865	26965	
Frequency (MHz)				821.5	831.5	841.5	
15	QPSK	1	0	24.04	24.05	24.03	25.7
15	QPSK	1	37	23.98	24.02	24.02	
15	QPSK	1	74	24.10	24.33	23.96	
15	QPSK	36	0	23.17	23.22	23.18	
15	QPSK	36	20	23.23	23.18	23.12	24.7
15	QPSK	36	39	23.19	23.19	23.15	
15	QPSK	75	0	23.23	23.17	23.12	
15	16QAM	1	0	23.36	23.36	23.39	24.7
15	16QAM	1	37	23.38	23.42	23.42	
15	16QAM	1	74	23.43	23.44	23.29	
15	16QAM	36	0	22.16	22.22	22.16	
15	16QAM	36	20	22.17	22.15	22.16	23.7
15	16QAM	36	39	22.14	22.17	22.23	
15	16QAM	75	0	22.17	22.15	22.22	
15	64QAM	1	0	22.79	22.70	22.74	23.7
15	64QAM	1	37	22.72	22.50	22.79	
15	64QAM	1	74	22.80	22.76	22.16	
15	64QAM	36	0	21.64	21.76	21.77	
15	64QAM	36	20	21.66	21.73	21.65	22.7
15	64QAM	36	39	21.67	21.70	21.78	
15	64QAM	75	0	21.76	21.65	21.77	
Channel				26740	26865	26990	Tune-up limit (dBm)
Frequency (MHz)				819	831.5	844	
10	QPSK	1	0	24.13	24.13	24.21	25.7
10	QPSK	1	25	24.03	24.13	24.12	
10	QPSK	1	49	24.09	24.17	24.09	
10	QPSK	25	0	23.22	23.12	23.21	24.7
10	QPSK	25	12	23.20	23.20	23.20	
10	QPSK	25	25	23.16	23.23	23.25	
10	QPSK	50	0	23.23	23.14	23.16	
10	16QAM	1	0	23.45	23.52	23.59	24.7
10	16QAM	1	25	23.55	23.51	23.52	
10	16QAM	1	49	23.53	23.49	23.45	
10	16QAM	25	0	22.22	22.20	22.21	23.7
10	16QAM	25	12	22.23	22.21	22.15	
10	16QAM	25	25	22.17	22.23	22.08	
10	16QAM	50	0	22.20	22.19	22.19	
10	64QAM	1	0	22.96	22.76	22.91	23.7
10	64QAM	1	25	22.81	22.91	22.98	
10	64QAM	1	49	22.93	22.91	22.96	
10	64QAM	25	0	21.76	21.73	21.76	22.7
10	64QAM	25	12	21.62	21.75	21.78	
10	64QAM	25	25	21.70	21.75	21.48	
10	64QAM	50	0	21.74	21.68	21.72	
Channel				26715	26865	27015	Tune-up limit (dBm)
Frequency (MHz)				816.5	831.5	846.5	
5	QPSK	1	0	24.31	24.13	24.11	25.7
5	QPSK	1	19	24.24	24.19	24.09	
5	QPSK	1	24	24.07	24.24	24.16	
5	QPSK	12	0	23.33	23.23	23.21	24.7
5	QPSK	12	7	23.27	23.27	23.22	
5	QPSK	12	13	23.26	23.24	23.11	
5	QPSK	25	0	23.28	23.13	23.20	24.7
5	16QAM	1	0	23.63	23.43	23.45	
5	16QAM	1	12	23.43	23.51	23.32	
5	16QAM	1	24	23.44	23.49	23.31	
5	16QAM	12	0	22.38	22.22	22.22	23.7
5	16QAM	12	7	22.32	22.24	22.21	
5	16QAM	12	13	22.21	22.25	22.18	
5	16QAM	25	0	22.22	22.21	22.21	23.7
5	64QAM	1	0	23.02	22.85	22.89	
5	64QAM	1	12	22.84	22.89	22.19	
5	64QAM	1	24	22.68	22.92	22.34	
5	64QAM	12	0	21.90	21.84	21.65	22.7
5	64QAM	12	7	21.89	21.81	21.18	
5	64QAM	12	13	21.75	21.82	21.02	
5	64QAM	25	0	21.82	21.69	21.56	
Channel				26705	26865	27025	Tune-up limit (dBm)
Frequency (MHz)				815.5	831.5	847.5	
3	QPSK	1	0	24.19	24.16	24.20	25.7
3	QPSK	1	8	24.24	24.27	24.13	
3	QPSK	1	14	24.07	24.18	24.11	
3	QPSK	8	0	23.34	23.18	23.17	24.7
3	QPSK	8	4	23.25	23.25	23.22	
3	QPSK	8	7	23.29	23.24	23.10	
3	QPSK	15	0	23.24	23.18	23.13	
3	16QAM	1	0	23.53	23.45	23.50	24.7
3	16QAM	1	8	23.59	23.51	23.39	
3	16QAM	1	14	23.50	23.53	23.35	
3	16QAM	8	0	22.35	22.23	22.26	23.7
3	16QAM	8	4	22.30	22.37	22.25	
3	16QAM	8	7	22.27	22.33	22.13	
3	16QAM	15	0	22.38	22.17	22.16	
3	64QAM	1	0	22.92	22.87	22.25	23.7
3	64QAM	1	8	23.00	22.93	22.12	
3	64QAM	1	14	22.89	22.94	22.30	
3	64QAM	8	0	21.87	21.79	21.08	22.7
3	64QAM	8	4	21.84	21.88	21.07	
3	64QAM	8	7	21.88	21.80	21.14	
3	64QAM	15	0	21.81	21.79	21.12	
Channel				26697	26865	27033	Tune-up limit (dBm)
Frequency (MHz)				814.7	831.5	848.3	
1.4	QPSK	1	0	24.16	24.04	24.05	25.7
1.4	QPSK	1	3	24.24	24.13	24.07	
1.4	QPSK	1	5	24.12	24.08	23.93	
1.4	QPSK	3	0	24.23	24.06	24.02	
1.4	QPSK	3	1	24.21	24.05	24.03	
1.4	QPSK	3	3	24.16	24.14	23.99	24.7
1.4	QPSK	6	0	23.25	23.20	23.04	
1.4	16QAM	1	0	23.52	23.37	23.36	24.7
1.4	16QAM	1	3	23.54	23.47	23.35	
1.4	16QAM	1	5	23.41	23.39	23.29	
1.4	16QAM	3	0	23.23	23.16	23.12	
1.4	16QAM	3	1	23.23	23.20	23.14	
1.4	16QAM	3	3	23.27	23.11	23.09	23.7
1.4	16QAM	6	0	22.34	22.26	22.14	
1.4	64QAM	1	0	22.85	22.81	22.16	
1.4	64QAM	1	3	22.96	22.89	22.39	
1.4	64QAM	1	5	22.79	22.75	22.41	23.7
1.4	64QAM	3	0	22.92	22.75	22.11	
1.4	64QAM	3	1	22.90	22.81	22.20	
1.4	64QAM	3	3	22.84	22.75	22.38	
1.4	64QAM	6	0	21.75	21.73	21.14	22.7



Band 30							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				27710	27710	27710	
Frequency (MHz)				2310			
10	QPSK	1	0	21.11			22.4
10	QPSK	1	25	21.10			
10	QPSK	1	49	21.07			
10	QPSK	25	0	21.14			
10	QPSK	25	12	21.19			22.4
10	QPSK	25	25	21.27			
10	QPSK	50	0	21.30			
10	16QAM	1	0	21.40			22.4
10	16QAM	1	25	21.39			
10	16QAM	1	49	21.38			
10	16QAM	25	0	20.33			
10	16QAM	25	12	20.37			21.4
10	16QAM	25	25	20.37			
10	16QAM	50	0	20.37			
10	64QAM	1	0	20.54			
10	64QAM	1	25	20.56			21.4
10	64QAM	1	49	20.49			
10	64QAM	25	0	19.37			
10	64QAM	25	12	19.44			20.4
10	64QAM	25	25	19.45			
10	64QAM	50	0	19.43			
Channel				27685	27710	27735	Tune-up limit (dBm)
Frequency (MHz)				2307.5	2310	2312.5	
5	QPSK	1	0	20.90	20.93	20.99	
5	QPSK	1	12	21.04	21.09	21.01	22.4
5	QPSK	1	24	21.08	21.00	21.03	
5	QPSK	12	0	21.05	21.04	21.06	
5	QPSK	12	7	21.18	21.09	21.12	22.4
5	QPSK	12	13	21.15	21.08	21.11	
5	QPSK	25	0	21.13	21.08	21.11	
5	16QAM	1	0	21.28	21.32	21.31	
5	16QAM	1	12	21.38	21.39	21.34	22.4
5	16QAM	1	24	21.39	21.37	21.39	
5	16QAM	12	0	20.35	20.38	20.40	
5	16QAM	12	7	20.47	20.44	20.46	21.4
5	16QAM	12	13	20.46	20.41	20.43	
5	16QAM	25	0	20.44	20.41	20.40	
5	64QAM	1	0	20.50	20.53	20.58	
5	64QAM	1	12	20.57	20.59	20.58	21.4
5	64QAM	1	24	20.64	20.60	20.61	
5	64QAM	12	0	19.41	19.42	19.43	
5	64QAM	12	7	19.52	19.48	19.50	20.4
5	64QAM	12	13	19.50	19.46	19.47	
5	64QAM	25	0	19.47	19.43	19.45	



Band 66							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				132072	132322	132572	
Frequency (MHz)				1720	1745	1770	
20	QPSK	1	0	20.05	19.96	19.93	21.9
20	QPSK	1	49	19.91	19.90	19.92	
20	QPSK	1	99	19.92	19.91	19.90	
20	QPSK	50	0	19.98	19.93	19.90	21.9
20	QPSK	50	24	20.17	20.00	20.03	
20	QPSK	50	50	20.05	19.90	19.91	
20	QPSK	100	0	20.02	19.90	19.90	21.9
20	16QAM	1	0	20.29	20.20	20.14	
20	16QAM	1	49	20.21	20.05	20.08	
20	16QAM	1	99	20.29	20.05	19.96	21.9
20	16QAM	50	0	20.00	19.92	19.91	
20	16QAM	50	24	20.06	19.93	19.97	
20	16QAM	50	50	20.05	19.90	19.92	21.9
20	16QAM	100	0	20.06	19.91	19.92	
20	64QAM	1	0	20.12	20.01	19.98	
20	64QAM	1	49	20.01	19.92	19.92	21.9
20	64QAM	1	99	20.11	19.98	19.92	
20	64QAM	50	0	20.00	19.92	19.92	
20	64QAM	50	24	20.07	19.93	19.97	21.9
20	64QAM	50	50	20.05	19.91	19.93	
20	64QAM	100	0	20.04	19.89	19.97	
Channel				132047	132322	132597	Tune-up limit (dBm)
Frequency (MHz)				1717.5	1745	1772.5	
15	QPSK	1	0	19.97	19.97	19.92	21.9
15	QPSK	1	37	19.91	19.95	19.94	
15	QPSK	1	74	19.92	19.94	19.93	
15	QPSK	36	0	20.07	19.93	19.96	21.9
15	QPSK	36	20	20.12	20.00	19.98	
15	QPSK	36	39	20.08	19.99	19.95	
15	QPSK	75	0	20.02	19.96	19.96	21.9
15	16QAM	1	0	20.22	20.18	20.18	
15	16QAM	1	37	20.21	20.15	20.18	
15	16QAM	1	74	20.20	20.08	20.02	21.9
15	16QAM	36	0	20.06	19.97	19.92	
15	16QAM	36	20	20.15	19.95	20.02	
15	16QAM	36	39	20.12	19.93	20.02	21.9
15	16QAM	75	0	20.07	19.96	20.00	
15	64QAM	1	0	20.17	20.09	19.98	
15	64QAM	1	37	20.05	20.00	20.01	21.9
15	64QAM	1	74	20.19	20.00	19.93	
15	64QAM	36	0	20.02	19.90	19.95	
15	64QAM	36	20	20.14	19.93	20.07	21.9
15	64QAM	36	39	20.12	19.99	19.98	
15	64QAM	75	0	20.09	19.96	19.95	
Channel				132022	132322	132622	Tune-up limit (dBm)
Frequency (MHz)				1715	1745	1775	
10	QPSK	1	0	19.99	19.96	19.91	21.9
10	QPSK	1	25	19.91	19.92	19.92	
10	QPSK	1	49	19.95	19.90	19.92	
10	QPSK	25	0	20.03	19.90	20.00	21.9
10	QPSK	25	12	20.12	19.97	19.99	
10	QPSK	25	25	20.13	19.97	19.95	
10	QPSK	50	0	20.04	19.91	19.96	21.9
10	16QAM	1	0	20.22	20.22	20.23	
10	16QAM	1	25	20.21	20.07	20.09	
10	16QAM	1	49	20.25	20.12	20.02	21.9
10	16QAM	25	0	20.00	19.97	19.97	
10	16QAM	25	12	20.07	20.03	20.06	
10	16QAM	25	25	20.06	19.95	20.00	21.9
10	16QAM	50	0	20.14	19.95	19.95	
10	64QAM	1	0	20.13	20.10	20.08	
10	64QAM	1	25	20.04	20.02	19.92	21.9
10	64QAM	1	49	20.21	19.98	19.92	
10	64QAM	25	0	20.02	19.90	19.99	
10	64QAM	25	12	20.12	19.95	20.03	21.9
10	64QAM	25	25	20.11	19.93	19.94	
10	64QAM	50	0	20.05	19.91	19.93	
Channel				131997	132322	132647	Tune-up limit (dBm)
Frequency (MHz)				1712.5	1745	1777.5	
5	QPSK	1	0	20.02	19.95	19.91	21.9
5	QPSK	1	12	19.91	19.90	19.91	
5	QPSK	1	24	19.96	19.91	19.92	
5	QPSK	12	0	20.08	19.97	19.97	21.9
5	QPSK	12	7	20.10	19.94	20.00	
5	QPSK	12	13	20.10	19.91	19.95	
5	QPSK	25	0	20.10	19.92	19.93	21.9
5	16QAM	1	0	20.26	20.26	20.24	
5	16QAM	1	12	20.24	20.11	20.09	
5	16QAM	1	24	20.25	20.12	20.06	21.9
5	16QAM	12	0	20.02	19.95	19.94	
5	16QAM	12	7	20.13	20.00	20.06	
5	16QAM	12	13	20.07	19.99	20.02	21.9
5	16QAM	25	0	20.14	19.95	19.99	
5	64QAM	1	0	20.17	20.04	20.04	
5	64QAM	1	12	20.02	19.92	19.97	21.9
5	64QAM	1	24	20.19	20.00	19.98	
5	64QAM	12	0	20.09	19.97	20.00	
5	64QAM	12	7	20.17	19.99	19.97	21.9
5	64QAM	12	13	20.15	19.97	20.03	
5	64QAM	25	0	20.11	19.93	19.94	
Channel				131987	132322	132657	Tune-up limit (dBm)
Frequency (MHz)				1711.5	1745	1776.5	
3	QPSK	1	0	19.97	19.92	19.91	21.9
3	QPSK	1	8	19.95	19.90	19.91	
3	QPSK	1	14	19.92	19.90	19.91	
3	QPSK	8	0	20.03	19.96	19.92	21.9
3	QPSK	8	4	20.11	19.96	19.99	
3	QPSK	8	7	20.09	19.95	20.00	
3	QPSK	15	0	20.04	19.97	19.98	21.9
3	16QAM	1	0	20.23	20.25	20.15	
3	16QAM	1	8	20.27	20.08	20.18	
3	16QAM	1	14	20.24	20.07	20.03	21.9
3	16QAM	8	0	20.00	19.98	20.01	
3	16QAM	8	4	20.12	19.99	20.02	
3	16QAM	8	7	20.06	19.98	19.92	21.9
3	16QAM	15	0	20.18	20.00	19.94	
3	64QAM	1	0	20.22	20.04	20.08	
3	64QAM	1	8	20.04	20.02	19.96	21.9
3	64QAM	1	14	20.21	19.98	20.01	
3	64QAM	8	0	20.07	19.92	19.97	
3	64QAM	8	4	20.14	20.01	20.04	21.9
3	64QAM	8	7	20.08	19.95	19.93	
3	64QAM	15	0	20.14	19.89	19.88	
Channel				131979	132322	132655	Tune-up limit (dBm)
Frequency (MHz)				1710.7	1745	1779.3	
1.4	QPSK	1	0	19.96	19.91	19.92	21.9
1.4	QPSK	1	3	20.04	19.90	19.95	
1.4	QPSK	1	5	19.97	19.91	19.93	
1.4	QPSK	3	0	20.01	19.92	19.93	21.9
1.4	QPSK	3	1	20.07	19.90	19.93	
1.4	QPSK	3	3	20.01	19.90	19.91	
1.4	QPSK	6	0	20.09	19.94	19.95	21.9
1.4	16QAM	1	0	20.21	20.24	20.21	
1.4	16QAM	1	3	20.23	20.25	20.27	
1.4	16QAM	1	5	20.28	20.14	20.18	21.9
1.4	16QAM	3	0	20.08	19.98	20.00	
1.4	16QAM	3	1	20.16	20.02	20.03	
1.4	16QAM	3	3	20.06	19.95	19.96	21.9
1.4	16QAM	6	0	20.17	20.02	20.08	
1.4	64QAM	1	0	20.23	20.13	20.16	
1.4	64QAM	1	3	20.28	20.16	20.19	21.9
1.4	64QAM	1	5	20.18	20.10	20.14	
1.4	64QAM	3	0	20.20	20.10	20.11	
1.4	64QAM	3	1	20.24	20.14	20.18	21.9
1.4	64QAM	3	3	20.19	20.10	20.11	
1.4	64QAM	6	0	20.07	20.00	19.98	



Band 71							
Ant 1							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				133222	133322	133372	
Frequency (MHz)				673	683	688	
20	QPSK	1	0	24.35	24.17	24.20	25.7
20	QPSK	1	49	24.15	24.16	24.15	
20	QPSK	1	99	24.12	24.09	24.08	
20	QPSK	50	0	23.28	23.24	23.26	24.7
20	QPSK	50	24	23.33	23.28	23.17	
20	QPSK	50	50	23.32	23.27	23.27	
20	QPSK	100	0	23.33	23.32	23.28	24.7
20	16QAM	1	0	23.68	23.52	23.53	
20	16QAM	1	49	23.58	23.54	23.49	
20	16QAM	1	99	23.49	23.49	23.45	23.7
20	16QAM	50	0	22.34	22.30	22.30	
20	16QAM	50	24	22.34	22.27	22.24	
20	16QAM	50	50	22.30	22.25	22.28	23.7
20	16QAM	100	0	22.32	22.30	22.26	
20	64QAM	1	0	22.18	22.70	23.01	
20	64QAM	1	49	22.76	22.59	22.38	23.7
20	64QAM	1	99	23.01	22.51	22.88	
20	64QAM	50	0	20.82	21.86	21.50	
20	64QAM	50	24	21.49	21.70	21.76	22.7
20	64QAM	50	50	21.96	21.50	21.85	
20	64QAM	100	0	21.50	21.89	21.87	
Channel				133197	133287	133387	Tune-up limit (dBm)
Frequency (MHz)				670.5	680.5	690.5	
15	QPSK	1	0	24.33	24.17	24.13	25.7
15	QPSK	1	37	24.01	24.14	24.11	
15	QPSK	1	74	24.16	24.11	24.11	
15	QPSK	36	0	23.24	23.26	23.27	24.7
15	QPSK	36	20	23.29	23.26	23.37	
15	QPSK	36	39	23.31	23.33	23.26	
15	QPSK	75	0	23.34	23.30	23.20	24.7
15	16QAM	1	0	23.56	23.53	23.49	
15	16QAM	1	37	23.28	23.50	23.41	
15	16QAM	1	74	23.38	23.43	23.38	23.7
15	16QAM	36	0	22.15	22.31	22.26	
15	16QAM	36	20	22.31	22.25	22.34	
15	16QAM	36	39	22.38	22.33	22.28	23.7
15	16QAM	75	0	22.37	22.19	22.18	
15	64QAM	1	0	22.13	22.80	22.90	
15	64QAM	1	37	21.73	23.04	23.04	23.7
15	64QAM	1	74	22.53	22.63	22.97	
15	64QAM	36	0	20.81	21.92	21.51	
15	64QAM	36	20	20.88	21.74	21.92	22.7
15	64QAM	36	39	21.49	21.44	21.88	
15	64QAM	75	0	21.38	21.79	21.77	
Channel				133172	133272	133422	Tune-up limit (dBm)
Frequency (MHz)				668	678	683	
10	QPSK	1	0	24.30	24.14	24.17	25.7
10	QPSK	1	25	24.11	24.10	24.12	
10	QPSK	1	49	24.13	24.14	24.01	
10	QPSK	25	0	23.36	23.26	23.22	24.7
10	QPSK	25	12	23.13	23.25	23.22	
10	QPSK	25	25	23.19	23.31	23.23	
10	QPSK	50	0	23.29	23.18	23.16	24.7
10	16QAM	1	0	23.62	23.47	23.53	
10	16QAM	1	25	23.47	23.51	23.45	
10	16QAM	1	49	23.46	23.44	23.39	23.7
10	16QAM	25	0	22.05	22.17	22.16	
10	16QAM	25	12	22.07	22.24	22.20	
10	16QAM	25	25	22.00	22.24	22.19	23.7
10	16QAM	50	0	22.28	22.17	22.22	
10	64QAM	1	0	21.83	22.96	22.99	
10	64QAM	1	25	21.88	23.08	23.07	23.7
10	64QAM	1	49	22.12	22.23	22.55	
10	64QAM	25	0	20.70	21.87	21.82	
10	64QAM	25	12	20.70	21.74	21.85	22.7
10	64QAM	25	25	20.68	21.37	21.72	
10	64QAM	50	0	20.79	21.60	21.80	
Channel				133147	133247	133447	Tune-up limit (dBm)
Frequency (MHz)				665.5	675.5	685.5	
5	QPSK	1	0	24.03	24.23	24.23	25.7
5	QPSK	1	12	24.13	24.24	24.12	
5	QPSK	1	24	24.11	24.10	24.10	
5	QPSK	12	0	23.15	23.26	23.19	24.7
5	QPSK	12	7	23.15	23.32	23.26	
5	QPSK	12	13	23.13	23.22	23.16	
5	QPSK	25	0	23.15	23.26	23.20	24.7
5	16QAM	1	0	23.29	23.53	23.52	
5	16QAM	1	12	23.38	23.54	23.50	
5	16QAM	1	24	23.40	23.49	23.42	23.7
5	16QAM	12	0	22.04	22.36	22.29	
5	16QAM	12	7	22.12	22.30	22.29	
5	16QAM	12	13	22.25	22.25	22.21	23.7
5	16QAM	25	0	22.06	22.21	22.22	
5	64QAM	1	0	21.70	22.98	23.00	
5	64QAM	1	12	21.82	22.93	22.81	23.7
5	64QAM	1	24	22.03	22.71	22.37	
5	64QAM	12	0	20.74	21.93	21.85	
5	64QAM	12	7	20.91	21.89	21.91	22.7
5	64QAM	12	13	20.87	21.70	21.89	
5	64QAM	25	0	20.69	21.73	21.61	



Band 2							
Ant 2							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch.	Power Mid Ch.	Power High Ch.	Tune-up limit (dbm)
Channel				18700	18900	19100	
Frequency (MHz)				1860	1880	1900	
20	QPSK	1	0	22.34	22.34	22.37	23.8
20	QPSK	1	49	22.32	22.38	22.32	
20	QPSK	1	99	22.34	22.39	22.35	
20	QPSK	50	0	22.38	22.44	22.47	23.8
20	QPSK	50	24	22.47	22.49	22.49	
20	QPSK	50	50	22.47	22.50	22.51	
20	QPSK	100	0	22.50	22.47	22.50	23.8
20	16QAM	1	0	22.59	22.69	22.69	
20	16QAM	1	49	22.63	22.76	22.83	
20	16QAM	1	99	22.65	22.68	22.64	23.7
20	16QAM	50	0	22.25	22.33	22.38	
20	16QAM	50	24	22.35	22.37	22.40	
20	16QAM	50	50	22.38	22.40	22.41	23.7
20	16QAM	100	0	22.35	22.35	22.40	
20	64QAM	1	0	22.35	22.46	22.51	
20	64QAM	1	49	22.39	22.52	22.35	23.7
20	64QAM	1	99	22.43	22.47	22.42	
20	64QAM	50	0	21.26	21.36	21.38	
20	64QAM	50	24	21.35	21.39	21.41	22.7
20	64QAM	50	50	21.37	21.39	21.44	
20	64QAM	100	0	21.37	21.38	21.41	
Channel				1867.5	18900	19125	Tune-up limit (dbm)
Frequency (MHz)				1857.5	1880	1902.5	
15	QPSK	1	0	22.23	22.38	22.37	23.8
15	QPSK	1	37	22.22	22.39	22.31	
15	QPSK	1	74	22.30	22.40	22.38	
15	QPSK	36	0	22.27	22.41	22.44	23.8
15	QPSK	36	20	22.41	22.48	22.47	
15	QPSK	36	39	22.40	22.47	22.51	
15	QPSK	75	0	22.38	22.47	22.47	23.8
15	16QAM	1	0	22.47	22.67	22.64	
15	16QAM	1	37	22.52	22.70	22.58	
15	16QAM	1	74	22.60	22.69	22.63	23.7
15	16QAM	36	0	22.15	22.31	22.33	
15	16QAM	36	20	22.28	22.37	22.37	
15	16QAM	36	39	22.29	22.37	22.38	23.7
15	16QAM	75	0	22.27	22.36	22.38	
15	64QAM	1	0	22.28	22.47	22.47	
15	64QAM	1	37	22.31	22.52	22.29	23.7
15	64QAM	1	74	22.40	22.46	22.49	
15	64QAM	36	0	21.19	21.35	21.33	
15	64QAM	36	20	21.32	21.36	21.38	22.7
15	64QAM	36	39	21.37	21.44	21.43	
15	64QAM	75	0	21.28	21.38	21.38	
Channel				18650	18900	19150	Tune-up limit (dbm)
Frequency (MHz)				1855	1880	1905	
10	QPSK	1	0	22.21	22.39	22.33	23.8
10	QPSK	1	25	22.17	22.36	22.28	
10	QPSK	1	49	22.25	22.38	22.35	
10	QPSK	25	0	22.28	22.40	22.40	23.8
10	QPSK	25	12	22.36	22.45	22.46	
10	QPSK	25	25	22.39	22.46	22.51	
10	QPSK	50	0	22.34	22.47	22.47	23.8
10	16QAM	1	0	22.54	22.71	22.71	
10	16QAM	1	25	22.54	22.72	22.68	
10	16QAM	1	49	22.61	22.75	22.75	23.7
10	16QAM	25	0	22.18	22.34	22.34	
10	16QAM	25	12	22.23	22.39	22.41	
10	16QAM	25	25	22.29	22.41	22.38	23.7
10	16QAM	50	0	22.23	22.37	22.39	
10	64QAM	1	0	22.39	22.49	22.40	
10	64QAM	1	25	22.40	22.58	22.49	23.7
10	64QAM	1	49	22.40	22.53	22.52	
10	64QAM	25	0	21.23	21.38	21.38	
10	64QAM	25	12	21.27	21.42	21.41	22.7
10	64QAM	25	25	21.29	21.41	21.44	
10	64QAM	50	0	21.27	21.41	21.42	
Channel				18625	18900	19175	Tune-up limit (dbm)
Frequency (MHz)				1852.5	1880	1907.5	
5	QPSK	1	0	22.18	22.31	22.30	23.8
5	QPSK	1	12	22.27	22.43	22.38	
5	QPSK	1	24	22.23	22.47	22.39	
5	QPSK	12	0	22.29	22.43	22.41	23.8
5	QPSK	12	7	22.35	22.48	22.49	
5	QPSK	12	13	22.33	22.52	22.46	
5	QPSK	25	0	22.33	22.43	22.43	23.8
5	16QAM	1	0	22.50	22.68	22.67	
5	16QAM	1	12	22.54	22.73	22.74	
5	16QAM	1	24	22.56	22.74	22.72	23.7
5	16QAM	12	0	22.20	22.38	22.37	
5	16QAM	12	7	22.26	22.40	22.40	
5	16QAM	12	13	22.23	22.50	22.41	23.7
5	16QAM	25	0	22.19	22.39	22.37	
5	64QAM	1	0	22.37	22.56	22.51	
5	64QAM	1	12	22.34	22.57	22.50	23.7
5	64QAM	1	24	22.39	22.61	22.54	
5	64QAM	12	0	21.23	21.41	21.39	
5	64QAM	12	7	21.29	21.48	21.47	22.7
5	64QAM	12	13	21.26	21.51	21.43	
5	64QAM	25	0	21.21	21.38	21.39	
Channel				18615	18900	19185	Tune-up limit (dbm)
Frequency (MHz)				1851.5	1880	1906.5	
3	QPSK	1	0	22.15	22.26	22.21	23.8
3	QPSK	1	8	22.24	22.36	22.36	
3	QPSK	1	14	22.18	22.46	22.39	
3	QPSK	8	0	22.28	22.41	22.41	23.8
3	QPSK	8	4	22.28	22.48	22.39	
3	QPSK	8	7	22.30	22.42	22.43	
3	QPSK	15	0	22.28	22.39	22.36	23.8
3	16QAM	1	0	22.48	22.62	22.61	
3	16QAM	1	8	22.54	22.71	22.66	
3	16QAM	1	14	22.52	22.73	22.75	23.7
3	16QAM	8	0	22.11	22.37	22.37	
3	16QAM	8	4	22.19	22.32	22.36	
3	16QAM	8	7	22.17	22.49	22.39	23.7
3	16QAM	15	0	22.15	22.30	22.27	
3	64QAM	1	0	22.29	22.47	22.43	
3	64QAM	1	8	22.29	22.53	22.46	23.7
3	64QAM	1	14	22.36	22.52	22.51	
3	64QAM	8	0	21.21	21.33	21.29	
3	64QAM	8	4	21.24	21.46	21.41	22.7
3	64QAM	8	7	21.18	21.41	21.35	
3	64QAM	15	0	21.18	21.28	21.34	
Channel				18907	18900	19193	Tune-up limit (dbm)
Frequency (MHz)				1850.7	1880	1909.3	
1.4	QPSK	1	0	22.08	22.28	22.19	23.8
1.4	QPSK	1	3	22.13	22.30	22.25	
1.4	QPSK	1	5	22.07	22.26	22.24	
1.4	QPSK	3	0	22.10	22.32	22.25	23.8
1.4	QPSK	3	1	22.17	22.36	22.27	
1.4	QPSK	3	3	22.11	22.33	22.24	
1.4	QPSK	6	0	22.17	22.38	22.30	23.8
1.4	16QAM	1	0	22.42	22.61	22.56	
1.4	16QAM	1	3	22.49	22.66	22.64	
1.4	16QAM	1	5	22.43	22.62	22.58	23.8
1.4	16QAM	3	0	22.23	22.43	22.34	
1.4	16QAM	3	1	22.28	22.50	22.41	
1.4	16QAM	3	3	22.21	22.42	22.36	23.7
1.4	16QAM	6	0	22.10	22.37	22.28	
1.4	64QAM	1	0	22.21	22.45	22.37	
1.4	64QAM	1	3	22.27	22.51	22.41	23.7
1.4	64QAM	1	5	22.21	22.45	22.37	
1.4	64QAM	3	0	22.17	22.39	22.33	
1.4	64QAM	3	1	22.26	22.44	22.37	23.7
1.4	64QAM	3	3	22.20	22.40	22.34	
1.4	64QAM	6	0	21.06	21.29	21.26	



Band 4							
Ant 2							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				20050	20175	20300	
Frequency (MHz)				1720	1732.5	1745	
20	QPSK	1	0	23.83	24.08	23.86	25.1
20	QPSK	1	49	23.72	23.70	23.71	
20	QPSK	1	99	23.73	23.71	23.72	
20	QPSK	50	0	23.37	23.36	23.27	24.7
20	QPSK	50	24	23.43	23.38	23.26	
20	QPSK	50	50	23.35	23.27	23.20	
20	QPSK	100	0	23.36	23.43	23.15	24.7
20	16QAM	1	0	23.65	23.66	23.60	
20	16QAM	1	49	23.52	23.46	23.28	
20	16QAM	1	99	23.59	23.44	23.32	23.7
20	16QAM	50	0	22.37	22.38	22.28	
20	16QAM	50	24	22.40	22.39	22.28	
20	16QAM	50	50	22.35	22.31	22.20	23.7
20	16QAM	100	0	22.37	22.41	22.17	
20	64QAM	1	0	22.48	22.50	22.44	
20	64QAM	1	49	22.37	22.38	22.27	23.7
20	64QAM	1	99	22.50	22.37	22.31	
20	64QAM	50	0	21.39	21.40	21.30	
20	64QAM	50	24	21.41	21.41	21.29	22.7
20	64QAM	50	50	21.37	21.30	21.22	
20	64QAM	100	0	21.42	21.38	21.22	
Channel				20225	20175	20325	Tune-up limit (dBm)
Frequency (MHz)				1717.5	1732.5	1747.5	
15	QPSK	1	0	23.72	23.74	23.70	25.1
15	QPSK	1	37	23.74	23.72	23.70	
15	QPSK	1	74	23.72	23.70	23.71	
15	QPSK	36	0	23.39	23.40	23.23	24.7
15	QPSK	36	20	23.39	23.35	23.16	
15	QPSK	36	39	23.35	23.28	23.16	
15	QPSK	75	0	23.38	23.40	23.18	24.7
15	16QAM	1	0	23.64	23.65	23.55	
15	16QAM	1	37	23.50	23.47	23.39	
15	16QAM	1	74	23.55	23.45	23.33	23.7
15	16QAM	36	0	22.43	22.36	22.24	
15	16QAM	36	20	22.37	22.34	22.16	
15	16QAM	36	39	22.34	22.28	22.20	23.7
15	16QAM	75	0	22.38	22.41	22.18	
15	64QAM	1	0	22.52	22.49	22.43	
15	64QAM	1	37	22.42	22.36	22.31	23.7
15	64QAM	1	74	22.43	22.38	22.25	
15	64QAM	36	0	21.44	21.44	21.27	
15	64QAM	36	20	21.38	21.43	21.19	22.7
15	64QAM	36	39	21.38	21.32	21.21	
15	64QAM	75	0	21.40	21.38	21.19	
Channel				20000	20175	20350	Tune-up limit (dBm)
Frequency (MHz)				1715	1732.5	1750	
10	QPSK	1	0	23.74	23.74	23.70	25.1
10	QPSK	1	25	23.71	23.71	23.70	
10	QPSK	1	49	23.73	23.74	23.70	
10	QPSK	25	0	23.34	23.29	23.10	24.7
10	QPSK	25	12	23.38	23.39	23.16	
10	QPSK	25	25	23.38	23.38	23.21	
10	QPSK	50	0	23.40	23.36	23.17	24.7
10	16QAM	1	0	23.65	23.61	23.49	
10	16QAM	1	25	23.61	23.59	23.44	
10	16QAM	1	49	23.65	23.60	23.47	23.7
10	16QAM	25	0	22.35	22.25	22.12	
10	16QAM	25	12	22.40	22.40	22.17	
10	16QAM	25	25	22.38	22.31	22.22	23.7
10	16QAM	50	0	22.38	22.37	22.16	
10	64QAM	1	0	22.52	22.49	22.35	
10	64QAM	1	25	22.51	22.52	22.38	23.7
10	64QAM	1	49	22.57	22.50	22.35	
10	64QAM	25	0	21.36	21.32	21.16	
10	64QAM	25	12	21.43	21.45	21.19	22.7
10	64QAM	25	25	21.42	21.39	21.26	
10	64QAM	50	0	21.43	21.42	21.22	
Channel				19975	20175	20375	Tune-up limit (dBm)
Frequency (MHz)				1712.5	1732.5	1752.5	
5	QPSK	1	0	23.74	23.71	23.70	25.1
5	QPSK	1	12	23.72	23.70	23.70	
5	QPSK	1	24	23.70	23.74	23.72	
5	QPSK	12	0	23.37	23.30	23.20	24.7
5	QPSK	12	7	23.39	23.37	23.21	
5	QPSK	12	13	23.37	23.36	23.21	
5	QPSK	25	0	23.35	23.37	23.22	24.7
5	16QAM	1	0	23.61	23.53	23.44	
5	16QAM	1	12	23.63	23.58	23.45	
5	16QAM	1	24	23.65	23.60	23.45	23.7
5	16QAM	12	0	22.38	22.29	22.21	
5	16QAM	12	7	22.45	22.38	22.23	
5	16QAM	12	13	22.41	22.38	22.20	23.7
5	16QAM	25	0	22.40	22.37	22.22	
5	64QAM	1	0	22.53	22.49	22.35	
5	64QAM	1	12	22.55	22.50	22.34	23.7
5	64QAM	1	24	22.60	22.54	22.36	
5	64QAM	12	0	21.45	21.35	21.27	
5	64QAM	12	7	21.45	21.44	21.30	22.7
5	64QAM	12	13	21.47	21.39	21.27	
5	64QAM	25	0	21.39	21.39	21.21	
Channel				19965	20175	20385	Tune-up limit (dBm)
Frequency (MHz)				1711.5	1732.5	1753.5	
3	QPSK	1	0	23.70	23.71	23.72	25.1
3	QPSK	1	8	23.70	23.70	23.70	
3	QPSK	1	14	23.70	23.71	23.72	
3	QPSK	8	0	23.28	23.24	23.19	24.7
3	QPSK	8	4	23.29	23.36	23.20	
3	QPSK	8	7	23.33	23.28	23.13	
3	QPSK	15	0	23.31	23.35	23.13	24.7
3	16QAM	1	0	23.59	23.46	23.43	
3	16QAM	1	8	23.53	23.58	23.44	
3	16QAM	1	14	23.63	23.60	23.39	23.7
3	16QAM	8	0	22.30	22.27	22.14	
3	16QAM	8	4	22.35	22.35	22.20	
3	16QAM	8	7	22.31	22.31	22.20	23.7
3	16QAM	15	0	22.37	22.32	22.15	
3	64QAM	3	0	22.50	22.41	22.28	
3	64QAM	1	8	22.49	22.48	22.27	23.7
3	64QAM	1	14	22.54	22.46	22.31	
3	64QAM	8	0	21.36	21.27	21.17	
3	64QAM	8	4	21.43	21.38	21.21	22.7
3	64QAM	8	7	21.38	21.36	21.25	
3	64QAM	15	0	21.39	21.35	21.18	
Channel				19957	20175	20393	Tune-up limit (dBm)
Frequency (MHz)				1710.7	1732.5	1754.3	
1.4	QPSK	1	0	23.72	23.70	23.70	25.1
1.4	QPSK	1	3	23.73	23.71	23.71	
1.4	QPSK	1	5	23.72	23.71	23.70	
1.4	QPSK	3	0	23.73	23.70	23.70	24.7
1.4	QPSK	3	1	23.75	23.71	23.72	
1.4	QPSK	3	3	23.74	23.74	23.71	
1.4	QPSK	6	0	23.24	23.17	23.01	24.7
1.4	16QAM	1	0	23.46	23.46	23.27	
1.4	16QAM	1	3	23.53	23.54	23.34	
1.4	16QAM	1	5	23.47	23.45	23.28	24.7
1.4	16QAM	3	0	23.25	23.27	23.07	
1.4	16QAM	3	1	23.31	23.26	23.12	
1.4	16QAM	3	3	23.24	23.24	23.08	23.7
1.4	16QAM	6	0	22.26	22.28	22.12	
1.4	64QAM	1	0	22.38	22.36	22.21	
1.4	64QAM	1	3	22.46	22.41	22.27	23.7
1.4	64QAM	1	5	22.39	22.36	22.21	
1.4	64QAM	3	0	22.39	22.32	22.16	
1.4	64QAM	3	1	22.42	22.39	22.26	23.7
1.4	64QAM	3	3	22.37	22.39	22.20	
1.4	64QAM	6	0	21.22	21.22	21.03	



Band 5							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				20450	20525	20600	
Frequency (MHz)				829	836.5	844	
10	QPSK	1	0	24.43	24.42	24.42	25.7
10	QPSK	1	25	24.34	24.44	24.43	
10	QPSK	1	49	24.44	24.54	24.29	
10	QPSK	25	0	23.47	23.49	23.49	24.7
10	QPSK	25	12	23.52	23.58	23.57	
10	QPSK	25	25	23.49	23.58	23.47	
10	QPSK	50	0	23.54	23.49	23.60	24.7
10	16QAM	1	0	23.81	23.83	23.86	
10	16QAM	1	25	23.70	23.84	23.83	
10	16QAM	1	49	23.81	23.92	23.71	23.7
10	16QAM	25	0	22.45	22.59	22.54	
10	16QAM	25	12	22.53	22.52	22.54	
10	16QAM	25	25	22.56	22.55	22.57	23.7
10	16QAM	50	0	22.51	22.50	22.49	
10	64QAM	1	0	22.59	22.66	22.64	
10	64QAM	1	25	22.70	22.74	22.76	23.7
10	64QAM	1	49	22.67	22.37	21.72	
10	64QAM	25	0	21.54	21.61	21.55	
10	64QAM	25	12	21.62	21.62	21.60	22.7
10	64QAM	25	25	21.53	21.61	20.86	
10	64QAM	50	0	21.53	21.59	21.28	
Channel				20425	20525	20625	Tune-up limit (dBm)
Frequency (MHz)				826.5	836.5	846.5	
5	QPSK	1	0	24.47	24.51	24.50	25.7
5	QPSK	1	12	24.47	24.45	24.31	
5	QPSK	1	24	24.41	24.52	24.20	
5	QPSK	12	0	23.55	23.64	23.59	24.7
5	QPSK	12	7	23.52	23.57	23.34	
5	QPSK	12	13	23.54	23.55	23.16	
5	QPSK	25	0	23.47	23.56	23.52	24.7
5	16QAM	1	0	23.83	23.83	23.79	
5	16QAM	1	12	23.77	23.83	23.57	
5	16QAM	1	24	23.68	23.85	23.46	23.7
5	16QAM	12	0	22.66	22.51	22.52	
5	16QAM	12	7	22.53	22.60	22.45	
5	16QAM	12	13	22.48	22.61	22.27	23.7
5	16QAM	25	0	22.56	22.52	22.56	
5	64QAM	1	0	22.75	22.73	22.50	
5	64QAM	1	12	22.64	22.69	21.78	23.7
5	64QAM	1	24	22.75	22.55	21.74	
5	64QAM	12	0	21.65	21.66	21.30	
5	64QAM	12	7	21.54	21.63	20.70	22.7
5	64QAM	12	13	21.51	21.61	20.71	
5	64QAM	25	0	21.58	21.61	20.70	
Channel				20415	20525	20635	Tune-up limit (dBm)
Frequency (MHz)				825.5	836.5	847.5	
3	QPSK	1	0	24.47	24.41	24.18	25.7
3	QPSK	1	8	24.50	24.48	24.04	
3	QPSK	1	14	24.40	24.49	24.13	
3	QPSK	8	0	23.54	23.58	23.04	24.7
3	QPSK	8	4	23.49	23.62	23.07	
3	QPSK	8	7	23.50	23.55	23.20	
3	QPSK	15	0	23.57	23.53	23.08	24.7
3	16QAM	1	0	23.83	23.81	23.53	
3	16QAM	1	8	23.83	23.86	23.38	
3	16QAM	1	14	23.69	23.78	23.46	23.7
3	16QAM	8	0	22.64	22.58	22.31	
3	16QAM	8	4	22.60	22.65	22.23	
3	16QAM	8	7	22.57	22.60	22.28	23.7
3	16QAM	15	0	22.60	22.62	22.19	
3	64QAM	1	0	22.63	22.73	21.70	
3	64QAM	1	8	22.75	22.75	21.72	23.7
3	64QAM	1	14	22.63	22.50	21.71	
3	64QAM	8	0	21.65	21.56	20.70	
3	64QAM	8	4	21.58	21.67	20.70	22.7
3	64QAM	8	7	21.49	21.63	20.74	
3	64QAM	15	0	21.53	21.62	20.71	
Channel				20407	20525	20643	Tune-up limit (dBm)
Frequency (MHz)				824.7	836.5	848.3	
1.4	QPSK	1	0	24.39	24.32	23.95	25.7
1.4	QPSK	1	3	24.42	24.47	24.10	
1.4	QPSK	1	5	24.29	24.38	24.09	
1.4	QPSK	3	0	24.41	24.36	24.12	24.7
1.4	QPSK	3	1	24.47	24.40	24.12	
1.4	QPSK	3	3	24.41	24.44	24.37	
1.4	QPSK	6	0	23.42	23.57	23.18	24.7
1.4	16QAM	1	0	23.68	23.69	23.34	
1.4	16QAM	1	3	23.69	23.85	23.50	
1.4	16QAM	1	5	23.61	23.69	23.58	24.7
1.4	16QAM	3	0	23.51	23.51	23.12	
1.4	16QAM	3	1	23.49	23.54	23.29	
1.4	16QAM	3	3	23.42	23.48	23.42	23.7
1.4	16QAM	6	0	22.55	22.62	22.27	
1.4	64QAM	1	0	22.60	22.60	21.70	
1.4	64QAM	1	3	22.68	22.75	21.72	23.7
1.4	64QAM	1	5	22.60	22.59	21.71	
1.4	64QAM	3	0	22.63	22.63	21.70	
1.4	64QAM	3	1	22.65	22.62	21.72	23.7
1.4	64QAM	3	3	22.55	22.58	21.71	
1.4	64QAM	6	0	21.45	21.48	20.72	



Band 7							
Ant 2							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch./	Power Middle Ch./	Power High Ch./	Tune-up limit (dBm)
Channel				20850	21100	21350	
Frequency (MHz)				2510	2535	2560	
20	QPSK	1	0	23.26	23.31	23.30	24.4
20	QPSK	1	49	23.28	23.39	23.30	
20	QPSK	1	99	23.29	23.42	23.40	
20	QPSK	50	0	23.28	23.44	23.41	23.9
20	QPSK	50	24	23.29	23.48	23.43	
20	QPSK	50	50	23.32	23.55	23.44	
20	QPSK	100	0	23.29	23.45	23.41	23.9
20	16QAM	1	0	23.47	23.66	23.64	
20	16QAM	1	49	23.50	23.71	23.68	
20	16QAM	1	99	23.55	23.77	23.65	22.9
20	16QAM	50	0	22.61	22.79	22.73	
20	16QAM	50	24	22.64	22.76	22.72	
20	16QAM	50	50	22.62	22.84	22.76	22.9
20	16QAM	100	0	22.61	22.75	22.74	
20	64QAM	1	0	22.71	22.87	22.18	
20	64QAM	1	49	22.72	22.90	22.31	22.9
20	64QAM	1	99	22.74	22.90	22.40	
20	64QAM	50	0	21.66	21.82	21.15	
20	64QAM	50	24	21.68	21.83	21.29	21.9
20	64QAM	50	50	21.70	21.86	21.31	
20	64QAM	100	0	21.62	21.79	21.11	
Channel				20925	21100	21375	Tune-up limit (dBm)
Frequency (MHz)				2507.5	2535	2562.5	
15	QPSK	1	0	23.20	23.34	23.38	24.4
15	QPSK	1	37	23.23	23.40	23.37	
15	QPSK	1	74	23.31	23.49	23.40	
15	QPSK	36	0	23.25	23.43	23.44	23.9
15	QPSK	36	20	23.39	23.49	23.50	
15	QPSK	36	39	23.40	23.57	23.49	
15	QPSK	75	0	23.37	23.47	23.51	23.9
15	16QAM	1	0	23.47	23.65	23.68	
15	16QAM	1	37	23.53	23.74	23.49	
15	16QAM	1	74	23.62	23.81	23.69	22.9
15	16QAM	36	0	22.55	22.72	22.71	
15	16QAM	36	20	22.68	22.75	22.82	
15	16QAM	36	39	22.68	22.87	22.78	22.9
15	16QAM	75	0	22.65	22.78	22.81	
15	64QAM	1	0	22.65	22.76	22.20	
15	64QAM	1	37	22.75	22.90	21.52	21.9
15	64QAM	1	74	22.78	22.90	22.25	
15	64QAM	36	0	21.68	21.76	20.78	
15	64QAM	36	20	21.70	21.80	20.89	21.9
15	64QAM	36	39	21.74	21.89	21.10	
15	64QAM	75	0	21.67	21.77	20.84	
Channel				20800	21100	21400	Tune-up limit (dBm)
Frequency (MHz)				2505	2535	2565	
10	QPSK	1	0	23.22	23.29	23.22	24.4
10	QPSK	1	25	23.20	23.39	23.25	
10	QPSK	1	49	23.20	23.37	23.27	
10	QPSK	25	0	23.28	23.41	23.37	23.9
10	QPSK	25	12	23.33	23.44	23.39	
10	QPSK	25	25	23.34	23.53	23.44	
10	QPSK	50	0	23.33	23.46	23.39	23.9
10	16QAM	1	0	23.49	23.67	23.62	
10	16QAM	1	25	23.50	23.71	23.70	
10	16QAM	1	49	23.58	23.78	23.68	22.9
10	16QAM	25	0	22.58	22.70	22.68	
10	16QAM	25	12	22.64	22.76	22.69	
10	16QAM	25	25	22.61	22.83	22.74	22.9
10	16QAM	50	0	22.60	22.75	22.67	
10	64QAM	1	0	22.69	22.82	21.86	
10	64QAM	1	25	22.70	22.90	22.34	22.9
10	64QAM	1	49	22.79	22.90	22.61	
10	64QAM	25	0	21.61	21.75	20.84	
10	64QAM	25	12	21.65	21.79	21.05	21.9
10	64QAM	25	25	21.65	21.86	21.23	
10	64QAM	50	0	21.65	21.77	20.89	
Channel				20775	21100	21425	Tune-up limit (dBm)
Frequency (MHz)				2502.5	2535	2567.5	
5	QPSK	1	0	23.26	23.31	23.30	24.4
5	QPSK	1	12	23.28	23.39	23.30	
5	QPSK	1	24	23.29	23.42	23.29	
5	QPSK	12	0	23.28	23.44	23.41	23.9
5	QPSK	12	7	23.29	23.46	23.43	
5	QPSK	12	13	23.32	23.55	23.42	
5	QPSK	25	0	23.29	23.45	23.41	23.9
5	16QAM	1	0	23.47	23.66	23.64	
5	16QAM	1	12	23.50	23.71	23.68	
5	16QAM	1	24	23.55	23.77	23.65	22.9
5	16QAM	12	0	22.61	22.79	22.73	
5	16QAM	12	7	22.64	22.76	22.72	
5	16QAM	12	13	22.62	22.84	22.76	22.9
5	16QAM	25	0	22.61	22.75	22.74	
5	64QAM	1	0	22.71	22.87	22.18	
5	64QAM	1	12	22.72	22.90	22.31	22.9
5	64QAM	1	24	22.74	22.90	22.40	
5	64QAM	12	0	21.66	21.82	21.15	
5	64QAM	12	7	21.68	21.83	21.29	21.9
5	64QAM	12	13	21.70	21.86	21.31	
5	64QAM	25	0	21.62	21.79	21.11	



Band 12							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				23060	23095	23130	
Frequency (MHz)				704	707.5	711	
10	QPSK	1	0	24.34	24.12	24.24	25.7
10	QPSK	1	25	24.15	24.15	24.14	
10	QPSK	1	49	24.31	24.24	24.14	
10	QPSK	25	0	23.27	23.33	23.32	24.7
10	QPSK	25	12	23.38	23.34	23.35	
10	QPSK	25	25	23.31	23.30	23.35	
10	QPSK	50	0	23.34	23.28	23.32	24.7
10	16QAM	1	0	23.55	23.49	23.56	
10	16QAM	1	25	23.61	23.61	23.59	
10	16QAM	1	49	23.66	23.60	23.54	23.7
10	16QAM	25	0	22.32	22.28	22.33	
10	16QAM	25	12	22.40	22.35	22.36	
10	16QAM	25	25	22.37	22.36	22.34	23.7
10	16QAM	50	0	22.39	22.31	22.33	
10	64QAM	1	0	22.43	22.31	22.39	
10	64QAM	1	25	22.52	22.42	22.25	23.7
10	64QAM	1	49	22.61	22.54	22.53	
10	64QAM	25	0	21.31	21.33	21.22	
10	64QAM	25	12	21.46	21.39	21.33	22.7
10	64QAM	25	25	21.37	21.41	21.37	
10	64QAM	50	0	21.36	21.34	21.37	
Channel				23035	23095	23155	Tune-up limit (dBm)
Frequency (MHz)				701.5	707.5	713.5	
5	QPSK	1	0	24.27	24.18	24.20	25.7
5	QPSK	1	12	24.27	24.28	24.27	
5	QPSK	1	24	24.23	24.21	24.24	
5	QPSK	12	0	23.38	23.32	23.26	24.7
5	QPSK	12	7	23.33	23.26	23.25	
5	QPSK	12	13	23.33	23.26	23.27	
5	QPSK	25	0	23.36	23.28	23.20	24.7
5	16QAM	1	0	23.59	23.56	23.50	
5	16QAM	1	12	23.60	23.59	23.55	
5	16QAM	1	24	23.61	23.61	23.60	23.7
5	16QAM	12	0	22.36	22.32	22.28	
5	16QAM	12	7	22.39	22.34	22.36	
5	16QAM	12	13	22.32	22.35	22.28	23.7
5	16QAM	25	0	22.40	22.35	22.32	
5	64QAM	1	0	22.37	22.24	22.40	
5	64QAM	1	12	22.51	22.44	22.40	22.7
5	64QAM	1	24	22.35	22.48	22.45	
5	64QAM	12	0	21.39	21.41	21.38	
5	64QAM	12	7	21.34	21.35	21.34	22.7
5	64QAM	12	13	21.43	21.38	21.28	
5	64QAM	25	0	21.42	21.39	21.32	
Channel				23025	23095	23165	Tune-up limit (dBm)
Frequency (MHz)				700.5	707.5	714.5	
3	QPSK	1	0	24.31	24.21	24.28	25.7
3	QPSK	1	8	24.32	24.30	24.30	
3	QPSK	1	14	24.28	24.27	24.18	
3	QPSK	8	0	23.35	23.27	23.30	24.7
3	QPSK	8	4	23.37	23.40	23.35	
3	QPSK	8	7	23.38	23.38	23.25	
3	QPSK	15	0	23.39	23.28	23.21	24.7
3	16QAM	1	0	23.71	23.62	23.52	
3	16QAM	1	8	23.66	23.59	23.60	
3	16QAM	1	14	23.60	23.56	23.46	23.7
3	16QAM	8	0	22.42	22.42	22.32	
3	16QAM	8	4	22.41	22.40	22.36	
3	16QAM	8	7	22.33	22.41	22.27	23.7
3	16QAM	15	0	22.37	22.31	22.30	
3	64QAM	1	0	22.48	22.41	22.47	
3	64QAM	1	8	22.64	22.55	22.45	23.7
3	64QAM	1	14	22.47	22.49	22.43	
3	64QAM	8	0	21.41	21.39	21.36	
3	64QAM	8	4	21.44	21.51	21.40	22.7
3	64QAM	8	7	21.34	21.40	21.36	
3	64QAM	15	0	21.37	21.34	21.24	
Channel				23017	23095	23173	Tune-up limit (dBm)
Frequency (MHz)				699.7	707.5	715.3	
1.4	QPSK	1	0	24.18	24.13	24.08	25.7
1.4	QPSK	1	3	24.23	24.21	24.18	
1.4	QPSK	1	5	24.19	24.20	24.02	
1.4	QPSK	3	0	24.26	24.09	24.18	24.7
1.4	QPSK	3	1	24.25	24.22	24.19	
1.4	QPSK	3	3	24.21	24.22	24.13	
1.4	QPSK	6	0	23.32	23.26	23.12	24.7
1.4	16QAM	1	0	23.60	23.49	23.46	
1.4	16QAM	1	3	23.57	23.57	23.48	
1.4	16QAM	1	5	23.53	23.52	23.43	24.7
1.4	16QAM	3	0	23.34	23.24	23.26	
1.4	16QAM	3	1	23.38	23.30	23.31	
1.4	16QAM	3	3	23.31	23.24	23.13	23.7
1.4	16QAM	6	0	22.32	22.23	22.22	
1.4	64QAM	1	0	22.48	22.42	22.38	
1.4	64QAM	1	3	22.46	22.50	22.42	23.7
1.4	64QAM	1	5	22.46	22.36	22.34	
1.4	64QAM	3	0	22.37	22.38	22.39	
1.4	64QAM	3	1	22.41	22.38	22.32	23.7
1.4	64QAM	3	3	22.40	22.38	22.31	
1.4	64QAM	6	0	21.27	21.21	21.21	



Band 13							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				23230			
Frequency (MHz)				762			
10	QPSK	1	0	23.83			25.2
10	QPSK	1	25	23.84			
10	QPSK	1	49	23.87			
10	QPSK	25	0	22.96			24.2
10	QPSK	25	12	23.01			
10	QPSK	25	25	22.91			
10	QPSK	50	0	23.01			24.2
10	16QAM	1	0	23.16			
10	16QAM	1	25	23.15			
10	16QAM	1	49	23.15			23.2
10	16QAM	25	0	21.97			
10	16QAM	25	12	22.03			
10	16QAM	25	25	21.93			23.2
10	16QAM	50	0	21.95			
10	64QAM	1	0	22.01			
10	64QAM	1	25	22.13			23.2
10	64QAM	1	49	22.04			
10	64QAM	25	0	21.02			
10	64QAM	25	12	21.00			22.2
10	64QAM	25	25	21.04			
10	64QAM	50	0	20.96			
Channel				23206 23230 23255			Tune-up limit (dBm)
Frequency (MHz)				779.5 762 784.5			
5	QPSK	1	0	23.75	23.76	23.86	25.2
5	QPSK	1	12	23.88	23.84	23.87	
5	QPSK	1	24	23.87	23.86	23.87	
5	QPSK	12	0	22.89	22.92	22.92	24.2
5	QPSK	12	7	22.83	22.97	22.83	
5	QPSK	12	13	23.02	23.01	22.92	
5	QPSK	25	0	23.01	22.99	22.91	24.2
5	16QAM	1	0	23.08	23.05	23.08	
5	16QAM	1	12	23.16	23.14	23.09	
5	16QAM	1	24	23.16	23.10	23.03	23.2
5	16QAM	12	0	21.99	21.97	21.98	
5	16QAM	12	7	22.05	21.96	21.96	
5	16QAM	12	13	22.02	21.94	21.97	23.2
5	16QAM	25	0	22.03	21.94	21.88	
5	64QAM	1	0	22.00	22.13	21.98	
5	64QAM	1	12	22.13	22.06	22.08	23.2
5	64QAM	1	24	22.07	22.15	22.00	
5	64QAM	12	0	21.03	21.06	20.99	
5	64QAM	12	7	21.07	21.01	20.92	22.2
5	64QAM	12	13	20.98	21.05	20.97	
5	64QAM	25	0	20.96	20.95	20.88	



Band 14							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				23330	23330		
Frequency (MHz)				793	793		
10	QPSK	1	0	24.44			25.7
10	QPSK	1	25	24.49			
10	QPSK	1	49	24.32			
10	QPSK	25	0	23.51			
10	QPSK	25	12	23.50			24.7
10	QPSK	25	25	23.48			
10	QPSK	50	0	23.42			
10	16QAM	1	0	23.87			24.7
10	16QAM	1	25	23.84			
10	16QAM	1	49	23.71			
10	16QAM	25	0	22.44			
10	16QAM	25	12	22.54			23.7
10	16QAM	25	25	22.55			
10	16QAM	50	0	22.44			
10	64QAM	1	0	22.75			23.7
10	64QAM	1	25	22.58			
10	64QAM	1	49	22.65			
10	64QAM	25	0	21.50			
10	64QAM	25	12	21.33			22.7
10	64QAM	25	25	21.48			
10	64QAM	50	0	21.55			
Channel				23306	23330	23356	Tune-up limit (dBm)
Frequency (MHz)				790.5	793	795.5	
5	QPSK	1	0	24.48	24.40	24.42	25.7
5	QPSK	1	12	24.48	24.48	24.47	
5	QPSK	1	24	24.47	24.44	24.42	
5	QPSK	12	0	23.54	23.49	23.41	24.7
5	QPSK	12	7	23.60	23.52	23.47	
5	QPSK	12	13	23.50	23.55	23.45	
5	QPSK	25	0	23.59	23.48	23.43	
5	16QAM	1	0	23.74	23.78	23.68	24.7
5	16QAM	1	12	23.78	23.80	23.80	
5	16QAM	1	24	23.80	23.72	23.71	
5	16QAM	12	0	22.51	22.57	22.48	23.7
5	16QAM	12	7	22.62	22.60	22.49	
5	16QAM	12	13	22.59	22.55	22.51	
5	16QAM	25	0	22.57	22.52	22.50	
5	64QAM	1	0	22.71	22.62	22.36	23.7
5	64QAM	1	12	22.78	22.24	22.53	
5	64QAM	1	24	22.33	22.27	22.70	
5	64QAM	12	0	21.61	21.26	21.18	22.7
5	64QAM	12	7	21.68	21.24	21.54	
5	64QAM	12	13	21.36	21.23	21.61	
5	64QAM	25	0	21.64	21.16	21.49	



Band 17							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch./	Power Middle Ch./	Power High Ch./	Tune-up limit (dBm)
Channel				23780	23790	23800	
Frequency (MHz)				709	710	711	
10	QPSK	1	0	24.38	24.29	24.27	25.7
10	QPSK	1	25	24.35	24.27	24.31	
10	QPSK	1	49	24.33	24.40	24.28	
10	QPSK	25	0	23.34	23.36	23.37	24.7
10	QPSK	25	12	23.51	23.39	23.43	
10	QPSK	25	25	23.50	23.51	23.46	
10	QPSK	50	0	23.44	23.37	23.34	24.7
10	16QAM	1	0	23.64	23.67	23.59	
10	16QAM	1	25	23.73	23.67	23.67	
10	16QAM	1	49	23.70	23.70	23.73	23.7
10	16QAM	25	0	22.35	22.28	22.38	
10	16QAM	25	12	22.43	22.42	22.36	
10	16QAM	25	25	22.40	22.45	22.42	23.7
10	16QAM	50	0	22.50	22.35	22.41	
10	64QAM	1	0	22.59	22.53	22.57	
10	64QAM	1	25	22.67	22.66	22.50	23.7
10	64QAM	1	49	22.65	22.65	22.58	
10	64QAM	25	0	21.36	21.43	21.41	
10	64QAM	25	12	21.47	21.43	21.46	22.7
10	64QAM	25	25	21.51	21.55	21.51	
10	64QAM	50	0	21.54	21.40	21.44	
Channel				23755	23790	23825	Tune-up limit (dBm)
Frequency (MHz)				706.5	710	713.5	
5	QPSK	1	0	24.24	24.27	24.26	25.7
5	QPSK	1	12	24.31	24.37	24.39	
5	QPSK	1	24	24.38	24.39	24.31	
5	QPSK	12	0	23.43	23.34	23.35	24.7
5	QPSK	12	7	23.48	23.47	23.43	
5	QPSK	12	13	23.46	23.44	23.40	
5	QPSK	25	0	23.49	23.45	23.42	24.7
5	16QAM	1	0	23.57	23.61	23.61	
5	16QAM	1	12	23.61	23.69	23.63	
5	16QAM	1	24	23.73	23.76	23.68	23.7
5	16QAM	12	0	22.40	22.39	22.36	
5	16QAM	12	7	22.45	22.40	22.38	
5	16QAM	12	13	22.51	22.44	22.43	23.7
5	16QAM	25	0	22.43	22.44	22.49	
5	64QAM	1	0	22.41	22.31	22.54	
5	64QAM	1	12	22.59	22.50	22.51	23.7
5	64QAM	1	24	22.61	22.53	22.49	
5	64QAM	12	0	21.43	21.40	21.44	
5	64QAM	12	7	21.47	21.45	21.53	22.7
5	64QAM	12	13	21.53	21.55	21.51	
5	64QAM	25	0	21.45	21.39	21.40	



Band 25							
Ant 2							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				26140	26340	26590	
Frequency (MHz)				1860	1880	1905	
20	QPSK	1	0	2229	2236	2234	23.8
20	QPSK	1	48	2227	2237	2229	
20	QPSK	1	99	2232	2238	2234	
20	QPSK	50	0	2238	2242	2239	23.8
20	QPSK	50	24	2248	2255	2241	
20	QPSK	50	50	2244	2253	2248	
20	QPSK	100	0	2248	2256	2242	23.8
20	16QAM	1	0	2260	2271	2270	
20	16QAM	1	49	2258	2272	2266	
20	16QAM	1	99	2266	2278	2264	23.7
20	16QAM	50	0	2229	2236	2230	
20	16QAM	50	24	2239	2250	2232	
20	16QAM	50	50	2238	2246	2242	23.7
20	16QAM	100	0	2236	2243	2232	
20	64QAM	1	0	2239	2246	2240	
20	64QAM	1	49	2232	2250	2241	23.7
20	64QAM	1	99	2240	2254	2238	
20	64QAM	50	0	2133	2136	2132	
20	64QAM	50	24	2140	2148	2135	22.7
20	64QAM	50	50	2138	2147	2142	
20	64QAM	100	0	2140	2145	2134	
Channel				26115	26340	26515	Tune-up limit (dBm)
Frequency (MHz)				1857.5	1880	1907.5	
15	QPSK	1	0	2229	2241	2238	23.8
15	QPSK	1	37	2228	2239	2231	
15	QPSK	1	74	2234	2242	2239	
15	QPSK	36	0	2245	2247	2240	23.8
15	QPSK	36	20	2244	2253	2248	
15	QPSK	36	39	2244	2251	2245	
15	QPSK	75	0	2242	2254	2238	23.8
15	16QAM	1	0	2257	2270	2265	
15	16QAM	1	37	2262	2274	2267	
15	16QAM	1	74	2264	2277	2268	23.7
15	16QAM	36	0	2236	2237	2232	
15	16QAM	36	20	2238	2245	2241	
15	16QAM	36	39	2231	2243	2237	23.7
15	16QAM	75	0	2235	2245	2232	
15	64QAM	1	0	2234	2248	2240	
15	64QAM	1	37	2242	2256	2250	23.7
15	64QAM	1	74	2246	2255	2232	
15	64QAM	36	0	2141	2142	2135	
15	64QAM	36	20	2140	2147	2142	22.7
15	64QAM	36	39	2136	2145	2143	
15	64QAM	75	0	2136	2145	2133	
Channel				26090	26340	26640	Tune-up limit (dBm)
Frequency (MHz)				1855	1880	1910	
10	QPSK	1	0	2223	2233	2234	23.8
10	QPSK	1	25	2222	2236	2234	
10	QPSK	1	49	2227	2242	2239	
10	QPSK	25	0	2237	2240	2243	23.8
10	QPSK	25	12	2239	2252	2249	
10	QPSK	25	25	2244	2251	2251	
10	QPSK	50	0	2241	2252	2249	23.8
10	16QAM	1	0	2270	2275	2269	
10	16QAM	1	25	2263	2273	2269	
10	16QAM	1	49	2267	2278	2275	23.7
10	16QAM	25	0	2228	2234	2237	
10	16QAM	25	12	2231	2245	2239	
10	16QAM	25	25	2229	2243	2239	23.7
10	16QAM	50	0	2230	2245	2238	
10	64QAM	1	0	2239	2246	2251	
10	64QAM	1	25	2240	2260	2255	23.7
10	64QAM	1	49	2243	2261	2234	
10	64QAM	25	0	2130	2134	2137	
10	64QAM	25	12	2136	2146	2142	22.7
10	64QAM	25	25	2134	2146	2143	
10	64QAM	50	0	2134	2145	2142	
Channel				26055	26340	26655	Tune-up limit (dBm)
Frequency (MHz)				1852.5	1880	1912.5	
5	QPSK	1	0	2222	2231	2233	23.8
5	QPSK	1	12	2230	2243	2236	
5	QPSK	1	24	2230	2243	2237	
5	QPSK	12	0	2229	2245	2242	23.8
5	QPSK	12	7	2240	2255	2248	
5	QPSK	12	13	2242	2253	2249	
5	QPSK	25	0	2236	2252	2245	23.8
5	16QAM	1	0	2259	2269	2268	
5	16QAM	1	12	2262	2275	2267	
5	16QAM	1	24	2262	2277	2272	23.7
5	16QAM	12	0	2245	2239	2234	
5	16QAM	12	7	2232	2245	2237	
5	16QAM	12	13	2234	2246	2240	23.7
5	16QAM	25	0	2228	2241	2233	
5	64QAM	1	0	2241	2251	2253	
5	64QAM	1	12	2239	2255	2248	23.7
5	64QAM	1	24	2243	2265	2222	
5	64QAM	12	0	2130	2141	2137	
5	64QAM	12	7	2137	2149	2143	22.7
5	64QAM	12	13	2136	2152	2126	
5	64QAM	25	0	2130	2143	2136	
Channel				26055	26340	26675	Tune-up limit (dBm)
Frequency (MHz)				1851.5	1880	1913.5	
3	QPSK	1	0	2212	2224	2228	23.8
3	QPSK	1	8	2229	2237	2227	
3	QPSK	1	14	2225	2233	2235	
3	QPSK	8	0	2229	2241	2235	23.8
3	QPSK	8	4	2231	2252	2241	
3	QPSK	8	7	2237	2245	2245	
3	QPSK	15	0	2235	2249	2241	23.8
3	16QAM	1	0	2258	2265	2263	
3	16QAM	1	8	2256	2274	2262	
3	16QAM	1	14	2252	2272	2270	23.7
3	16QAM	8	0	2215	2238	2226	
3	16QAM	8	4	2230	2241	2236	
3	16QAM	8	7	2231	2240	2237	23.7
3	16QAM	15	0	2219	2236	2232	
3	64QAM	1	0	2235	2247	2253	
3	64QAM	1	8	2238	2252	2241	23.7
3	64QAM	1	14	2243	2257	2215	
3	64QAM	8	0	2128	2137	2128	
3	64QAM	8	4	2128	2142	2142	22.7
3	64QAM	8	7	2136	2144	2116	
3	64QAM	15	0	2126	2139	2129	
Channel				26047	26340	26683	Tune-up limit (dBm)
Frequency (MHz)				1850.7	1880	1914.3	
1.4	QPSK	1	0	2209	2222	2216	23.8
1.4	QPSK	1	3	2223	2236	2227	
1.4	QPSK	1	5	2219	2233	2226	
1.4	QPSK	3	0	2214	2230	2223	23.8
1.4	QPSK	3	1	2221	2237	2228	
1.4	QPSK	3	3	2220	2236	2227	
1.4	QPSK	6	0	2221	2238	2232	23.8
1.4	16QAM	1	0	2244	2253	2252	
1.4	16QAM	1	3	2258	2270	2262	
1.4	16QAM	1	5	2251	2268	2258	23.8
1.4	16QAM	3	0	2225	2244	2234	
1.4	16QAM	3	1	2231	2247	2238	
1.4	16QAM	3	3	2229	2244	2235	23.7
1.4	16QAM	6	0	2221	2237	2228	
1.4	64QAM	1	0	2223	2240	2214	
1.4	64QAM	1	3	2233	2253	2214	23.7
1.4	64QAM	1	5	2232	2253	2204	
1.4	64QAM	3	0	2224	2242	2215	
1.4	64QAM	3	1	2230	2248	2221	23.7
1.4	64QAM	3	3	2226	2246	2212	
1.4	64QAM	6	0	2115	2131	2105	



Band 26							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit [dBm]
Channel				26765	26865	26965	
Frequency (MHz)				821.5	831.5	841.5	
15	QPSK	1	0	24.28	24.16	24.24	25.7
15	QPSK	1	37	24.14	24.24	24.21	
15	QPSK	1	74	24.27	24.52	24.13	
15	QPSK	36	0	23.38	23.39	23.34	24.7
15	QPSK	36	20	23.40	23.31	23.37	
15	QPSK	36	39	23.33	23.34	23.29	
15	QPSK	75	0	23.39	23.35	23.35	24.7
15	16QAM	1	0	23.55	23.58	23.61	
15	16QAM	1	37	23.54	23.54	23.60	
15	16QAM	1	74	23.56	23.63	23.47	23.7
15	16QAM	36	0	22.36	22.42	22.34	
15	16QAM	36	20	22.34	22.33	22.30	
15	16QAM	36	39	22.36	22.36	22.33	23.7
15	16QAM	75	0	22.42	22.38	22.33	
15	64QAM	1	0	22.48	22.42	22.41	
15	64QAM	1	37	22.45	22.49	22.41	23.7
15	64QAM	1	74	22.48	22.48	21.70	
15	64QAM	36	0	21.43	21.45	21.41	
15	64QAM	36	20	21.47	21.43	21.37	22.7
15	64QAM	36	39	21.38	21.44	21.49	
15	64QAM	75	0	21.47	21.36	21.42	
Channel				26740	26865	26990	Tune-up limit [dBm]
Frequency (MHz)				819	831.5	844	
10	QPSK	1	0	24.38	24.29	24.37	25.7
10	QPSK	1	25	24.22	24.25	24.23	
10	QPSK	1	49	24.28	24.29	24.20	
10	QPSK	25	0	23.50	23.36	23.44	24.7
10	QPSK	25	12	23.50	23.41	23.37	
10	QPSK	25	25	23.40	23.42	23.37	
10	QPSK	50	0	23.38	23.41	23.42	24.7
10	16QAM	1	0	23.77	23.60	23.75	
10	16QAM	1	25	23.61	23.73	23.64	
10	16QAM	1	49	23.64	23.67	23.62	23.7
10	16QAM	25	0	22.46	22.36	22.37	
10	16QAM	25	12	22.45	22.42	22.36	
10	16QAM	25	25	22.30	22.44	22.38	22.7
10	16QAM	50	0	22.46	22.37	22.33	
10	64QAM	1	0	22.64	22.51	22.57	
10	64QAM	1	25	22.54	22.66	22.66	23.7
10	64QAM	1	49	22.56	22.60	22.05	
10	64QAM	25	0	21.44	21.42	21.43	
10	64QAM	25	12	21.50	21.47	21.48	22.7
10	64QAM	25	25	21.37	21.41	21.29	
10	64QAM	50	0	21.47	21.37	21.36	
Channel				26715	26865	27015	Tune-up limit [dBm]
Frequency (MHz)				616.5	631.5	646.5	
5	QPSK	1	0	24.45	24.32	24.35	25.7
5	QPSK	1	12	24.38	24.36	24.33	
5	QPSK	1	24	24.30	24.37	24.26	
5	QPSK	12	0	23.50	23.37	23.40	24.7
5	QPSK	12	7	23.51	23.41	23.44	
5	QPSK	12	13	23.44	23.36	23.33	
5	QPSK	25	0	23.44	23.40	23.38	24.7
5	16QAM	1	0	23.78	23.60	23.73	
5	16QAM	1	12	23.72	23.66	23.60	
5	16QAM	1	24	23.66	23.72	23.58	23.7
5	16QAM	12	0	22.49	22.38	22.41	
5	16QAM	12	7	22.45	22.45	22.41	
5	16QAM	12	13	22.44	22.37	22.30	23.7
5	16QAM	25	0	22.43	22.36	22.40	
5	64QAM	1	0	22.73	22.56	22.53	
5	64QAM	1	12	22.54	22.59	21.87	23.7
5	64QAM	1	24	22.56	22.57	21.82	
5	64QAM	12	0	21.58	21.56	21.51	
5	64QAM	12	7	21.59	21.50	20.86	22.7
5	64QAM	12	13	21.54	21.45	20.56	
5	64QAM	25	0	21.50	21.39	21.68	
Channel				26705	26865	27025	Tune-up limit [dBm]
Frequency (MHz)				815.5	831.5	847.5	
3	QPSK	1	0	24.43	24.37	24.37	25.7
3	QPSK	1	8	24.41	24.37	24.32	
3	QPSK	1	14	24.30	24.35	24.26	
3	QPSK	8	0	23.51	23.43	23.27	24.7
3	QPSK	8	4	23.54	23.46	23.33	
3	QPSK	8	7	23.40	23.41	23.37	
3	QPSK	15	0	23.42	23.35	23.30	24.7
3	16QAM	1	0	23.79	23.62	23.67	
3	16QAM	1	8	23.80	23.76	23.49	
3	16QAM	1	14	23.68	23.71	23.56	23.7
3	16QAM	8	0	22.53	22.44	22.45	
3	16QAM	8	4	22.59	22.47	22.41	
3	16QAM	8	7	22.46	22.49	22.36	23.7
3	16QAM	15	0	22.56	22.36	22.37	
3	64QAM	1	0	22.61	22.57	21.91	
3	64QAM	1	8	22.68	22.58	21.70	23.7
3	64QAM	1	14	22.58	22.61	21.71	
3	64QAM	8	0	21.59	21.49	20.70	
3	64QAM	8	4	21.55	21.54	20.57	22.7
3	64QAM	8	7	21.49	21.52	20.57	
3	64QAM	15	0	21.50	21.48	20.64	
Channel				26697	26865	27033	Tune-up limit [dBm]
Frequency (MHz)				814.7	831.5	848.3	
1.4	QPSK	1	0	24.37	24.27	24.21	25.7
1.4	QPSK	1	3	24.42	24.30	24.23	
1.4	QPSK	1	5	24.36	24.21	24.15	
1.4	QPSK	3	0	24.41	24.23	24.20	24.7
1.4	QPSK	3	1	24.41	24.33	24.21	
1.4	QPSK	3	3	24.40	24.32	24.20	
1.4	QPSK	6	0	23.41	23.38	23.30	24.7
1.4	16QAM	1	0	23.71	23.59	23.46	
1.4	16QAM	1	3	23.72	23.62	23.59	
1.4	16QAM	1	5	23.63	23.59	23.46	24.7
1.4	16QAM	3	0	23.56	23.29	23.30	
1.4	16QAM	3	1	23.60	23.39	23.30	
1.4	16QAM	3	3	23.50	23.35	23.24	23.7
1.4	16QAM	6	0	22.50	22.46	22.33	
1.4	64QAM	1	0	22.68	22.47	21.74	
1.4	64QAM	1	3	22.68	22.61	21.70	23.7
1.4	64QAM	1	5	22.62	22.46	21.71	
1.4	64QAM	3	0	22.64	22.46	21.72	
1.4	64QAM	3	1	22.57	22.47	21.71	22.7
1.4	64QAM	3	3	22.56	22.51	21.80	
1.4	64QAM	6	0	21.43	21.42	20.70	



Band 30							
Ant 2							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				27710			
Frequency (MHz)				2310			
10	QPSK	1	0	22.18			23.7
10	QPSK	1	25	22.07			
10	QPSK	1	49	22.09			
10	QPSK	25	0	21.18			22.7
10	QPSK	25	12	21.14			
10	QPSK	25	25	21.23			
10	QPSK	50	0	21.14			22.7
10	16QAM	1	0	21.51			
10	16QAM	1	25	21.44			
10	16QAM	1	49	21.52			21.7
10	16QAM	25	0	20.18			
10	16QAM	25	12	20.25			
10	16QAM	25	25	20.19			21.7
10	16QAM	50	0	20.23			
10	64QAM	1	0	20.35			
10	64QAM	1	25	20.42			21.7
10	64QAM	1	49	20.39			
10	64QAM	25	0	19.24			
10	64QAM	25	12	19.21			20.7
10	64QAM	25	25	19.22			
10	64QAM	50	0	19.21			
Channel				27685 27710 27735			Tune-up limit (dBm)
Frequency (MHz)				2307.5 2310 2312.5			
5	QPSK	1	0	22.04	22.08	22.10	23.7
5	QPSK	1	12	22.18	22.10	22.13	
5	QPSK	1	24	22.11	22.12	22.14	
5	QPSK	12	0	21.14	21.18	21.17	22.7
5	QPSK	12	7	21.27	21.18	21.20	
5	QPSK	12	13	21.32	21.23	21.13	
5	QPSK	25	0	21.24	21.15	21.21	22.7
5	16QAM	1	0	21.36	21.35	21.42	
5	16QAM	1	12	21.47	21.47	21.42	
5	16QAM	1	24	21.55	21.44	21.44	21.7
5	16QAM	12	0	20.15	20.21	20.17	
5	16QAM	12	7	20.20	20.25	20.29	
5	16QAM	12	13	20.22	20.20	20.19	21.7
5	16QAM	25	0	20.24	20.17	20.23	
5	64QAM	1	0	20.27	20.34	20.47	
5	64QAM	1	12	20.39	20.35	20.37	21.7
5	64QAM	1	24	20.53	20.37	20.31	
5	64QAM	12	0	19.25	19.27	19.23	
5	64QAM	12	7	19.29	19.22	19.33	20.7
5	64QAM	12	13	19.31	19.33	19.25	
5	64QAM	25	0	19.27	19.21	19.27	



Band 66							
Ant 2							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				132072	132322	132572	
Frequency (MHz)				1720	1745	1770	
20	QPSK	1	0	23.95	23.87	23.78	25.1
20	QPSK	1	49	23.82	23.71	23.70	
20	QPSK	1	99	23.60	23.75	23.72	
20	QPSK	50	0	23.58	23.46	23.44	24.7
20	QPSK	50	24	23.65	23.51	23.52	
20	QPSK	50	50	23.64	23.48	23.46	
20	QPSK	100	0	23.66	23.48	23.44	24.7
20	16QAM	1	0	23.84	23.76	23.74	
20	16QAM	1	49	23.78	23.55	23.60	
20	16QAM	1	99	23.86	23.63	23.54	23.7
20	16QAM	50	0	22.59	22.47	22.48	
20	16QAM	50	24	22.67	22.52	22.52	
20	16QAM	50	50	22.63	22.46	22.47	23.7
20	16QAM	100	0	22.64	22.49	22.45	
20	64QAM	1	0	22.73	22.62	22.56	
20	64QAM	1	49	22.68	22.49	22.53	23.7
20	64QAM	1	99	22.74	22.56	22.48	
20	64QAM	50	0	21.61	21.49	21.49	
20	64QAM	50	24	21.67	21.52	21.53	22.7
20	64QAM	50	50	21.66	21.49	21.49	
20	64QAM	100	0	21.67	21.50	21.44	
Channel				132047	132322	132597	Tune-up limit (dBm)
Frequency (MHz)				1717.5	1745	1772.5	
15	QPSK	1	0	23.91	23.81	23.79	25.1
15	QPSK	1	37	23.81	23.70	23.70	
15	QPSK	1	74	23.94	23.74	23.74	
15	QPSK	36	0	23.67	23.46	23.45	24.7
15	QPSK	36	20	23.65	23.46	23.42	
15	QPSK	36	39	23.62	23.44	23.47	
15	QPSK	75	0	23.65	23.50	23.46	24.7
15	16QAM	1	0	23.82	23.70	23.73	
15	16QAM	1	37	23.74	23.60	23.64	
15	16QAM	1	74	23.85	23.63	23.61	23.7
15	16QAM	36	0	22.66	22.45	22.45	
15	16QAM	36	20	22.65	22.48	22.42	
15	16QAM	36	39	22.63	22.47	22.49	23.7
15	16QAM	75	0	22.65	22.51	22.45	
15	64QAM	1	0	22.66	22.61	22.53	
15	64QAM	1	37	22.62	22.50	22.49	23.7
15	64QAM	1	74	22.74	22.57	22.53	
15	64QAM	36	0	21.66	21.50	21.53	
15	64QAM	36	20	21.66	21.49	21.46	22.7
15	64QAM	36	39	21.68	21.50	21.50	
15	64QAM	75	0	21.66	21.51	21.47	
Channel				132022	132322	132622	Tune-up limit (dBm)
Frequency (MHz)				1715	1745	1775	
10	QPSK	1	0	23.94	23.77	23.81	25.1
10	QPSK	1	25	23.89	23.76	23.79	
10	QPSK	1	49	23.92	23.75	23.80	
10	QPSK	25	0	23.63	23.43	23.44	24.7
10	QPSK	25	12	23.64	23.50	23.44	
10	QPSK	25	25	23.65	23.47	23.52	
10	QPSK	50	0	23.67	23.52	23.48	24.7
10	16QAM	1	0	23.83	23.79	23.80	
10	16QAM	1	25	23.89	23.73	23.77	
10	16QAM	1	49	23.89	23.71	23.78	23.7
10	16QAM	25	0	22.61	22.43	22.44	
10	16QAM	25	12	22.70	22.52	22.47	
10	16QAM	25	25	22.62	22.46	22.51	23.7
10	16QAM	50	0	22.65	22.45	22.45	
10	64QAM	1	0	22.79	22.63	22.61	
10	64QAM	1	25	22.82	22.63	22.70	23.7
10	64QAM	1	49	22.84	22.64	22.67	
10	64QAM	25	0	21.66	21.48	21.49	
10	64QAM	25	12	21.70	21.54	21.50	22.7
10	64QAM	25	25	21.64	21.50	21.55	
10	64QAM	50	0	21.68	21.55	21.49	
Channel				131997	132322	132647	Tune-up limit (dBm)
Frequency (MHz)				1712.5	1745	1777.5	
5	QPSK	1	0	23.94	23.73	23.81	25.1
5	QPSK	1	12	23.94	23.80	23.85	
5	QPSK	1	24	23.93	23.75	23.79	
5	QPSK	12	0	23.63	23.42	23.50	24.7
5	QPSK	12	7	23.69	23.52	23.52	
5	QPSK	12	13	23.64	23.46	23.47	
5	QPSK	25	0	23.63	23.45	23.50	24.7
5	16QAM	1	0	23.86	23.71	23.76	
5	16QAM	1	12	23.89	23.74	23.75	
5	16QAM	1	24	23.86	23.71	23.75	23.7
5	16QAM	12	0	22.67	22.46	22.54	
5	16QAM	12	7	22.69	22.50	22.56	
5	16QAM	12	13	22.66	22.52	22.54	23.7
5	16QAM	25	0	22.68	22.52	22.54	
5	64QAM	1	0	22.82	22.63	22.72	
5	64QAM	1	12	22.82	22.64	22.68	23.7
5	64QAM	1	24	22.84	22.64	22.67	
5	64QAM	12	0	21.71	21.50	21.56	
5	64QAM	12	7	21.72	21.57	21.62	22.7
5	64QAM	12	13	21.73	21.52	21.59	
5	64QAM	25	0	21.66	21.50	21.54	
Channel				131967	132322	132657	Tune-up limit (dBm)
Frequency (MHz)				1711.5	1745	1778.5	
3	QPSK	1	0	23.88	23.73	23.77	25.1
3	QPSK	1	8	23.83	23.74	23.83	
3	QPSK	1	14	23.84	23.73	23.74	
3	QPSK	8	0	23.67	23.36	23.45	24.7
3	QPSK	8	4	23.64	23.45	23.46	
3	QPSK	8	7	23.61	23.43	23.40	
3	QPSK	15	0	23.63	23.36	23.47	24.7
3	16QAM	1	0	23.77	23.61	23.73	
3	16QAM	1	8	23.83	23.64	23.70	
3	16QAM	1	14	23.79	23.61	23.74	23.7
3	16QAM	8	0	22.66	22.38	22.52	
3	16QAM	8	4	22.64	22.40	22.54	
3	16QAM	8	7	22.59	22.49	22.50	23.7
3	16QAM	15	0	22.68	22.50	22.47	
3	64QAM	1	0	22.73	22.55	22.71	
3	64QAM	1	8	22.77	22.62	22.59	23.7
3	64QAM	1	14	22.84	22.54	22.65	
3	64QAM	8	0	21.71	21.48	21.56	
3	64QAM	8	4	21.66	21.51	21.56	22.7
3	64QAM	8	7	21.71	21.47	21.58	
3	64QAM	15	0	21.56	21.45	21.51	
Channel				131979	132322	132665	Tune-up limit (dBm)
Frequency (MHz)				1710.7	1745	1779.3	
1.4	QPSK	1	0	23.85	23.74	23.70	25.1
1.4	QPSK	1	3	23.86	23.72	23.77	
1.4	QPSK	1	5	23.84	23.76	23.72	
1.4	QPSK	3	0	23.68	23.71	23.78	24.7
1.4	QPSK	3	1	23.61	23.74	23.80	
1.4	QPSK	3	3	23.62	23.71	23.74	
1.4	QPSK	6	0	23.64	23.38	23.40	24.7
1.4	16QAM	1	0	23.73	23.60	23.68	
1.4	16QAM	1	3	23.82	23.66	23.76	
1.4	16QAM	1	5	23.73	23.62	23.67	24.7
1.4	16QAM	3	0	23.64	23.34	23.43	
1.4	16QAM	3	1	23.60	23.46	23.46	
1.4	16QAM	3	3	23.63	23.43	23.44	23.7
1.4	16QAM	6	0	22.58	22.43	22.51	
1.4	64QAM	1	0	22.70	22.57	22.60	
1.4	64QAM	1	3	22.75	22.62	22.63	23.7
1.4	64QAM	1	5	22.67	22.54	22.57	
1.4	64QAM	3	0	22.67	22.54	22.58	
1.4	64QAM	3	1	22.71	22.57	22.61	23.7
1.4	64QAM	3	3	22.67	22.51	22.56	
1.4	64QAM	6	0	21.57	21.39	21.44	



Band 71							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch./	Power Middle Ch./	Power High Ch./	Tune-up limit (dBm)
Channel				133222	133322	133372	
Frequency (MHz)				673	683	688	
20	QPSK	1	0	24.39	24.32	24.28	25.7
20	QPSK	1	49	24.21	24.25	24.28	
20	QPSK	1	99	24.24	24.21	24.14	
20	QPSK	50	0	23.39	23.37	23.38	24.7
20	QPSK	50	24	23.50	23.42	23.32	
20	QPSK	50	50	23.45	23.39	23.33	
20	QPSK	100	0	23.46	23.30	23.37	24.7
20	16QAM	1	0	23.69	23.66	23.66	
20	16QAM	1	49	23.58	23.58	23.57	
20	16QAM	1	99	23.61	23.58	23.54	23.7
20	16QAM	50	0	22.46	22.32	22.40	
20	16QAM	50	24	22.42	22.33	22.39	
20	16QAM	50	50	22.42	22.39	22.39	23.7
20	16QAM	100	0	22.46	22.34	22.42	
20	64QAM	1	0	21.79	22.29	22.52	
20	64QAM	1	49	22.23	22.43	21.81	23.7
20	64QAM	1	99	22.50	22.00	22.43	
20	64QAM	50	0	20.70	21.36	21.01	
20	64QAM	50	24	20.85	21.40	21.15	22.7
20	64QAM	50	50	21.49	21.04	21.37	
20	64QAM	100	0	21.05	21.36	21.45	
Channel				133197	133297	133397	Tune-up limit (dBm)
Frequency (MHz)				670.5	680.5	690.5	
15	QPSK	1	0	24.23	24.27	24.23	25.7
15	QPSK	1	37	24.23	24.18	24.22	
15	QPSK	1	74	24.28	24.28	24.14	
15	QPSK	36	0	23.41	23.31	23.37	24.7
15	QPSK	36	20	23.45	23.30	23.34	
15	QPSK	36	39	23.38	23.40	23.35	
15	QPSK	75	0	23.36	23.35	23.34	24.7
15	16QAM	1	0	23.68	23.64	23.56	
15	16QAM	1	37	23.38	23.54	23.52	
15	16QAM	1	74	23.54	23.51	23.54	23.7
15	16QAM	36	0	22.28	22.39	22.28	
15	16QAM	36	20	22.31	22.34	22.43	
15	16QAM	36	39	22.45	22.37	22.38	23.7
15	16QAM	75	0	22.45	22.32	22.35	
15	64QAM	1	0	21.71	22.45	22.43	
15	64QAM	1	37	21.70	22.51	22.51	23.7
15	64QAM	1	74	22.41	22.16	22.49	
15	64QAM	36	0	20.70	21.34	20.97	
15	64QAM	36	20	20.44	21.43	21.36	22.7
15	64QAM	36	39	21.00	20.91	21.37	
15	64QAM	75	0	20.86	21.39	21.33	
Channel				133172	133272	133422	Tune-up limit (dBm)
Frequency (MHz)				668	678	683	
10	QPSK	1	0	24.27	24.17	24.29	25.7
10	QPSK	1	25	24.19	24.16	24.20	
10	QPSK	1	49	24.17	24.27	24.18	
10	QPSK	25	0	23.33	23.31	23.33	24.7
10	QPSK	25	12	23.33	23.43	23.26	
10	QPSK	25	25	23.24	23.30	23.27	
10	QPSK	50	0	23.41	23.40	23.26	24.7
10	16QAM	1	0	23.71	23.36	23.60	
10	16QAM	1	25	23.62	23.63	23.53	
10	16QAM	1	49	23.62	23.61	23.47	23.7
10	16QAM	25	0	22.27	22.28	22.30	
10	16QAM	25	12	22.28	22.38	22.33	
10	16QAM	25	25	22.14	22.38	22.23	23.7
10	16QAM	50	0	22.32	22.42	22.24	
10	64QAM	1	0	21.75	21.80	22.44	
10	64QAM	1	25	21.73	22.52	22.48	23.7
10	64QAM	1	49	21.70	22.46	22.13	
10	64QAM	25	0	20.70	21.34	21.35	
10	64QAM	25	12	20.33	21.41	21.36	22.7
10	64QAM	25	25	20.40	21.38	21.31	
10	64QAM	50	0	20.33	21.36	21.30	
Channel				133147	133247	133447	Tune-up limit (dBm)
Frequency (MHz)				665.5	675.5	695.5	
5	QPSK	1	0	24.07	24.21	24.21	25.7
5	QPSK	1	12	24.33	24.20	24.17	
5	QPSK	1	24	24.22	24.20	24.18	
5	QPSK	12	0	23.33	23.35	23.25	24.7
5	QPSK	12	7	23.30	23.36	23.33	
5	QPSK	12	13	23.32	23.30	23.28	
5	QPSK	25	0	23.32	23.37	23.25	24.7
5	16QAM	1	0	23.51	23.53	23.67	
5	16QAM	1	12	23.51	23.55	23.55	
5	16QAM	1	24	23.48	23.53	23.47	23.7
5	16QAM	12	0	22.16	22.40	22.33	
5	16QAM	12	7	22.31	22.37	22.34	
5	16QAM	12	13	22.38	22.34	22.27	23.7
5	16QAM	25	0	22.24	22.39	22.29	
5	64QAM	1	0	21.78	21.74	22.47	
5	64QAM	1	12	21.72	22.51	22.39	23.7
5	64QAM	1	24	21.70	22.56	21.87	
5	64QAM	12	0	20.70	21.16	21.31	
5	64QAM	12	7	20.42	21.41	21.39	22.7
5	64QAM	12	13	20.40	21.40	21.19	
5	64QAM	25	0	20.23	21.10	21.23	



Band 2							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch.	Power Middle Ch.	Power High Ch.	Tune-up limit (dbm)
Channel				18700	18900	19100	
Frequency (MHz)				1860	1880	1900	
20	QPSK	1	0	17.61	17.61	17.62	18.9
20	QPSK	1	49	17.55	17.62	17.50	
20	QPSK	1	99	17.56	17.62	17.56	
20	QPSK	50	0	17.63	17.69	17.73	18.9
20	QPSK	50	24	17.77	17.74	17.75	
20	QPSK	50	50	17.72	17.74	17.71	
20	QPSK	100	0	17.74	17.71	17.72	18.9
20	16QAM	1	0	17.97	17.96	17.96	
20	16QAM	1	49	17.93	17.95	17.90	
20	16QAM	1	99	17.86	17.93	17.88	18.9
20	16QAM	50	0	17.88	17.70	17.72	
20	16QAM	50	24	17.76	17.76	17.75	
20	16QAM	50	50	17.73	17.74	17.74	18.9
20	16QAM	100	0	17.72	17.71	17.71	
20	64QAM	1	0	17.81	17.77	17.67	
20	64QAM	1	49	17.75	17.84	17.78	18.9
20	64QAM	1	99	17.80	17.81	17.74	
20	64QAM	50	0	17.67	17.73	17.74	
20	64QAM	50	24	17.76	17.76	17.77	18.9
20	64QAM	50	50	17.75	17.74	17.76	
20	64QAM	100	0	17.73	17.72	17.74	
Channel				1867.5	18900	19125	Tune-up limit (dbm)
Frequency (MHz)				1857.5	1880	1902.5	
15	QPSK	1	0	17.54	17.57	17.56	18.9
15	QPSK	1	37	17.45	17.52	17.45	
15	QPSK	1	74	17.54	17.52	17.52	
15	QPSK	36	0	17.58	17.65	17.63	18.9
15	QPSK	36	20	17.68	17.66	17.67	
15	QPSK	36	39	17.64	17.72	17.71	
15	QPSK	75	0	17.72	17.65	17.71	18.9
15	16QAM	1	0	17.93	17.96	17.94	
15	16QAM	1	37	17.88	17.87	17.89	
15	16QAM	1	74	17.84	17.84	17.81	18.9
15	16QAM	36	0	17.58	17.70	17.62	
15	16QAM	36	20	17.74	17.71	17.72	
15	16QAM	36	39	17.73	17.70	17.66	18.9
15	16QAM	75	0	17.64	17.69	17.65	
15	64QAM	1	0	17.76	17.73	17.79	
15	64QAM	1	37	17.69	17.74	17.70	18.9
15	64QAM	1	74	17.72	17.80	17.72	
15	64QAM	36	0	17.64	17.66	17.73	
15	64QAM	36	20	17.68	17.72	17.68	18.9
15	64QAM	36	39	17.67	17.73	17.74	
15	64QAM	75	0	17.64	17.66	17.73	
Channel				18650	18900	19150	Tune-up limit (dbm)
Frequency (MHz)				1855	1880	1905	
10	QPSK	1	0	17.52	17.61	17.55	18.9
10	QPSK	1	25	17.51	17.52	17.42	
10	QPSK	1	49	17.53	17.53	17.49	
10	QPSK	25	0	17.69	17.61	17.63	18.9
10	QPSK	25	12	17.74	17.73	17.70	
10	QPSK	25	25	17.72	17.70	17.68	
10	QPSK	50	0	17.70	17.65	17.67	18.9
10	16QAM	1	0	17.91	17.97	17.95	
10	16QAM	1	25	17.91	17.86	17.98	
10	16QAM	1	49	17.84	17.93	17.82	18.9
10	16QAM	25	0	17.67	17.65	17.63	
10	16QAM	25	12	17.75	17.75	17.66	
10	16QAM	25	25	17.71	17.73	17.64	18.9
10	16QAM	50	0	17.67	17.64	17.66	
10	64QAM	1	0	17.76	17.76	17.77	
10	64QAM	1	25	17.74	17.84	17.74	18.9
10	64QAM	1	49	17.71	17.81	17.69	
10	64QAM	25	0	17.64	17.69	17.73	
10	64QAM	25	12	17.74	17.72	17.68	18.9
10	64QAM	25	25	17.69	17.69	17.70	
10	64QAM	50	0	17.69	17.71	17.65	
Channel				18625	18900	19175	Tune-up limit (dbm)
Frequency (MHz)				1852.5	1880	1907.5	
5	QPSK	1	0	17.54	17.52	17.58	18.9
5	QPSK	1	12	17.46	17.58	17.40	
5	QPSK	1	24	17.51	17.54	17.49	
5	QPSK	12	0	17.63	17.67	17.68	18.9
5	QPSK	12	7	17.68	17.69	17.70	
5	QPSK	12	13	17.66	17.73	17.69	
5	QPSK	25	0	17.69	17.62	17.70	18.9
5	16QAM	1	0	17.96	17.96	17.98	
5	16QAM	1	12	17.90	17.94	17.88	
5	16QAM	1	24	17.85	17.86	17.85	18.9
5	16QAM	12	0	17.98	17.86	17.71	
5	16QAM	12	7	17.73	17.76	17.75	
5	16QAM	12	13	17.72	17.65	17.66	18.9
5	16QAM	25	0	17.69	17.62	17.69	
5	64QAM	1	0	17.75	17.77	17.84	
5	64QAM	1	12	17.65	17.77	17.76	18.9
5	64QAM	1	24	17.76	17.76	17.74	
5	64QAM	12	0	17.64	17.72	17.70	
5	64QAM	12	7	17.68	17.68	17.71	18.9
5	64QAM	12	13	17.68	17.74	17.67	
5	64QAM	25	0	17.69	17.64	17.65	
Channel				18615	18900	19185	Tune-up limit (dbm)
Frequency (MHz)				1851.5	1880	1906.5	
3	QPSK	1	0	17.54	17.56	17.55	18.9
3	QPSK	1	8	17.45	17.55	17.43	
3	QPSK	1	14	17.47	17.58	17.47	
3	QPSK	8	0	17.60	17.65	17.72	18.9
3	QPSK	8	4	17.70	17.73	17.75	
3	QPSK	8	7	17.67	17.67	17.65	
3	QPSK	15	0	17.71	17.67	17.64	18.9
3	16QAM	1	0	17.91	17.91	17.88	
3	16QAM	1	8	17.89	17.85	17.82	
3	16QAM	1	14	17.86	17.93	17.88	18.9
3	16QAM	8	0	17.60	17.62	17.68	
3	16QAM	8	4	17.66	17.78	17.74	
3	16QAM	8	7	17.70	17.69	17.64	18.9
3	16QAM	15	0	17.67	17.71	17.71	
3	64QAM	1	0	17.73	17.67	17.66	
3	64QAM	1	8	17.67	17.75	17.77	18.9
3	64QAM	1	14	17.71	17.78	17.71	
3	64QAM	8	0	17.67	17.64	17.74	
3	64QAM	8	4	17.76	17.69	17.70	18.9
3	64QAM	8	7	17.71	17.69	17.76	
3	64QAM	15	0	17.71	17.72	17.69	
Channel				18607	18900	19193	Tune-up limit (dbm)
Frequency (MHz)				1850.7	1880	1909.3	
1.4	QPSK	1	0	17.49	17.58	17.46	18.9
1.4	QPSK	1	3	17.54	17.65	17.58	
1.4	QPSK	1	5	17.53	17.61	17.49	
1.4	QPSK	3	0	17.55	17.63	17.50	18.9
1.4	QPSK	3	1	17.61	17.67	17.63	
1.4	QPSK	3	3	17.59	17.64	17.54	
1.4	QPSK	6	0	17.64	17.67	17.58	18.9
1.4	16QAM	1	0	17.81	17.90	17.81	
1.4	16QAM	1	3	17.84	17.97	17.84	
1.4	16QAM	1	5	17.78	17.90	17.78	18.9
1.4	16QAM	3	0	17.65	17.74	17.63	
1.4	16QAM	3	1	17.71	17.79	17.64	
1.4	16QAM	3	3	17.62	17.74	17.63	18.9
1.4	16QAM	6	0	17.71	17.75	17.65	
1.4	64QAM	1	0	17.74	17.86	17.69	
1.4	64QAM	1	3	17.81	17.90	17.80	18.9
1.4	64QAM	1	5	17.73	17.83	17.72	
1.4	64QAM	3	0	17.72	17.82	17.70	
1.4	64QAM	3	1	17.79	17.88	17.74	18.9
1.4	64QAM	3	3	17.73	17.82	17.72	
1.4	64QAM	6	0	17.65	17.73	17.60	



Band 4							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				20050	20175	20300	
Frequency (MHz)				1720	1732.5	1745	
20	QPSK	1	0	20.05	20.09	19.99	
20	QPSK	1	48	19.93	19.92	19.91	21.1
20	QPSK	1	99	19.95	19.92	19.90	
20	QPSK	50	0	20.10	20.09	20.01	
20	QPSK	50	24	20.16	20.08	20.00	
20	QPSK	50	50	20.07	20.01	19.96	21.1
20	QPSK	100	0	20.11	20.13	19.90	
20	16QAM	1	0	20.39	20.41	20.33	
20	16QAM	1	49	20.28	20.23	20.16	21.1
20	16QAM	1	99	20.30	20.17	20.07	
20	16QAM	50	0	20.13	20.11	20.02	
20	16QAM	50	24	20.15	20.13	20.05	
20	16QAM	50	50	20.10	20.04	19.96	21.1
20	16QAM	100	0	20.12	20.11	19.96	
20	64QAM	1	0	20.21	20.25	20.19	
20	64QAM	1	49	20.13	20.07	20.08	21.1
20	64QAM	1	99	20.16	20.09	20.11	
20	64QAM	50	0	20.14	20.16	20.07	
20	64QAM	50	24	20.15	20.11	20.07	
20	64QAM	50	50	20.09	20.04	19.99	21.1
20	64QAM	100	0	20.12	20.10	19.96	
Channel				20250	20175	20325	
Frequency (MHz)				1717.5	1732.5	1747.5	
15	QPSK	1	0	20.03	20.00	19.92	
15	QPSK	1	37	19.93	19.91	19.90	21.1
15	QPSK	1	74	19.95	19.92	19.92	
15	QPSK	36	0	20.08	20.01	19.93	
15	QPSK	36	20	20.11	20.02	19.90	21.1
15	QPSK	36	39	19.99	19.96	19.90	
15	QPSK	75	0	20.02	20.12	19.91	
15	16QAM	1	0	20.39	20.32	20.23	
15	16QAM	1	37	20.26	20.23	20.06	21.1
15	16QAM	1	74	20.23	20.10	20.00	
15	16QAM	36	0	20.03	20.06	20.01	
15	16QAM	36	20	20.14	20.09	20.01	21.1
15	16QAM	36	39	20.05	20.04	19.91	
15	16QAM	75	0	20.09	20.05	19.96	
15	64QAM	1	0	20.12	20.20	20.14	
15	64QAM	1	37	20.04	19.98	19.98	21.1
15	64QAM	1	74	20.14	20.04	20.07	
15	64QAM	36	0	20.07	20.06	20.01	
15	64QAM	36	20	20.10	20.10	19.98	21.1
15	64QAM	36	39	20.04	20.03	19.96	
15	64QAM	75	0	20.08	20.03	19.90	
Channel				20000	20175	20350	
Frequency (MHz)				1715	1732.5	1750	
10	QPSK	1	0	20.01	20.03	19.98	
10	QPSK	1	25	19.91	19.92	19.93	21.1
10	QPSK	1	49	19.90	19.94	19.91	
10	QPSK	25	0	20.08	20.02	19.91	
10	QPSK	25	12	20.07	19.99	19.91	21.1
10	QPSK	25	25	19.98	20.00	19.96	
10	QPSK	50	0	20.10	20.05	19.92	
10	16QAM	1	0	20.34	20.32	20.27	
10	16QAM	1	25	20.17	20.21	20.05	21.1
10	16QAM	1	49	20.20	20.11	20.06	
10	16QAM	25	0	20.12	20.01	19.98	
10	16QAM	25	12	20.05	20.05	20.01	21.1
10	16QAM	25	25	20.10	19.95	19.92	
10	16QAM	50	0	20.05	20.07	19.93	
10	64QAM	1	0	20.16	20.18	20.13	
10	64QAM	1	25	20.10	19.99	20.01	21.1
10	64QAM	1	49	20.07	20.05	20.07	
10	64QAM	25	0	20.14	20.12	20.04	
10	64QAM	25	12	20.06	20.04	20.00	21.1
10	64QAM	25	25	20.02	20.04	19.93	
10	64QAM	50	0	20.02	20.10	19.94	
Channel				19975	20175	20375	
Frequency (MHz)				1712.5	1732.5	1752.5	
5	QPSK	1	0	19.95	20.09	19.90	
5	QPSK	1	12	19.95	19.92	19.90	21.1
5	QPSK	1	24	19.94	19.92	19.91	
5	QPSK	12	0	20.04	20.01	19.93	
5	QPSK	12	7	20.07	19.99	19.97	21.1
5	QPSK	12	13	20.00	19.95	19.92	
5	QPSK	25	0	20.10	20.06	19.91	
5	16QAM	1	0	20.37	20.41	20.30	
5	16QAM	1	12	20.24	20.16	20.12	21.1
5	16QAM	1	24	20.27	20.15	19.97	
5	16QAM	12	0	20.08	20.06	19.97	
5	16QAM	12	7	20.10	20.10	19.96	21.1
5	16QAM	12	13	20.07	19.95	19.90	
5	16QAM	25	0	20.07	20.06	19.93	
5	64QAM	1	0	20.15	20.25	20.16	
5	64QAM	1	12	20.03	20.01	20.08	21.1
5	64QAM	1	24	20.13	20.03	20.08	
5	64QAM	12	0	20.10	20.15	19.96	
5	64QAM	12	7	20.15	20.03	20.05	21.1
5	64QAM	12	13	20.00	20.02	19.95	
5	64QAM	25	0	20.08	20.08	19.90	
Channel				19965	20175	20385	
Frequency (MHz)				1711.5	1732.5	1753.5	
3	QPSK	1	0	19.98	20.07	19.95	
3	QPSK	1	8	19.94	19.91	19.92	21.1
3	QPSK	1	14	19.94	19.91	19.90	
3	QPSK	8	0	20.01	20.05	19.99	
3	QPSK	8	4	20.12	19.96	20.00	21.1
3	QPSK	8	7	20.04	19.96	19.93	
3	QPSK	15	0	20.03	20.12	19.91	
3	16QAM	1	0	20.33	20.36	20.26	
3	16QAM	1	8	20.17	20.14	20.14	21.1
3	16QAM	1	14	20.22	20.10	20.01	
3	16QAM	8	0	20.06	20.05	19.96	
3	16QAM	8	4	20.11	20.07	20.01	21.1
3	16QAM	8	7	20.06	19.95	19.90	
3	16QAM	15	0	20.04	20.06	19.95	
3	64QAM	1	0	20.14	20.25	20.16	
3	64QAM	1	8	20.06	19.97	20.07	21.1
3	64QAM	1	14	20.14	20.06	20.05	
3	64QAM	8	0	20.07	20.14	20.01	
3	64QAM	8	4	20.14	20.01	20.03	21.1
3	64QAM	8	7	20.04	19.97	19.96	
3	64QAM	15	0	20.04	20.07	19.91	
Channel				19957	20175	20393	
Frequency (MHz)				1710.7	1732.5	1754.3	
1.4	QPSK	1	0	19.95	19.93	19.92	
1.4	QPSK	1	3	20.01	19.97	19.94	21.1
1.4	QPSK	1	5	19.91	19.94	19.90	
1.4	QPSK	3	0	19.98	19.91	19.90	
1.4	QPSK	3	1	20.02	19.95	19.90	21.1
1.4	QPSK	3	3	19.99	19.90	19.92	
1.4	QPSK	6	0	20.04	20.00	19.92	
1.4	16QAM	1	0	20.27	20.16	20.10	
1.4	16QAM	1	3	20.30	20.25	20.15	
1.4	16QAM	1	5	20.25	20.21	20.08	21.1
1.4	16QAM	3	0	20.02	19.95	19.93	
1.4	16QAM	3	1	20.05	20.01	19.96	
1.4	16QAM	3	3	20.01	19.94	19.91	21.1
1.4	16QAM	6	0	20.12	20.03	19.96	
1.4	64QAM	1	0	20.23	20.17	20.02	
1.4	64QAM	1	3	20.27	20.20	20.04	21.1
1.4	64QAM	1	5	20.22	20.13	19.94	
1.4	64QAM	3	0	20.18	20.12	19.98	
1.4	64QAM	3	1	20.23	20.18	20.04	
1.4	64QAM	3	3	20.17	20.13	19.98	21.1
1.4	64QAM	6	0	20.04	20.00	19.90	



Band 5							
Ant 1							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch./	Power Middle Ch./	Power High Ch./	Tune-up limit (dBm)
Channel				20450	20525	20600	
Frequency (MHz)				829	836.5	844	
10	QPSK	1	0	24.09	24.12	24.20	25.7
10	QPSK	1	25	23.99	24.14	24.15	
10	QPSK	1	49	24.18	24.24	24.16	
10	QPSK	25	0	23.22	23.22	23.21	24.7
10	QPSK	25	12	23.27	23.24	23.31	
10	QPSK	25	25	23.26	23.28	23.27	
10	QPSK	50	0	23.24	23.26	23.25	24.7
10	16QAM	1	0	23.42	23.48	23.50	
10	16QAM	1	25	23.44	23.49	23.59	
10	16QAM	1	49	23.55	23.64	23.48	23.7
10	16QAM	25	0	22.17	22.28	22.24	
10	16QAM	25	12	22.32	22.27	22.30	
10	16QAM	25	25	22.19	22.25	22.38	23.7
10	16QAM	50	0	22.31	22.26	22.33	
10	64QAM	1	0	22.88	22.77	22.86	
10	64QAM	1	25	22.95	22.74	22.89	23.7
10	64QAM	1	49	22.95	22.56	22.14	
10	64QAM	25	0	21.70	21.80	21.65	
10	64QAM	25	12	21.81	21.83	21.85	22.7
10	64QAM	25	25	21.83	21.79	21.64	
10	64QAM	50	0	21.88	21.80	21.51	
Channel				20425	20525	20625	Tune-up limit (dBm)
Frequency (MHz)				826.5	836.5	846.5	
5	QPSK	1	0	24.19	24.13	24.18	25.7
5	QPSK	1	12	24.09	24.21	23.89	
5	QPSK	1	24	24.08	24.12	23.96	
5	QPSK	12	0	23.30	23.27	23.23	24.7
5	QPSK	12	7	23.23	23.30	23.00	
5	QPSK	12	13	23.14	23.25	23.05	
5	QPSK	25	0	23.22	23.21	23.15	24.7
5	16QAM	1	0	23.57	23.50	23.47	
5	16QAM	1	12	23.39	23.54	23.21	
5	16QAM	1	24	23.39	23.55	23.17	23.7
5	16QAM	12	0	22.26	22.34	22.26	
5	16QAM	12	7	22.20	22.31	22.18	
5	16QAM	12	13	22.19	22.30	22.22	23.7
5	16QAM	25	0	22.26	22.22	22.30	
5	64QAM	1	0	22.94	22.94	22.53	
5	64QAM	1	12	22.83	22.89	21.92	23.7
5	64QAM	1	24	22.81	22.82	21.84	
5	64QAM	12	0	21.84	21.90	21.19	
5	64QAM	12	7	21.75	21.81	20.82	22.7
5	64QAM	12	13	21.78	21.83	21.71	
5	64QAM	25	0	21.70	21.81	20.89	
Channel				20415	20525	20635	Tune-up limit (dBm)
Frequency (MHz)				825.5	836.5	847.5	
3	QPSK	1	0	24.12	24.15	23.99	25.7
3	QPSK	1	8	24.17	24.20	23.99	
3	QPSK	1	14	24.08	24.13	24.04	
3	QPSK	8	0	23.28	23.24	22.89	24.7
3	QPSK	8	4	23.19	23.27	23.03	
3	QPSK	8	7	23.25	23.23	23.20	
3	QPSK	15	0	23.20	23.22	23.02	24.7
3	16QAM	1	0	23.50	23.43	23.20	
3	16QAM	1	8	23.50	23.53	23.21	
3	16QAM	1	14	23.41	23.51	23.27	23.7
3	16QAM	8	0	22.33	22.29	22.05	
3	16QAM	8	4	22.23	22.39	22.15	
3	16QAM	8	7	22.24	22.33	22.19	23.7
3	16QAM	15	0	22.30	22.30	22.10	
3	64QAM	1	0	22.91	22.86	21.84	
3	64QAM	1	8	22.90	23.03	21.82	23.7
3	64QAM	1	14	22.90	22.88	21.79	
3	64QAM	8	0	21.75	21.80	21.63	
3	64QAM	8	4	21.83	21.88	21.73	22.7
3	64QAM	8	7	21.76	21.80	20.75	
3	64QAM	15	0	21.78	21.85	20.77	
Channel				20407	20525	20643	Tune-up limit (dBm)
Frequency (MHz)				824.7	836.5	848.3	
1.4	QPSK	1	0	24.11	24.14	24.03	25.7
1.4	QPSK	1	3	24.10	24.10	24.15	
1.4	QPSK	1	5	23.95	24.09	24.02	
1.4	QPSK	3	0	24.15	24.08	24.06	24.7
1.4	QPSK	3	1	24.10	24.13	24.19	
1.4	QPSK	3	3	24.09	24.08	24.12	
1.4	QPSK	6	0	23.11	23.27	23.23	24.7
1.4	16QAM	1	0	23.38	23.40	23.32	
1.4	16QAM	1	3	23.38	23.55	23.53	
1.4	16QAM	1	5	23.33	23.42	23.39	24.7
1.4	16QAM	3	0	23.15	23.20	23.11	
1.4	16QAM	3	1	23.22	23.29	23.23	
1.4	16QAM	3	3	23.13	23.20	23.15	23.7
1.4	16QAM	6	0	22.19	22.29	22.31	
1.4	64QAM	1	0	22.79	22.85	21.81	
1.4	64QAM	1	3	22.82	22.95	21.84	23.7
1.4	64QAM	1	5	22.75	22.82	21.98	
1.4	64QAM	3	0	22.75	22.76	21.77	
1.4	64QAM	3	1	22.79	22.89	21.84	23.7
1.4	64QAM	3	3	22.74	22.88	22.00	
1.4	64QAM	6	0	21.70	21.79	21.65	



Band 7							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				20850	21100	21350	
Frequency (MHz)				2510	2535	2560	
20	QPSK	1	0	20.46	20.57	20.58	21.6
20	QPSK	1	49	20.52	20.66	20.62	
20	QPSK	1	99	20.62	20.72	20.63	
20	QPSK	50	0	20.58	20.71	20.69	21.6
20	QPSK	50	24	20.68	20.75	20.72	
20	QPSK	50	50	20.69	20.84	20.76	
20	QPSK	100	0	20.69	20.73	20.70	21.6
20	16QAM	1	0	20.80	20.89	20.96	
20	16QAM	1	49	20.88	21.02	20.95	
20	16QAM	1	99	21.02	21.11	21.00	21.6
20	16QAM	50	0	20.56	20.72	20.70	
20	16QAM	50	24	20.73	20.76	20.73	
20	16QAM	50	50	20.71	20.85	20.80	21.6
20	16QAM	100	0	20.67	20.73	20.70	
20	64QAM	1	0	20.61	20.70	20.76	
20	64QAM	1	49	20.73	20.82	20.79	21.6
20	64QAM	1	99	20.90	20.96	20.88	
20	64QAM	50	0	20.59	20.71	20.69	
20	64QAM	50	24	20.71	20.76	20.73	21.6
20	64QAM	50	50	20.73	20.84	20.77	
20	64QAM	100	0	20.71	20.75	20.69	
Channel				20925	21100	21375	Tune-up limit (dBm)
Frequency (MHz)				2507.5	2535	2562.5	
15	QPSK	1	0	20.47	20.42	20.43	21.6
15	QPSK	1	37	20.41	20.48	20.45	
15	QPSK	1	74	20.40	20.55	20.48	
15	QPSK	36	0	20.44	20.52	20.49	21.6
15	QPSK	36	20	20.49	20.56	20.63	
15	QPSK	36	39	20.50	20.63	20.57	
15	QPSK	75	0	20.45	20.54	20.58	21.6
15	16QAM	1	0	20.63	20.78	20.73	
15	16QAM	1	37	20.68	20.82	20.75	
15	16QAM	1	74	20.75	20.89	20.78	21.6
15	16QAM	36	0	20.46	20.53	20.49	
15	16QAM	36	20	20.49	20.55	20.58	
15	16QAM	36	39	20.48	20.64	20.57	21.6
15	16QAM	75	0	20.46	20.56	20.59	
15	64QAM	1	0	20.49	20.59	20.62	
15	64QAM	1	37	20.57	20.74	20.67	21.6
15	64QAM	1	74	20.59	20.78	20.70	
15	64QAM	36	0	20.39	20.56	20.62	
15	64QAM	36	20	20.52	20.59	20.59	21.6
15	64QAM	36	39	20.51	20.68	20.58	
15	64QAM	75	0	20.47	20.56	20.56	
Channel				20800	21100	21400	Tune-up limit (dBm)
Frequency (MHz)				2505	2535	2565	
10	QPSK	1	0	20.43	20.40	20.47	21.6
10	QPSK	1	25	20.45	20.40	20.46	
10	QPSK	1	49	20.53	20.48	20.40	
10	QPSK	25	0	20.43	20.52	20.47	21.6
10	QPSK	25	12	20.45	20.53	20.48	
10	QPSK	25	25	20.46	20.59	20.54	
10	QPSK	50	0	20.44	20.55	20.47	21.6
10	16QAM	1	0	20.62	20.74	20.71	
10	16QAM	1	25	20.64	20.61	20.73	
10	16QAM	1	49	20.67	20.85	20.77	21.6
10	16QAM	25	0	20.41	20.49	20.45	
10	16QAM	25	12	20.45	20.54	20.47	
10	16QAM	25	25	20.44	20.60	20.52	21.6
10	16QAM	50	0	20.45	20.52	20.47	
10	64QAM	1	0	20.52	20.62	20.61	
10	64QAM	1	25	20.56	20.76	20.70	21.6
10	64QAM	1	49	20.56	20.76	20.72	
10	64QAM	25	0	20.42	20.57	20.49	
10	64QAM	25	12	20.48	20.61	20.55	21.6
10	64QAM	25	25	20.46	20.66	20.59	
10	64QAM	50	0	20.47	20.59	20.53	
Channel				20775	21100	21425	Tune-up limit (dBm)
Frequency (MHz)				2502.5	2535	2567.5	
5	QPSK	1	0	20.40	20.40	20.40	21.6
5	QPSK	1	12	20.40	20.48	20.41	
5	QPSK	1	24	20.40	20.48	20.40	
5	QPSK	12	0	20.41	20.54	20.52	21.6
5	QPSK	12	7	20.47	20.53	20.54	
5	QPSK	12	13	20.44	20.61	20.51	
5	QPSK	25	0	20.44	20.55	20.52	21.6
5	16QAM	1	0	20.68	20.75	20.73	
5	16QAM	1	12	20.62	20.73	20.70	
5	16QAM	1	24	20.68	20.80	20.73	21.6
5	16QAM	12	0	20.49	20.56	20.56	
5	16QAM	12	7	20.46	20.54	20.51	
5	16QAM	12	13	20.43	20.66	20.52	21.6
5	16QAM	25	0	20.42	20.55	20.55	
5	64QAM	1	0	20.52	20.68	20.65	
5	64QAM	1	12	20.50	20.75	20.65	21.6
5	64QAM	1	24	20.54	20.74	20.65	
5	64QAM	12	0	20.49	20.65	20.60	
5	64QAM	12	7	20.48	20.60	20.58	21.6
5	64QAM	12	13	20.48	20.67	20.57	
5	64QAM	25	0	20.43	20.59	20.57	



Band 12							
Ant 1							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low [dB]	Power Middle [dB]	Power High [dB]	Tune-up limit [dBm]
Channel				23060	23095	23130	
Frequency (MHz)				704	707.5	711	
10	QPSK	1	0	23.86	23.82	23.80	25.7
10	QPSK	1	25	23.75	23.85	23.77	
10	QPSK	1	49	23.89	23.88	23.81	
10	QPSK	25	0	22.95	22.92	22.90	
10	QPSK	25	12	23.03	22.92	22.98	24.7
10	QPSK	25	25	23.01	22.94	22.95	
10	QPSK	50	0	22.97	22.99	22.97	
10	16QAM	1	0	23.25	23.19	23.14	24.7
10	16QAM	1	25	23.25	23.24	23.19	
10	16QAM	1	49	23.30	23.28	23.19	
10	16QAM	25	0	21.94	21.92	21.86	
10	16QAM	25	12	22.01	21.86	21.92	23.7
10	16QAM	25	25	21.88	22.00	21.87	
10	16QAM	50	0	22.02	21.94	21.88	
10	64QAM	1	0	22.58	22.50	22.58	23.7
10	64QAM	1	25	22.63	22.67	22.64	
10	64QAM	1	49	22.68	22.68	22.58	
10	64QAM	25	0	21.49	21.44	21.40	
10	64QAM	25	12	21.58	21.43	21.57	22.7
10	64QAM	25	25	21.47	21.47	21.41	
10	64QAM	50	0	21.59	21.45	21.45	
Channel				23035	23095	23155	Tune-up limit [dBm]
Frequency (MHz)				701.5	707.5	713.5	
5	QPSK	1	0	23.88	23.80	23.79	
5	QPSK	1	12	23.88	23.84	23.84	25.7
5	QPSK	1	24	23.78	23.82	23.80	
5	QPSK	12	0	22.91	22.93	22.91	
5	QPSK	12	7	23.00	22.86	22.96	24.7
5	QPSK	12	13	22.93	22.94	22.85	
5	QPSK	25	0	22.99	22.87	22.91	
5	16QAM	1	0	23.20	23.22	23.09	24.7
5	16QAM	1	12	23.14	23.21	23.15	
5	16QAM	1	24	23.14	23.15	23.09	
5	16QAM	12	0	21.99	21.98	21.94	
5	16QAM	12	7	21.98	21.89	21.93	23.7
5	16QAM	12	13	21.96	21.92	21.87	
5	16QAM	25	0	21.94	21.98	21.92	
5	64QAM	1	0	22.69	22.61	22.58	
5	64QAM	1	12	22.59	22.54	22.60	23.7
5	64QAM	1	24	22.66	22.63	22.56	
5	64QAM	12	0	21.51	21.50	21.41	
5	64QAM	12	7	21.50	21.45	21.50	22.7
5	64QAM	12	13	21.52	21.45	21.42	
5	64QAM	25	0	21.44	21.45	21.39	
Channel				23025	23095	23165	Tune-up limit [dBm]
Frequency (MHz)				700.5	707.5	714.5	
3	QPSK	1	0	23.84	23.80	23.81	25.7
3	QPSK	1	8	23.85	23.84	23.80	
3	QPSK	1	14	23.85	23.83	23.77	
3	QPSK	8	0	23.01	22.94	22.90	
3	QPSK	8	4	22.92	22.95	22.91	24.7
3	QPSK	8	7	22.90	22.87	22.84	
3	QPSK	15	0	22.90	22.92	22.84	
3	16QAM	1	0	23.24	23.15	23.17	24.7
3	16QAM	1	8	23.19	23.23	23.16	
3	16QAM	1	14	23.23	23.22	23.18	
3	16QAM	8	0	22.06	21.94	21.94	
3	16QAM	8	4	22.01	22.06	22.01	23.7
3	16QAM	8	7	22.03	21.92	21.88	
3	16QAM	15	0	22.01	21.86	21.86	
3	64QAM	1	0	22.70	22.60	22.53	23.7
3	64QAM	1	8	22.68	22.72	22.60	
3	64QAM	1	14	22.66	22.60	22.57	
3	64QAM	8	0	21.60	21.44	21.47	
3	64QAM	8	4	21.60	21.50	21.53	22.7
3	64QAM	8	7	21.47	21.45	21.41	
3	64QAM	15	0	21.45	21.39	21.36	
Channel				23017	23095	23173	Tune-up limit [dBm]
Frequency (MHz)				699.7	707.5	715.3	
1.4	QPSK	1	0	23.80	23.74	23.79	
1.4	QPSK	1	3	23.81	23.79	23.77	25.7
1.4	QPSK	1	5	23.80	23.74	23.70	
1.4	QPSK	3	0	23.82	23.73	23.71	
1.4	QPSK	3	1	23.84	23.75	23.79	
1.4	QPSK	3	3	23.78	23.75	23.71	
1.4	QPSK	6	0	22.97	22.78	22.79	24.7
1.4	16QAM	1	0	23.15	23.06	23.09	
1.4	16QAM	1	3	23.18	23.21	23.09	
1.4	16QAM	1	5	23.08	23.08	22.98	24.7
1.4	16QAM	3	0	22.96	22.81	22.80	
1.4	16QAM	3	1	22.96	22.87	22.88	
1.4	16QAM	3	3	22.92	22.88	22.78	23.7
1.4	16QAM	6	0	21.94	21.86	21.82	
1.4	64QAM	1	0	22.59	22.48	22.43	
1.4	64QAM	1	3	22.69	22.57	22.48	
1.4	64QAM	1	5	22.55	22.46	22.43	23.7
1.4	64QAM	3	0	22.57	22.51	22.45	
1.4	64QAM	3	1	22.55	22.45	22.53	
1.4	64QAM	3	3	22.55	22.57	22.46	
1.4	64QAM	6	0	21.40	21.32	21.31	22.7



Band 13							
Ant 1							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				23230			
Frequency (MHz)				762			
10	QPSK	1	0	23.60			25.2
10	QPSK	1	25	23.47			
10	QPSK	1	49	23.51			
10	QPSK	25	0	22.58			24.2
10	QPSK	25	12	22.65			
10	QPSK	25	25	22.56			
10	QPSK	50	0	22.58			24.2
10	16QAM	1	0	22.75			
10	16QAM	1	25	22.82			
10	16QAM	1	49	22.78			23.2
10	16QAM	25	0	21.59			
10	16QAM	25	12	21.62			
10	16QAM	25	25	21.61			23.2
10	16QAM	50	0	21.57			
10	64QAM	1	0	23.07			
10	64QAM	1	25	23.04			23.2
10	64QAM	1	49	23.01			
10	64QAM	25	0	22.07			
10	64QAM	25	12	22.06			22.2
10	64QAM	25	25	22.02			
10	64QAM	50	0	22.04			
Channel				23206 23230 23255			
Frequency (MHz)				779.5 762 784.5			Tune-up limit (dBm)
5	QPSK	1	0	23.50	23.45	23.49	25.2
5	QPSK	1	12	23.45	23.54	23.52	
5	QPSK	1	24	23.50	23.51	23.52	
5	QPSK	12	0	22.63	22.56	22.61	24.2
5	QPSK	12	7	22.67	22.64	22.57	
5	QPSK	12	13	22.67	22.62	22.52	
5	QPSK	25	0	22.64	22.57	22.55	24.2
5	16QAM	1	0	22.71	22.71	22.78	
5	16QAM	1	12	22.78	22.85	22.79	
5	16QAM	1	24	22.82	22.85	22.72	23.2
5	16QAM	12	0	21.70	21.62	21.68	
5	16QAM	12	7	21.68	21.57	21.60	
5	16QAM	12	13	21.69	21.60	21.70	23.2
5	16QAM	25	0	21.63	21.64	21.54	
5	64QAM	1	0	22.14	22.25	22.17	
5	64QAM	1	12	22.26	22.30	22.21	23.2
5	64QAM	1	24	22.26	22.23	22.15	
5	64QAM	12	0	21.19	21.11	21.20	
5	64QAM	12	7	21.24	21.14	21.08	22.2
5	64QAM	12	13	21.15	21.17	21.08	
5	64QAM	25	0	21.21	21.11	21.10	



Band 14							
Ant 1							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				23330			
Frequency (MHz)				793			
10	QPSK	1	0	24.23			25.7
10	QPSK	1	25	24.12			
10	QPSK	1	49	24.04			
10	QPSK	25	0	23.11			24.7
10	QPSK	25	12	23.18			
10	QPSK	25	25	23.16			
10	QPSK	50	0	23.15			24.7
10	16QAM	1	0	23.49			
10	16QAM	1	25	23.41			
10	16QAM	1	49	23.37			23.7
10	16QAM	25	0	22.10			
10	16QAM	25	12	22.09			
10	16QAM	25	25	22.19			23.7
10	16QAM	50	0	22.16			
10	64QAM	1	0	22.81			
10	64QAM	1	25	22.86			23.7
10	64QAM	1	49	22.73			
10	64QAM	25	0	21.72			
10	64QAM	25	12	21.81			22.7
10	64QAM	25	25	21.67			
10	64QAM	50	0	21.68			
Channel				23306 23330 23356			Tune-up limit (dBm)
Frequency (MHz)				790.5 793 795.5			
5	QPSK	1	0	23.98	24.04	24.05	25.7
5	QPSK	1	12	24.14	24.19	24.14	
5	QPSK	1	24	24.08	24.07	24.05	
5	QPSK	12	0	23.13	23.12	23.08	24.7
5	QPSK	12	7	23.21	23.21	23.14	
5	QPSK	12	13	23.14	23.16	23.12	
5	QPSK	25	0	23.11	23.12	23.03	24.7
5	16QAM	1	0	23.40	23.37	23.34	
5	16QAM	1	12	23.47	23.44	23.43	
5	16QAM	1	24	23.45	23.34	23.39	23.7
5	16QAM	12	0	22.13	22.09	22.10	
5	16QAM	12	7	22.24	22.13	22.18	
5	16QAM	12	13	22.15	22.19	22.15	23.7
5	16QAM	25	0	22.17	22.07	22.08	
5	64QAM	1	0	22.75	22.83	22.82	
5	64QAM	1	12	22.89	22.72	22.82	23.7
5	64QAM	1	24	22.71	22.80	22.80	
5	64QAM	12	0	21.63	21.70	21.65	
5	64QAM	12	7	21.69	21.72	21.71	22.7
5	64QAM	12	13	21.75	21.67	21.65	
5	64QAM	25	0	21.71	21.66	21.61	



Band 17							
Ant 1							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				23780	23790	23800	
Frequency (MHz)				709	710	711	
10	QPSK	1	0	24.25	24.20	24.11	25.7
10	QPSK	1	25	24.30	24.35	24.15	
10	QPSK	1	49	24.30	24.21	24.20	
10	QPSK	25	0	23.29	23.30	23.28	24.7
10	QPSK	25	12	23.40	23.30	23.28	
10	QPSK	25	25	23.38	23.36	23.44	
10	QPSK	50	0	23.35	23.29	23.30	24.7
10	16QAM	1	0	23.62	23.59	23.59	
10	16QAM	1	25	23.66	23.61	23.58	
10	16QAM	1	49	23.60	23.63	23.62	23.7
10	16QAM	25	0	22.29	22.27	22.30	
10	16QAM	25	12	22.41	22.37	22.28	
10	16QAM	25	25	22.44	22.35	22.45	23.7
10	16QAM	50	0	22.37	22.35	22.25	
10	64QAM	1	0	23.01	22.91	22.99	
10	64QAM	1	25	23.11	23.02	23.01	23.7
10	64QAM	1	49	23.05	23.02	22.93	
10	64QAM	25	0	21.81	21.82	21.78	
10	64QAM	25	12	21.95	21.88	21.82	22.7
10	64QAM	25	25	21.89	21.92	21.97	
10	64QAM	50	0	21.95	21.82	21.85	
Channel				23765	23790	23825	Tune-up limit (dBm)
Frequency (MHz)				706.5	710	713.5	
5	QPSK	1	0	24.16	24.23	24.17	25.7
5	QPSK	1	12	24.32	24.33	24.24	
5	QPSK	1	24	24.30	24.32	24.28	
5	QPSK	12	0	23.28	23.30	23.29	24.7
5	QPSK	12	7	23.31	23.35	23.32	
5	QPSK	12	13	23.40	23.37	23.34	
5	QPSK	25	0	23.34	23.27	23.38	24.7
5	16QAM	1	0	23.61	23.57	23.51	
5	16QAM	1	12	23.64	23.63	23.59	
5	16QAM	1	24	23.62	23.61	23.59	23.7
5	16QAM	12	0	22.38	22.40	22.27	
5	16QAM	12	7	22.39	22.35	22.35	
5	16QAM	12	13	22.34	22.35	22.30	23.7
5	16QAM	25	0	22.35	22.38	22.37	
5	64QAM	1	0	22.79	22.83	23.01	
5	64QAM	1	12	23.01	23.08	22.96	23.7
5	64QAM	1	24	23.04	23.07	22.97	
5	64QAM	12	0	21.93	21.92	21.91	
5	64QAM	12	7	21.96	21.91	21.94	22.7
5	64QAM	12	13	21.92	21.96	21.92	
5	64QAM	25	0	21.86	21.84	21.91	



Band 25							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				26140	26340	26590	
Frequency (MHz)				1860	1880	1905	
20	QPSK	1	0	17.68	17.70	17.58	
20	QPSK	1	49	17.58	17.66	17.56	18.9
20	QPSK	1	99	17.59	17.66	17.55	
20	QPSK	50	0	17.74	17.77	17.68	
20	QPSK	50	24	17.83	17.82	17.89	
20	QPSK	50	50	17.78	17.78	17.75	18.9
20	QPSK	100	0	17.81	17.78	17.64	
20	16QAM	1	0	18.01	17.98	17.98	
20	16QAM	1	49	17.93	17.95	17.93	18.9
20	16QAM	1	99	17.91	17.95	17.92	
20	16QAM	50	0	17.77	17.77	17.85	
20	16QAM	50	24	17.80	17.83	17.70	18.9
20	16QAM	50	50	17.77	17.84	17.73	
20	16QAM	100	0	17.77	17.78	17.63	
20	64QAM	1	0	17.91	17.84	17.75	
20	64QAM	1	49	17.80	17.88	17.77	18.9
20	64QAM	1	99	17.81	17.91	17.79	
20	64QAM	50	0	17.78	17.78	17.70	
20	64QAM	50	24	17.82	17.86	17.70	18.9
20	64QAM	50	50	17.80	17.83	17.79	
20	64QAM	100	0	17.79	17.82	17.68	
Channel				26115	26340	26615	Tune-up limit (dBm)
Frequency (MHz)				1857.5	1880	1907.5	
15	QPSK	1	0	17.60	17.61	17.52	
15	QPSK	1	37	17.53	17.64	17.48	18.9
15	QPSK	1	74	17.52	17.57	17.54	
15	QPSK	36	0	17.66	17.71	17.63	
15	QPSK	36	20	17.73	17.77	17.81	18.9
15	QPSK	36	39	17.71	17.77	17.75	
15	QPSK	75	0	17.72	17.73	17.57	
15	16QAM	1	0	18.01	17.95	17.88	
15	16QAM	1	37	17.89	17.95	17.85	18.9
15	16QAM	1	74	17.90	17.92	17.84	
15	16QAM	36	0	17.73	17.76	17.57	
15	16QAM	36	20	17.79	17.77	17.70	18.9
15	16QAM	36	39	17.76	17.74	17.69	
15	16QAM	75	0	17.69	17.71	17.61	
15	64QAM	1	0	17.84	17.76	17.72	
15	64QAM	1	37	17.71	17.78	17.70	18.9
15	64QAM	1	74	17.72	17.85	17.70	
15	64QAM	36	0	17.76	17.78	17.60	
15	64QAM	36	20	17.72	17.63	17.69	18.9
15	64QAM	36	39	17.70	17.78	17.78	
15	64QAM	75	0	17.75	17.76	17.63	
Channel				26090	26340	26640	Tune-up limit (dBm)
Frequency (MHz)				1855	1880	1910	
10	QPSK	1	0	17.58	17.70	17.55	
10	QPSK	1	25	17.54	17.66	17.56	18.9
10	QPSK	1	49	17.51	17.62	17.54	
10	QPSK	25	0	17.74	17.76	17.60	
10	QPSK	25	12	17.74	17.81	17.65	18.9
10	QPSK	25	25	17.78	17.71	17.67	
10	QPSK	50	0	17.74	17.75	17.63	
10	16QAM	1	0	18.01	17.92	17.94	
10	16QAM	1	25	17.86	17.92	17.83	18.9
10	16QAM	1	49	17.91	17.89	17.91	
10	16QAM	25	0	17.73	17.67	17.59	
10	16QAM	25	12	17.79	17.80	17.65	18.9
10	16QAM	25	25	17.75	17.75	17.67	
10	16QAM	50	0	17.73	17.72	17.63	
10	64QAM	1	0	17.83	17.80	17.75	
10	64QAM	1	25	17.74	17.83	17.76	18.9
10	64QAM	1	49	17.81	17.85	17.71	
10	64QAM	25	0	17.74	17.71	17.66	
10	64QAM	25	12	17.77	17.79	17.64	18.9
10	64QAM	25	25	17.74	17.76	17.78	
10	64QAM	50	0	17.72	17.71	17.66	
Channel				26055	26340	26695	Tune-up limit (dBm)
Frequency (MHz)				1852.5	1880	1912.5	
5	QPSK	1	0	17.68	17.66	17.50	
5	QPSK	1	12	17.46	17.58	17.53	18.9
5	QPSK	1	24	17.52	17.60	17.52	
5	QPSK	12	0	17.67	17.74	17.65	
5	QPSK	12	7	17.60	17.79	17.68	18.9
5	QPSK	12	13	17.75	17.70	17.75	
5	QPSK	25	0	17.80	17.78	17.64	
5	16QAM	1	0	17.93	17.95	17.91	
5	16QAM	1	12	17.87	17.88	17.90	18.9
5	16QAM	1	24	17.84	17.88	17.92	
5	16QAM	12	0	17.77	17.86	17.75	
5	16QAM	12	7	17.75	17.78	17.66	18.9
5	16QAM	12	13	17.74	17.80	17.72	
5	16QAM	25	0	17.70	17.73	17.59	
5	64QAM	1	0	17.81	17.76	17.68	
5	64QAM	1	12	17.79	17.87	17.75	18.9
5	64QAM	1	24	17.74	17.85	17.75	
5	64QAM	12	0	17.74	17.77	17.63	
5	64QAM	12	7	17.80	17.81	17.70	18.9
5	64QAM	12	13	17.76	17.75	17.71	
5	64QAM	25	0	17.72	17.80	17.68	
Channel				26055	26340	26675	Tune-up limit (dBm)
Frequency (MHz)				1851.5	1880	1913.5	
3	QPSK	1	0	17.68	17.64	17.53	
3	QPSK	1	8	17.46	17.63	17.53	18.9
3	QPSK	1	14	17.51	17.63	17.53	
3	QPSK	8	0	17.74	17.71	17.67	
3	QPSK	8	4	17.80	17.72	17.60	18.9
3	QPSK	8	7	17.78	17.71	17.69	
3	QPSK	15	0	17.78	17.76	17.63	
3	16QAM	1	0	17.88	17.91	17.93	
3	16QAM	1	8	17.84	17.93	17.84	18.9
3	16QAM	1	14	17.85	17.90	17.90	
3	16QAM	8	0	17.70	17.77	17.56	
3	16QAM	8	4	17.71	17.75	17.65	18.9
3	16QAM	8	7	17.71	17.78	17.73	
3	16QAM	15	0	17.71	17.68	17.57	
3	64QAM	1	0	17.91	17.76	17.65	
3	64QAM	1	8	17.73	17.82	17.71	18.9
3	64QAM	1	14	17.79	17.90	17.75	
3	64QAM	8	0	17.68	17.78	17.67	
3	64QAM	8	4	17.78	17.81	17.64	18.9
3	64QAM	8	7	17.79	17.75	17.75	
3	64QAM	15	0	17.74	17.78	17.68	
Channel				26047	26340	26883	Tune-up limit (dBm)
Frequency (MHz)				1850.7	1880	1914.3	
1.4	QPSK	1	0	17.53	17.50	17.43	
1.4	QPSK	1	3	17.65	17.66	17.55	
1.4	QPSK	1	5	17.61	17.61	17.49	18.9
1.4	QPSK	3	0	17.59	17.59	17.47	
1.4	QPSK	3	1	17.66	17.65	17.50	
1.4	QPSK	3	3	17.65	17.64	17.51	
1.4	QPSK	6	0	17.69	17.68	17.55	18.9
1.4	16QAM	1	0	17.90	17.85	17.77	
1.4	16QAM	1	3	17.99	18.01	17.92	
1.4	16QAM	1	5	17.85	17.97	17.81	18.9
1.4	16QAM	3	0	17.68	17.71	17.55	
1.4	16QAM	3	1	17.72	17.81	17.59	
1.4	16QAM	3	3	17.70	17.71	17.58	
1.4	16QAM	6	0	17.82	17.82	17.67	18.9
1.4	64QAM	1	0	17.72	17.69	17.68	
1.4	64QAM	1	3	17.84	17.87	17.78	
1.4	64QAM	1	5	17.81	17.83	17.74	18.9
1.4	64QAM	3	0	17.77	17.80	17.66	
1.4	64QAM	3	1	17.85	17.88	17.70	
1.4	64QAM	3	3	17.81	17.83	17.70	
1.4	64QAM	6	0	17.68	17.71	17.57	18.9



Band 26							
Ant 1							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				26765	26865	26965	
Frequency (MHz)				821.5	831.5	841.5	
15	QPSK	1	0	24.04	24.05	24.03	25.7
15	QPSK	1	37	23.98	24.02	24.02	
15	QPSK	1	74	24.10	24.33	23.96	
15	QPSK	36	0	23.17	23.22	23.18	
15	QPSK	36	20	23.23	23.18	23.12	24.7
15	QPSK	36	39	23.19	23.19	23.15	
15	QPSK	75	0	23.23	23.17	23.12	
15	16QAM	1	0	23.36	23.36	23.39	24.7
15	16QAM	1	37	23.38	23.42	23.42	
15	16QAM	1	74	23.43	23.44	23.29	
15	16QAM	36	0	22.16	22.22	22.16	
15	16QAM	36	20	22.17	22.15	22.16	23.7
15	16QAM	36	39	22.14	22.17	22.23	
15	16QAM	75	0	22.17	22.15	22.22	
15	64QAM	1	0	22.79	22.70	22.74	23.7
15	64QAM	1	37	22.72	22.50	22.79	
15	64QAM	1	74	22.80	22.76	22.16	
15	64QAM	36	0	21.64	21.76	21.77	
15	64QAM	36	20	21.66	21.73	21.65	22.7
15	64QAM	36	39	21.67	21.70	21.78	
15	64QAM	75	0	21.76	21.65	21.77	
Channel				26740	26865	26990	Tune-up limit (dBm)
Frequency (MHz)				819	831.5	844	
10	QPSK	1	0	24.13	24.13	24.21	25.7
10	QPSK	1	25	24.03	24.13	24.12	
10	QPSK	1	49	24.09	24.17	24.09	
10	QPSK	25	0	23.22	23.12	23.21	
10	QPSK	25	12	23.20	23.20	23.20	24.7
10	QPSK	25	25	23.16	23.23	23.25	
10	QPSK	50	0	23.23	23.14	23.16	
10	16QAM	1	0	23.45	23.52	23.59	24.7
10	16QAM	1	25	23.55	23.51	23.52	
10	16QAM	1	49	23.53	23.49	23.45	
10	16QAM	25	0	22.22	22.20	22.21	
10	16QAM	25	12	22.23	22.21	22.15	23.7
10	16QAM	25	25	22.17	22.23	22.08	
10	16QAM	50	0	22.20	22.19	22.19	
10	64QAM	1	0	22.96	22.76	22.91	23.7
10	64QAM	1	25	22.81	22.91	22.98	
10	64QAM	1	49	22.93	22.91	22.96	
10	64QAM	25	0	21.76	21.73	21.76	22.7
10	64QAM	25	12	21.62	21.75	21.78	
10	64QAM	25	25	21.70	21.75	21.48	
10	64QAM	50	0	21.74	21.68	21.72	
Channel				26715	26865	27015	Tune-up limit (dBm)
Frequency (MHz)				816.5	831.5	846.5	
5	QPSK	1	0	24.31	24.13	24.11	25.7
5	QPSK	1	19	24.24	24.19	24.09	
5	QPSK	1	24	24.07	24.24	24.16	
5	QPSK	12	0	23.33	23.23	23.21	
5	QPSK	12	7	23.27	23.27	23.22	24.7
5	QPSK	12	13	23.26	23.24	23.11	
5	QPSK	25	0	23.28	23.13	23.20	
5	16QAM	1	0	23.63	23.43	23.45	24.7
5	16QAM	1	12	23.43	23.51	23.32	
5	16QAM	1	24	23.44	23.49	23.31	
5	16QAM	12	0	22.38	22.22	22.22	
5	16QAM	12	7	22.32	22.24	22.21	23.7
5	16QAM	12	13	22.21	22.25	22.18	
5	16QAM	25	0	22.22	22.21	22.21	
5	64QAM	1	0	23.02	22.85	22.89	23.7
5	64QAM	1	12	22.84	22.89	22.19	
5	64QAM	1	24	22.68	22.92	22.34	
5	64QAM	12	0	21.90	21.84	21.65	
5	64QAM	12	7	21.89	21.81	21.18	22.7
5	64QAM	12	13	21.75	21.82	21.02	
5	64QAM	25	0	21.82	21.69	21.56	
Channel				26705	26865	27025	Tune-up limit (dBm)
Frequency (MHz)				815.5	831.5	847.5	
3	QPSK	1	0	24.19	24.16	24.20	25.7
3	QPSK	1	8	24.24	24.27	24.13	
3	QPSK	1	14	24.07	24.18	24.11	
3	QPSK	8	0	23.34	23.18	23.17	
3	QPSK	8	4	23.25	23.25	23.22	24.7
3	QPSK	8	7	23.29	23.24	23.10	
3	QPSK	15	0	23.24	23.18	23.13	
3	16QAM	1	0	23.53	23.45	23.50	24.7
3	16QAM	1	8	23.59	23.51	23.39	
3	16QAM	1	14	23.50	23.53	23.35	
3	16QAM	8	0	22.35	22.23	22.26	
3	16QAM	8	4	22.30	22.37	22.25	23.7
3	16QAM	8	7	22.27	22.33	22.13	
3	16QAM	15	0	22.38	22.17	22.16	
3	64QAM	1	0	22.92	22.87	22.25	
3	64QAM	1	8	23.00	22.93	22.12	23.7
3	64QAM	1	14	22.89	22.94	22.30	
3	64QAM	8	0	21.87	21.79	21.08	
3	64QAM	8	4	21.84	21.88	21.07	22.7
3	64QAM	8	7	21.88	21.80	21.14	
3	64QAM	15	0	21.81	21.79	21.12	
Channel				26697	26865	27033	Tune-up limit (dBm)
Frequency (MHz)				814.7	831.5	848.3	
1.4	QPSK	1	0	24.16	24.04	24.05	25.7
1.4	QPSK	1	3	24.24	24.13	24.07	
1.4	QPSK	1	5	24.12	24.08	23.93	
1.4	QPSK	3	0	24.23	24.06	24.02	
1.4	QPSK	3	1	24.21	24.05	24.03	
1.4	QPSK	3	3	24.16	24.14	23.99	24.7
1.4	QPSK	6	0	23.25	23.20	23.04	
1.4	16QAM	1	0	23.52	23.37	23.36	
1.4	16QAM	1	3	23.54	23.47	23.35	24.7
1.4	16QAM	1	5	23.41	23.39	23.29	
1.4	16QAM	3	0	23.23	23.16	23.12	
1.4	16QAM	3	1	23.23	23.20	23.14	
1.4	16QAM	3	3	23.27	23.11	23.09	
1.4	16QAM	6	0	22.34	22.26	22.14	23.7
1.4	64QAM	1	0	22.85	22.81	22.16	
1.4	64QAM	1	3	22.96	22.89	22.39	
1.4	64QAM	1	5	22.79	22.75	22.41	
1.4	64QAM	3	0	22.92	22.75	22.11	23.7
1.4	64QAM	3	1	22.90	22.81	22.20	
1.4	64QAM	3	3	22.84	22.75	22.38	
1.4	64QAM	6	0	21.75	21.73	21.14	22.7



Band 30							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				27710			
Frequency (MHz)				2310			
10	QPSK	1	0	20.54			21.6
10	QPSK	1	25	20.50			
10	QPSK	1	49	20.51			
10	QPSK	25	0	20.55			
10	QPSK	25	12	20.60			
10	QPSK	25	25	20.59			21.6
10	QPSK	50	0	20.75			
10	16QAM	1	0	20.65			21.6
10	16QAM	1	25	20.67			
10	16QAM	1	49	20.65			
10	16QAM	25	0	20.33			
10	16QAM	25	12	20.37			21.6
10	16QAM	25	25	20.34			
10	16QAM	50	0	20.40			
10	64QAM	1	0	20.54			21.6
10	64QAM	1	25	20.53			
10	64QAM	1	49	20.49			
10	64QAM	25	0	19.46			
10	64QAM	25	12	19.53			20.6
10	64QAM	25	25	19.55			
10	64QAM	50	0	19.52			
Channel				27685	27710	27735	Tune-up limit (dBm)
Frequency (MHz)				2307.5	2310	2312.5	
5	QPSK	1	0	20.10	20.15	20.19	21.6
5	QPSK	1	12	20.26	20.30	20.24	
5	QPSK	1	24	20.28	20.22	20.25	
5	QPSK	12	0	20.24	20.28	20.28	
5	QPSK	12	7	20.35	20.29	20.31	21.6
5	QPSK	12	13	20.33	20.32	20.31	
5	QPSK	25	0	20.31	20.28	20.28	
5	16QAM	1	0	20.42	20.42	20.56	21.6
5	16QAM	1	12	20.50	20.55	20.46	
5	16QAM	1	24	20.56	20.53	20.56	
5	16QAM	12	0	20.26	20.29	20.27	21.6
5	16QAM	12	7	20.38	20.34	20.33	
5	16QAM	12	13	20.38	20.31	20.34	
5	16QAM	25	0	20.30	20.29	20.33	
5	64QAM	1	0	20.36	20.43	20.44	21.6
5	64QAM	1	12	20.47	20.50	20.46	
5	64QAM	1	24	20.55	20.49	20.50	
5	64QAM	12	0	19.41	19.44	19.46	20.6
5	64QAM	12	7	19.51	19.47	19.49	
5	64QAM	12	13	19.51	19.44	19.49	
5	64QAM	25	0	19.46	19.42	19.42	



Band 66							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				132072	132322	132572	
Frequency (MHz)				1720	1745	1770	
20	QPSK	1	0	20.05	19.96	19.93	21.1
20	QPSK	1	48	19.91	19.90	19.96	
20	QPSK	1	99	19.92	19.91	19.90	
20	QPSK	50	0	19.98	19.93	19.90	
20	QPSK	50	24	20.17	20.00	20.03	21.1
20	QPSK	50	50	20.05	19.90	19.91	
20	QPSK	100	0	20.02	19.90	19.90	
20	16QAM	1	0	20.29	20.20	20.14	21.1
20	16QAM	1	49	20.21	20.05	20.08	
20	16QAM	1	99	20.29	20.05	19.96	
20	16QAM	50	0	20.00	19.92	19.91	
20	16QAM	50	24	20.06	19.93	19.97	21.1
20	16QAM	50	50	20.05	19.90	19.92	
20	16QAM	100	0	20.06	19.91	19.92	
20	64QAM	1	0	20.12	20.01	19.98	21.1
20	64QAM	1	49	20.01	19.92	19.92	
20	64QAM	1	99	20.11	19.98	19.92	
20	64QAM	50	0	20.00	19.92	19.92	
20	64QAM	50	24	20.07	19.93	19.97	21.1
20	64QAM	50	50	20.05	19.91	19.93	
20	64QAM	100	0	20.04	19.89	19.87	
Channel				132047	132322	132597	Tune-up limit (dBm)
Frequency (MHz)				1717.5	1745	1772.5	
15	QPSK	1	0	19.97	19.97	19.92	21.1
15	QPSK	1	37	19.91	19.95	19.94	
15	QPSK	1	74	19.92	19.94	19.93	
15	QPSK	36	0	20.07	19.93	19.96	21.1
15	QPSK	36	20	20.12	20.00	19.98	
15	QPSK	36	39	20.08	19.99	19.95	
15	QPSK	75	0	20.02	19.96	19.96	
15	16QAM	1	0	20.22	20.18	20.18	21.1
15	16QAM	1	37	20.21	20.15	20.18	
15	16QAM	1	74	20.20	20.08	20.02	
15	16QAM	36	0	20.06	19.97	19.92	21.1
15	16QAM	36	20	20.15	19.95	20.02	
15	16QAM	36	39	20.12	19.93	20.02	
15	16QAM	75	0	20.07	19.96	20.00	
15	64QAM	1	0	20.17	20.09	19.98	21.1
15	64QAM	1	37	20.05	20.00	20.01	
15	64QAM	1	74	20.19	20.00	19.93	
15	64QAM	36	0	20.02	19.90	19.95	21.1
15	64QAM	36	20	20.14	19.93	20.07	
15	64QAM	36	39	20.12	19.99	19.98	
15	64QAM	75	0	20.09	19.96	19.95	
Channel				132022	132322	132622	Tune-up limit (dBm)
Frequency (MHz)				1715	1745	1775	
10	QPSK	1	0	19.99	19.96	19.91	21.1
10	QPSK	1	25	19.91	19.92	19.92	
10	QPSK	1	49	19.95	19.90	19.92	
10	QPSK	25	0	20.03	19.90	20.00	21.1
10	QPSK	25	12	20.12	19.97	19.99	
10	QPSK	25	25	20.13	19.97	19.95	
10	QPSK	50	0	20.04	19.91	19.96	21.1
10	16QAM	1	0	20.22	20.22	20.23	21.1
10	16QAM	1	25	20.21	20.07	20.09	
10	16QAM	1	49	20.25	20.12	20.02	
10	16QAM	25	0	20.00	19.97	19.97	21.1
10	16QAM	25	12	20.07	20.03	20.06	
10	16QAM	25	25	20.06	19.95	20.00	
10	16QAM	50	0	20.14	19.95	19.95	21.1
10	64QAM	1	0	20.13	20.10	20.08	21.1
10	64QAM	1	25	20.04	20.02	19.92	
10	64QAM	1	49	20.21	19.98	19.92	
10	64QAM	25	0	20.02	19.90	19.99	21.1
10	64QAM	25	12	20.12	19.95	20.03	
10	64QAM	25	25	20.11	19.93	19.94	
10	64QAM	50	0	20.05	19.91	19.93	
Channel				131997	132322	132647	Tune-up limit (dBm)
Frequency (MHz)				1712.5	1745	1777.5	
5	QPSK	1	0	20.02	19.95	19.91	21.1
5	QPSK	1	12	19.91	19.90	19.91	
5	QPSK	1	24	19.96	19.91	19.92	
5	QPSK	12	0	20.08	19.97	19.97	21.1
5	QPSK	12	7	20.10	19.94	20.00	
5	QPSK	12	13	20.10	19.91	19.95	
5	QPSK	25	0	20.10	19.92	19.93	21.1
5	16QAM	1	0	20.26	20.26	20.24	21.1
5	16QAM	1	12	20.24	20.11	20.09	
5	16QAM	1	24	20.25	20.12	20.06	
5	16QAM	12	0	20.02	19.95	19.94	21.1
5	16QAM	12	7	20.13	20.00	20.06	
5	16QAM	12	13	20.07	19.99	20.02	
5	16QAM	25	0	20.14	19.95	19.99	21.1
5	64QAM	1	0	20.17	20.04	20.04	21.1
5	64QAM	1	12	20.02	19.92	19.97	
5	64QAM	1	24	20.19	20.00	19.96	
5	64QAM	12	0	20.09	19.97	20.00	21.1
5	64QAM	12	7	20.17	19.99	19.97	
5	64QAM	12	13	20.15	19.97	20.03	
5	64QAM	25	0	20.11	19.93	19.94	
Channel				131987	132322	132657	Tune-up limit (dBm)
Frequency (MHz)				1711.5	1745	1776.5	
3	QPSK	1	0	19.97	19.92	19.91	21.1
3	QPSK	1	8	19.95	19.90	19.91	
3	QPSK	1	14	19.92	19.90	19.91	
3	QPSK	8	0	20.03	19.96	19.92	21.1
3	QPSK	8	4	20.11	19.96	19.99	
3	QPSK	8	7	20.09	19.95	20.00	
3	QPSK	15	0	20.04	19.97	19.98	21.1
3	16QAM	1	0	20.23	20.25	20.15	21.1
3	16QAM	1	8	20.27	20.08	20.18	
3	16QAM	1	14	20.24	20.07	20.03	
3	16QAM	8	0	20.00	19.98	20.01	21.1
3	16QAM	8	4	20.12	19.99	20.02	
3	16QAM	8	7	20.06	19.98	19.92	
3	16QAM	15	0	20.16	20.00	19.94	21.1
3	64QAM	1	0	20.22	20.04	20.08	21.1
3	64QAM	1	8	20.04	20.02	19.96	
3	64QAM	1	14	20.21	19.98	20.01	
3	64QAM	8	0	20.07	19.92	19.97	21.1
3	64QAM	8	4	20.14	20.01	20.04	
3	64QAM	8	7	20.08	19.95	19.93	
3	64QAM	15	0	20.14	19.99	19.98	
Channel				131979	132322	132665	Tune-up limit (dBm)
Frequency (MHz)				1710.7	1745	1779.3	
1.4	QPSK	1	0	19.96	19.91	19.92	21.1
1.4	QPSK	1	3	20.04	19.90	19.95	
1.4	QPSK	1	5	19.97	19.91	19.93	
1.4	QPSK	3	0	20.01	19.92	19.93	21.1
1.4	QPSK	3	1	20.07	19.90	19.93	
1.4	QPSK	3	3	20.01	19.90	19.91	
1.4	QPSK	6	0	20.09	19.94	19.95	21.1
1.4	16QAM	1	0	20.21	20.24	20.21	21.1
1.4	16QAM	1	3	20.23	20.25	20.27	
1.4	16QAM	1	5	20.28	20.14	20.18	
1.4	16QAM	3	0	20.08	19.98	20.00	21.1
1.4	16QAM	3	1	20.16	20.02	20.03	
1.4	16QAM	3	3	20.06	19.95	19.96	
1.4	16QAM	6	0	20.17	20.02	20.08	21.1
1.4	64QAM	1	0	20.23	20.13	20.16	21.1
1.4	64QAM	1	3	20.28	20.16	20.19	
1.4	64QAM	1	5	20.18	20.10	20.14	
1.4	64QAM	3	0	20.20	20.10	20.11	21.1
1.4	64QAM	3	1	20.24	20.14	20.18	
1.4	64QAM	3	3	20.19	20.10	20.11	
1.4	64QAM	6	0	20.07	20.00	19.98	21.1



Band 71							
Ant 1							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				133222	133322	133372	
Frequency (MHz)				673	683	688	
20	QPSK	1	0	24.35	24.17	24.20	25.7
20	QPSK	1	49	24.15	24.16	24.15	
20	QPSK	1	99	24.12	24.09	24.08	
20	QPSK	50	0	23.28	23.24	23.26	24.7
20	QPSK	50	24	23.33	23.28	23.17	
20	QPSK	50	50	23.32	23.27	23.27	
20	QPSK	100	0	23.33	23.32	23.28	24.7
20	16QAM	1	0	23.68	23.52	23.53	
20	16QAM	1	49	23.58	23.54	23.49	
20	16QAM	1	99	23.49	23.49	23.45	23.7
20	16QAM	50	0	22.34	22.30	22.30	
20	16QAM	50	24	22.34	22.27	22.24	
20	16QAM	50	50	22.30	22.25	22.28	23.7
20	16QAM	100	0	22.32	22.30	22.26	
20	64QAM	1	0	22.18	22.70	23.01	
20	64QAM	1	49	22.76	22.59	22.38	23.7
20	64QAM	1	99	23.01	22.51	22.88	
20	64QAM	50	0	20.82	21.86	21.50	
20	64QAM	50	24	21.49	21.70	21.76	22.7
20	64QAM	50	50	21.96	21.50	21.85	
20	64QAM	100	0	21.50	21.89	21.87	
Channel				133197	133287	133387	Tune-up limit (dBm)
Frequency (MHz)				670.5	680.5	690.5	
15	QPSK	1	0	24.33	24.17	24.13	25.7
15	QPSK	1	37	24.01	24.14	24.11	
15	QPSK	1	74	24.16	24.11	24.11	
15	QPSK	36	0	23.24	23.26	23.27	24.7
15	QPSK	36	20	23.29	23.26	23.37	
15	QPSK	36	39	23.31	23.33	23.26	
15	QPSK	75	0	23.34	23.30	23.20	24.7
15	16QAM	1	0	23.56	23.53	23.49	
15	16QAM	1	37	23.28	23.50	23.41	
15	16QAM	1	74	23.38	23.43	23.38	23.7
15	16QAM	36	0	22.15	22.31	22.26	
15	16QAM	36	20	22.31	22.25	22.34	
15	16QAM	36	39	22.38	22.33	22.28	23.7
15	16QAM	75	0	22.37	22.19	22.18	
15	64QAM	1	0	22.13	22.80	22.90	
15	64QAM	1	37	21.73	23.04	23.04	23.7
15	64QAM	1	74	22.53	22.63	22.97	
15	64QAM	36	0	20.81	21.92	21.51	
15	64QAM	36	20	20.88	21.74	21.92	22.7
15	64QAM	36	39	21.49	21.44	21.86	
15	64QAM	75	0	21.38	21.79	21.77	
Channel				133172	133272	133422	Tune-up limit (dBm)
Frequency (MHz)				668	678	683	
10	QPSK	1	0	24.30	24.14	24.17	25.7
10	QPSK	1	25	24.11	24.10	24.12	
10	QPSK	1	49	24.13	24.14	24.01	
10	QPSK	25	0	23.36	23.26	23.22	24.7
10	QPSK	25	12	23.13	23.25	23.22	
10	QPSK	25	25	23.19	23.31	23.23	
10	QPSK	50	0	23.29	23.18	23.16	24.7
10	16QAM	1	0	23.62	23.47	23.53	
10	16QAM	1	25	23.47	23.51	23.45	
10	16QAM	1	49	23.46	23.44	23.39	23.7
10	16QAM	25	0	22.05	22.17	22.16	
10	16QAM	25	12	22.07	22.24	22.20	
10	16QAM	25	25	22.00	22.24	22.19	23.7
10	16QAM	50	0	22.28	22.17	22.22	
10	64QAM	1	0	21.83	22.96	22.99	
10	64QAM	1	25	21.88	23.08	23.07	23.7
10	64QAM	1	49	22.12	22.23	22.55	
10	64QAM	25	0	20.70	21.87	21.82	
10	64QAM	25	12	20.70	21.74	21.85	22.7
10	64QAM	25	25	20.68	21.37	21.72	
10	64QAM	50	0	20.79	21.60	21.80	
Channel				133147	133247	133447	Tune-up limit (dBm)
Frequency (MHz)				665.5	675.5	685.5	
5	QPSK	1	0	24.03	24.23	24.23	25.7
5	QPSK	1	12	24.13	24.24	24.12	
5	QPSK	1	24	24.11	24.10	24.10	
5	QPSK	12	0	23.15	23.26	23.19	24.7
5	QPSK	12	7	23.15	23.32	23.26	
5	QPSK	12	13	23.13	23.22	23.16	
5	QPSK	25	0	23.15	23.26	23.20	24.7
5	16QAM	1	0	23.29	23.53	23.52	
5	16QAM	1	12	23.38	23.54	23.50	
5	16QAM	1	24	23.40	23.49	23.42	23.7
5	16QAM	12	0	22.04	22.36	22.29	
5	16QAM	12	7	22.12	22.30	22.29	
5	16QAM	12	13	22.25	22.25	22.21	23.7
5	16QAM	25	0	22.06	22.21	22.22	
5	64QAM	1	0	21.70	22.98	23.00	
5	64QAM	1	12	21.82	22.93	22.81	23.7
5	64QAM	1	24	22.03	22.71	22.37	
5	64QAM	12	0	20.74	21.93	21.85	
5	64QAM	12	7	20.91	21.89	21.91	22.7
5	64QAM	12	13	20.87	21.70	21.89	
5	64QAM	25	0	20.69	21.73	21.61	



Band 2							
Ant 2							
Band	Modulation	RB Size	RB Offset	Power Low Ch.	Power Mid Ch.	Power High Ch.	Tune-up limit (dbm)
Channel				18700	18900	19100	
Frequency (MHz)				1860	1880	1900	
20	QPSK	1	0	24.49	24.54	24.52	25.7
20	QPSK	1	49	24.45	24.53	24.43	
20	QPSK	1	99	24.45	24.47	24.40	
20	QPSK	50	0	23.55	23.99	23.58	24.7
20	QPSK	50	24	23.64	23.63	23.99	
20	QPSK	50	50	23.62	23.57	23.99	
20	QPSK	100	0	23.65	23.58	23.99	24.7
20	16QAM	1	0	23.84	23.86	23.82	
20	16QAM	1	49	23.83	23.86	23.76	
20	16QAM	1	99	23.75	23.82	23.70	23.7
20	16QAM	50	0	22.56	22.60	22.61	
20	16QAM	50	24	22.66	22.64	22.61	
20	16QAM	50	50	22.65	22.60	22.59	23.7
20	16QAM	100	0	22.62	22.59	22.59	
20	64QAM	1	0	22.68	22.77	22.74	
20	64QAM	1	49	22.73	22.73	22.40	22.7
20	64QAM	1	99	22.66	22.67	22.63	
20	64QAM	50	0	21.59	21.61	21.60	
20	64QAM	50	24	21.88	21.66	21.56	Tune-up limit (dbm)
20	64QAM	50	50	21.86	21.61	21.61	
20	64QAM	100	0	21.85	21.64	21.59	
Channel				1867.5	18900	19125	
Frequency (MHz)				1857.5	1880	1902.5	
15	QPSK	1	0	24.51	24.82	24.50	25.7
15	QPSK	1	37	24.47	24.53	24.39	
15	QPSK	1	74	24.50	24.52	24.46	
15	QPSK	36	0	23.51	23.57	23.54	24.7
15	QPSK	36	20	23.61	23.63	23.58	
15	QPSK	36	39	23.60	23.60	23.57	
15	QPSK	75	0	23.61	23.60	23.55	24.7
15	16QAM	1	0	23.73	23.84	23.80	
15	16QAM	1	37	23.78	23.83	23.74	
15	16QAM	1	74	23.79	23.81	23.72	23.7
15	16QAM	36	0	22.53	22.59	22.54	
15	16QAM	36	20	22.62	22.62	22.56	
15	16QAM	36	39	22.61	22.61	22.57	23.7
15	16QAM	75	0	22.62	22.61	22.58	
15	64QAM	1	0	22.68	22.76	22.69	
15	64QAM	1	37	22.71	22.82	22.47	22.7
15	64QAM	1	74	22.70	22.66	22.66	
15	64QAM	36	0	21.57	21.64	21.42	
15	64QAM	36	20	21.66	21.66	21.60	Tune-up limit (dbm)
15	64QAM	36	39	21.70	21.67	21.59	
15	64QAM	75	0	21.65	21.62	21.59	
Channel				18650	18900	19150	
Frequency (MHz)				1855	1880	1905	
10	QPSK	1	0	24.43	24.53	24.44	25.7
10	QPSK	1	25	24.44	24.49	24.38	
10	QPSK	1	49	24.45	24.50	24.43	
10	QPSK	25	0	23.55	23.55	23.49	24.7
10	QPSK	25	12	23.59	23.59	23.55	
10	QPSK	25	25	23.60	23.58	23.58	
10	QPSK	50	0	23.59	23.59	23.55	24.7
10	16QAM	1	0	23.83	23.86	23.79	
10	16QAM	1	25	23.81	23.93	23.77	
10	16QAM	1	49	23.80	23.87	23.76	23.7
10	16QAM	25	0	22.57	22.55	22.82	
10	16QAM	25	12	22.61	22.62	22.53	
10	16QAM	25	25	22.54	22.59	22.56	23.7
10	16QAM	50	0	22.59	22.57	22.95	
10	64QAM	1	0	22.67	22.71	22.48	
10	64QAM	1	25	22.75	22.79	22.68	22.7
10	64QAM	1	49	22.71	22.72	22.70	
10	64QAM	25	0	21.60	21.59	21.51	
10	64QAM	25	12	21.63	21.64	21.58	Tune-up limit (dbm)
10	64QAM	25	25	21.62	21.62	21.59	
10	64QAM	50	0	21.64	21.64	21.55	
Channel				1862.5	18900	19175	
Frequency (MHz)				1852.5	1880	1907.5	
5	QPSK	1	0	24.42	24.45	24.43	25.7
5	QPSK	1	12	24.45	24.50	24.48	
5	QPSK	1	24	24.48	24.49	24.46	
5	QPSK	12	0	23.54	23.54	23.50	24.7
5	QPSK	12	7	23.55	23.59	23.53	
5	QPSK	12	13	23.59	23.63	23.52	
5	QPSK	25	0	23.56	23.57	23.50	24.7
5	16QAM	1	0	23.77	23.88	23.68	
5	16QAM	1	12	23.83	23.90	23.75	
5	16QAM	1	24	23.82	23.92	23.78	23.7
5	16QAM	12	0	22.57	22.59	22.53	
5	16QAM	12	7	22.61	22.62	22.65	
5	16QAM	12	13	22.56	22.67	22.56	23.7
5	16QAM	25	0	22.56	22.59	22.65	
5	64QAM	1	0	22.73	22.76	22.69	
5	64QAM	1	12	22.72	22.79	22.70	22.7
5	64QAM	1	24	22.73	22.82	22.72	
5	64QAM	12	0	21.62	21.66	21.56	
5	64QAM	12	7	21.65	21.66	21.59	Tune-up limit (dbm)
5	64QAM	12	13	21.64	21.69	21.60	
5	64QAM	25	0	21.59	21.58	21.56	
Channel				18615	18900	19185	
Frequency (MHz)				1851.5	1880	1906.5	
3	QPSK	1	0	24.46	24.46	24.35	25.7
3	QPSK	1	8	24.46	24.49	24.49	
3	QPSK	1	14	24.47	24.53	24.44	
3	QPSK	8	0	23.55	23.58	23.47	24.7
3	QPSK	8	4	23.56	23.67	23.50	
3	QPSK	8	7	23.51	23.60	23.48	
3	QPSK	15	0	23.55	23.57	23.49	24.7
3	16QAM	1	0	23.78	23.79	23.68	
3	16QAM	1	8	23.89	23.96	23.80	
3	16QAM	1	14	23.82	23.89	23.77	23.7
3	16QAM	8	0	22.62	22.61	22.65	
3	16QAM	8	4	22.63	22.73	22.59	
3	16QAM	8	7	22.61	22.69	22.56	23.7
3	16QAM	15	0	22.56	22.59	22.53	
3	64QAM	1	0	22.71	22.74	22.66	
3	64QAM	1	8	22.78	22.89	22.76	22.7
3	64QAM	1	14	22.72	22.82	22.70	
3	64QAM	8	0	21.61	21.60	21.56	
3	64QAM	8	4	21.61	21.69	21.62	Tune-up limit (dbm)
3	64QAM	8	7	21.62	21.66	21.58	
3	64QAM	15	0	21.58	21.58	21.53	
Channel				18907	18900	19193	
Frequency (MHz)				1850.7	1880	1909.3	
1.4	QPSK	1	0	24.40	24.46	24.32	25.7
1.4	QPSK	1	3	24.45	24.52	24.41	
1.4	QPSK	1	5	24.38	24.46	24.33	
1.4	QPSK	3	0	24.44	24.53	24.36	24.7
1.4	QPSK	3	1	24.47	24.50	24.41	
1.4	QPSK	3	3	24.43	24.51	24.37	
1.4	QPSK	6	0	23.48	23.57	23.40	24.7
1.4	16QAM	1	0	23.72	23.77	23.63	
1.4	16QAM	1	3	23.76	23.87	23.74	
1.4	16QAM	1	5	23.71	23.80	23.64	24.7
1.4	16QAM	3	0	23.50	23.58	23.42	
1.4	16QAM	3	1	23.58	23.65	23.50	
1.4	16QAM	3	3	23.51	23.59	23.43	23.7
1.4	16QAM	6	0	22.53	22.60	22.47	
1.4	64QAM	1	0	22.65	22.73	22.56	
1.4	64QAM	1	3	22.72	22.81	22.67	23.7
1.4	64QAM	1	5	22.67	22.72	22.60	
1.4	64QAM	3	0	22.60	22.68	22.56	
1.4	64QAM	3	1	22.68	22.75	22.63	22.7
1.4	64QAM	3	3	22.62	22.70	22.55	
1.4	64QAM	6	0	21.50	21.57	21.43	



Band 4							
Ant 2							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				20050	20175	20300	
Frequency (MHz)				1720	1732.5	1745	
20	QPSK	1	0	24.31	24.32	24.35	25.7
20	QPSK	1	49	24.20	24.17	24.08	
20	QPSK	1	99	24.21	24.16	24.12	
20	QPSK	50	0	23.35	23.32	23.29	24.7
20	QPSK	50	24	23.41	23.41	23.23	
20	QPSK	50	50	23.36	23.25	23.23	
20	QPSK	100	0	23.29	23.38	23.24	24.7
20	16QAM	1	0	23.69	23.65	23.64	
20	16QAM	1	49	23.51	23.46	23.46	
20	16QAM	1	99	23.57	23.42	23.43	23.7
20	16QAM	50	0	22.31	22.31	22.35	
20	16QAM	50	24	22.39	22.32	22.32	
20	16QAM	50	50	22.34	22.25	22.23	23.7
20	16QAM	100	0	22.35	22.45	22.24	
20	64QAM	1	0	22.29	22.61	22.11	
20	64QAM	1	49	22.41	22.33	22.34	23.7
20	64QAM	1	99	22.41	22.04	22.43	
20	64QAM	50	0	21.33	21.42	21.09	
20	64QAM	50	24	21.42	21.38	21.28	22.7
20	64QAM	50	50	21.29	21.12	21.25	
20	64QAM	100	0	21.41	21.42	21.25	
Channel				20225	20175	20325	Tune-up limit (dBm)
Frequency (MHz)				1717.5	1732.5	1747.5	
15	QPSK	1	0	24.34	24.33	24.33	25.7
15	QPSK	1	37	24.12	24.14	24.11	
15	QPSK	1	74	24.21	24.22	24.14	
15	QPSK	36	0	23.38	23.29	23.31	24.7
15	QPSK	36	20	23.38	23.33	23.20	
15	QPSK	36	39	23.34	23.33	23.30	
15	QPSK	75	0	23.36	23.42	23.23	24.7
15	16QAM	1	0	23.56	23.59	23.62	
15	16QAM	1	37	23.47	23.50	23.44	
15	16QAM	1	74	23.53	23.47	23.42	23.7
15	16QAM	36	0	22.39	22.39	22.33	
15	16QAM	36	20	22.31	22.37	22.30	
15	16QAM	36	39	22.29	22.34	22.22	23.7
15	16QAM	75	0	22.36	22.41	22.24	
15	64QAM	1	0	22.33	22.52	22.27	
15	64QAM	1	37	22.48	22.46	22.44	23.7
15	64QAM	1	74	22.42	22.13	22.33	
15	64QAM	36	0	21.42	21.36	21.34	
15	64QAM	36	20	21.33	21.48	21.30	22.7
15	64QAM	36	39	21.35	21.07	21.28	
15	64QAM	75	0	21.36	21.36	21.30	
Channel				20000	20175	20350	Tune-up limit (dBm)
Frequency (MHz)				1715	1732.5	1750	
10	QPSK	1	0	24.20	24.24	24.21	25.7
10	QPSK	1	25	24.18	24.16	24.15	
10	QPSK	1	49	24.29	24.23	24.22	
10	QPSK	25	0	23.29	23.31	23.21	24.7
10	QPSK	25	12	23.34	23.38	23.22	
10	QPSK	25	25	23.30	23.41	23.29	
10	QPSK	50	0	23.32	23.37	23.21	24.7
10	16QAM	1	0	23.60	23.63	23.56	
10	16QAM	1	25	23.54	23.60	23.51	
10	16QAM	1	49	23.64	23.53	23.60	23.7
10	16QAM	25	0	22.31	22.31	22.27	
10	16QAM	25	12	22.35	22.38	22.27	
10	16QAM	25	25	22.37	22.38	22.30	23.7
10	16QAM	50	0	22.34	22.35	22.29	
10	64QAM	1	0	22.16	22.45	22.40	
10	64QAM	1	25	22.54	22.49	22.42	23.7
10	64QAM	1	49	22.49	22.12	22.47	
10	64QAM	25	0	21.35	21.31	21.24	
10	64QAM	25	12	21.43	21.40	21.26	22.7
10	64QAM	25	25	21.32	21.17	21.38	
10	64QAM	50	0	21.39	21.32	21.29	
Channel				19975	20175	20375	Tune-up limit (dBm)
Frequency (MHz)				1712.5	1732.5	1752.5	
5	QPSK	1	0	24.21	24.19	24.17	25.7
5	QPSK	1	12	24.27	24.26	24.18	
5	QPSK	1	24	24.24	24.25	24.16	
5	QPSK	12	0	23.35	23.31	23.23	24.7
5	QPSK	12	7	23.39	23.36	23.32	
5	QPSK	12	13	23.41	23.39	23.24	
5	QPSK	25	0	23.27	23.38	23.20	24.7
5	16QAM	1	0	23.50	23.54	23.53	
5	16QAM	1	12	23.62	23.63	23.56	
5	16QAM	1	24	23.57	23.57	23.50	23.7
5	16QAM	12	0	22.41	22.36	22.34	
5	16QAM	12	7	22.39	22.37	22.28	
5	16QAM	12	13	22.37	22.42	22.36	23.7
5	16QAM	25	0	22.39	22.31	22.29	
5	64QAM	1	0	22.20	22.51	22.47	
5	64QAM	1	12	22.43	22.47	22.50	23.7
5	64QAM	1	24	22.55	22.09	22.44	
5	64QAM	12	0	21.17	21.28	21.39	
5	64QAM	12	7	21.40	21.46	21.31	22.7
5	64QAM	12	13	21.38	21.22	21.36	
5	64QAM	25	0	21.32	21.44	21.24	
Channel				19965	20175	20385	Tune-up limit (dBm)
Frequency (MHz)				1711.5	1732.5	1753.5	
3	QPSK	1	0	24.24	24.20	24.22	25.7
3	QPSK	1	8	24.32	24.34	24.24	
3	QPSK	1	14	24.27	24.24	24.18	
3	QPSK	8	0	23.29	23.24	23.23	24.7
3	QPSK	8	4	23.35	23.37	23.32	
3	QPSK	8	7	23.42	23.34	23.21	
3	QPSK	15	0	23.36	23.37	23.31	24.7
3	16QAM	1	0	23.64	23.49	23.51	
3	16QAM	1	8	23.63	23.59	23.61	
3	16QAM	1	14	23.55	23.57	23.54	23.7
3	16QAM	8	0	22.41	22.35	22.29	
3	16QAM	8	4	22.41	22.41	22.32	
3	16QAM	8	7	22.37	22.48	22.27	23.7
3	16QAM	15	0	22.34	22.36	22.28	
3	64QAM	1	0	22.28	22.53	22.39	
3	64QAM	1	8	22.47	22.65	22.52	23.7
3	64QAM	1	14	22.49	22.32	22.46	
3	64QAM	8	0	21.18	21.35	21.33	
3	64QAM	8	4	21.37	21.41	21.39	22.7
3	64QAM	8	7	21.34	21.34	21.31	
3	64QAM	15	0	21.32	21.40	21.33	
Channel				19957	20175	20393	Tune-up limit (dBm)
Frequency (MHz)				1710.7	1732.5	1754.3	
1.4	QPSK	1	0	24.15	24.15	24.12	25.7
1.4	QPSK	1	3	24.27	24.30	24.13	
1.4	QPSK	1	5	24.24	24.23	24.07	
1.4	QPSK	3	0	24.25	24.18	24.10	24.7
1.4	QPSK	3	1	24.23	24.31	24.17	
1.4	QPSK	3	3	24.15	24.24	24.12	
1.4	QPSK	6	0	23.25	23.26	23.20	24.7
1.4	16QAM	1	0	23.48	23.49	23.36	
1.4	16QAM	1	3	23.59	23.55	23.50	
1.4	16QAM	1	5	23.56	23.47	23.50	24.7
1.4	16QAM	3	0	23.42	23.33	23.23	
1.4	16QAM	3	1	23.32	23.36	23.29	
1.4	16QAM	3	3	23.28	23.32	23.20	23.7
1.4	16QAM	6	0	22.34	22.32	22.27	
1.4	64QAM	1	0	22.12	22.45	22.36	
1.4	64QAM	1	3	22.21	22.54	22.48	23.7
1.4	64QAM	1	5	22.22	22.44	22.32	
1.4	64QAM	3	0	22.18	22.38	22.37	
1.4	64QAM	3	1	22.29	22.43	22.43	23.7
1.4	64QAM	3	3	22.28	22.37	22.38	
1.4	64QAM	6	0	21.06	21.28	21.17	



Band 5							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				20450	20525	20600	
Frequency (MHz)				829	836.5	844	
10	QPSK	1	0	24.43	24.42	24.42	25.7
10	QPSK	1	25	24.34	24.44	24.43	
10	QPSK	1	49	24.44	24.54	24.29	
10	QPSK	25	0	23.47	23.49	23.49	24.7
10	QPSK	25	12	23.52	23.56	23.57	
10	QPSK	25	25	23.49	23.58	23.47	
10	QPSK	50	0	23.54	23.49	23.60	24.7
10	16QAM	1	0	23.81	23.83	23.86	
10	16QAM	1	25	23.70	23.84	23.83	
10	16QAM	1	49	23.81	23.92	23.71	23.7
10	16QAM	25	0	22.45	22.59	22.54	
10	16QAM	25	12	22.53	22.52	22.54	
10	16QAM	25	25	22.56	22.55	22.57	23.7
10	16QAM	50	0	22.51	22.50	22.49	
10	64QAM	1	0	22.59	22.66	22.64	
10	64QAM	1	25	22.70	22.74	22.76	23.7
10	64QAM	1	49	22.67	22.37	21.72	
10	64QAM	25	0	21.54	21.61	21.55	
10	64QAM	25	12	21.62	21.62	21.60	22.7
10	64QAM	25	25	21.53	21.61	20.86	
10	64QAM	50	0	21.53	21.59	21.28	
Channel				20425	20525	20625	Tune-up limit (dBm)
Frequency (MHz)				826.5	836.5	846.5	
5	QPSK	1	0	24.47	24.51	24.50	25.7
5	QPSK	1	12	24.47	24.45	24.31	
5	QPSK	1	24	24.41	24.52	24.20	
5	QPSK	12	0	23.55	23.64	23.59	24.7
5	QPSK	12	7	23.52	23.57	23.34	
5	QPSK	12	13	23.54	23.55	23.16	
5	QPSK	25	0	23.47	23.56	23.52	24.7
5	16QAM	1	0	23.83	23.83	23.79	
5	16QAM	1	12	23.77	23.83	23.57	
5	16QAM	1	24	23.68	23.85	23.46	23.7
5	16QAM	12	0	22.66	22.51	22.52	
5	16QAM	12	7	22.53	22.60	22.45	
5	16QAM	12	13	22.48	22.61	22.27	23.7
5	16QAM	25	0	22.56	22.52	22.56	
5	64QAM	1	0	22.75	22.73	22.50	
5	64QAM	1	12	22.64	22.69	21.78	23.7
5	64QAM	1	24	22.75	22.55	21.74	
5	64QAM	12	0	21.65	21.66	21.30	
5	64QAM	12	7	21.54	21.63	20.70	22.7
5	64QAM	12	13	21.51	21.61	20.71	
5	64QAM	25	0	21.58	21.61	20.70	
Channel				20415	20525	20635	Tune-up limit (dBm)
Frequency (MHz)				825.5	836.5	847.5	
3	QPSK	1	0	24.47	24.41	24.18	25.7
3	QPSK	1	8	24.50	24.48	24.04	
3	QPSK	1	14	24.40	24.49	24.13	
3	QPSK	8	0	23.54	23.58	23.04	24.7
3	QPSK	8	4	23.49	23.62	23.07	
3	QPSK	8	7	23.50	23.55	23.20	
3	QPSK	15	0	23.57	23.53	23.08	24.7
3	16QAM	1	0	23.83	23.81	23.53	
3	16QAM	1	8	23.83	23.86	23.38	
3	16QAM	1	14	23.69	23.78	23.46	23.7
3	16QAM	8	0	22.64	22.58	22.31	
3	16QAM	8	4	22.60	22.65	22.23	
3	16QAM	8	7	22.57	22.60	22.28	23.7
3	16QAM	15	0	22.60	22.62	22.19	
3	64QAM	1	0	22.63	22.73	21.70	
3	64QAM	1	8	22.75	22.75	21.72	23.7
3	64QAM	1	14	22.63	22.50	21.71	
3	64QAM	8	0	21.65	21.56	20.70	
3	64QAM	8	4	21.58	21.67	20.70	22.7
3	64QAM	8	7	21.49	21.63	20.74	
3	64QAM	15	0	21.53	21.62	20.71	
Channel				20407	20525	20643	Tune-up limit (dBm)
Frequency (MHz)				824.7	836.5	848.3	
1.4	QPSK	1	0	24.39	24.32	23.95	25.7
1.4	QPSK	1	3	24.42	24.47	24.10	
1.4	QPSK	1	5	24.29	24.38	24.09	
1.4	QPSK	3	0	24.41	24.36	24.12	24.7
1.4	QPSK	3	1	24.47	24.40	24.12	
1.4	QPSK	3	3	24.41	24.44	24.37	
1.4	QPSK	6	0	23.42	23.57	23.18	24.7
1.4	16QAM	1	0	23.68	23.69	23.34	
1.4	16QAM	1	3	23.69	23.85	23.50	
1.4	16QAM	1	5	23.61	23.69	23.58	24.7
1.4	16QAM	3	0	23.51	23.51	23.12	
1.4	16QAM	3	1	23.49	23.54	23.29	
1.4	16QAM	3	3	23.42	23.48	23.42	23.7
1.4	16QAM	6	0	22.55	22.62	22.27	
1.4	64QAM	1	0	22.60	22.60	21.70	
1.4	64QAM	1	3	22.68	22.75	21.72	23.7
1.4	64QAM	1	5	22.60	22.59	21.71	
1.4	64QAM	3	0	22.63	22.63	21.70	
1.4	64QAM	3	1	22.65	22.62	21.72	23.7
1.4	64QAM	3	3	22.55	22.58	21.71	
1.4	64QAM	6	0	21.45	21.48	20.72	



Band 7							
Ant 2							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				20850	21100	21350	
Frequency (MHz)				2510	2535	2560	
20	QPSK	1	0	24.42	24.46	24.29	25.7
20	QPSK	1	49	24.47	24.42	24.26	
20	QPSK	1	99	24.57	24.45	24.26	
20	QPSK	50	0	23.70	23.47	23.46	24.7
20	QPSK	50	24	23.67	23.48	23.39	
20	QPSK	50	50	23.63	23.56	23.41	
20	QPSK	100	0	23.65	23.54	23.41	24.7
20	16QAM	1	0	23.78	23.66	23.64	
20	16QAM	1	49	23.50	23.75	23.62	
20	16QAM	1	99	23.92	23.50	23.63	23.7
20	16QAM	50	0	22.63	22.47	22.42	
20	16QAM	50	24	22.62	22.52	22.45	
20	16QAM	50	50	22.67	22.54	22.47	23.7
20	16QAM	100	0	22.62	22.54	22.39	
20	64QAM	1	0	22.62	22.55	22.54	
20	64QAM	1	49	22.70	22.68	21.98	23.7
20	64QAM	1	99	22.80	22.64	22.33	
20	64QAM	50	0	21.70	21.49	21.27	
20	64QAM	50	24	21.76	21.56	21.21	22.7
20	64QAM	50	50	21.74	21.62	21.38	
20	64QAM	100	0	21.65	21.55	21.21	
Channel				20925	21100	21375	Tune-up limit (dBm)
Frequency (MHz)				2507.5	2535	2562.5	
15	QPSK	1	0	24.47	24.39	24.28	25.7
15	QPSK	1	37	24.53	24.47	24.21	
15	QPSK	1	74	24.56	24.48	24.31	
15	QPSK	36	0	23.55	23.46	23.42	24.7
15	QPSK	36	20	23.69	23.35	23.43	
15	QPSK	36	39	23.66	23.56	23.40	
15	QPSK	75	0	23.65	23.50	23.38	24.7
15	16QAM	1	0	23.77	23.74	23.63	
15	16QAM	1	37	23.89	23.87	23.62	
15	16QAM	1	74	23.67	23.81	23.66	23.7
15	16QAM	36	0	22.59	22.43	22.39	
15	16QAM	36	20	22.59	22.55	22.46	
15	16QAM	36	39	22.68	22.50	22.37	23.7
15	16QAM	75	0	22.62	22.50	22.40	
15	64QAM	1	0	22.74	22.60	22.49	
15	64QAM	1	37	22.76	22.74	22.01	23.7
15	64QAM	1	74	22.86	22.71	22.47	
15	64QAM	36	0	21.65	21.50	21.05	
15	64QAM	36	20	21.74	21.56	21.23	22.7
15	64QAM	36	39	21.74	21.62	21.47	
15	64QAM	75	0	21.73	21.57	21.18	
Channel				20800	21100	21400	Tune-up limit (dBm)
Frequency (MHz)				2505	2535	2565	
10	QPSK	1	0	24.39	24.39	24.21	25.7
10	QPSK	1	25	24.48	24.35	24.11	
10	QPSK	1	49	24.51	24.44	24.22	
10	QPSK	25	0	23.61	23.41	23.33	24.7
10	QPSK	25	12	23.67	23.45	23.39	
10	QPSK	25	25	23.63	23.54	23.38	
10	QPSK	50	0	23.58	23.48	23.27	24.7
10	16QAM	1	0	23.85	23.89	23.46	
10	16QAM	1	25	23.77	23.77	23.48	
10	16QAM	1	49	23.87	23.78	23.54	23.7
10	16QAM	25	0	22.56	22.38	22.28	
10	16QAM	25	12	22.65	22.45	22.36	
10	16QAM	25	25	22.66	22.51	22.30	23.7
10	16QAM	50	0	22.66	22.46	22.26	
10	64QAM	1	0	22.74	22.61	22.24	
10	64QAM	1	25	22.74	22.65	22.46	23.7
10	64QAM	1	49	22.82	22.67	22.50	
10	64QAM	25	0	21.64	21.45	21.27	
10	64QAM	25	12	21.63	21.57	21.34	22.7
10	64QAM	25	25	21.55	21.51	21.31	
10	64QAM	50	0	21.60	21.53	21.29	
Channel				20775	21100	21425	Tune-up limit (dBm)
Frequency (MHz)				2502.5	2535	2567.5	
5	QPSK	1	0	24.52	24.31	24.15	25.7
5	QPSK	1	12	24.53	24.50	24.27	
5	QPSK	1	24	24.51	24.44	24.20	
5	QPSK	12	0	23.55	23.47	23.28	24.7
5	QPSK	12	7	23.56	23.53	23.25	
5	QPSK	12	13	23.62	23.61	23.32	
5	QPSK	25	0	23.66	23.52	23.29	24.7
5	16QAM	1	0	23.79	23.64	23.45	
5	16QAM	1	12	23.80	23.76	23.46	
5	16QAM	1	24	23.90	23.74	23.55	23.7
5	16QAM	12	0	22.62	22.36	22.33	
5	16QAM	12	7	22.65	22.52	22.34	
5	16QAM	12	13	22.70	22.65	22.31	23.7
5	16QAM	25	0	22.67	22.57	22.33	
5	64QAM	1	0	22.81	22.68	22.42	
5	64QAM	1	12	22.79	22.69	22.40	23.7
5	64QAM	1	24	22.81	22.77	22.44	
5	64QAM	12	0	21.67	21.59	21.37	
5	64QAM	12	7	21.68	21.57	21.37	22.7
5	64QAM	12	13	21.74	21.63	21.40	
5	64QAM	25	0	21.68	21.48	21.35	



Band 12							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low [dBm]	Power Middle [dBm]	Power High [dBm]	Tune-up limit [dBm]
Channel				23060	23095	23130	
Frequency (MHz)				704	707.5	711	
10	QPSK	1	0	24.34	24.12	24.24	25.7
10	QPSK	1	25	24.15	24.15	24.14	
10	QPSK	1	49	24.31	24.24	24.14	
10	QPSK	25	0	23.27	23.33	23.32	24.7
10	QPSK	25	12	23.38	23.34	23.35	
10	QPSK	25	25	23.31	23.30	23.35	
10	QPSK	50	0	23.34	23.28	23.32	24.7
10	16QAM	1	0	23.55	23.49	23.56	
10	16QAM	1	25	23.61	23.61	23.59	
10	16QAM	1	49	23.66	23.60	23.54	23.7
10	16QAM	25	0	22.32	22.28	22.33	
10	16QAM	25	12	22.40	22.35	22.36	
10	16QAM	25	25	22.37	22.36	22.34	23.7
10	16QAM	50	0	22.39	22.31	22.33	
10	64QAM	1	0	22.43	22.31	22.39	
10	64QAM	1	25	22.52	22.42	22.25	23.7
10	64QAM	1	49	22.61	22.54	22.53	
10	64QAM	25	0	21.31	21.33	21.22	
10	64QAM	25	12	21.46	21.39	21.33	22.7
10	64QAM	25	25	21.37	21.41	21.37	
10	64QAM	50	0	21.36	21.34	21.37	
Channel				23035	23095	23155	Tune-up limit [dBm]
Frequency (MHz)				701.5	707.5	713.5	
5	QPSK	1	0	24.27	24.18	24.20	25.7
5	QPSK	1	12	24.27	24.28	24.27	
5	QPSK	1	24	24.23	24.21	24.24	
5	QPSK	12	0	23.38	23.32	23.26	24.7
5	QPSK	12	7	23.33	23.26	23.25	
5	QPSK	12	13	23.33	23.26	23.27	
5	QPSK	25	0	23.36	23.28	23.20	24.7
5	16QAM	1	0	23.59	23.56	23.50	
5	16QAM	1	12	23.60	23.59	23.55	
5	16QAM	1	24	23.61	23.61	23.60	23.7
5	16QAM	12	0	22.36	22.32	22.28	
5	16QAM	12	7	22.39	22.34	22.36	
5	16QAM	12	13	22.32	22.35	22.28	23.7
5	16QAM	25	0	22.40	22.35	22.32	
5	64QAM	1	0	22.37	22.24	22.40	
5	64QAM	1	12	22.51	22.44	22.40	23.7
5	64QAM	1	24	22.35	22.48	22.45	
5	64QAM	12	0	21.39	21.41	21.38	
5	64QAM	12	7	21.34	21.35	21.34	22.7
5	64QAM	12	13	21.43	21.38	21.28	
5	64QAM	25	0	21.42	21.39	21.32	
Channel				23025	23095	23165	Tune-up limit [dBm]
Frequency (MHz)				700.5	707.5	714.5	
3	QPSK	1	0	24.31	24.21	24.28	25.7
3	QPSK	1	8	24.32	24.30	24.30	
3	QPSK	1	14	24.28	24.27	24.18	
3	QPSK	8	0	23.35	23.27	23.30	24.7
3	QPSK	8	4	23.37	23.40	23.35	
3	QPSK	8	7	23.38	23.38	23.25	
3	QPSK	15	0	23.39	23.28	23.21	24.7
3	16QAM	1	0	23.71	23.62	23.52	
3	16QAM	1	8	23.66	23.59	23.60	
3	16QAM	1	14	23.60	23.56	23.46	23.7
3	16QAM	8	0	22.42	22.42	22.32	
3	16QAM	8	4	22.41	22.40	22.36	
3	16QAM	8	7	22.33	22.41	22.27	23.7
3	16QAM	15	0	22.37	22.31	22.30	
3	64QAM	1	0	22.48	22.41	22.47	
3	64QAM	1	8	22.64	22.55	22.45	23.7
3	64QAM	1	14	22.47	22.49	22.43	
3	64QAM	8	0	21.41	21.39	21.36	
3	64QAM	8	4	21.44	21.51	21.40	22.7
3	64QAM	8	7	21.34	21.40	21.36	
3	64QAM	15	0	21.37	21.34	21.24	
Channel				23017	23095	23173	Tune-up limit [dBm]
Frequency (MHz)				699.7	707.5	715.3	
1.4	QPSK	1	0	24.18	24.13	24.08	25.7
1.4	QPSK	1	3	24.23	24.21	24.18	
1.4	QPSK	1	5	24.19	24.20	24.02	
1.4	QPSK	3	0	24.26	24.09	24.18	24.7
1.4	QPSK	3	1	24.25	24.22	24.19	
1.4	QPSK	3	3	24.21	24.22	24.13	
1.4	QPSK	6	0	23.32	23.26	23.12	24.7
1.4	16QAM	1	0	23.60	23.49	23.46	
1.4	16QAM	1	3	23.57	23.57	23.48	
1.4	16QAM	1	5	23.53	23.52	23.43	24.7
1.4	16QAM	3	0	23.34	23.24	23.26	
1.4	16QAM	3	1	23.38	23.30	23.31	
1.4	16QAM	3	3	23.31	23.24	23.13	23.7
1.4	16QAM	6	0	22.32	22.23	22.22	
1.4	64QAM	1	0	22.48	22.42	22.38	
1.4	64QAM	1	3	22.46	22.50	22.42	23.7
1.4	64QAM	1	5	22.46	22.36	22.34	
1.4	64QAM	3	0	22.37	22.38	22.39	
1.4	64QAM	3	1	22.41	22.38	22.32	23.7
1.4	64QAM	3	3	22.40	22.38	22.31	
1.4	64QAM	6	0	21.27	21.21	21.21	



Band 13							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				23230			
Frequency (MHz)				762			
10	QPSK	1	0	23.83			25.2
10	QPSK	1	25	23.84			
10	QPSK	1	49	23.97			
10	QPSK	25	0	22.96			24.2
10	QPSK	25	12	23.01			
10	QPSK	25	25	22.91			
10	QPSK	50	0	23.01			24.2
10	16QAM	1	0	23.16			
10	16QAM	1	25	23.15			
10	16QAM	1	49	23.15			23.2
10	16QAM	25	0	21.97			
10	16QAM	25	12	22.03			
10	16QAM	25	25	21.93			23.2
10	16QAM	50	0	21.95			
10	64QAM	1	0	22.01			
10	64QAM	1	25	22.13			23.2
10	64QAM	1	49	22.04			
10	64QAM	25	0	21.02			
10	64QAM	25	12	21.00			22.2
10	64QAM	25	25	21.04			
10	64QAM	50	0	20.96			
Channel				23206 23230 23255			Tune-up limit (dBm)
Frequency (MHz)				779.5 762 784.5			
5	QPSK	1	0	23.75	23.76	23.86	25.2
5	QPSK	1	12	23.88	23.84	23.87	
5	QPSK	1	24	23.87	23.86	23.87	
5	QPSK	12	0	22.89	22.92	22.92	24.2
5	QPSK	12	7	22.83	22.97	22.83	
5	QPSK	12	13	23.02	23.01	22.92	
5	QPSK	25	0	23.01	22.99	22.91	24.2
5	16QAM	1	0	23.08	23.05	23.08	
5	16QAM	1	12	23.16	23.14	23.09	
5	16QAM	1	24	23.16	23.10	23.03	23.2
5	16QAM	12	0	21.99	21.97	21.98	
5	16QAM	12	7	22.05	21.96	21.96	
5	16QAM	12	13	22.02	21.94	21.97	23.2
5	16QAM	25	0	22.03	21.94	21.88	
5	64QAM	1	0	22.00	22.13	21.98	
5	64QAM	1	12	22.13	22.06	22.08	23.2
5	64QAM	1	24	22.07	22.15	22.00	
5	64QAM	12	0	21.03	21.06	20.99	
5	64QAM	12	7	21.07	21.01	20.92	22.2
5	64QAM	12	13	20.98	21.05	20.97	
5	64QAM	25	0	20.96	20.95	20.88	



Band 14							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				23330			
Frequency (MHz)				793			
10	QPSK	1	0	24.44			25.7
10	QPSK	1	25	24.49			
10	QPSK	1	49	24.32			
10	QPSK	25	0	23.51			24.7
10	QPSK	25	12	23.50			
10	QPSK	25	25	23.48			
10	QPSK	50	0	23.42			24.7
10	16QAM	1	0	23.87			
10	16QAM	1	25	23.84			
10	16QAM	1	49	23.71			23.7
10	16QAM	25	0	22.44			
10	16QAM	25	12	22.54			
10	16QAM	25	25	22.55			23.7
10	16QAM	50	0	22.44			
10	64QAM	1	0	22.75			
10	64QAM	1	25	22.58			23.7
10	64QAM	1	49	22.65			
10	64QAM	25	0	21.50			
10	64QAM	25	12	21.33			22.7
10	64QAM	25	25	21.48			
10	64QAM	50	0	21.55			
Channel				23306 23330 23355			Tune-up limit (dBm)
Frequency (MHz)				790.5 793 795.5			
5	QPSK	1	0	24.48	24.40	24.42	25.7
5	QPSK	1	12	24.48	24.48	24.47	
5	QPSK	1	24	24.47	24.44	24.42	
5	QPSK	12	0	23.54	23.49	23.41	24.7
5	QPSK	12	7	23.60	23.52	23.47	
5	QPSK	12	13	23.50	23.55	23.45	
5	QPSK	25	0	23.59	23.48	23.43	24.7
5	16QAM	1	0	23.74	23.78	23.68	
5	16QAM	1	12	23.78	23.80	23.80	
5	16QAM	1	24	23.80	23.72	23.71	23.7
5	16QAM	12	0	22.51	22.57	22.48	
5	16QAM	12	7	22.62	22.60	22.49	
5	16QAM	12	13	22.59	22.55	22.51	23.7
5	16QAM	25	0	22.57	22.52	22.50	
5	64QAM	1	0	22.71	22.62	22.36	
5	64QAM	1	12	22.78	22.24	22.53	23.7
5	64QAM	1	24	22.33	22.27	22.70	
5	64QAM	12	0	21.61	21.26	21.18	
5	64QAM	12	7	21.68	21.24	21.54	22.7
5	64QAM	12	13	21.36	21.23	21.61	
5	64QAM	25	0	21.64	21.16	21.49	



Band 17							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch./	Power Middle Ch./	Power High Ch./	Tune-up limit (dBm)
Channel				23780	23790	23800	
Frequency (MHz)				709	710	711	
10	QPSK	1	0	24.38	24.29	24.27	25.7
10	QPSK	1	25	24.35	24.27	24.31	
10	QPSK	1	49	24.33	24.40	24.28	
10	QPSK	25	0	23.34	23.36	23.37	24.7
10	QPSK	25	12	23.51	23.39	23.43	
10	QPSK	25	25	23.50	23.51	23.46	
10	QPSK	50	0	23.44	23.37	23.34	24.7
10	16QAM	1	0	23.64	23.67	23.59	
10	16QAM	1	25	23.73	23.67	23.67	
10	16QAM	1	49	23.70	23.70	23.73	23.7
10	16QAM	25	0	22.35	22.28	22.38	
10	16QAM	25	12	22.43	22.42	22.36	
10	16QAM	25	25	22.40	22.45	22.42	23.7
10	16QAM	50	0	22.50	22.35	22.41	
10	64QAM	1	0	22.59	22.53	22.57	
10	64QAM	1	25	22.67	22.66	22.50	23.7
10	64QAM	1	49	22.65	22.65	22.58	
10	64QAM	25	0	21.36	21.43	21.41	
10	64QAM	25	12	21.47	21.43	21.46	22.7
10	64QAM	25	25	21.51	21.55	21.51	
10	64QAM	50	0	21.54	21.40	21.44	
Channel				23755	23790	23825	Tune-up limit (dBm)
Frequency (MHz)				706.5	710	713.5	
5	QPSK	1	0	24.24	24.27	24.26	25.7
5	QPSK	1	12	24.31	24.37	24.39	
5	QPSK	1	24	24.38	24.39	24.31	
5	QPSK	12	0	23.43	23.34	23.35	24.7
5	QPSK	12	7	23.48	23.47	23.43	
5	QPSK	12	13	23.46	23.44	23.40	
5	QPSK	25	0	23.49	23.45	23.42	24.7
5	16QAM	1	0	23.57	23.61	23.61	
5	16QAM	1	12	23.61	23.69	23.63	
5	16QAM	1	24	23.73	23.76	23.68	23.7
5	16QAM	12	0	22.40	22.39	22.36	
5	16QAM	12	7	22.45	22.40	22.38	
5	16QAM	12	13	22.51	22.44	22.43	23.7
5	16QAM	25	0	22.43	22.44	22.49	
5	64QAM	1	0	22.41	22.31	22.54	
5	64QAM	1	12	22.59	22.50	22.51	23.7
5	64QAM	1	24	22.61	22.53	22.49	
5	64QAM	12	0	21.43	21.40	21.44	
5	64QAM	12	7	21.47	21.45	21.53	22.7
5	64QAM	12	13	21.53	21.55	21.51	
5	64QAM	25	0	21.45	21.39	21.40	



Band 25							
Ant 2							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				26140	26340	26590	
Frequency (MHz)				1860	1880	1905	
20	QPSK	1	0	24.56	24.54	24.48	25.7
20	QPSK	1	49	24.46	24.52	24.36	
20	QPSK	1	99	24.44	24.45	24.39	
20	QPSK	50	0	23.63	23.64	23.50	24.7
20	QPSK	50	24	23.70	23.69	23.51	
20	QPSK	50	50	23.65	23.65	23.58	
20	QPSK	100	0	23.70	23.67	23.51	24.7
20	16QAM	1	0	23.53	23.50	23.79	
20	16QAM	1	49	23.55	23.55	23.74	
20	16QAM	1	99	23.76	23.84	23.69	23.7
20	16QAM	50	0	22.65	22.65	22.53	
20	16QAM	50	24	22.72	22.71	22.53	
20	16QAM	50	50	22.65	22.67	22.57	23.7
20	16QAM	100	0	22.68	22.69	22.50	
20	64QAM	1	0	22.74	22.72	22.64	
20	64QAM	1	49	22.69	22.71	22.65	23.7
20	64QAM	1	99	22.68	22.71	22.47	
20	64QAM	50	0	21.65	21.66	21.56	
20	64QAM	50	24	21.72	21.76	21.55	22.7
20	64QAM	50	50	21.67	21.68	21.59	
20	64QAM	100	0	21.70	21.73	21.54	
Channel				26115	26340	26515	Tune-up limit (dBm)
Frequency (MHz)				1857.5	1880	1907.5	
15	QPSK	1	0	24.55	24.55	24.44	25.7
15	QPSK	1	37	24.50	24.55	24.44	
15	QPSK	1	74	24.51	24.53	24.41	
15	QPSK	36	0	23.69	23.63	23.52	24.7
15	QPSK	36	20	23.69	23.67	23.59	
15	QPSK	36	39	23.64	23.63	23.54	
15	QPSK	75	0	23.65	23.68	23.49	24.7
15	16QAM	1	0	23.81	23.91	23.73	
15	16QAM	1	37	23.84	23.83	23.73	
15	16QAM	1	74	23.82	23.85	23.74	23.7
15	16QAM	36	0	22.69	22.63	22.51	
15	16QAM	36	20	22.67	22.70	22.59	
15	16QAM	36	39	22.61	22.65	22.55	23.7
15	16QAM	75	0	22.68	22.70	22.51	
15	64QAM	1	0	22.72	22.76	22.59	
15	64QAM	1	37	22.73	22.79	22.67	23.7
15	64QAM	1	74	22.70	22.76	22.48	
15	64QAM	36	0	21.74	21.64	21.51	
15	64QAM	36	20	21.72	21.73	21.61	22.7
15	64QAM	36	39	21.71	21.70	21.64	
15	64QAM	75	0	21.69	21.70	21.52	
Channel				26090	26340	26640	Tune-up limit (dBm)
Frequency (MHz)				1855	1880	1910	
10	QPSK	1	0	24.51	24.48	24.35	25.7
10	QPSK	1	25	24.48	24.50	24.39	
10	QPSK	1	49	24.45	24.48	24.39	
10	QPSK	25	0	23.62	23.56	23.52	24.7
10	QPSK	25	12	23.68	23.67	23.59	
10	QPSK	25	25	23.67	23.68	23.60	
10	QPSK	50	0	23.67	23.67	23.58	24.7
10	16QAM	1	0	23.80	23.87	23.74	
10	16QAM	1	25	23.84	23.86	23.80	
10	16QAM	1	49	23.87	23.89	23.79	23.7
10	16QAM	25	0	22.64	22.59	22.54	
10	16QAM	25	12	22.69	22.69	22.58	
10	16QAM	25	25	22.62	22.68	22.52	23.7
10	16QAM	50	0	22.65	22.69	22.56	
10	64QAM	1	0	22.77	22.74	22.64	
10	64QAM	1	25	22.82	22.79	22.72	23.7
10	64QAM	1	49	22.79	22.78	22.51	
10	64QAM	25	0	21.65	21.60	21.57	
10	64QAM	25	12	21.72	21.71	21.62	22.7
10	64QAM	25	25	21.69	21.70	21.63	
10	64QAM	50	0	21.65	21.70	21.62	
Channel				26055	26340	26655	Tune-up limit (dBm)
Frequency (MHz)				1852.5	1880	1912.5	
5	QPSK	1	0	24.49	24.44	24.40	25.7
5	QPSK	1	12	24.55	24.54	24.43	
5	QPSK	1	24	24.53	24.50	24.42	
5	QPSK	12	0	23.60	23.62	23.49	24.7
5	QPSK	12	7	23.69	23.65	23.55	
5	QPSK	12	13	23.64	23.69	23.56	
5	QPSK	25	0	23.62	23.64	23.55	24.7
5	16QAM	1	0	23.85	23.82	23.74	
5	16QAM	1	12	23.80	23.86	23.73	
5	16QAM	1	24	23.88	23.93	23.72	23.7
5	16QAM	12	0	22.63	22.65	22.50	
5	16QAM	12	7	22.68	22.71	22.58	
5	16QAM	12	13	22.67	22.71	22.56	23.7
5	16QAM	25	0	22.67	22.67	22.52	
5	64QAM	1	0	22.79	22.75	22.69	
5	64QAM	1	12	22.74	22.77	22.61	23.7
5	64QAM	1	24	22.71	22.79	22.23	
5	64QAM	12	0	21.67	21.67	21.55	
5	64QAM	12	7	21.74	21.78	21.61	22.7
5	64QAM	12	13	21.74	21.75	21.30	
5	64QAM	25	0	21.65	21.67	21.47	
Channel				26055	26340	26675	Tune-up limit (dBm)
Frequency (MHz)				1851.5	1880	1913.5	
3	QPSK	1	0	24.41	24.39	24.35	25.7
3	QPSK	1	8	24.50	24.49	24.48	
3	QPSK	1	14	24.52	24.51	24.45	
3	QPSK	8	0	23.57	23.62	23.47	24.7
3	QPSK	8	4	23.67	23.66	23.55	
3	QPSK	8	7	23.65	23.66	23.57	
3	QPSK	15	0	23.63	23.62	23.53	24.7
3	16QAM	1	0	23.79	23.71	23.69	
3	16QAM	1	8	23.93	23.95	23.81	
3	16QAM	1	14	23.90	23.91	23.76	23.7
3	16QAM	8	0	22.66	22.65	22.53	
3	16QAM	8	4	22.74	22.75	22.61	
3	16QAM	8	7	22.73	22.75	22.62	23.7
3	16QAM	15	0	22.68	22.66	22.54	
3	64QAM	1	0	22.70	22.66	22.56	
3	64QAM	1	8	22.82	22.87	22.44	23.7
3	64QAM	1	14	22.80	22.83	22.21	
3	64QAM	8	0	21.66	21.67	21.53	
3	64QAM	8	4	21.74	21.75	21.37	22.7
3	64QAM	8	7	21.72	21.75	21.25	
3	64QAM	15	0	21.66	21.67	21.38	
Channel				26047	26340	26683	Tune-up limit (dBm)
Frequency (MHz)				1850.7	1880	1914.3	
1.4	QPSK	1	0	24.41	24.36	24.29	25.7
1.4	QPSK	1	3	24.51	24.52	24.36	
1.4	QPSK	1	5	24.45	24.48	24.34	
1.4	QPSK	3	0	24.46	24.47	24.30	24.7
1.4	QPSK	3	1	24.53	24.50	24.37	
1.4	QPSK	3	3	24.49	24.48	24.36	
1.4	QPSK	6	0	23.57	23.59	23.43	24.7
1.4	16QAM	1	0	23.76	23.67	23.61	
1.4	16QAM	1	3	23.88	23.85	23.73	
1.4	16QAM	1	5	23.83	23.81	23.65	24.7
1.4	16QAM	3	0	23.63	23.55	23.36	
1.4	16QAM	3	1	23.62	23.62	23.45	
1.4	16QAM	3	3	23.54	23.58	23.39	23.7
1.4	16QAM	6	0	22.62	22.65	22.49	
1.4	64QAM	1	0	22.63	22.58	22.20	
1.4	64QAM	1	3	22.72	22.76	22.17	23.7
1.4	64QAM	1	5	22.69	22.72	22.10	
1.4	64QAM	3	0	22.64	22.65	22.19	
1.4	64QAM	3	1	22.72	22.72	22.28	23.7
1.4	64QAM	3	3	22.69	22.69	22.12	
1.4	64QAM	6	0	21.57	21.58	21.10	



Band 26							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				26765	26865	26965	
Frequency (MHz)				821.5	831.5	841.5	
15	QPSK	1	0	24.28	24.16	24.24	25.7
15	QPSK	1	37	24.14	24.24	24.21	
15	QPSK	1	74	24.27	24.52	24.13	
15	QPSK	36	0	23.38	23.39	23.34	24.7
15	QPSK	36	20	23.40	23.31	23.37	
15	QPSK	36	39	23.33	23.34	23.29	
15	QPSK	75	0	23.39	23.35	23.35	24.7
15	16QAM	1	0	23.55	23.58	23.61	
15	16QAM	1	37	23.54	23.54	23.60	
15	16QAM	1	74	23.56	23.63	23.47	23.7
15	16QAM	36	0	22.36	22.42	22.34	
15	16QAM	36	20	22.34	22.33	22.30	
15	16QAM	36	39	22.36	22.36	22.33	23.7
15	16QAM	75	0	22.42	22.38	22.33	
15	64QAM	1	0	22.48	22.42	22.41	
15	64QAM	1	37	22.45	22.49	22.41	23.7
15	64QAM	1	74	22.48	22.48	21.70	
15	64QAM	36	0	21.43	21.45	21.41	
15	64QAM	36	20	21.47	21.43	21.37	22.7
15	64QAM	36	39	21.38	21.44	21.49	
15	64QAM	75	0	21.47	21.36	21.42	
Channel				26740	26865	26990	Tune-up limit (dBm)
Frequency (MHz)				819	831.5	844	
10	QPSK	1	0	24.38	24.29	24.37	25.7
10	QPSK	1	25	24.22	24.25	24.23	
10	QPSK	1	49	24.28	24.29	24.20	
10	QPSK	25	0	23.50	23.36	23.44	24.7
10	QPSK	25	12	23.50	23.41	23.37	
10	QPSK	25	25	23.40	23.42	23.37	
10	QPSK	50	0	23.38	23.41	23.42	24.7
10	16QAM	1	0	23.77	23.60	23.75	
10	16QAM	1	25	23.61	23.73	23.64	
10	16QAM	1	49	23.64	23.67	23.62	23.7
10	16QAM	25	0	22.46	22.36	22.37	
10	16QAM	25	12	22.45	22.42	22.36	
10	16QAM	25	25	22.30	22.44	22.38	22.7
10	16QAM	50	0	22.46	22.37	22.33	
10	64QAM	1	0	22.64	22.51	22.57	
10	64QAM	1	25	22.54	22.66	22.66	22.7
10	64QAM	1	49	22.56	22.60	22.05	
10	64QAM	25	0	21.44	21.42	21.43	
10	64QAM	25	12	21.50	21.47	21.48	22.7
10	64QAM	25	25	21.37	21.41	21.29	
10	64QAM	50	0	21.47	21.37	21.36	
Channel				26715	26865	27015	Tune-up limit (dBm)
Frequency (MHz)				616.5	631.5	646.5	
5	QPSK	1	0	24.45	24.32	24.35	25.7
5	QPSK	1	12	24.38	24.36	24.33	
5	QPSK	1	24	24.30	24.37	24.26	
5	QPSK	12	0	23.50	23.37	23.40	24.7
5	QPSK	12	7	23.51	23.41	23.44	
5	QPSK	12	13	23.44	23.36	23.33	
5	QPSK	25	0	23.44	23.40	23.38	24.7
5	16QAM	1	0	23.78	23.60	23.73	
5	16QAM	1	12	23.72	23.66	23.60	
5	16QAM	1	24	23.66	23.72	23.58	23.7
5	16QAM	12	0	22.49	22.38	22.41	
5	16QAM	12	7	22.45	22.45	22.41	
5	16QAM	12	13	22.44	22.37	22.30	23.7
5	16QAM	25	0	22.43	22.36	22.40	
5	64QAM	1	0	22.73	22.56	22.53	
5	64QAM	1	12	22.54	22.59	21.87	23.7
5	64QAM	1	24	22.56	22.57	21.82	
5	64QAM	12	0	21.58	21.56	21.51	
5	64QAM	12	7	21.59	21.50	20.86	22.7
5	64QAM	12	13	21.54	21.45	20.56	
5	64QAM	25	0	21.50	21.39	21.68	
Channel				26705	26865	27025	Tune-up limit (dBm)
Frequency (MHz)				815.5	831.5	847.5	
3	QPSK	1	0	24.43	24.37	24.37	25.7
3	QPSK	1	8	24.41	24.37	24.32	
3	QPSK	1	14	24.30	24.35	24.26	
3	QPSK	8	0	23.51	23.43	23.27	24.7
3	QPSK	8	4	23.54	23.46	23.33	
3	QPSK	8	7	23.40	23.41	23.37	
3	QPSK	15	0	23.42	23.35	23.30	24.7
3	16QAM	1	0	23.79	23.62	23.67	
3	16QAM	1	8	23.80	23.76	23.49	
3	16QAM	1	14	23.68	23.71	23.56	23.7
3	16QAM	8	0	22.53	22.44	22.45	
3	16QAM	8	4	22.59	22.47	22.41	
3	16QAM	8	7	22.46	22.49	22.36	23.7
3	16QAM	15	0	22.56	22.36	22.37	
3	64QAM	1	0	22.61	22.57	21.91	
3	64QAM	1	8	22.68	22.58	21.70	23.7
3	64QAM	1	14	22.58	22.61	21.71	
3	64QAM	8	0	21.59	21.49	20.70	
3	64QAM	8	4	21.55	21.54	20.57	22.7
3	64QAM	8	7	21.49	21.52	20.57	
3	64QAM	15	0	21.50	21.48	20.64	
Channel				26697	26865	27033	Tune-up limit (dBm)
Frequency (MHz)				814.7	831.5	848.3	
1.4	QPSK	1	0	24.37	24.27	24.21	25.7
1.4	QPSK	1	3	24.42	24.30	24.23	
1.4	QPSK	1	5	24.36	24.21	24.15	
1.4	QPSK	3	0	24.41	24.23	24.20	24.7
1.4	QPSK	3	1	24.41	24.33	24.21	
1.4	QPSK	3	3	24.40	24.32	24.20	
1.4	QPSK	6	0	23.41	23.38	23.30	24.7
1.4	16QAM	1	0	23.71	23.59	23.46	
1.4	16QAM	1	3	23.72	23.62	23.59	
1.4	16QAM	1	5	23.63	23.59	23.46	24.7
1.4	16QAM	3	0	23.56	23.29	23.30	
1.4	16QAM	3	1	23.60	23.39	23.30	
1.4	16QAM	3	3	23.50	23.35	23.24	23.7
1.4	16QAM	6	0	22.50	22.46	22.33	
1.4	64QAM	1	0	22.68	22.47	21.74	
1.4	64QAM	1	3	22.68	22.61	21.70	23.7
1.4	64QAM	1	5	22.62	22.46	21.71	
1.4	64QAM	3	0	22.64	22.46	21.72	
1.4	64QAM	3	1	22.57	22.47	21.71	22.7
1.4	64QAM	3	3	22.56	22.51	21.80	
1.4	64QAM	6	0	21.43	21.42	20.70	



Band 30							
Ant 2							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				27710			
Frequency (MHz)				2310			
10	QPSK	1	0	22.18			23.7
10	QPSK	1	25	22.07			
10	QPSK	1	49	22.09			
10	QPSK	25	0	21.18			22.7
10	QPSK	25	12	21.14			
10	QPSK	25	25	21.23			
10	QPSK	50	0	21.14			22.7
10	16QAM	1	0	21.51			
10	16QAM	1	25	21.44			
10	16QAM	1	49	21.52			21.7
10	16QAM	25	0	20.18			
10	16QAM	25	12	20.25			
10	16QAM	25	25	20.19			21.7
10	16QAM	50	0	20.23			
10	64QAM	1	0	20.35			
10	64QAM	1	25	20.42			21.7
10	64QAM	1	49	20.39			
10	64QAM	25	0	19.24			
10	64QAM	25	12	19.21			20.7
10	64QAM	25	25	19.22			
10	64QAM	50	0	19.21			
Channel				27685 27710 27735			Tune-up limit (dBm)
Frequency (MHz)				2307.5 2310 2312.5			
5	QPSK	1	0	22.04	22.08	22.10	23.7
5	QPSK	1	12	22.18	22.10	22.13	
5	QPSK	1	24	22.11	22.12	22.14	
5	QPSK	12	0	21.14	21.18	21.17	22.7
5	QPSK	12	7	21.27	21.18	21.20	
5	QPSK	12	13	21.32	21.23	21.13	
5	QPSK	25	0	21.24	21.15	21.21	21.7
5	16QAM	1	0	21.36	21.35	21.42	
5	16QAM	1	12	21.47	21.47	21.42	
5	16QAM	1	24	21.55	21.44	21.44	21.7
5	16QAM	12	0	20.15	20.21	20.17	
5	16QAM	12	7	20.20	20.25	20.29	
5	16QAM	12	13	20.22	20.20	20.19	21.7
5	16QAM	25	0	20.24	20.17	20.23	
5	64QAM	1	0	20.27	20.34	20.47	
5	64QAM	1	12	20.39	20.35	20.37	21.7
5	64QAM	1	24	20.53	20.37	20.31	
5	64QAM	12	0	19.25	19.27	19.23	
5	64QAM	12	7	19.29	19.22	19.33	20.7
5	64QAM	12	13	19.31	19.33	19.25	
5	64QAM	25	0	19.27	19.21	19.27	



Band 66							
Ant 2							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				132072	132322	132572	
Frequency (MHz)				1720	1745	1770	
20	QPSK	1	0	24.14	24.20	24.01	25.7
20	QPSK	1	48	24.00	23.99	23.95	
20	QPSK	1	99	24.13	24.01	23.91	
20	QPSK	50	0	23.15	23.19	23.14	24.7
20	QPSK	50	24	23.24	23.14	23.17	
20	QPSK	50	50	23.23	23.13	23.13	
20	QPSK	100	0	23.22	23.22	23.17	24.7
20	16QAM	1	0	23.49	23.42	23.32	
20	16QAM	1	49	23.38	23.24	23.23	
20	16QAM	1	99	23.49	23.28	23.19	23.7
20	16QAM	50	0	22.19	22.20	22.09	
20	16QAM	50	24	22.29	22.15	22.23	
20	16QAM	50	50	22.29	22.19	22.19	23.7
20	16QAM	100	0	22.28	22.13	22.25	
20	64QAM	1	0	22.35	22.30	22.29	
20	64QAM	1	49	22.23	22.15	22.21	23.7
20	64QAM	1	99	22.34	22.29	22.09	
20	64QAM	50	0	21.15	21.16	21.21	
20	64QAM	50	24	21.23	21.15	21.15	22.7
20	64QAM	50	50	21.25	21.16	21.13	
20	64QAM	100	0	21.34	21.22	21.24	
Channel				132047	132322	132597	Tune-up limit (dBm)
Frequency (MHz)				1717.5	1745	1772.5	
15	QPSK	1	0	24.10	24.08	24.03	25.7
15	QPSK	1	37	24.06	24.00	23.96	
15	QPSK	1	74	24.13	24.11	23.95	
15	QPSK	36	0	23.14	23.19	23.11	24.7
15	QPSK	36	20	23.18	23.25	23.14	
15	QPSK	36	39	23.19	23.16	23.14	
15	QPSK	75	0	23.20	23.21	23.04	24.7
15	16QAM	1	0	23.37	23.39	23.40	
15	16QAM	1	37	23.33	23.32	23.31	
15	16QAM	1	74	23.45	23.30	23.25	23.7
15	16QAM	36	0	22.19	22.19	22.07	
15	16QAM	36	20	22.22	22.14	22.13	
15	16QAM	36	39	22.22	22.17	22.16	23.7
15	16QAM	75	0	22.24	22.19	22.06	
15	64QAM	1	0	22.26	22.22	22.19	
15	64QAM	1	37	22.30	22.29	22.15	22.7
15	64QAM	1	74	22.36	22.26	22.18	
15	64QAM	36	0	21.20	21.19	21.11	
15	64QAM	36	20	21.22	21.20	21.13	22.7
15	64QAM	36	39	21.22	21.18	21.12	
15	64QAM	75	0	21.23	21.16	21.07	
Channel				132022	132322	132622	Tune-up limit (dBm)
Frequency (MHz)				1715	1745	1775	
10	QPSK	1	0	24.09	24.03	24.07	25.7
10	QPSK	1	25	24.08	24.07	24.06	
10	QPSK	1	49	24.14	24.08	24.07	
10	QPSK	25	0	23.16	23.15	23.15	24.7
10	QPSK	25	12	23.19	23.22	23.13	
10	QPSK	25	25	23.19	23.19	23.14	
10	QPSK	50	0	23.20	23.23	23.06	24.7
10	16QAM	1	0	23.59	23.46	23.51	
10	16QAM	1	25	23.44	23.45	23.45	
10	16QAM	1	49	23.54	23.39	23.44	23.7
10	16QAM	25	0	22.18	22.16	22.08	
10	16QAM	25	12	22.23	22.16	22.11	
10	16QAM	25	25	22.21	22.20	22.21	23.7
10	16QAM	50	0	22.23	22.25	22.08	
10	64QAM	1	0	22.37	22.29	22.29	
10	64QAM	1	25	22.42	22.34	22.40	23.7
10	64QAM	1	49	22.36	22.38	22.34	
10	64QAM	25	0	21.20	21.18	21.19	
10	64QAM	25	12	21.30	21.22	21.19	22.7
10	64QAM	25	25	21.24	21.21	21.19	
10	64QAM	50	0	21.30	21.24	21.13	
Channel				131997	132322	132647	Tune-up limit (dBm)
Frequency (MHz)				1712.5	1745	1777.5	
5	QPSK	1	0	24.07	24.10	24.08	25.7
5	QPSK	1	12	24.12	24.06	24.05	
5	QPSK	1	24	24.09	24.11	24.08	
5	QPSK	12	0	23.22	23.13	23.12	24.7
5	QPSK	12	7	23.25	23.15	23.14	
5	QPSK	12	13	23.17	23.22	23.17	
5	QPSK	25	0	23.16	23.20	23.17	24.7
5	16QAM	1	0	23.46	23.36	23.34	
5	16QAM	1	12	23.53	23.43	23.47	
5	16QAM	1	24	23.47	23.38	23.32	23.7
5	16QAM	12	0	22.24	22.17	22.17	
5	16QAM	12	7	22.24	22.21	22.29	
5	16QAM	12	13	22.25	22.23	22.16	23.7
5	16QAM	25	0	22.18	22.22	22.14	
5	64QAM	1	0	22.35	22.31	22.33	
5	64QAM	1	12	22.38	22.36	22.34	23.7
5	64QAM	1	24	22.45	22.31	22.32	
5	64QAM	12	0	21.28	21.19	21.23	
5	64QAM	12	7	21.23	21.28	21.28	22.7
5	64QAM	12	13	21.32	21.21	21.23	
5	64QAM	25	0	21.20	21.22	21.19	
Channel				131987	132322	132657	Tune-up limit (dBm)
Frequency (MHz)				1711.5	1745	1776.5	
3	QPSK	1	0	24.10	24.13	24.08	25.7
3	QPSK	1	8	24.11	24.12	24.16	
3	QPSK	1	14	24.15	24.07	24.11	
3	QPSK	8	0	23.23	23.12	23.17	24.7
3	QPSK	8	4	23.22	23.20	23.19	
3	QPSK	8	7	23.28	23.20	23.12	
3	QPSK	15	0	23.16	23.23	23.18	24.7
3	16QAM	1	0	23.52	23.35	23.45	
3	16QAM	1	8	23.54	23.53	23.47	
3	16QAM	1	14	23.49	23.45	23.45	23.7
3	16QAM	8	0	22.25	22.14	22.17	
3	16QAM	8	4	22.35	22.21	22.20	
3	16QAM	8	7	22.29	22.23	22.22	23.7
3	16QAM	15	0	22.32	22.19	22.16	
3	64QAM	1	0	22.36	22.32	22.35	
3	64QAM	1	8	22.54	22.45	22.38	23.7
3	64QAM	1	14	22.42	22.35	22.40	
3	64QAM	8	0	21.26	21.15	21.14	
3	64QAM	8	4	21.36	21.27	21.20	22.7
3	64QAM	8	7	21.31	21.27	21.24	
3	64QAM	15	0	21.21	21.17	21.23	
Channel				131979	132322	132655	Tune-up limit (dBm)
Frequency (MHz)				1710.7	1745	1779.3	
1.4	QPSK	1	0	24.12	23.98	23.97	25.7
1.4	QPSK	1	3	24.17	24.09	24.04	
1.4	QPSK	1	5	24.10	24.08	24.05	
1.4	QPSK	3	0	24.11	24.14	24.09	24.7
1.4	QPSK	3	1	24.19	24.12	24.10	
1.4	QPSK	3	3	24.17	24.07	24.04	
1.4	QPSK	6	0	23.18	23.09	23.19	24.7
1.4	16QAM	1	0	23.47	23.39	23.37	
1.4	16QAM	1	3	23.52	23.43	23.46	
1.4	16QAM	1	5	23.42	23.36	23.32	24.7
1.4	16QAM	3	0	23.24	23.20	23.16	
1.4	16QAM	3	1	23.28	23.19	23.24	
1.4	16QAM	3	3	23.24	23.18	23.14	23.7
1.4	16QAM	6	0	22.25	22.21	22.24	
1.4	64QAM	1	0	22.27	22.36	22.33	
1.4	64QAM	1	3	22.46	22.33	22.41	23.7
1.4	64QAM	1	5	22.37	22.27	22.25	
1.4	64QAM	3	0	22.34	22.34	22.25	
1.4	64QAM	3	1	22.33	22.34	22.29	23.7
1.4	64QAM	3	3	22.27	22.27	22.22	
1.4	64QAM	6	0	21.18	21.12	21.08	



Band 71							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				133222	133322	133372	
Frequency (MHz)				673	683	688	
20	QPSK	1	0	24.39	24.32	24.28	25.7
20	QPSK	1	49	24.21	24.25	24.28	
20	QPSK	1	99	24.24	24.21	24.14	
20	QPSK	50	0	23.39	23.37	23.38	24.7
20	QPSK	50	24	23.50	23.42	23.32	
20	QPSK	50	50	23.45	23.39	23.33	
20	QPSK	100	0	23.46	23.30	23.37	24.7
20	16QAM	1	0	23.69	23.66	23.66	
20	16QAM	1	49	23.58	23.55	23.57	
20	16QAM	1	99	23.61	23.58	23.54	23.7
20	16QAM	50	0	22.46	22.32	22.40	
20	16QAM	50	24	22.42	22.33	22.39	
20	16QAM	50	50	22.42	22.39	22.39	23.7
20	16QAM	100	0	22.46	22.34	22.42	
20	64QAM	1	0	21.79	22.29	22.52	
20	64QAM	1	49	22.23	22.43	21.81	23.7
20	64QAM	1	99	22.50	22.00	22.43	
20	64QAM	50	0	20.70	21.36	21.01	
20	64QAM	50	24	20.85	21.40	21.15	22.7
20	64QAM	50	50	21.49	21.04	21.37	
20	64QAM	100	0	21.05	21.36	21.45	
Channel				133197	133297	133397	Tune-up limit (dBm)
Frequency (MHz)				670.5	680.5	690.5	
15	QPSK	1	0	24.23	24.27	24.23	25.7
15	QPSK	1	37	24.23	24.18	24.22	
15	QPSK	1	74	24.28	24.28	24.14	
15	QPSK	36	0	23.41	23.31	23.37	24.7
15	QPSK	36	20	23.45	23.30	23.34	
15	QPSK	36	39	23.38	23.40	23.35	
15	QPSK	75	0	23.36	23.35	23.34	24.7
15	16QAM	1	0	23.68	23.64	23.56	
15	16QAM	1	37	23.38	23.54	23.52	
15	16QAM	1	74	23.54	23.51	23.54	23.7
15	16QAM	36	0	22.28	22.39	22.28	
15	16QAM	36	20	22.31	22.34	22.43	
15	16QAM	36	39	22.45	22.37	22.38	23.7
15	16QAM	75	0	22.45	22.32	22.35	
15	64QAM	1	0	21.71	22.45	22.43	
15	64QAM	1	37	21.70	22.51	22.51	23.7
15	64QAM	1	74	22.41	22.16	22.49	
15	64QAM	36	0	20.70	21.34	20.97	
15	64QAM	36	20	20.44	21.43	21.36	22.7
15	64QAM	36	39	21.00	20.91	21.37	
15	64QAM	75	0	20.86	21.39	21.33	
Channel				133172	133272	133422	Tune-up limit (dBm)
Frequency (MHz)				668	678	683	
10	QPSK	1	0	24.27	24.17	24.29	25.7
10	QPSK	1	25	24.19	24.16	24.20	
10	QPSK	1	49	24.17	24.27	24.18	
10	QPSK	25	0	23.33	23.31	23.33	24.7
10	QPSK	25	12	23.33	23.43	23.26	
10	QPSK	25	25	23.24	23.30	23.27	
10	QPSK	50	0	23.41	23.40	23.28	24.7
10	16QAM	1	0	23.71	23.36	23.60	
10	16QAM	1	25	23.62	23.63	23.53	
10	16QAM	1	49	23.62	23.61	23.47	23.7
10	16QAM	25	0	22.27	22.28	22.30	
10	16QAM	25	12	22.28	22.38	22.33	
10	16QAM	25	25	22.14	22.38	22.23	23.7
10	16QAM	50	0	22.32	22.42	22.24	
10	64QAM	1	0	21.75	21.80	22.44	
10	64QAM	1	25	21.73	22.52	22.48	23.7
10	64QAM	1	49	21.70	22.46	22.13	
10	64QAM	25	0	20.70	21.34	21.35	
10	64QAM	25	12	20.33	21.41	21.36	22.7
10	64QAM	25	25	20.40	21.38	21.31	
10	64QAM	50	0	20.33	21.36	21.30	
Channel				133147	133247	133447	Tune-up limit (dBm)
Frequency (MHz)				665.5	675.5	695.5	
5	QPSK	1	0	24.07	24.21	24.21	25.7
5	QPSK	1	12	24.33	24.20	24.17	
5	QPSK	1	24	24.22	24.20	24.18	
5	QPSK	12	0	23.33	23.35	23.25	24.7
5	QPSK	12	7	23.30	23.36	23.33	
5	QPSK	12	13	23.32	23.30	23.28	
5	QPSK	25	0	23.32	23.37	23.25	24.7
5	16QAM	1	0	23.51	23.53	23.67	
5	16QAM	1	12	23.51	23.55	23.55	
5	16QAM	1	24	23.48	23.53	23.47	23.7
5	16QAM	12	0	22.16	22.40	22.33	
5	16QAM	12	7	22.31	22.37	22.34	
5	16QAM	12	13	22.38	22.34	22.27	23.7
5	16QAM	25	0	22.24	22.39	22.29	
5	64QAM	1	0	21.78	21.74	22.47	
5	64QAM	1	12	21.72	22.51	22.39	23.7
5	64QAM	1	24	21.70	22.56	21.87	
5	64QAM	12	0	20.70	21.16	21.31	
5	64QAM	12	7	20.42	21.41	21.39	22.7
5	64QAM	12	13	20.40	21.40	21.19	
5	64QAM	25	0	20.23	21.10	21.23	



Band 2							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch.	Power Mid Ch.	Power High Ch.	Tune-up limit (dbm)
Channel				18700	18900	19100	
Frequency (MHz)				1860	1880	1900	
20	QPSK	1	0	24.25	24.10	24.15	25.7
20	QPSK	1	49	24.12	24.04	24.04	
20	QPSK	1	99	24.03	24.11	24.05	
20	QPSK	50	0	23.18	23.10	23.15	24.7
20	QPSK	50	24	23.34	23.19	23.14	
20	QPSK	50	50	23.22	23.21	23.22	
20	QPSK	100	0	23.29	23.27	23.18	24.7
20	16QAM	1	0	23.43	23.43	23.45	
20	16QAM	1	49	23.41	23.40	23.35	
20	16QAM	1	99	23.34	23.43	23.47	23.7
20	16QAM	50	0	22.18	22.17	22.17	
20	16QAM	50	24	22.26	22.28	22.18	
20	16QAM	50	50	22.32	22.24	22.22	23.7
20	16QAM	100	0	22.21	22.24	22.13	
20	64QAM	1	0	22.35	22.29	22.33	
20	64QAM	1	49	22.35	22.31	21.77	22.7
20	64QAM	1	99	22.27	22.31	21.86	
20	64QAM	50	0	21.19	21.19	21.00	
20	64QAM	50	24	21.28	21.32	20.92	Tune-up limit (dbm)
20	64QAM	50	50	21.26	21.24	20.90	
20	64QAM	100	0	21.25	21.25	20.96	
Channel				1867.5	18900	19125	
Frequency (MHz)				1857.5	1880	1902.5	
15	QPSK	1	0	24.14	24.04	24.06	25.7
15	QPSK	1	37	24.08	24.01	23.95	
15	QPSK	1	74	24.01	24.03	23.97	
15	QPSK	36	0	23.10	23.05	23.10	24.7
15	QPSK	36	20	23.33	23.16	23.34	
15	QPSK	36	39	23.12	23.11	23.16	
15	QPSK	75	0	23.20	23.25	23.10	24.7
15	16QAM	1	0	23.37	23.35	23.40	
15	16QAM	1	37	23.37	23.33	23.30	
15	16QAM	1	74	23.27	23.38	23.46	23.7
15	16QAM	36	0	22.13	22.07	22.14	
15	16QAM	36	20	22.17	22.18	22.14	
15	16QAM	36	39	22.25	22.16	22.13	23.7
15	16QAM	75	0	22.20	22.19	22.08	
15	64QAM	1	0	22.31	22.23	22.29	
15	64QAM	1	37	22.31	22.26	21.73	22.7
15	64QAM	1	74	22.20	22.24	21.77	
15	64QAM	36	0	21.16	21.19	20.97	
15	64QAM	36	20	21.28	21.24	20.88	Tune-up limit (dbm)
15	64QAM	36	39	21.20	21.18	20.85	
15	64QAM	75	0	21.22	21.16	20.87	
Channel				18650	18900	19150	
Frequency (MHz)				1855	1880	1905	
10	QPSK	1	0	24.19	24.06	24.13	25.7
10	QPSK	1	25	24.12	24.03	23.95	
10	QPSK	1	49	24.01	24.05	23.99	
10	QPSK	25	0	23.13	23.10	23.05	24.7
10	QPSK	25	12	23.30	23.13	23.10	
10	QPSK	25	25	23.14	23.17	23.17	
10	QPSK	50	0	23.19	23.22	23.09	24.7
10	16QAM	1	0	23.38	23.42	23.42	
10	16QAM	1	25	23.35	23.32	23.28	
10	16QAM	1	49	23.31	23.40	23.42	23.7
10	16QAM	25	0	22.17	22.07	22.12	
10	16QAM	25	12	22.23	22.20	22.13	
10	16QAM	25	25	22.32	22.21	22.15	23.7
10	16QAM	50	0	22.19	22.24	22.12	
10	64QAM	1	0	22.29	22.22	22.28	
10	64QAM	1	25	22.31	22.29	21.70	22.7
10	64QAM	1	49	22.24	22.31	21.84	
10	64QAM	25	0	21.10	21.13	20.94	
10	64QAM	25	12	21.18	21.32	20.92	Tune-up limit (dbm)
10	64QAM	25	25	21.18	21.21	20.88	
10	64QAM	50	0	21.25	21.20	20.89	
Channel				1862.5	18900	19175	
Frequency (MHz)				1852.5	1880	1907.5	
5	QPSK	1	0	24.15	24.05	24.07	25.7
5	QPSK	1	12	24.20	24.15	24.18	
5	QPSK	1	24	24.13	24.16	24.16	
5	QPSK	12	0	23.23	23.13	23.24	24.7
5	QPSK	12	7	23.38	23.28	23.21	
5	QPSK	12	13	23.27	23.27	23.21	
5	QPSK	25	0	23.28	23.21	23.20	24.7
5	16QAM	1	0	23.44	23.30	23.38	
5	16QAM	1	12	23.48	23.48	23.46	
5	16QAM	1	24	23.54	23.47	23.42	23.7
5	16QAM	12	0	22.32	22.24	22.21	
5	16QAM	12	7	22.32	22.35	22.31	
5	16QAM	12	13	22.27	22.27	22.24	23.7
5	16QAM	25	0	22.30	22.28	22.20	
5	64QAM	1	0	22.47	22.31	21.86	
5	64QAM	1	12	22.35	22.36	21.97	23.7
5	64QAM	1	24	22.36	22.44	21.97	
5	64QAM	12	0	21.32	21.23	20.86	
5	64QAM	12	7	21.35	21.36	20.95	22.7
5	64QAM	12	13	21.39	21.40	20.89	
5	64QAM	25	0	21.30	21.33	20.83	
Channel				18615	18900	19185	
Frequency (MHz)				1851.5	1880	1906.5	
3	QPSK	1	0	24.21	24.11	24.09	25.7
3	QPSK	1	8	24.24	24.24	24.16	
3	QPSK	1	14	24.23	24.19	24.07	
3	QPSK	8	0	23.29	23.29	23.24	24.7
3	QPSK	8	4	23.36	23.24	23.26	
3	QPSK	8	7	23.31	23.21	23.18	
3	QPSK	15	0	23.34	23.24	23.16	24.7
3	16QAM	1	0	23.45	23.41	23.42	
3	16QAM	1	8	23.56	23.51	23.43	
3	16QAM	1	14	23.51	23.43	23.48	23.7
3	16QAM	8	0	22.29	22.37	22.28	
3	16QAM	8	4	22.37	22.38	22.32	
3	16QAM	8	7	22.34	22.32	22.25	23.7
3	16QAM	15	0	22.35	22.29	22.31	
3	64QAM	1	0	22.45	22.37	21.95	
3	64QAM	1	8	22.60	22.46	22.02	23.7
3	64QAM	1	14	22.50	22.48	21.92	
3	64QAM	8	0	21.38	21.32	20.88	
3	64QAM	8	4	21.37	21.43	20.88	22.7
3	64QAM	8	7	21.37	21.36	20.81	
3	64QAM	15	0	21.34	21.35	20.84	
Channel				18607	18900	19193	
Frequency (MHz)				1850.7	1880	1909.3	
1.4	QPSK	1	0	24.11	23.99	23.98	25.7
1.4	QPSK	1	3	24.20	24.14	24.13	
1.4	QPSK	1	5	24.15	24.04	24.07	
1.4	QPSK	3	0	24.11	24.06	23.99	24.7
1.4	QPSK	3	1	24.20	24.13	24.15	
1.4	QPSK	3	3	24.19	24.06	24.01	
1.4	QPSK	6	0	23.26	23.13	23.13	24.7
1.4	16QAM	1	0	23.46	23.42	23.35	
1.4	16QAM	1	3	23.55	23.53	23.49	
1.4	16QAM	1	5	23.52	23.43	23.36	24.7
1.4	16QAM	3	0	23.20	23.13	23.16	
1.4	16QAM	3	1	23.33	23.24	23.14	
1.4	16QAM	3	3	23.18	23.16	23.06	23.7
1.4	16QAM	6	0	22.30	22.30	22.26	
1.4	64QAM	1	0	22.38	22.35	21.94	
1.4	64QAM	1	3	22.43	22.42	22.00	23.7
1.4	64QAM	1	5	22.36	22.41	21.89	
1.4	64QAM	3	0	22.30	22.24	21.89	
1.4	64QAM	3	1	22.37	22.35	22.05	23.7
1.4	64QAM	3	3	22.37	22.34	21.96	
1.4	64QAM	6	0	21.28	21.25	20.78	



Band 4							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				20050	20175	20300	
Frequency (MHz)				1720	1732.5	1745	
20	QPSK	1	0	24.19	24.13	24.23	25.7
20	QPSK	1	49	24.02	23.94	23.98	
20	QPSK	1	99	24.06	24.04	24.04	
20	QPSK	50	0	23.20	23.16	23.22	24.7
20	QPSK	50	24	23.27	23.16	23.16	
20	QPSK	50	50	23.13	23.10	23.11	
20	QPSK	100	0	23.18	23.23	23.06	24.7
20	16QAM	1	0	23.51	23.50	23.48	
20	16QAM	1	49	23.40	23.51	23.32	
20	16QAM	1	99	23.47	23.33	23.32	23.7
20	16QAM	50	0	22.25	22.22	22.17	
20	16QAM	50	24	22.27	22.17	22.14	
20	16QAM	50	50	22.20	22.15	22.19	23.7
20	16QAM	100	0	22.17	22.27	22.13	
20	64QAM	1	0	22.32	22.36	22.07	
20	64QAM	1	49	22.21	22.20	22.29	23.7
20	64QAM	1	99	22.28	22.04	22.25	
20	64QAM	50	0	21.18	21.26	21.24	
20	64QAM	50	24	21.29	21.20	21.10	22.7
20	64QAM	50	50	21.20	21.13	21.14	
20	64QAM	100	0	21.22	21.24	21.19	
Channel				20025	20175	20325	
Frequency (MHz)				1717.5	1732.5	1747.5	
15	QPSK	1	0	24.21	24.17	24.22	25.7
15	QPSK	1	37	24.07	24.08	24.05	
15	QPSK	1	74	24.04	24.09	24.08	
15	QPSK	36	0	23.33	23.31	23.16	24.7
15	QPSK	36	20	23.27	23.26	23.10	
15	QPSK	36	39	23.27	23.16	23.14	
15	QPSK	75	0	23.24	23.22	23.15	24.7
15	16QAM	1	0	23.49	23.51	23.55	
15	16QAM	1	37	23.41	23.39	23.38	
15	16QAM	1	74	23.48	23.39	23.31	23.7
15	16QAM	36	0	22.30	22.16	22.24	
15	16QAM	36	20	22.20	22.25	22.12	
15	16QAM	36	39	22.20	22.20	22.17	23.7
15	16QAM	75	0	22.23	22.28	22.14	
15	64QAM	1	0	22.43	22.38	22.34	
15	64QAM	1	37	22.30	22.18	22.26	23.7
15	64QAM	1	74	22.37	22.07	22.20	
15	64QAM	36	0	21.27	21.29	21.27	
15	64QAM	36	20	21.25	21.13	21.21	22.7
15	64QAM	36	39	21.27	21.05	21.20	
15	64QAM	75	0	21.32	21.21	21.20	
Channel				20000	20175	20350	
Frequency (MHz)				1715	1732.5	1750	
10	QPSK	1	0	24.16	24.09	24.14	25.7
10	QPSK	1	25	24.14	24.09	24.08	
10	QPSK	1	49	24.15	24.17	24.10	
10	QPSK	25	0	23.24	23.19	23.15	24.7
10	QPSK	25	12	23.31	23.27	23.19	
10	QPSK	25	25	23.30	23.29	23.28	
10	QPSK	50	0	23.32	23.25	23.15	24.7
10	16QAM	1	0	23.87	23.84	23.47	
10	16QAM	1	25	23.43	23.51	23.45	
10	16QAM	1	49	23.52	23.45	23.56	23.7
10	16QAM	25	0	22.25	22.14	22.15	
10	16QAM	25	12	22.27	22.25	22.16	
10	16QAM	25	25	22.24	22.23	22.24	23.7
10	16QAM	50	0	22.31	22.29	22.14	
10	64QAM	1	0	22.36	22.33	22.38	
10	64QAM	1	25	22.46	22.28	22.46	23.7
10	64QAM	1	49	22.42	22.07	22.45	
10	64QAM	25	0	21.30	21.23	21.23	
10	64QAM	25	12	21.30	21.14	21.25	22.7
10	64QAM	25	25	21.35	20.96	21.26	
10	64QAM	50	0	21.30	21.11	21.23	
Channel				19975	20175	20375	
Frequency (MHz)				1712.5	1732.5	1752.5	
5	QPSK	1	0	24.19	24.12	24.06	25.7
5	QPSK	1	12	24.19	24.19	24.16	
5	QPSK	1	24	24.22	24.12	24.15	
5	QPSK	12	0	23.28	23.19	23.19	24.7
5	QPSK	12	7	23.36	23.29	23.23	
5	QPSK	12	13	23.28	23.23	23.14	
5	QPSK	25	0	23.30	23.24	23.23	24.7
5	16QAM	1	0	23.53	23.36	23.43	
5	16QAM	1	12	23.55	23.48	23.47	
5	16QAM	1	24	23.56	23.45	23.44	23.7
5	16QAM	12	0	22.25	22.15	22.29	
5	16QAM	12	7	22.32	22.31	22.21	
5	16QAM	12	13	22.28	22.32	22.28	23.7
5	16QAM	25	0	22.28	22.29	22.26	
5	64QAM	1	0	22.32	22.38	22.44	
5	64QAM	1	12	22.47	22.29	22.39	23.7
5	64QAM	1	24	22.55	22.04	22.40	
5	64QAM	12	0	21.33	21.25	21.33	
5	64QAM	12	7	21.35	21.25	21.29	22.7
5	64QAM	12	13	21.36	21.12	21.27	
5	64QAM	25	0	21.32	21.08	21.24	
Channel				19965	20175	20385	
Frequency (MHz)				1711.5	1732.5	1753.5	
3	QPSK	1	0	24.14	24.04	24.07	25.7
3	QPSK	1	8	24.23	24.20	24.15	
3	QPSK	1	14	24.19	24.20	24.10	
3	QPSK	8	0	23.25	23.18	23.17	24.7
3	QPSK	8	4	23.28	23.26	23.28	
3	QPSK	8	7	23.26	23.29	23.18	
3	QPSK	15	0	23.31	23.31	23.21	24.7
3	16QAM	1	0	23.51	23.42	23.42	
3	16QAM	1	8	23.59	23.56	23.46	
3	16QAM	1	14	23.49	23.41	23.43	23.7
3	16QAM	8	0	22.30	22.21	22.21	
3	16QAM	8	4	22.39	22.33	22.33	
3	16QAM	8	7	22.37	22.27	22.25	23.7
3	16QAM	15	0	22.32	22.22	22.26	
3	64QAM	1	0	22.37	22.24	22.33	
3	64QAM	1	8	22.57	22.26	22.45	23.7
3	64QAM	1	14	22.53	22.19	22.42	
3	64QAM	8	0	21.36	21.16	21.30	
3	64QAM	8	4	21.37	21.17	21.27	22.7
3	64QAM	8	7	21.35	21.09	21.26	
3	64QAM	15	0	21.29	21.14	21.20	
Channel				19957	20175	20393	
Frequency (MHz)				1710.7	1732.5	1754.3	
1.4	QPSK	1	0	24.02	24.07	24.05	25.7
1.4	QPSK	1	3	24.21	24.16	24.08	
1.4	QPSK	1	5	24.09	24.07	23.98	
1.4	QPSK	3	0	24.17	24.02	24.08	24.7
1.4	QPSK	3	1	24.17	24.16	24.09	
1.4	QPSK	3	3	24.14	24.12	24.09	
1.4	QPSK	6	0	23.12	23.14	23.06	24.7
1.4	16QAM	1	0	23.47	23.39	23.37	
1.4	16QAM	1	3	23.50	23.42	23.44	
1.4	16QAM	1	5	23.45	23.41	23.37	24.7
1.4	16QAM	3	0	23.22	23.16	23.13	
1.4	16QAM	3	1	23.22	23.26	23.24	
1.4	16QAM	3	3	23.23	23.16	23.13	23.7
1.4	16QAM	6	0	22.26	22.21	22.14	
1.4	64QAM	1	0	22.34	22.31	22.28	
1.4	64QAM	1	3	22.37	22.28	22.42	23.7
1.4	64QAM	1	5	22.34	22.21	22.33	
1.4	64QAM	3	0	22.36	22.28	22.22	
1.4	64QAM	3	1	22.36	22.34	22.30	23.7
1.4	64QAM	3	3	22.34	22.21	22.23	
1.4	64QAM	6	0	21.25	21.11	21.06	



Band 5							
Ant 1							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				20450	20525	20600	
Frequency (MHz)				829	836.5	844	
10	QPSK	1	0	23.09	23.04	23.08	23.8
10	QPSK	1	25	22.99	23.05	22.97	
10	QPSK	1	49	23.08	23.02	22.94	
10	QPSK	25	0	23.10	23.16	23.11	23.8
10	QPSK	25	12	23.20	23.14	23.12	
10	QPSK	25	25	23.18	23.17	23.13	
10	QPSK	50	0	23.21	23.16	23.10	23.8
10	16QAM	1	0	23.49	23.43	23.46	
10	16QAM	1	25	23.41	23.43	23.40	
10	16QAM	1	49	23.47	23.37	23.35	23.3
10	16QAM	25	0	22.97	23.05	23.02	
10	16QAM	25	12	23.06	23.06	23.04	
10	16QAM	25	25	23.04	23.09	23.05	23.3
10	16QAM	50	0	23.07	23.07	23.02	
10	64QAM	1	0	23.18	23.13	23.22	
10	64QAM	1	25	23.22	23.28	23.05	23.3
10	64QAM	1	49	23.24	23.02	22.76	
10	64QAM	25	0	21.98	22.13	22.08	
10	64QAM	25	12	22.14	22.12	22.06	22.3
10	64QAM	25	25	22.08	22.12	21.41	
10	64QAM	50	0	22.11	22.11	22.00	
Channel				20425	20525	20525	Tune-up limit (dBm)
Frequency (MHz)				826.5	836.5	846.5	
5	QPSK	1	0	23.05	22.65	22.60	23.8
5	QPSK	1	12	22.91	22.64	22.66	
5	QPSK	1	24	23.04	22.67	22.60	
5	QPSK	12	0	23.03	22.58	22.53	23.8
5	QPSK	12	7	23.15	22.62	22.46	
5	QPSK	12	13	23.14	22.57	22.46	
5	QPSK	25	0	23.14	22.51	22.45	23.8
5	16QAM	1	0	23.47	22.89	22.79	
5	16QAM	1	12	23.39	22.85	22.78	
5	16QAM	1	24	23.38	22.80	22.70	23.3
5	16QAM	12	0	22.96	22.59	22.42	
5	16QAM	12	7	23.04	22.54	22.41	
5	16QAM	12	13	23.04	22.49	22.40	23.3
5	16QAM	25	0	23.03	22.47	22.38	
5	64QAM	1	0	23.09	22.65	22.20	
5	64QAM	1	12	23.17	22.64	21.74	23.3
5	64QAM	1	24	23.20	22.64	21.90	
5	64QAM	12	0	21.97	21.60	21.87	
5	64QAM	12	7	22.08	21.59	21.63	22.3
5	64QAM	12	13	22.04	21.54	21.67	
5	64QAM	25	0	22.05	21.46	21.70	
Channel				20415	20525	20635	Tune-up limit (dBm)
Frequency (MHz)				825.5	836.5	847.5	
3	QPSK	1	0	22.80	22.75	22.80	23.8
3	QPSK	1	8	22.79	22.84	22.76	
3	QPSK	1	14	22.70	22.75	22.82	
3	QPSK	8	0	22.91	22.85	22.81	23.8
3	QPSK	8	4	22.85	22.87	22.80	
3	QPSK	8	7	22.82	22.84	22.72	
3	QPSK	15	0	22.83	22.83	22.77	23.8
3	16QAM	1	0	23.18	23.15	23.12	
3	16QAM	1	8	23.19	23.20	23.12	
3	16QAM	1	14	23.09	23.11	22.96	23.3
3	16QAM	8	0	22.80	22.85	22.81	
3	16QAM	8	4	22.80	22.88	22.79	
3	16QAM	8	7	22.74	22.83	22.71	23.3
3	16QAM	15	0	22.79	22.77	22.75	
3	64QAM	1	0	22.94	22.93	21.97	
3	64QAM	1	8	22.96	23.01	22.20	23.3
3	64QAM	1	14	22.85	22.90	22.28	
3	64QAM	8	0	21.82	21.83	21.85	
3	64QAM	8	4	21.79	21.86	21.96	22.3
3	64QAM	8	7	21.75	21.85	22.16	
3	64QAM	15	0	21.73	21.80	22.06	
Channel				20407	20525	20643	Tune-up limit (dBm)
Frequency (MHz)				824.7	836.5	848.3	
1.4	QPSK	1	0	22.70	22.66	22.61	23.8
1.4	QPSK	1	3	22.73	22.74	22.68	
1.4	QPSK	1	5	22.68	22.70	22.60	
1.4	QPSK	3	0	22.75	22.70	22.64	23.8
1.4	QPSK	3	1	22.78	22.73	22.69	
1.4	QPSK	3	3	22.73	22.74	22.64	
1.4	QPSK	6	0	22.81	22.73	22.69	23.8
1.4	16QAM	1	0	23.07	23.02	22.97	
1.4	16QAM	1	3	23.10	23.12	23.00	
1.4	16QAM	1	5	23.03	23.05	22.93	23.8
1.4	16QAM	3	0	22.88	22.78	22.76	
1.4	16QAM	3	1	22.89	22.84	22.80	
1.4	16QAM	3	3	22.82	22.84	22.70	23.3
1.4	16QAM	6	0	22.72	22.75	22.68	
1.4	64QAM	1	0	22.85	22.80	22.29	
1.4	64QAM	1	3	22.91	22.92	22.47	23.3
1.4	64QAM	1	5	22.82	22.96	22.49	
1.4	64QAM	3	0	22.85	22.77	22.25	
1.4	64QAM	3	1	22.86	22.83	22.37	23.3
1.4	64QAM	3	3	22.79	22.84	22.44	
1.4	64QAM	6	0	21.69	21.68	21.30	



Band 7							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch./	Power Middle Ch./	Power High Ch./	Tune-up limit (dBm)
Channel				20850	21100	21350	
Frequency (MHz)				2510	2535	2560	
20	QPSK	1	0	24.43	24.33	24.18	25.7
20	QPSK	1	49	24.40	24.36	24.21	
20	QPSK	1	99	24.53	24.43	24.20	
20	QPSK	50	0	23.80	23.46	23.37	24.7
20	QPSK	50	24	23.62	23.47	23.35	
20	QPSK	50	50	23.58	23.49	23.38	
20	QPSK	100	0	23.57	23.49	23.30	24.7
20	16QAM	1	0	23.72	23.69	23.53	
20	16QAM	1	49	23.76	23.65	23.47	
20	16QAM	1	99	23.89	23.74	23.52	23.7
20	16QAM	50	0	22.64	22.40	22.33	
20	16QAM	50	24	22.66	22.46	22.32	
20	16QAM	50	50	22.66	22.45	22.30	23.7
20	16QAM	100	0	22.58	22.45	22.32	
20	64QAM	1	0	22.63	22.40	22.44	
20	64QAM	1	49	22.62	22.65	22.46	23.7
20	64QAM	1	99	22.70	22.63	22.38	
20	64QAM	50	0	21.65	21.44	21.35	
20	64QAM	50	24	21.69	21.52	21.43	22.7
20	64QAM	50	50	21.66	21.44	21.39	
20	64QAM	100	0	21.67	21.51	21.40	
Channel				20925	21100	21375	Tune-up limit (dBm)
Frequency (MHz)				2507.5	2535	2562.5	
15	QPSK	1	0	24.41	24.35	24.22	25.7
15	QPSK	1	37	24.50	24.38	24.11	
15	QPSK	1	74	24.49	24.42	24.24	
15	QPSK	36	0	23.49	23.39	23.27	24.7
15	QPSK	36	20	23.64	23.46	23.32	
15	QPSK	36	39	23.64	23.46	23.32	
15	QPSK	75	0	23.58	23.40	23.35	24.7
15	16QAM	1	0	23.72	23.67	23.49	
15	16QAM	1	37	23.83	23.64	23.48	
15	16QAM	1	74	23.80	23.78	23.53	23.7
15	16QAM	36	0	22.50	22.47	22.29	
15	16QAM	36	20	22.60	22.50	22.35	
15	16QAM	36	39	22.65	22.48	22.34	23.7
15	16QAM	75	0	22.58	22.49	22.33	
15	64QAM	1	0	22.67	22.52	22.41	
15	64QAM	1	37	22.68	22.59	22.34	23.7
15	64QAM	1	74	22.80	22.60	22.41	
15	64QAM	36	0	21.49	21.41	21.38	
15	64QAM	36	20	21.66	21.55	21.32	22.7
15	64QAM	36	39	21.64	21.48	21.35	
15	64QAM	75	0	21.61	21.42	21.33	
Channel				20800	21100	21400	Tune-up limit (dBm)
Frequency (MHz)				2505	2535	2565	
10	QPSK	1	0	24.42	24.34	24.18	25.7
10	QPSK	1	25	24.48	24.37	24.08	
10	QPSK	1	49	24.42	24.34	24.20	
10	QPSK	25	0	23.43	23.29	23.24	24.7
10	QPSK	25	12	23.58	23.44	23.25	
10	QPSK	25	25	23.58	23.38	23.31	
10	QPSK	50	0	23.49	23.34	23.26	24.7
10	16QAM	1	0	23.85	23.57	23.43	
10	16QAM	1	25	23.81	23.62	23.38	
10	16QAM	1	49	23.72	23.72	23.47	23.7
10	16QAM	25	0	22.49	22.47	22.26	
10	16QAM	25	12	22.51	22.43	22.25	
10	16QAM	25	25	22.59	22.47	22.31	23.7
10	16QAM	50	0	22.57	22.46	22.24	
10	64QAM	1	0	22.65	22.45	22.36	
10	64QAM	1	25	22.68	22.53	22.25	23.7
10	64QAM	1	49	22.80	22.54	22.33	
10	64QAM	25	0	21.47	21.36	21.29	
10	64QAM	25	12	21.56	21.52	21.23	22.7
10	64QAM	25	25	21.52	21.45	21.33	
10	64QAM	50	0	21.61	21.33	21.23	
Channel				20775	21100	21425	Tune-up limit (dBm)
Frequency (MHz)				2502.5	2535	2567.5	
5	QPSK	1	0	24.45	24.33	24.22	25.7
5	QPSK	1	12	24.43	24.36	24.11	
5	QPSK	1	24	24.41	24.32	24.15	
5	QPSK	12	0	23.47	23.38	23.18	24.7
5	QPSK	12	7	23.62	23.39	23.31	
5	QPSK	12	13	23.61	23.38	23.24	
5	QPSK	25	0	23.48	23.32	23.26	24.7
5	16QAM	1	0	23.67	23.61	23.44	
5	16QAM	1	12	23.81	23.56	23.45	
5	16QAM	1	24	23.72	23.69	23.43	23.7
5	16QAM	12	0	22.47	22.45	22.20	
5	16QAM	12	7	22.56	22.41	22.33	
5	16QAM	12	13	22.62	22.48	22.25	23.7
5	16QAM	25	0	22.56	22.44	22.26	
5	64QAM	1	0	22.63	22.44	22.37	
5	64QAM	1	12	22.63	22.49	22.32	23.7
5	64QAM	1	24	22.78	22.55	22.37	
5	64QAM	12	0	21.41	21.34	21.30	
5	64QAM	12	7	21.83	21.52	21.24	22.7
5	64QAM	12	13	21.62	21.42	21.34	
5	64QAM	25	0	21.52	21.39	21.29	



Band 12							
Ant 1							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low (Ch.)	Power Middle (Ch.)	Power High (Ch.)	Tune-up limit (dBm)
Channel				23060	23095	23130	
Frequency (MHz)				704	707.5	711	
10	QPSK	1	0	23.76	23.70	23.73	25.1
10	QPSK	1	25	23.71	23.76	23.75	
10	QPSK	1	49	23.81	23.85	23.79	
10	QPSK	25	0	23.45	23.47	23.47	
10	QPSK	25	12	23.54	23.47	23.46	24.1
10	QPSK	25	25	23.52	23.54	23.54	
10	QPSK	50	0	23.53	23.47	23.46	
10	16QAM	1	0	23.74	23.68	23.67	24.1
10	16QAM	1	25	23.70	23.73	23.71	
10	16QAM	1	49	23.79	23.79	23.72	
10	16QAM	25	0	22.43	22.48	22.46	
10	16QAM	25	12	22.51	22.49	22.46	23.1
10	16QAM	25	25	22.47	22.52	22.56	
10	16QAM	50	0	22.53	22.45	22.45	
10	64QAM	1	0	22.85	22.81	22.84	23.1
10	64QAM	1	25	22.83	22.86	22.87	
10	64QAM	1	49	22.89	22.73	22.65	
10	64QAM	25	0	21.46	21.46	21.49	
10	64QAM	25	12	21.55	21.51	21.49	22.1
10	64QAM	25	25	21.53	21.57	21.56	
10	64QAM	50	0	21.53	21.51	21.52	
Channel				23035	23095	23155	Tune-up limit (dBm)
Frequency (MHz)				701.5	707.5	713.5	
5	QPSK	1	0	23.78	23.76	23.74	25.1
5	QPSK	1	12	23.77	23.82	23.80	
5	QPSK	1	24	23.78	23.83	23.82	
5	QPSK	12	0	23.43	23.46	23.51	24.1
5	QPSK	12	7	23.48	23.46	23.50	
5	QPSK	12	13	23.47	23.48	23.47	
5	QPSK	25	0	23.46	23.44	23.46	
5	16QAM	1	0	23.75	23.70	23.65	24.1
5	16QAM	1	12	23.73	23.73	23.75	
5	16QAM	1	24	23.70	23.72	23.72	
5	16QAM	12	0	22.50	22.52	22.51	23.1
5	16QAM	12	7	22.49	22.47	22.52	
5	16QAM	12	13	22.48	22.52	22.49	
5	16QAM	25	0	22.52	22.47	22.46	
5	64QAM	1	0	22.60	22.59	22.60	23.1
5	64QAM	1	12	22.61	22.64	22.66	
5	64QAM	1	24	22.65	22.70	22.66	
5	64QAM	12	0	21.54	21.54	21.54	22.1
5	64QAM	12	7	21.55	21.54	21.54	
5	64QAM	12	13	21.53	21.57	21.52	
5	64QAM	25	0	21.51	21.50	21.48	
Channel				23025	23095	23165	Tune-up limit (dBm)
Frequency (MHz)				700.5	707.5	714.5	
3	QPSK	1	0	23.82	23.77	23.79	25.1
3	QPSK	1	8	23.80	23.86	23.82	
3	QPSK	1	14	23.73	23.78	23.76	
3	QPSK	8	0	23.51	23.44	23.47	24.1
3	QPSK	8	4	23.48	23.50	23.49	
3	QPSK	8	7	23.42	23.49	23.47	
3	QPSK	15	0	23.49	23.42	23.45	24.1
3	16QAM	1	0	23.77	23.70	23.75	
3	16QAM	1	8	23.75	23.82	23.79	
3	16QAM	1	14	23.66	23.73	23.68	23.1
3	16QAM	8	0	22.55	22.53	22.51	
3	16QAM	8	4	22.55	22.61	22.57	
3	16QAM	8	7	22.53	22.55	22.53	
3	16QAM	15	0	22.54	22.49	22.46	23.1
3	64QAM	1	0	22.66	22.66	22.68	23.1
3	64QAM	1	8	22.71	22.70	22.69	
3	64QAM	1	14	22.64	22.66	22.61	
3	64QAM	8	0	21.58	21.52	21.54	22.1
3	64QAM	8	4	21.54	21.62	21.56	
3	64QAM	8	7	21.50	21.55	21.53	
3	64QAM	15	0	21.52	21.45	21.47	
Channel				23017	23095	23173	Tune-up limit (dBm)
Frequency (MHz)				699.7	707.5	715.3	
1.4	QPSK	1	0	23.73	23.69	23.71	25.1
1.4	QPSK	1	3	23.75	23.76	23.74	
1.4	QPSK	1	5	23.69	23.73	23.68	
1.4	QPSK	3	0	23.75	23.70	23.73	24.1
1.4	QPSK	3	1	23.78	23.75	23.77	
1.4	QPSK	3	3	23.69	23.73	23.70	
1.4	QPSK	6	0	23.40	23.43	23.40	24.1
1.4	16QAM	1	0	23.65	23.58	23.64	24.1
1.4	16QAM	1	3	23.69	23.71	23.71	
1.4	16QAM	1	5	23.61	23.64	23.60	
1.4	16QAM	3	0	23.43	23.41	23.41	23.1
1.4	16QAM	3	1	23.50	23.44	23.47	
1.4	16QAM	3	3	23.40	23.41	23.39	
1.4	16QAM	6	0	22.46	22.49	22.46	23.1
1.4	64QAM	1	0	22.57	22.53	22.57	
1.4	64QAM	1	3	22.61	22.65	22.62	23.1
1.4	64QAM	1	5	22.53	22.56	22.50	
1.4	64QAM	3	0	22.54	22.50	22.55	
1.4	64QAM	3	1	22.58	22.55	22.58	
1.4	64QAM	3	3	22.52	22.55	22.51	
1.4	64QAM	6	0	21.44	21.44	21.44	22.1



Band 13							
Ant 1							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				23230			
Frequency (MHz)				782			
10	QPSK	1	0	23.80			25.2
10	QPSK	1	25	23.47			
10	QPSK	1	49	23.51			
10	QPSK	25	0	22.58			24.2
10	QPSK	25	12	22.65			
10	QPSK	25	25	22.56			
10	QPSK	50	0	22.58			24.2
10	16QAM	1	0	22.75			
10	16QAM	1	25	22.82			
10	16QAM	1	49	22.78			23.2
10	16QAM	25	0	21.59			
10	16QAM	25	12	21.62			
10	16QAM	25	25	21.61			23.2
10	16QAM	50	0	21.57			
10	64QAM	1	0	23.07			
10	64QAM	1	25	23.04			23.2
10	64QAM	1	49	23.01			
10	64QAM	25	0	22.07			
10	64QAM	25	12	22.06			22.2
10	64QAM	25	25	22.02			
10	64QAM	50	0	22.04			
Channel				23206 23230 23255			Tune-up limit (dBm)
Frequency (MHz)				779.5 782 784.5			
5	QPSK	1	0	23.50	23.45	23.49	25.2
5	QPSK	1	12	23.45	23.54	23.52	
5	QPSK	1	24	23.50	23.51	23.52	
5	QPSK	12	0	22.63	22.56	22.61	24.2
5	QPSK	12	7	22.67	22.64	22.57	
5	QPSK	12	13	22.67	22.62	22.52	
5	QPSK	25	0	22.64	22.57	22.55	24.2
5	16QAM	1	0	22.71	22.71	22.78	
5	16QAM	1	12	22.78	22.85	22.79	
5	16QAM	1	24	22.82	22.85	22.72	23.2
5	16QAM	12	0	21.70	21.62	21.68	
5	16QAM	12	7	21.68	21.57	21.60	
5	16QAM	12	13	21.69	21.60	21.70	23.2
5	16QAM	25	0	21.63	21.64	21.54	
5	64QAM	1	0	22.14	22.25	22.17	
5	64QAM	1	12	22.26	22.30	22.21	23.2
5	64QAM	1	24	22.26	22.23	22.15	
5	64QAM	12	0	21.19	21.11	21.20	
5	64QAM	12	7	21.24	21.14	21.08	22.2
5	64QAM	12	13	21.15	21.17	21.08	
5	64QAM	25	0	21.21	21.11	21.10	



Band 14							
Ant 1							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				23330	23330	23330	
Frequency (MHz)				793	793	793	
10	QPSK	1	0	23.99			24.9
10	QPSK	1	25	23.82			
10	QPSK	1	49	23.76			
10	QPSK	25	0	23.69			23.9
10	QPSK	25	12	23.69			
10	QPSK	25	25	23.76			
10	QPSK	50	0	23.68			23.9
10	16QAM	1	0	23.82			
10	16QAM	1	25	23.85			
10	16QAM	1	49	23.85			22.9
10	16QAM	25	0	22.70			
10	16QAM	25	12	22.70			
10	16QAM	25	25	22.72			22.9
10	16QAM	50	0	22.71			
10	64QAM	1	0	22.84			
10	64QAM	1	25	22.80			22.9
10	64QAM	1	49	22.88			
10	64QAM	25	0	21.73			
10	64QAM	25	12	21.72			21.9
10	64QAM	25	25	21.76			
10	64QAM	50	0	21.72			
Channel				23306	23330	23356	Tune-up limit (dBm)
Frequency (MHz)				790.5	793	795.5	
5	QPSK	1	0	23.76	23.70	23.70	24.9
5	QPSK	1	12	23.81	23.79	23.83	
5	QPSK	1	24	23.77	23.74	23.70	
5	QPSK	12	0	23.67	23.62	23.56	23.9
5	QPSK	12	7	23.68	23.66	23.63	
5	QPSK	12	13	23.63	23.66	23.58	
5	QPSK	25	0	23.63	23.57	23.54	23.9
5	16QAM	1	0	23.90	23.83	23.80	
5	16QAM	1	12	23.90	23.90	23.89	
5	16QAM	1	24	23.86	23.86	23.82	22.9
5	16QAM	12	0	22.70	22.63	22.59	
5	16QAM	12	7	22.71	22.65	22.68	
5	16QAM	12	13	22.68	22.64	22.63	22.9
5	16QAM	25	0	22.70	22.59	22.57	
5	64QAM	1	0	22.80	22.76	22.77	
5	64QAM	1	12	22.86	22.87	22.85	22.9
5	64QAM	1	24	22.88	22.83	22.78	
5	64QAM	12	0	21.75	21.68	21.65	
5	64QAM	12	7	21.76	21.69	21.71	21.9
5	64QAM	12	13	21.71	21.69	21.67	
5	64QAM	25	0	21.67	21.61	21.58	



Band 17							
Ant 1							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				23780	23790	23800	
Frequency (MHz)				709	710	711	
10	QPSK	1	0	23.74	23.72	23.73	25.1
10	QPSK	1	25	23.78	23.79	23.78	
10	QPSK	1	49	23.81	23.82	23.82	
10	QPSK	25	0	23.42	23.44	23.42	24.1
10	QPSK	25	12	23.57	23.59	23.59	
10	QPSK	25	25	23.59	23.60	23.59	
10	QPSK	50	0	23.57	23.47	23.47	24.1
10	16QAM	1	0	23.71	23.69	23.71	
10	16QAM	1	25	23.79	23.81	23.80	
10	16QAM	1	49	23.88	23.88	23.82	23.1
10	16QAM	25	0	22.43	22.45	22.46	
10	16QAM	25	12	22.58	22.51	22.60	
10	16QAM	25	25	22.63	22.54	22.56	23.1
10	16QAM	50	0	22.54	22.48	22.44	
10	64QAM	1	0	22.55	22.56	22.57	
10	64QAM	1	25	22.71	22.71	22.71	23.1
10	64QAM	1	49	22.76	22.79	22.73	
10	64QAM	25	0	21.48	21.48	21.48	
10	64QAM	25	12	21.64	21.56	21.63	22.1
10	64QAM	25	25	21.61	21.64	21.63	
10	64QAM	50	0	21.60	21.54	21.54	
Channel				23765	23790	23825	Tune-up limit (dBm)
Frequency (MHz)				706.5	710	713.5	
5	QPSK	1	0	23.75	23.74	23.77	25.1
5	QPSK	1	12	23.85	23.86	23.87	
5	QPSK	1	24	23.89	23.89	23.90	
5	QPSK	12	0	23.46	23.46	23.48	24.1
5	QPSK	12	7	23.53	23.59	23.53	
5	QPSK	12	13	23.52	23.54	23.55	
5	QPSK	25	0	23.51	23.51	23.53	24.1
5	16QAM	1	0	23.71	23.68	23.68	
5	16QAM	1	12	23.74	23.75	23.77	
5	16QAM	1	24	23.80	23.81	23.82	23.1
5	16QAM	12	0	22.50	22.51	22.52	
5	16QAM	12	7	22.55	22.57	22.56	
5	16QAM	12	13	22.54	22.59	22.58	23.1
5	16QAM	25	0	22.54	22.49	22.51	
5	64QAM	1	0	22.63	22.61	22.65	
5	64QAM	1	12	22.66	22.69	22.69	23.1
5	64QAM	1	24	22.73	22.76	22.74	
5	64QAM	12	0	21.52	21.56	21.55	
5	64QAM	12	7	21.63	21.65	21.57	22.1
5	64QAM	12	13	21.59	21.65	21.63	
5	64QAM	25	0	21.55	21.53	21.57	



Band 25							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				26140	26340	26590	
Frequency (MHz)				1860	1880	1905	
20	QPSK	1	0	24.37	24.11	23.99	25.7
20	QPSK	1	49	24.17	24.10	24.01	
20	QPSK	1	99	24.09	24.05	23.83	
20	QPSK	50	0	23.28	23.27	23.08	24.7
20	QPSK	50	24	23.33	23.30	23.12	
20	QPSK	50	50	23.27	23.29	23.14	
20	QPSK	100	0	23.28	23.29	23.17	24.7
20	16QAM	1	0	23.53	23.42	23.39	
20	16QAM	1	49	23.52	23.45	23.38	
20	16QAM	1	99	23.42	23.47	23.21	23.7
20	16QAM	50	0	22.25	22.27	22.14	
20	16QAM	50	24	22.33	22.33	22.11	
20	16QAM	50	50	22.28	22.24	22.22	23.7
20	16QAM	100	0	22.28	22.27	22.13	
20	64QAM	1	0	22.41	22.30	22.21	
20	64QAM	1	49	22.31	22.32	21.92	23.7
20	64QAM	1	99	22.39	22.38	21.70	
20	64QAM	50	0	21.29	21.27	20.87	
20	64QAM	50	24	21.33	21.30	20.90	22.7
20	64QAM	50	50	21.35	21.35	20.70	
20	64QAM	100	0	21.29	21.35	20.71	
Channel				28115	28340	28615	Tune-up limit (dBm)
Frequency (MHz)				1857.5	1880	1907.5	
15	QPSK	1	0	24.24	24.13	24.06	25.7
15	QPSK	1	37	24.11	24.17	24.07	
15	QPSK	1	74	24.19	24.20	23.81	
15	QPSK	36	0	23.36	23.25	23.15	24.7
15	QPSK	36	20	23.38	23.38	23.14	
15	QPSK	36	39	23.27	23.27	23.17	
15	QPSK	75	0	23.32	23.26	23.15	24.7
15	16QAM	1	0	23.46	23.50	23.39	
15	16QAM	1	37	23.44	23.50	23.30	
15	16QAM	1	74	23.42	23.50	23.19	23.7
15	16QAM	36	0	22.34	22.29	22.14	
15	16QAM	36	20	22.32	22.29	22.20	
15	16QAM	36	39	22.32	22.27	22.14	23.7
15	16QAM	75	0	22.27	22.28	22.24	
15	64QAM	1	0	22.42	22.33	21.77	
15	64QAM	1	37	22.35	22.38	21.86	23.7
15	64QAM	1	74	22.33	22.45	21.71	
15	64QAM	36	0	21.39	21.25	20.88	
15	64QAM	36	20	21.36	21.30	20.96	22.7
15	64QAM	36	39	21.33	21.28	20.71	
15	64QAM	75	0	21.33	21.34	20.70	
Channel				26090	26340	26640	Tune-up limit (dBm)
Frequency (MHz)				1855	1880	1910	
10	QPSK	1	0	24.16	24.13	24.06	25.7
10	QPSK	1	25	24.18	24.14	24.06	
10	QPSK	1	49	24.22	24.21	23.78	
10	QPSK	25	0	23.35	23.33	23.04	24.7
10	QPSK	25	12	23.32	23.27	23.25	
10	QPSK	25	25	23.28	23.32	23.17	
10	QPSK	50	0	23.29	23.26	23.18	24.7
10	16QAM	1	0	23.60	23.57	23.34	
10	16QAM	1	25	23.54	23.53	23.43	
10	16QAM	1	49	23.58	23.54	23.19	23.7
10	16QAM	25	0	22.31	22.28	22.05	
10	16QAM	25	12	22.33	22.29	22.16	
10	16QAM	25	25	22.35	22.27	22.12	23.7
10	16QAM	50	0	22.35	22.28	22.09	
10	64QAM	1	0	22.54	22.39	22.01	
10	64QAM	1	25	22.52	22.42	21.87	23.7
10	64QAM	1	49	22.41	22.48	21.75	
10	64QAM	25	0	21.31	21.33	20.78	
10	64QAM	25	12	21.42	21.36	20.85	22.7
10	64QAM	25	25	21.40	21.37	20.64	
10	64QAM	50	0	21.33	21.40	20.52	
Channel				26055	26340	26655	Tune-up limit (dBm)
Frequency (MHz)				1852.5	1880	1912.5	
5	QPSK	1	0	24.26	24.17	24.08	25.7
5	QPSK	1	12	24.23	24.21	24.04	
5	QPSK	1	24	24.29	24.19	23.74	
5	QPSK	12	0	23.23	23.22	23.18	24.7
5	QPSK	12	7	23.32	23.29	23.20	
5	QPSK	12	13	23.34	23.34	23.00	
5	QPSK	25	0	23.30	23.30	23.10	24.7
5	16QAM	1	0	23.57	23.48	23.36	
5	16QAM	1	12	23.60	23.55	23.41	
5	16QAM	1	24	23.60	23.55	23.14	23.7
5	16QAM	12	0	22.27	22.26	22.14	
5	16QAM	12	7	22.37	22.30	22.21	
5	16QAM	12	13	22.42	22.39	22.17	23.7
5	16QAM	25	0	22.36	22.28	22.13	
5	64QAM	1	0	22.42	22.44	21.76	
5	64QAM	1	12	22.41	22.39	21.78	23.7
5	64QAM	1	24	22.53	22.43	21.73	
5	64QAM	12	0	21.37	21.38	20.72	
5	64QAM	12	7	21.42	21.35	20.55	22.7
5	64QAM	12	13	21.42	21.34	20.38	
5	64QAM	25	0	21.29	21.32	20.45	
Channel				26055	26340	26675	Tune-up limit (dBm)
Frequency (MHz)				1851.5	1880	1913.5	
3	QPSK	1	0	24.15	24.03	24.06	25.7
3	QPSK	1	8	24.29	24.32	23.94	
3	QPSK	1	14	24.31	24.28	23.76	
3	QPSK	8	0	23.29	23.22	23.13	24.7
3	QPSK	8	4	23.31	23.33	23.06	
3	QPSK	8	7	23.31	23.37	22.84	
3	QPSK	15	0	23.28	23.32	22.90	24.7
3	16QAM	1	0	23.48	23.44	23.28	
3	16QAM	1	8	23.65	23.61	23.22	
3	16QAM	1	14	23.57	23.60	22.97	23.7
3	16QAM	8	0	22.29	22.31	22.20	
3	16QAM	8	4	22.41	22.31	22.13	
3	16QAM	8	7	22.34	22.42	22.10	23.7
3	16QAM	15	0	22.35	22.31	22.09	
3	64QAM	1	0	22.36	22.26	21.77	
3	64QAM	1	8	22.49	22.52	21.79	23.7
3	64QAM	1	14	22.57	22.51	21.75	
3	64QAM	8	0	21.29	21.29	21.66	
3	64QAM	8	4	21.41	21.39	20.42	22.7
3	64QAM	8	7	21.47	21.37	20.21	
3	64QAM	15	0	21.39	21.36	20.34	
Channel				26047	26340	26683	Tune-up limit (dBm)
Frequency (MHz)				1850.7	1880	1914.3	
1.4	QPSK	1	0	24.13	24.06	23.93	25.7
1.4	QPSK	1	3	24.16	24.35	23.79	
1.4	QPSK	1	5	24.34	24.22	23.73	
1.4	QPSK	3	0	24.22	24.20	23.75	24.7
1.4	QPSK	3	1	24.29	24.30	23.75	
1.4	QPSK	3	3	24.24	24.17	23.74	
1.4	QPSK	6	0	23.28	23.21	22.91	24.7
1.4	16QAM	1	0	23.55	23.46	23.10	
1.4	16QAM	1	3	23.58	23.49	23.18	
1.4	16QAM	1	5	23.52	23.46	22.88	24.7
1.4	16QAM	3	0	23.31	23.28	22.98	
1.4	16QAM	3	1	23.36	23.25	22.91	
1.4	16QAM	3	3	23.38	23.25	22.81	23.7
1.4	16QAM	6	0	22.28	22.41	22.00	
1.4	64QAM	1	0	22.36	22.44	21.74	
1.4	64QAM	1	3	22.51	22.58	21.78	23.7
1.4	64QAM	1	5	22.58	22.33	21.72	
1.4	64QAM	3	0	22.40	22.41	21.75	
1.4	64QAM	3	1	22.50	22.44	21.77	23.7
1.4	64QAM	3	3	22.38	22.43	21.70	
1.4	64QAM	6	0	21.23	21.35	20.78	



Band 26							
Ant 1							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				26765	26865	26965	
Frequency (MHz)				821.5	831.5	841.5	
15	QPSK	1	0	22.76	22.65	22.66	23.8
15	QPSK	1	37	22.68	22.65	22.61	
15	QPSK	1	74	22.63	22.63	22.80	
15	QPSK	36	0	22.80	22.75	22.75	23.8
15	QPSK	36	20	22.86	22.80	22.74	
15	QPSK	36	39	22.77	22.77	22.73	
15	QPSK	75	0	22.84	22.82	22.73	23.8
15	16QAM	1	0	23.29	22.97	23.03	
15	16QAM	1	37	22.96	22.97	22.98	
15	16QAM	1	74	22.94	22.95	22.83	23.3
15	16QAM	36	0	22.73	22.70	22.70	
15	16QAM	36	20	22.74	22.70	22.62	
15	16QAM	36	39	22.68	22.68	22.65	23.3
15	16QAM	75	0	22.75	22.72	22.68	
15	64QAM	1	0	22.82	22.71	22.71	
15	64QAM	1	37	22.78	22.78	22.78	23.3
15	64QAM	1	74	22.74	22.72	22.43	
15	64QAM	36	0	21.51	21.72	21.72	
15	64QAM	36	20	21.78	21.79	21.68	22.3
15	64QAM	36	39	21.74	21.72	21.72	
15	64QAM	75	0	21.75	21.72	21.67	
Channel				26740	26855	26950	Tune-up limit (dBm)
Frequency (MHz)				819	831.5	844	
10	QPSK	1	0	22.81	22.76	22.80	23.8
10	QPSK	1	25	22.68	22.70	22.70	
10	QPSK	1	49	22.65	22.68	22.82	
10	QPSK	25	0	22.89	22.80	22.81	23.8
10	QPSK	25	12	22.84	22.78	22.81	
10	QPSK	25	25	22.77	22.78	22.77	
10	QPSK	50	0	22.82	22.84	22.74	23.8
10	16QAM	1	0	23.17	23.08	23.11	
10	16QAM	1	25	23.10	23.06	23.07	
10	16QAM	1	49	23.05	23.01	22.96	23.3
10	16QAM	25	0	22.78	22.66	22.66	
10	16QAM	25	12	22.78	22.65	22.65	
10	16QAM	25	25	22.66	22.67	22.62	23.3
10	16QAM	50	0	22.75	22.71	22.66	
10	64QAM	1	0	22.97	22.84	22.90	
10	64QAM	1	25	22.74	22.92	22.92	23.3
10	64QAM	1	49	22.86	22.84	22.83	
10	64QAM	25	0	21.50	21.69	21.70	
10	64QAM	25	12	21.50	21.69	21.74	22.3
10	64QAM	25	25	21.70	21.72	21.48	
10	64QAM	50	0	21.66	21.75	21.69	
Channel				26715	26865	27015	Tune-up limit (dBm)
Frequency (MHz)				616.5	631.5	646.5	
5	QPSK	1	0	22.85	22.71	22.75	23.8
5	QPSK	1	12	22.78	22.78	22.76	
5	QPSK	1	24	22.70	22.74	22.82	
5	QPSK	12	0	22.92	22.80	22.84	23.8
5	QPSK	12	7	22.89	22.86	22.79	
5	QPSK	12	13	22.81	22.78	22.73	
5	QPSK	25	0	22.88	22.84	22.79	23.8
5	16QAM	1	0	23.21	23.01	23.05	
5	16QAM	1	12	23.14	23.04	23.00	
5	16QAM	1	24	23.06	23.07	22.93	23.3
5	16QAM	12	0	22.84	22.68	22.70	
5	16QAM	12	7	22.84	22.71	22.73	
5	16QAM	12	13	22.75	22.66	22.62	23.3
5	16QAM	25	0	22.80	22.75	22.68	
5	64QAM	1	0	22.77	22.84	22.75	
5	64QAM	1	12	22.59	22.85	22.11	23.3
5	64QAM	1	24	22.45	22.87	22.44	
5	64QAM	12	0	21.70	21.77	21.30	
5	64QAM	12	7	21.59	21.80	21.12	22.3
5	64QAM	12	13	21.43	21.72	21.28	
5	64QAM	25	0	21.49	21.70	21.23	
Channel				26705	26855	27025	Tune-up limit (dBm)
Frequency (MHz)				815.5	831.5	847.5	
3	QPSK	1	0	22.87	22.72	22.72	23.8
3	QPSK	1	8	22.84	22.78	22.71	
3	QPSK	1	14	22.72	22.76	22.64	
3	QPSK	8	0	22.92	22.83	22.76	23.8
3	QPSK	8	4	22.89	22.86	22.78	
3	QPSK	8	7	22.86	22.80	22.71	
3	QPSK	15	0	22.89	22.85	22.75	23.8
3	16QAM	1	0	23.22	23.00	23.03	
3	16QAM	1	8	23.20	23.09	23.05	
3	16QAM	1	14	23.07	23.05	22.96	23.3
3	16QAM	8	0	22.88	22.76	22.75	
3	16QAM	8	4	22.88	22.79	22.70	
3	16QAM	8	7	22.84	22.75	22.64	23.3
3	16QAM	15	0	22.83	22.72	22.70	
3	64QAM	1	0	22.80	22.83	22.28	
3	64QAM	1	8	22.83	22.92	22.34	23.3
3	64QAM	1	14	22.98	22.86	22.48	
3	64QAM	8	0	21.77	21.75	21.10	
3	64QAM	8	4	21.76	21.83	21.27	22.3
3	64QAM	8	7	21.64	21.75	21.48	
3	64QAM	15	0	21.68	21.78	21.33	
Channel				26697	26865	27033	Tune-up limit (dBm)
Frequency (MHz)				814.7	831.5	848.3	
1.4	QPSK	1	0	22.74	22.62	22.61	23.8
1.4	QPSK	1	3	22.62	22.71	22.62	
1.4	QPSK	1	5	22.74	22.65	22.62	
1.4	QPSK	3	0	22.80	22.66	22.61	23.8
1.4	QPSK	3	1	22.80	22.70	22.62	
1.4	QPSK	3	3	22.75	22.89	22.68	
1.4	QPSK	6	0	22.84	22.76	22.67	23.8
1.4	16QAM	1	0	23.12	22.90	22.91	
1.4	16QAM	1	3	23.17	23.04	22.95	
1.4	16QAM	1	5	23.02	22.93	22.80	23.8
1.4	16QAM	3	0	22.91	22.72	22.68	
1.4	16QAM	3	1	22.92	22.76	22.73	
1.4	16QAM	3	3	22.82	22.73	22.63	23.3
1.4	16QAM	6	0	22.82	22.70	22.62	
1.4	64QAM	1	0	22.93	22.77	22.51	
1.4	64QAM	1	3	22.86	22.85	22.68	23.3
1.4	64QAM	1	5	22.80	22.73	22.64	
1.4	64QAM	3	0	22.85	22.73	22.52	
1.4	64QAM	3	1	22.92	22.77	22.67	23.3
1.4	64QAM	3	3	22.79	22.74	22.66	
1.4	64QAM	6	0	21.78	21.66	21.58	



Band 30							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				27710			
Frequency (MHz)				2310			
10	QPSK	1	0	22.60			23.7
10	QPSK	1	25	22.56			
10	QPSK	1	49	22.57			
10	QPSK	25	0	21.40			22.7
10	QPSK	25	12	21.64			
10	QPSK	25	25	21.51			
10	QPSK	50	0	21.63			22.7
10	16QAM	1	0	21.91			
10	16QAM	1	25	21.92			
10	16QAM	1	49	21.84			21.7
10	16QAM	25	0	20.46			
10	16QAM	25	12	20.53			
10	16QAM	25	25	20.45			21.7
10	16QAM	50	0	20.55			
10	64QAM	1	0	20.66			
10	64QAM	1	25	20.70			21.7
10	64QAM	1	49	20.62			
10	64QAM	25	0	19.46			
10	64QAM	25	12	19.81			20.7
10	64QAM	25	25	19.67			
10	64QAM	50	0	19.60			
Channel				27335			
Frequency (MHz)				2307.5			
5	QPSK	1	0	22.40	22.33	22.46	23.7
5	QPSK	1	12	22.50	22.59	22.53	
5	QPSK	1	24	22.58	22.42	22.56	
5	QPSK	12	0	21.52	21.63	21.49	22.7
5	QPSK	12	7	21.56	21.57	21.60	
5	QPSK	12	13	21.55	21.61	21.44	
5	QPSK	25	0	21.68	21.45	21.51	22.7
5	16QAM	1	0	21.71	21.78	21.72	
5	16QAM	1	12	21.80	21.73	21.86	
5	16QAM	1	24	22.01	21.70	21.78	21.7
5	16QAM	12	0	20.58	20.56	20.55	
5	16QAM	12	7	20.71	20.64	20.67	
5	16QAM	12	13	20.59	20.54	20.63	21.7
5	16QAM	25	0	20.66	20.60	20.51	
5	64QAM	1	0	20.71	20.69	20.64	
5	64QAM	1	12	20.68	20.73	20.64	21.7
5	64QAM	1	24	20.65	20.63	20.70	
5	64QAM	12	0	19.64	19.66	19.68	
5	64QAM	12	7	19.70	19.57	19.60	20.7
5	64QAM	12	13	19.73	19.66	19.69	
5	64QAM	25	0	19.73	19.66	19.62	



Band 66							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				132072	132322	132572	
Frequency (MHz)				1720	1745	1770	
20	QPSK	1	0	24.30	24.23	24.29	25.7
20	QPSK	1	49	24.09	24.16	24.12	
20	QPSK	1	99	24.24	24.20	24.16	
20	QPSK	50	0	23.14	23.07	23.15	24.7
20	QPSK	50	24	23.18	22.94	23.14	
20	QPSK	50	50	23.21	23.00	23.03	
20	QPSK	100	0	23.14	23.16	23.11	24.7
20	16QAM	1	0	23.42	23.47	23.37	
20	16QAM	1	49	23.34	23.24	23.20	
20	16QAM	1	99	23.33	23.34	23.10	23.7
20	16QAM	50	0	22.13	21.98	22.08	
20	16QAM	50	24	22.19	21.98	22.18	
20	16QAM	50	50	22.17	22.04	22.12	23.7
20	16QAM	100	0	22.18	22.06	22.23	
20	64QAM	1	0	22.36	22.29	22.16	
20	64QAM	1	49	22.09	22.08	22.17	23.7
20	64QAM	1	99	22.31	22.25	22.10	
20	64QAM	50	0	21.13	21.16	21.03	
20	64QAM	50	24	21.28	21.17	21.23	22.7
20	64QAM	50	50	21.14	21.10	21.14	
20	64QAM	100	0	21.14	21.10	21.14	
Channel				132047	132322	132597	Tune-up limit (dBm)
Frequency (MHz)				1717.5	1745	1772.5	
15	QPSK	1	0	24.18	23.94	24.08	25.7
15	QPSK	1	37	23.89	23.88	23.85	
15	QPSK	1	74	24.10	24.10	23.90	
15	QPSK	36	0	23.05	23.14	23.03	24.7
15	QPSK	36	20	23.09	23.15	23.05	
15	QPSK	36	39	23.19	23.16	23.01	
15	QPSK	75	0	23.06	23.10	23.01	24.7
15	16QAM	1	0	23.38	23.35	23.32	
15	16QAM	1	37	23.28	23.30	23.22	
15	16QAM	1	74	23.40	23.34	23.17	23.7
15	16QAM	36	0	22.03	22.04	21.98	
15	16QAM	36	20	22.28	22.03	22.08	
15	16QAM	36	39	22.18	22.01	22.20	23.7
15	16QAM	75	0	22.08	22.23	21.94	
15	64QAM	1	0	22.32	22.16	22.18	
15	64QAM	1	37	22.13	22.17	22.07	23.7
15	64QAM	1	74	22.25	22.20	22.21	
15	64QAM	36	0	21.01	21.05	21.11	
15	64QAM	36	20	21.06	21.19	21.05	22.7
15	64QAM	36	39	21.16	21.05	21.09	
15	64QAM	75	0	21.19	21.16	21.06	
Channel				132022	132322	132622	Tune-up limit (dBm)
Frequency (MHz)				1715	1745	1775	
10	QPSK	1	0	24.11	24.02	24.01	25.7
10	QPSK	1	25	24.01	23.94	24.10	
10	QPSK	1	49	24.07	23.97	24.06	
10	QPSK	25	0	23.22	23.02	23.12	24.7
10	QPSK	25	12	23.19	23.15	23.12	
10	QPSK	25	25	23.24	23.22	23.21	
10	QPSK	50	0	23.25	23.23	23.16	24.7
10	16QAM	1	0	23.42	23.36	23.38	
10	16QAM	1	25	23.46	23.36	23.37	
10	16QAM	1	49	23.38	23.45	23.49	23.7
10	16QAM	25	0	22.24	22.00	22.16	
10	16QAM	25	12	22.31	22.25	22.08	
10	16QAM	25	25	22.14	22.10	22.08	23.7
10	16QAM	50	0	22.23	22.25	22.09	
10	64QAM	1	0	22.28	22.20	22.25	
10	64QAM	1	25	22.32	22.28	22.40	23.7
10	64QAM	1	49	22.40	22.41	22.24	
10	64QAM	25	0	21.15	21.09	21.10	
10	64QAM	25	12	21.29	21.12	21.10	22.7
10	64QAM	25	25	21.24	21.22	21.21	
10	64QAM	50	0	21.19	21.25	21.18	
Channel				131997	132322	132647	Tune-up limit (dBm)
Frequency (MHz)				1712.5	1745	1777.5	
5	QPSK	1	0	24.08	24.07	24.01	25.7
5	QPSK	1	12	24.22	24.06	24.12	
5	QPSK	1	24	24.15	24.17	24.01	
5	QPSK	12	0	23.15	23.10	23.13	24.7
5	QPSK	12	7	23.11	23.27	23.24	
5	QPSK	12	13	23.29	23.19	23.27	
5	QPSK	25	0	23.13	23.20	23.14	24.7
5	16QAM	1	0	23.51	23.45	23.47	
5	16QAM	1	12	23.59	23.49	23.41	
5	16QAM	1	24	23.47	23.46	23.30	23.7
5	16QAM	12	0	22.30	22.11	22.26	
5	16QAM	12	7	22.29	22.28	22.26	
5	16QAM	12	13	22.18	22.28	22.25	23.7
5	16QAM	25	0	22.21	22.09	22.27	
5	64QAM	1	0	22.40	22.30	22.30	
5	64QAM	1	12	22.47	22.38	22.33	23.7
5	64QAM	1	24	22.42	22.35	22.32	
5	64QAM	12	0	21.39	21.26	21.33	
5	64QAM	12	7	21.19	21.19	21.33	22.7
5	64QAM	12	13	21.24	21.27	21.30	
5	64QAM	25	0	21.16	21.25	21.08	
Channel				131987	132322	132657	Tune-up limit (dBm)
Frequency (MHz)				1711.5	1745	1776.5	
3	QPSK	1	0	24.06	24.06	24.00	25.7
3	QPSK	1	8	24.25	24.06	24.07	
3	QPSK	1	14	24.05	24.10	24.03	
3	QPSK	8	0	23.18	23.09	23.20	24.7
3	QPSK	8	4	23.21	23.21	23.13	
3	QPSK	8	7	23.18	23.10	23.05	
3	16QAM	1	0	23.12	23.22	23.17	24.7
3	16QAM	1	8	23.51	23.27	23.27	
3	16QAM	1	8	23.50	23.58	23.48	
3	16QAM	1	14	23.41	23.39	23.44	23.7
3	16QAM	8	0	22.20	22.29	22.27	
3	16QAM	8	4	22.39	22.27	22.24	
3	16QAM	8	7	22.24	22.12	22.11	23.7
3	16QAM	15	0	22.25	22.16	22.27	
3	64QAM	1	0	22.32	22.37	22.38	
3	64QAM	1	8	22.51	22.33	22.42	23.7
3	64QAM	1	14	22.47	22.29	22.31	
3	64QAM	8	0	21.36	21.20	21.26	
3	64QAM	8	4	21.25	21.16	21.20	22.7
3	64QAM	8	7	21.20	21.32	21.16	
3	64QAM	15	0	21.18	21.17	21.27	
Channel				131979	132322	132655	Tune-up limit (dBm)
Frequency (MHz)				1710.7	1745	1779.3	
1.4	QPSK	1	0	24.01	24.08	23.94	25.7
1.4	QPSK	1	3	24.15	23.99	24.13	
1.4	QPSK	1	5	23.95	23.98	23.92	
1.4	QPSK	3	0	24.16	23.99	24.11	24.7
1.4	QPSK	3	1	24.08	24.06	24.13	
1.4	QPSK	3	3	23.98	24.03	24.03	
1.4	QPSK	6	0	23.18	23.00	23.09	24.7
1.4	16QAM	1	0	23.42	23.24	23.22	
1.4	16QAM	1	3	23.42	23.46	23.43	
1.4	16QAM	1	5	23.33	23.35	23.22	24.7
1.4	16QAM	3	0	23.19	23.17	23.10	
1.4	16QAM	3	1	23.20	23.06	23.07	
1.4	16QAM	3	3	23.11	23.09	23.01	23.7
1.4	16QAM	6	0	22.24	22.15	22.08	
1.4	64QAM	1	0	22.39	22.20	22.35	
1.4	64QAM	1	3	22.41	22.31	22.32	23.7
1.4	64QAM	1	5	22.39	22.29	22.32	
1.4	64QAM	3	0	22.19	22.20	22.22	
1.4	64QAM	3	1	22.40	22.38	22.37	23.7
1.4	64QAM	3	3	22.36	22.12	22.21	
1.4	64QAM	6	0	21.27	21.06	21.17	



Band 71							
Ant 1							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				133222	133322	133372	
Frequency (MHz)				673	683	688	
20	QPSK	1	0	24.35	24.17	24.20	25.7
20	QPSK	1	49	24.15	24.16	24.15	
20	QPSK	1	99	24.12	24.09	24.08	
20	QPSK	50	0	23.28	23.24	23.26	24.7
20	QPSK	50	24	23.33	23.28	23.17	
20	QPSK	50	50	23.32	23.27	23.27	
20	QPSK	100	0	23.33	23.32	23.28	24.7
20	16QAM	1	0	23.68	23.52	23.53	
20	16QAM	1	49	23.58	23.54	23.49	
20	16QAM	1	99	23.49	23.49	23.45	23.7
20	16QAM	50	0	22.34	22.30	22.30	
20	16QAM	50	24	22.34	22.27	22.24	
20	16QAM	50	50	22.30	22.25	22.28	23.7
20	16QAM	100	0	22.32	22.30	22.26	
20	64QAM	1	0	22.18	22.70	23.01	
20	64QAM	1	49	22.76	22.59	22.38	23.7
20	64QAM	1	99	23.01	22.51	22.88	
20	64QAM	50	0	20.82	21.86	21.50	
20	64QAM	50	24	21.49	21.70	21.76	22.7
20	64QAM	50	50	21.96	21.50	21.85	
20	64QAM	100	0	21.50	21.89	21.87	
Channel				133197	133287	133387	Tune-up limit (dBm)
Frequency (MHz)				670.5	680.5	690.5	
15	QPSK	1	0	24.33	24.17	24.13	25.7
15	QPSK	1	37	24.01	24.14	24.11	
15	QPSK	1	74	24.16	24.11	24.11	
15	QPSK	36	0	23.24	23.26	23.27	24.7
15	QPSK	36	20	23.29	23.26	23.37	
15	QPSK	36	39	23.31	23.33	23.26	
15	QPSK	75	0	23.34	23.30	23.20	24.7
15	16QAM	1	0	23.56	23.53	23.49	
15	16QAM	1	37	23.28	23.50	23.41	
15	16QAM	1	74	23.38	23.43	23.38	23.7
15	16QAM	36	0	22.15	22.31	22.26	
15	16QAM	36	20	22.31	22.25	22.34	
15	16QAM	36	39	22.38	22.33	22.28	23.7
15	16QAM	75	0	22.37	22.19	22.18	
15	64QAM	1	0	22.13	22.80	22.90	
15	64QAM	1	37	21.73	23.04	23.04	23.7
15	64QAM	1	74	22.53	22.63	22.97	
15	64QAM	36	0	20.81	21.92	21.51	
15	64QAM	36	20	20.88	21.74	21.92	22.7
15	64QAM	36	39	21.49	21.44	21.86	
15	64QAM	75	0	21.38	21.79	21.77	
Channel				133172	133272	133422	Tune-up limit (dBm)
Frequency (MHz)				668	678	683	
10	QPSK	1	0	24.30	24.14	24.17	25.7
10	QPSK	1	25	24.11	24.10	24.12	
10	QPSK	1	49	24.13	24.14	24.01	
10	QPSK	25	0	23.36	23.26	23.22	24.7
10	QPSK	25	12	23.13	23.25	23.22	
10	QPSK	25	25	23.19	23.31	23.23	
10	QPSK	50	0	23.29	23.18	23.16	24.7
10	16QAM	1	0	23.62	23.47	23.53	
10	16QAM	1	25	23.47	23.51	23.45	
10	16QAM	1	49	23.46	23.44	23.39	23.7
10	16QAM	25	0	22.05	22.17	22.16	
10	16QAM	25	12	22.07	22.24	22.20	
10	16QAM	25	25	22.00	22.24	22.19	23.7
10	16QAM	50	0	22.28	22.17	22.22	
10	64QAM	1	0	21.83	22.96	22.99	
10	64QAM	1	25	21.88	23.08	23.07	23.7
10	64QAM	1	49	22.12	22.23	22.55	
10	64QAM	25	0	20.70	21.87	21.82	
10	64QAM	25	12	20.70	21.74	21.85	22.7
10	64QAM	25	25	20.68	21.37	21.72	
10	64QAM	50	0	20.79	21.60	21.80	
Channel				133147	133247	133447	Tune-up limit (dBm)
Frequency (MHz)				665.5	675.5	685.5	
5	QPSK	1	0	24.03	24.23	24.23	25.7
5	QPSK	1	12	24.13	24.24	24.12	
5	QPSK	1	24	24.11	24.10	24.10	
5	QPSK	12	0	23.15	23.26	23.19	24.7
5	QPSK	12	7	23.15	23.32	23.26	
5	QPSK	12	13	23.13	23.22	23.16	
5	QPSK	25	0	23.15	23.26	23.20	24.7
5	16QAM	1	0	23.29	23.53	23.52	
5	16QAM	1	12	23.38	23.54	23.50	
5	16QAM	1	24	23.40	23.49	23.42	23.7
5	16QAM	12	0	22.04	22.36	22.29	
5	16QAM	12	7	22.12	22.30	22.29	
5	16QAM	12	13	22.25	22.25	22.21	23.7
5	16QAM	25	0	22.06	22.21	22.22	
5	64QAM	1	0	21.70	22.98	23.00	
5	64QAM	1	12	21.82	22.93	22.81	23.7
5	64QAM	1	24	22.03	22.71	22.37	
5	64QAM	12	0	20.74	21.93	21.85	
5	64QAM	12	7	20.91	21.89	21.91	22.7
5	64QAM	12	13	20.87	21.70	21.89	
5	64QAM	25	0	20.69	21.73	21.61	



Band 2							
Ant 2							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch.	Power Mid Ch.	Power High Ch.	Tune-up limit (dbm)
Channel				18700	18900	19100	
Frequency (MHz)				1860	1880	1900	
20	QPSK	1	0	22.34	22.34	22.37	23.8
20	QPSK	1	49	22.32	22.38	22.32	
20	QPSK	1	99	22.34	22.39	22.35	
20	QPSK	50	0	22.38	22.44	22.47	23.8
20	QPSK	50	24	22.47	22.49	22.49	
20	QPSK	50	50	22.47	22.50	22.51	
20	QPSK	100	0	22.50	22.47	22.50	23.8
20	16QAM	1	0	22.59	22.69	22.69	
20	16QAM	1	49	22.63	22.76	22.83	
20	16QAM	1	99	22.65	22.68	22.64	23.7
20	16QAM	50	0	22.25	22.33	22.38	
20	16QAM	50	24	22.35	22.37	22.40	
20	16QAM	50	50	22.38	22.40	22.41	23.7
20	16QAM	100	0	22.35	22.35	22.40	
20	64QAM	1	0	22.35	22.46	22.51	
20	64QAM	1	49	22.39	22.52	22.35	23.7
20	64QAM	1	99	22.43	22.47	22.42	
20	64QAM	50	0	21.26	21.36	21.39	
20	64QAM	50	24	21.35	21.39	21.41	22.7
20	64QAM	50	50	21.37	21.39	21.44	
20	64QAM	100	0	21.37	21.38	21.41	
Channel				1867.5	18900	19125	Tune-up limit (dbm)
Frequency (MHz)				1857.5	1880	1902.5	
15	QPSK	1	0	22.23	22.38	22.37	23.8
15	QPSK	1	37	22.22	22.39	22.31	
15	QPSK	1	74	22.30	22.40	22.38	
15	QPSK	36	0	22.27	22.41	22.44	23.8
15	QPSK	36	20	22.41	22.48	22.47	
15	QPSK	36	39	22.40	22.47	22.51	
15	QPSK	75	0	22.38	22.47	22.47	23.8
15	16QAM	1	0	22.47	22.67	22.64	
15	16QAM	1	37	22.52	22.70	22.58	
15	16QAM	1	74	22.60	22.69	22.63	23.7
15	16QAM	36	0	22.15	22.31	22.33	
15	16QAM	36	20	22.28	22.37	22.37	
15	16QAM	36	39	22.29	22.37	22.39	23.7
15	16QAM	75	0	22.27	22.36	22.38	
15	64QAM	1	0	22.28	22.47	22.47	
15	64QAM	1	37	22.31	22.52	22.29	23.7
15	64QAM	1	74	22.40	22.46	22.49	
15	64QAM	36	0	21.19	21.35	21.33	
15	64QAM	36	20	21.32	21.36	21.38	22.7
15	64QAM	36	39	21.37	21.44	21.43	
15	64QAM	75	0	21.28	21.38	21.38	
Channel				18650	18900	19150	Tune-up limit (dbm)
Frequency (MHz)				1855	1880	1905	
10	QPSK	1	0	22.21	22.39	22.33	23.8
10	QPSK	1	25	22.17	22.36	22.28	
10	QPSK	1	49	22.25	22.39	22.35	
10	QPSK	25	0	22.28	22.40	22.40	23.8
10	QPSK	25	12	22.36	22.45	22.46	
10	QPSK	25	25	22.39	22.46	22.51	
10	QPSK	50	0	22.34	22.47	22.47	23.8
10	16QAM	1	0	22.54	22.71	22.71	
10	16QAM	1	25	22.54	22.72	22.68	
10	16QAM	1	49	22.61	22.75	22.75	23.7
10	16QAM	25	0	22.18	22.34	22.34	
10	16QAM	25	12	22.23	22.39	22.41	
10	16QAM	25	25	22.29	22.41	22.38	23.7
10	16QAM	50	0	22.23	22.37	22.39	
10	64QAM	1	0	22.39	22.49	22.40	
10	64QAM	1	25	22.40	22.58	22.49	23.7
10	64QAM	1	49	22.40	22.53	22.52	
10	64QAM	25	0	21.23	21.38	21.38	
10	64QAM	25	12	21.27	21.42	21.41	22.7
10	64QAM	25	25	21.29	21.41	21.44	
10	64QAM	50	0	21.27	21.41	21.42	
Channel				18625	18900	19175	Tune-up limit (dbm)
Frequency (MHz)				1852.5	1880	1907.5	
5	QPSK	1	0	22.18	22.31	22.30	23.8
5	QPSK	1	12	22.27	22.43	22.38	
5	QPSK	1	24	22.23	22.47	22.39	
5	QPSK	12	0	22.29	22.43	22.41	23.8
5	QPSK	12	7	22.35	22.48	22.49	
5	QPSK	12	13	22.33	22.52	22.46	
5	QPSK	25	0	22.33	22.43	22.43	23.8
5	16QAM	1	0	22.50	22.68	22.67	
5	16QAM	1	12	22.54	22.73	22.74	
5	16QAM	1	24	22.56	22.74	22.72	23.7
5	16QAM	12	0	22.20	22.38	22.37	
5	16QAM	12	7	22.26	22.40	22.40	
5	16QAM	12	13	22.23	22.50	22.41	23.7
5	16QAM	25	0	22.19	22.39	22.37	
5	64QAM	1	0	22.37	22.56	22.51	
5	64QAM	1	12	22.34	22.57	22.50	23.7
5	64QAM	1	24	22.39	22.61	22.54	
5	64QAM	12	0	21.23	21.41	21.39	
5	64QAM	12	7	21.29	21.48	21.47	22.7
5	64QAM	12	13	21.26	21.51	21.43	
5	64QAM	25	0	21.21	21.38	21.39	
Channel				18615	18900	19185	Tune-up limit (dbm)
Frequency (MHz)				1851.5	1880	1906.5	
3	QPSK	1	0	22.15	22.26	22.21	23.8
3	QPSK	1	8	22.24	22.36	22.36	
3	QPSK	1	14	22.18	22.46	22.39	
3	QPSK	8	0	22.28	22.41	22.41	23.8
3	QPSK	8	4	22.28	22.48	22.39	
3	QPSK	8	7	22.30	22.42	22.43	
3	QPSK	15	0	22.28	22.39	22.36	23.8
3	16QAM	1	0	22.48	22.62	22.61	
3	16QAM	1	8	22.54	22.71	22.66	
3	16QAM	1	14	22.52	22.73	22.75	23.7
3	16QAM	8	0	22.11	22.37	22.37	
3	16QAM	8	4	22.19	22.32	22.36	
3	16QAM	8	7	22.17	22.49	22.39	23.7
3	16QAM	15	0	22.15	22.30	22.27	
3	64QAM	1	0	22.29	22.47	22.43	
3	64QAM	1	8	22.29	22.53	22.46	23.7
3	64QAM	1	14	22.36	22.52	22.51	
3	64QAM	8	0	21.21	21.33	21.29	
3	64QAM	8	4	21.24	21.46	21.41	22.7
3	64QAM	8	7	21.18	21.41	21.35	
3	64QAM	15	0	21.18	21.28	21.34	
Channel				18907	18900	19193	Tune-up limit (dbm)
Frequency (MHz)				1850.7	1880	1909.3	
1.4	QPSK	1	0	22.08	22.28	22.19	23.8
1.4	QPSK	1	3	22.13	22.30	22.25	
1.4	QPSK	1	5	22.07	22.26	22.24	
1.4	QPSK	3	0	22.10	22.32	22.25	23.8
1.4	QPSK	3	1	22.17	22.36	22.27	
1.4	QPSK	3	3	22.11	22.33	22.24	
1.4	QPSK	6	0	22.17	22.38	22.30	23.8
1.4	16QAM	1	0	22.42	22.61	22.56	
1.4	16QAM	1	3	22.49	22.66	22.64	
1.4	16QAM	1	5	22.43	22.62	22.58	23.8
1.4	16QAM	3	0	22.23	22.43	22.34	
1.4	16QAM	3	1	22.28	22.50	22.41	
1.4	16QAM	3	3	22.21	22.42	22.36	23.7
1.4	16QAM	6	0	22.10	22.37	22.28	
1.4	64QAM	1	0	22.21	22.45	22.37	
1.4	64QAM	1	3	22.27	22.51	22.41	23.7
1.4	64QAM	1	5	22.21	22.45	22.37	
1.4	64QAM	3	0	22.17	22.39	22.33	
1.4	64QAM	3	1	22.26	22.44	22.37	23.7
1.4	64QAM	3	3	22.20	22.40	22.34	
1.4	64QAM	6	0	21.06	21.29	21.26	



Band 4							
Ant 2							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				20050	20175	20300	
Frequency (MHz)				1720	1732.5	1745	
20	QPSK	1	0	23.83	24.08	23.86	25.1
20	QPSK	1	49	23.72	23.70	23.71	
20	QPSK	1	99	23.73	23.71	23.72	
20	QPSK	50	0	23.37	23.36	23.27	24.7
20	QPSK	50	24	23.43	23.38	23.26	
20	QPSK	50	50	23.35	23.27	23.20	
20	QPSK	100	0	23.36	23.43	23.15	24.7
20	16QAM	1	0	23.65	23.66	23.60	
20	16QAM	1	49	23.52	23.46	23.28	
20	16QAM	1	99	23.59	23.44	23.32	23.7
20	16QAM	50	0	22.37	22.38	22.28	
20	16QAM	50	24	22.40	22.39	22.28	
20	16QAM	50	50	22.35	22.31	22.20	23.7
20	16QAM	100	0	22.37	22.41	22.17	
20	64QAM	1	0	22.48	22.50	22.44	
20	64QAM	1	49	22.37	22.38	22.27	23.7
20	64QAM	1	99	22.50	22.37	22.31	
20	64QAM	50	0	21.39	21.40	21.30	
20	64QAM	50	24	21.41	21.41	21.29	22.7
20	64QAM	50	50	21.37	21.30	21.22	
20	64QAM	100	0	21.42	21.38	21.22	
Channel				20250	20175	20325	Tune-up limit (dBm)
Frequency (MHz)				1717.5	1732.5	1747.5	
15	QPSK	1	0	23.72	23.74	23.70	25.1
15	QPSK	1	37	23.74	23.72	23.70	
15	QPSK	1	74	23.72	23.70	23.71	
15	QPSK	36	0	23.39	23.40	23.23	24.7
15	QPSK	36	20	23.39	23.35	23.16	
15	QPSK	36	39	23.35	23.28	23.16	
15	QPSK	75	0	23.38	23.40	23.18	24.7
15	16QAM	1	0	23.64	23.65	23.55	
15	16QAM	1	37	23.50	23.47	23.39	
15	16QAM	1	74	23.55	23.45	23.33	23.7
15	16QAM	36	0	22.43	22.36	22.24	
15	16QAM	36	20	22.37	22.34	22.16	
15	16QAM	36	39	22.34	22.28	22.20	23.7
15	16QAM	75	0	22.38	22.41	22.18	
15	64QAM	1	0	22.52	22.49	22.43	
15	64QAM	1	37	22.42	22.36	22.31	23.7
15	64QAM	1	74	22.43	22.38	22.25	
15	64QAM	36	0	21.44	21.44	21.27	
15	64QAM	36	20	21.38	21.43	21.19	22.7
15	64QAM	36	39	21.38	21.32	21.21	
15	64QAM	75	0	21.40	21.38	21.19	
Channel				20000	20175	20350	Tune-up limit (dBm)
Frequency (MHz)				1715	1732.5	1750	
10	QPSK	1	0	23.74	23.74	23.70	25.1
10	QPSK	1	25	23.71	23.71	23.70	
10	QPSK	1	49	23.73	23.74	23.70	
10	QPSK	25	0	23.34	23.29	23.10	24.7
10	QPSK	25	12	23.38	23.39	23.16	
10	QPSK	25	25	23.38	23.38	23.21	
10	QPSK	50	0	23.40	23.36	23.17	24.7
10	16QAM	1	0	23.65	23.61	23.49	
10	16QAM	1	25	23.61	23.59	23.44	
10	16QAM	1	49	23.65	23.60	23.47	23.7
10	16QAM	25	0	22.35	22.25	22.12	
10	16QAM	25	12	22.40	22.40	22.17	
10	16QAM	25	25	22.38	22.31	22.22	23.7
10	16QAM	50	0	22.38	22.37	22.16	
10	64QAM	1	0	22.52	22.49	22.35	
10	64QAM	1	25	22.51	22.52	22.38	23.7
10	64QAM	1	49	22.57	22.50	22.35	
10	64QAM	25	0	21.36	21.32	21.16	
10	64QAM	25	12	21.43	21.45	21.19	22.7
10	64QAM	25	25	21.42	21.39	21.26	
10	64QAM	50	0	21.43	21.42	21.22	
Channel				19975	20175	20375	Tune-up limit (dBm)
Frequency (MHz)				1712.5	1732.5	1752.5	
5	QPSK	1	0	23.74	23.71	23.70	25.1
5	QPSK	1	12	23.72	23.70	23.70	
5	QPSK	1	24	23.70	23.74	23.72	
5	QPSK	12	0	23.37	23.30	23.20	24.7
5	QPSK	12	7	23.39	23.37	23.21	
5	QPSK	12	13	23.37	23.36	23.21	
5	QPSK	25	0	23.35	23.37	23.22	24.7
5	16QAM	1	0	23.61	23.53	23.44	
5	16QAM	1	12	23.63	23.58	23.45	
5	16QAM	1	24	23.65	23.60	23.45	23.7
5	16QAM	12	0	22.38	22.29	22.21	
5	16QAM	12	7	22.45	22.38	22.23	
5	16QAM	12	13	22.41	22.38	22.20	23.7
5	16QAM	25	0	22.40	22.37	22.22	
5	64QAM	1	0	22.53	22.49	22.35	
5	64QAM	1	12	22.55	22.50	22.34	23.7
5	64QAM	1	24	22.60	22.54	22.36	
5	64QAM	12	0	21.45	21.35	21.27	
5	64QAM	12	7	21.45	21.44	21.30	22.7
5	64QAM	12	13	21.47	21.39	21.27	
5	64QAM	25	0	21.39	21.39	21.21	
Channel				19965	20175	20385	Tune-up limit (dBm)
Frequency (MHz)				1711.5	1732.5	1753.5	
3	QPSK	1	0	23.70	23.71	23.72	25.1
3	QPSK	1	8	23.70	23.70	23.70	
3	QPSK	1	14	23.70	23.71	23.72	
3	QPSK	8	0	23.28	23.24	23.19	24.7
3	QPSK	8	4	23.29	23.36	23.20	
3	QPSK	8	7	23.33	23.28	23.13	
3	QPSK	15	0	23.31	23.35	23.13	24.7
3	16QAM	1	0	23.59	23.46	23.43	
3	16QAM	1	8	23.53	23.58	23.44	
3	16QAM	1	14	23.63	23.60	23.39	23.7
3	16QAM	8	0	22.30	22.27	22.14	
3	16QAM	8	4	22.35	22.35	22.20	
3	16QAM	8	7	22.31	22.31	22.20	23.7
3	16QAM	15	0	22.37	22.32	22.15	
3	64QAM	1	0	22.50	22.41	22.28	
3	64QAM	1	8	22.49	22.48	22.27	23.7
3	64QAM	1	14	22.54	22.46	22.31	
3	64QAM	8	0	21.36	21.27	21.17	
3	64QAM	8	4	21.43	21.38	21.21	22.7
3	64QAM	8	7	21.38	21.36	21.25	
3	64QAM	15	0	21.39	21.35	21.18	
Channel				19957	20175	20393	Tune-up limit (dBm)
Frequency (MHz)				1710.7	1732.5	1754.3	
1.4	QPSK	1	0	23.72	23.70	23.70	25.1
1.4	QPSK	1	3	23.73	23.71	23.71	
1.4	QPSK	1	5	23.72	23.71	23.70	
1.4	QPSK	3	0	23.73	23.70	23.70	24.7
1.4	QPSK	3	1	23.75	23.71	23.72	
1.4	QPSK	3	3	23.74	23.74	23.71	
1.4	QPSK	6	0	23.24	23.17	23.01	24.7
1.4	16QAM	1	0	23.46	23.46	23.27	
1.4	16QAM	1	3	23.53	23.54	23.34	
1.4	16QAM	1	5	23.47	23.45	23.28	24.7
1.4	16QAM	3	0	23.25	23.27	23.07	
1.4	16QAM	3	1	23.31	23.26	23.12	
1.4	16QAM	3	3	23.24	23.24	23.08	23.7
1.4	16QAM	6	0	22.26	22.28	22.12	
1.4	64QAM	1	0	22.38	22.36	22.21	
1.4	64QAM	1	3	22.46	22.41	22.27	23.7
1.4	64QAM	1	5	22.39	22.36	22.21	
1.4	64QAM	3	0	22.39	22.32	22.16	
1.4	64QAM	3	1	22.42	22.39	22.26	23.7
1.4	64QAM	3	3	22.37	22.39	22.20	
1.4	64QAM	6	0	21.22	21.22	21.03	



Band 5							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				20450	20525	20600	
Frequency (MHz)				829	836.5	844	
10	QPSK	1	0	24.43	24.42	24.42	25.7
10	QPSK	1	25	24.34	24.44	24.43	
10	QPSK	1	49	24.44	24.54	24.29	
10	QPSK	25	0	23.47	23.49	23.49	24.7
10	QPSK	25	12	23.52	23.56	23.57	
10	QPSK	25	25	23.49	23.58	23.47	
10	QPSK	50	0	23.54	23.49	23.60	24.7
10	16QAM	1	0	23.81	23.83	23.86	
10	16QAM	1	25	23.70	23.84	23.83	
10	16QAM	1	49	23.81	23.92	23.71	23.7
10	16QAM	25	0	22.45	22.59	22.54	
10	16QAM	25	12	22.53	22.52	22.54	
10	16QAM	25	25	22.56	22.55	22.57	23.7
10	16QAM	50	0	22.51	22.50	22.49	
10	64QAM	1	0	22.59	22.66	22.64	
10	64QAM	1	25	22.70	22.74	22.76	23.7
10	64QAM	1	49	22.67	22.37	21.72	
10	64QAM	25	0	21.54	21.61	21.55	
10	64QAM	25	12	21.62	21.62	21.60	22.7
10	64QAM	25	25	21.53	21.61	20.86	
10	64QAM	50	0	21.53	21.59	21.28	
Channel				20425	20525	20625	Tune-up limit (dBm)
Frequency (MHz)				826.5	836.5	846.5	
5	QPSK	1	0	24.47	24.51	24.50	25.7
5	QPSK	1	12	24.47	24.45	24.31	
5	QPSK	1	24	24.41	24.52	24.20	
5	QPSK	12	0	23.55	23.64	23.59	24.7
5	QPSK	12	7	23.52	23.57	23.34	
5	QPSK	12	13	23.54	23.56	23.16	
5	QPSK	25	0	23.47	23.56	23.52	24.7
5	16QAM	1	0	23.83	23.83	23.79	
5	16QAM	1	12	23.77	23.83	23.57	
5	16QAM	1	24	23.68	23.85	23.46	23.7
5	16QAM	12	0	22.66	22.51	22.52	
5	16QAM	12	7	22.53	22.60	22.45	
5	16QAM	12	13	22.48	22.61	22.27	23.7
5	16QAM	25	0	22.56	22.52	22.56	
5	64QAM	1	0	22.75	22.73	22.50	
5	64QAM	1	12	22.64	22.69	21.78	23.7
5	64QAM	1	24	22.75	22.55	21.74	
5	64QAM	12	0	21.65	21.66	21.30	
5	64QAM	12	7	21.54	21.63	20.70	22.7
5	64QAM	12	13	21.51	21.61	20.71	
5	64QAM	25	0	21.58	21.61	20.70	
Channel				20415	20525	20635	Tune-up limit (dBm)
Frequency (MHz)				825.5	836.5	847.5	
3	QPSK	1	0	24.47	24.41	24.18	25.7
3	QPSK	1	8	24.50	24.48	24.04	
3	QPSK	1	14	24.40	24.49	24.13	
3	QPSK	8	0	23.54	23.58	23.04	24.7
3	QPSK	8	4	23.49	23.62	23.07	
3	QPSK	8	7	23.50	23.55	23.20	
3	QPSK	15	0	23.57	23.53	23.08	24.7
3	16QAM	1	0	23.83	23.81	23.53	
3	16QAM	1	8	23.83	23.86	23.38	
3	16QAM	1	14	23.69	23.78	23.46	23.7
3	16QAM	8	0	22.64	22.58	22.31	
3	16QAM	8	4	22.60	22.65	22.23	
3	16QAM	8	7	22.57	22.60	22.28	23.7
3	16QAM	15	0	22.60	22.62	22.19	
3	64QAM	1	0	22.63	22.73	21.70	
3	64QAM	1	8	22.75	22.75	21.72	23.7
3	64QAM	1	14	22.63	22.50	21.71	
3	64QAM	8	0	21.65	21.56	20.70	
3	64QAM	8	4	21.58	21.67	20.70	22.7
3	64QAM	8	7	21.49	21.63	20.74	
3	64QAM	15	0	21.53	21.62	20.71	
Channel				20407	20525	20643	Tune-up limit (dBm)
Frequency (MHz)				824.7	836.5	848.3	
1.4	QPSK	1	0	24.39	24.32	23.95	25.7
1.4	QPSK	1	3	24.42	24.47	24.10	
1.4	QPSK	1	5	24.29	24.38	24.09	
1.4	QPSK	3	0	24.41	24.36	24.12	24.7
1.4	QPSK	3	1	24.47	24.40	24.12	
1.4	QPSK	3	3	24.41	24.44	24.37	
1.4	QPSK	6	0	23.42	23.57	23.18	24.7
1.4	16QAM	1	0	23.68	23.69	23.34	
1.4	16QAM	1	3	23.69	23.85	23.50	
1.4	16QAM	1	5	23.61	23.69	23.58	24.7
1.4	16QAM	3	0	23.51	23.51	23.12	
1.4	16QAM	3	1	23.49	23.54	23.29	
1.4	16QAM	3	3	23.42	23.48	23.42	23.7
1.4	16QAM	6	0	22.55	22.62	22.27	
1.4	64QAM	1	0	22.60	22.60	21.70	
1.4	64QAM	1	3	22.68	22.75	21.72	23.7
1.4	64QAM	1	5	22.60	22.59	21.71	
1.4	64QAM	3	0	22.63	22.63	21.70	
1.4	64QAM	3	1	22.65	22.62	21.72	23.7
1.4	64QAM	3	3	22.55	22.58	21.71	
1.4	64QAM	6	0	21.45	21.48	20.72	



Band 7							
Ant 2							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch./	Power Middle Ch./	Power High Ch./	Tune-up limit (dBm)
Channel				20850	21100	21350	
Frequency (MHz)				2510	2535	2560	
20	QPSK	1	0	23.26	23.31	23.30	24.4
20	QPSK	1	49	23.28	23.39	23.30	
20	QPSK	1	99	23.29	23.42	23.40	
20	QPSK	50	0	23.28	23.44	23.41	23.9
20	QPSK	50	24	23.29	23.48	23.43	
20	QPSK	50	50	23.32	23.56	23.44	
20	QPSK	100	0	23.29	23.45	23.41	23.9
20	16QAM	1	0	23.47	23.66	23.64	
20	16QAM	1	49	23.50	23.71	23.68	
20	16QAM	1	99	23.55	23.77	23.65	22.9
20	16QAM	50	0	22.61	22.79	22.73	
20	16QAM	50	24	22.64	22.76	22.72	
20	16QAM	50	50	22.62	22.84	22.76	22.9
20	16QAM	100	0	22.61	22.75	22.74	
20	64QAM	1	0	22.71	22.87	22.18	
20	64QAM	1	49	22.72	22.90	22.31	21.9
20	64QAM	1	99	22.74	22.90	22.40	
20	64QAM	50	0	21.66	21.82	21.15	
20	64QAM	50	24	21.68	21.83	21.29	21.9
20	64QAM	50	50	21.70	21.86	21.31	
20	64QAM	100	0	21.62	21.79	21.11	
Channel				20855	21100	21375	Tune-up limit (dBm)
Frequency (MHz)				2507.5	2535	2562.5	
15	QPSK	1	0	23.20	23.34	23.38	24.4
15	QPSK	1	37	23.23	23.40	23.37	
15	QPSK	1	74	23.31	23.49	23.40	
15	QPSK	36	0	23.25	23.43	23.44	23.9
15	QPSK	36	20	23.39	23.49	23.50	
15	QPSK	36	39	23.40	23.57	23.49	
15	QPSK	75	0	23.37	23.47	23.51	23.9
15	16QAM	1	0	23.47	23.65	23.68	
15	16QAM	1	37	23.53	23.74	23.49	
15	16QAM	1	74	23.62	23.81	23.69	22.9
15	16QAM	36	0	22.55	22.72	22.71	
15	16QAM	36	20	22.68	22.75	22.82	
15	16QAM	36	39	22.68	22.87	22.78	22.9
15	16QAM	75	0	22.65	22.78	22.81	
15	64QAM	1	0	22.65	22.76	22.20	
15	64QAM	1	37	22.75	22.90	21.52	21.9
15	64QAM	1	74	22.78	22.90	22.25	
15	64QAM	36	0	21.68	21.76	20.78	
15	64QAM	36	20	21.70	21.80	20.89	21.9
15	64QAM	36	39	21.74	21.89	21.10	
15	64QAM	75	0	21.67	21.77	20.84	
Channel				20860	21100	21400	Tune-up limit (dBm)
Frequency (MHz)				2505	2535	2565	
10	QPSK	1	0	23.22	23.29	23.22	24.4
10	QPSK	1	25	23.20	23.39	23.25	
10	QPSK	1	49	23.20	23.37	23.27	
10	QPSK	25	0	23.28	23.41	23.37	23.9
10	QPSK	25	12	23.33	23.44	23.39	
10	QPSK	25	25	23.34	23.53	23.44	
10	QPSK	50	0	23.33	23.46	23.39	23.9
10	16QAM	1	0	23.49	23.67	23.62	
10	16QAM	1	25	23.50	23.71	23.70	
10	16QAM	1	49	23.58	23.78	23.68	22.9
10	16QAM	25	0	22.58	22.70	22.68	
10	16QAM	25	12	22.64	22.76	22.69	
10	16QAM	25	25	22.61	22.83	22.74	22.9
10	16QAM	50	0	22.60	22.75	22.67	
10	64QAM	1	0	22.69	22.82	21.86	
10	64QAM	1	25	22.70	22.90	22.34	21.9
10	64QAM	1	49	22.79	22.90	22.61	
10	64QAM	25	0	21.61	21.75	20.84	
10	64QAM	25	12	21.65	21.79	21.05	21.9
10	64QAM	25	25	21.65	21.86	21.23	
10	64QAM	50	0	21.65	21.77	20.89	
Channel				20775	21100	21425	Tune-up limit (dBm)
Frequency (MHz)				2502.5	2535	2567.5	
5	QPSK	1	0	23.26	23.31	23.30	24.4
5	QPSK	1	12	23.28	23.39	23.30	
5	QPSK	1	24	23.29	23.42	23.29	
5	QPSK	12	0	23.28	23.44	23.41	23.9
5	QPSK	12	7	23.29	23.46	23.43	
5	QPSK	12	13	23.32	23.56	23.42	
5	QPSK	25	0	23.29	23.45	23.41	23.9
5	16QAM	1	0	23.47	23.66	23.64	
5	16QAM	1	12	23.50	23.71	23.68	
5	16QAM	1	24	23.55	23.77	23.65	22.9
5	16QAM	12	0	22.61	22.79	22.73	
5	16QAM	12	7	22.64	22.76	22.72	
5	16QAM	12	13	22.62	22.84	22.76	22.9
5	16QAM	25	0	22.61	22.75	22.74	
5	64QAM	1	0	22.71	22.87	22.18	
5	64QAM	1	12	22.72	22.90	22.31	22.9
5	64QAM	1	24	22.74	22.90	22.40	
5	64QAM	12	0	21.66	21.82	21.15	
5	64QAM	12	7	21.68	21.83	21.29	21.9
5	64QAM	12	13	21.70	21.86	21.31	
5	64QAM	25	0	21.62	21.79	21.11	



Band 12							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low [dBm]	Power Middle [dBm]	Power High [dBm]	Tune-up limit [dBm]
Channel				23060	23095	23130	
Frequency (MHz)				704	707.5	711	
10	QPSK	1	0	24.34	24.12	24.24	25.7
10	QPSK	1	25	24.15	24.15	24.14	
10	QPSK	1	49	24.31	24.24	24.14	
10	QPSK	25	0	23.27	23.33	23.32	24.7
10	QPSK	25	12	23.38	23.34	23.35	
10	QPSK	25	25	23.31	23.30	23.35	
10	QPSK	50	0	23.34	23.28	23.32	24.7
10	16QAM	1	0	23.55	23.49	23.56	
10	16QAM	1	25	23.61	23.61	23.59	
10	16QAM	1	49	23.66	23.60	23.54	23.7
10	16QAM	25	0	22.32	22.28	22.33	
10	16QAM	25	12	22.40	22.35	22.36	
10	16QAM	25	25	22.37	22.36	22.34	23.7
10	16QAM	50	0	22.39	22.31	22.33	
10	64QAM	1	0	22.43	22.31	22.39	
10	64QAM	1	25	22.52	22.42	22.25	23.7
10	64QAM	1	49	22.61	22.54	22.53	
10	64QAM	25	0	21.31	21.33	21.22	
10	64QAM	25	12	21.46	21.39	21.33	22.7
10	64QAM	25	25	21.37	21.41	21.37	
10	64QAM	50	0	21.36	21.34	21.37	
Channel				23035	23095	23155	Tune-up limit [dBm]
Frequency (MHz)				701.5	707.5	713.5	
5	QPSK	1	0	24.27	24.18	24.20	25.7
5	QPSK	1	12	24.27	24.28	24.27	
5	QPSK	1	24	24.23	24.21	24.24	
5	QPSK	12	0	23.38	23.32	23.26	24.7
5	QPSK	12	7	23.33	23.26	23.25	
5	QPSK	12	13	23.33	23.26	23.27	
5	QPSK	25	0	23.36	23.28	23.20	24.7
5	16QAM	1	0	23.59	23.56	23.50	
5	16QAM	1	12	23.60	23.59	23.55	
5	16QAM	1	24	23.61	23.61	23.60	23.7
5	16QAM	12	0	22.36	22.32	22.28	
5	16QAM	12	7	22.39	22.34	22.36	
5	16QAM	12	13	22.32	22.35	22.28	23.7
5	16QAM	25	0	22.40	22.35	22.32	
5	64QAM	1	0	22.37	22.24	22.40	
5	64QAM	1	12	22.51	22.44	22.40	23.7
5	64QAM	1	24	22.35	22.48	22.45	
5	64QAM	12	0	21.39	21.41	21.39	
5	64QAM	12	7	21.34	21.35	21.34	22.7
5	64QAM	12	13	21.43	21.38	21.28	
5	64QAM	25	0	21.42	21.39	21.32	
Channel				23025	23095	23165	Tune-up limit [dBm]
Frequency (MHz)				700.5	707.5	714.5	
3	QPSK	1	0	24.31	24.21	24.28	25.7
3	QPSK	1	8	24.32	24.30	24.30	
3	QPSK	1	14	24.28	24.27	24.18	
3	QPSK	8	0	23.35	23.27	23.30	24.7
3	QPSK	8	4	23.37	23.40	23.35	
3	QPSK	8	7	23.38	23.38	23.25	
3	QPSK	15	0	23.39	23.28	23.21	24.7
3	16QAM	1	0	23.71	23.62	23.52	
3	16QAM	1	8	23.66	23.59	23.60	
3	16QAM	1	14	23.60	23.56	23.46	23.7
3	16QAM	8	0	22.42	22.42	22.32	
3	16QAM	8	4	22.41	22.40	22.36	
3	16QAM	8	7	22.33	22.41	22.27	23.7
3	16QAM	15	0	22.37	22.31	22.30	
3	64QAM	1	0	22.48	22.41	22.47	
3	64QAM	1	8	22.64	22.55	22.45	23.7
3	64QAM	1	14	22.47	22.49	22.43	
3	64QAM	8	0	21.41	21.39	21.36	
3	64QAM	8	4	21.44	21.51	21.40	22.7
3	64QAM	8	7	21.34	21.40	21.36	
3	64QAM	15	0	21.37	21.34	21.24	
Channel				23017	23095	23173	Tune-up limit [dBm]
Frequency (MHz)				699.7	707.5	715.3	
1.4	QPSK	1	0	24.18	24.13	24.08	25.7
1.4	QPSK	1	3	24.23	24.21	24.18	
1.4	QPSK	1	5	24.19	24.20	24.02	
1.4	QPSK	3	0	24.26	24.09	24.18	24.7
1.4	QPSK	3	1	24.25	24.22	24.19	
1.4	QPSK	3	3	24.21	24.22	24.13	
1.4	QPSK	6	0	23.32	23.26	23.12	24.7
1.4	16QAM	1	0	23.60	23.49	23.46	
1.4	16QAM	1	3	23.57	23.57	23.48	
1.4	16QAM	1	5	23.53	23.52	23.43	24.7
1.4	16QAM	3	0	23.34	23.24	23.26	
1.4	16QAM	3	1	23.38	23.30	23.31	
1.4	16QAM	3	3	23.31	23.24	23.13	23.7
1.4	16QAM	6	0	22.32	22.23	22.22	
1.4	64QAM	1	0	22.48	22.42	22.38	
1.4	64QAM	1	3	22.46	22.50	22.42	23.7
1.4	64QAM	1	5	22.46	22.36	22.34	
1.4	64QAM	3	0	22.37	22.38	22.39	
1.4	64QAM	3	1	22.41	22.38	22.32	23.7
1.4	64QAM	3	3	22.40	22.38	22.31	
1.4	64QAM	6	0	21.27	21.21	21.21	



Band 13							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				23230			
Frequency (MHz)				762			
10	QPSK	1	0	23.83			25.2
10	QPSK	1	25	23.84			
10	QPSK	1	49	23.87			
10	QPSK	25	0	22.96			24.2
10	QPSK	25	12	23.01			
10	QPSK	25	25	22.91			
10	QPSK	50	0	23.01			24.2
10	16QAM	1	0	23.16			
10	16QAM	1	25	23.15			
10	16QAM	1	49	23.15			23.2
10	16QAM	25	0	21.97			
10	16QAM	25	12	22.03			
10	16QAM	25	25	21.93			23.2
10	16QAM	50	0	21.95			
10	64QAM	1	0	22.01			
10	64QAM	1	25	22.13			23.2
10	64QAM	1	49	22.04			
10	64QAM	25	0	21.02			
10	64QAM	25	12	21.00			22.2
10	64QAM	25	25	21.04			
10	64QAM	50	0	20.96			
Channel				23206 23230 23255			Tune-up limit (dBm)
Frequency (MHz)				779.5 762 784.5			
5	QPSK	1	0	23.75	23.76	23.86	25.2
5	QPSK	1	12	23.88	23.84	23.87	
5	QPSK	1	24	23.87	23.86	23.87	
5	QPSK	12	0	22.89	22.92	22.92	24.2
5	QPSK	12	7	22.83	22.97	22.83	
5	QPSK	12	13	23.02	23.01	22.92	
5	QPSK	25	0	23.01	22.99	22.91	24.2
5	16QAM	1	0	23.08	23.05	23.08	
5	16QAM	1	12	23.16	23.14	23.09	
5	16QAM	1	24	23.16	23.10	23.03	23.2
5	16QAM	12	0	21.99	21.97	21.98	
5	16QAM	12	7	22.05	21.96	21.96	
5	16QAM	12	13	22.02	21.94	21.97	23.2
5	16QAM	25	0	22.03	21.94	21.88	
5	64QAM	1	0	22.00	22.13	21.98	
5	64QAM	1	12	22.13	22.06	22.08	23.2
5	64QAM	1	24	22.07	22.15	22.00	
5	64QAM	12	0	21.03	21.06	20.99	
5	64QAM	12	7	21.07	21.01	20.92	22.2
5	64QAM	12	13	20.98	21.05	20.97	
5	64QAM	25	0	20.96	20.95	20.88	



Band 14							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				23330	23330		
Frequency (MHz)				793			
10	QPSK	1	0	24.44			25.7
10	QPSK	1	25	24.49			
10	QPSK	1	49	24.32			
10	QPSK	25	0	23.51			
10	QPSK	25	12	23.50			24.7
10	QPSK	25	25	23.48			
10	QPSK	50	0	23.42			
10	16QAM	1	0	23.87			24.7
10	16QAM	1	25	23.84			
10	16QAM	1	49	23.71			
10	16QAM	25	0	22.44			
10	16QAM	25	12	22.54			23.7
10	16QAM	25	25	22.55			
10	16QAM	50	0	22.44			
10	64QAM	1	0	22.75			23.7
10	64QAM	1	25	22.58			
10	64QAM	1	49	22.65			
10	64QAM	25	0	21.50			
10	64QAM	25	12	21.33			22.7
10	64QAM	25	25	21.48			
10	64QAM	50	0	21.55			
Channel				23306	23330	23356	Tune-up limit (dBm)
Frequency (MHz)				790.5	793	795.5	
5	QPSK	1	0	24.48	24.40	24.42	25.7
5	QPSK	1	12	24.48	24.48	24.47	
5	QPSK	1	24	24.47	24.44	24.42	
5	QPSK	12	0	23.54	23.49	23.41	24.7
5	QPSK	12	7	23.60	23.52	23.47	
5	QPSK	12	13	23.50	23.55	23.45	
5	QPSK	25	0	23.59	23.48	23.43	
5	16QAM	1	0	23.74	23.78	23.68	24.7
5	16QAM	1	12	23.78	23.80	23.80	
5	16QAM	1	24	23.80	23.72	23.71	
5	16QAM	12	0	22.51	22.57	22.48	23.7
5	16QAM	12	7	22.62	22.60	22.49	
5	16QAM	12	13	22.59	22.55	22.51	
5	16QAM	25	0	22.57	22.52	22.50	
5	64QAM	1	0	22.71	22.62	22.36	23.7
5	64QAM	1	12	22.78	22.24	22.53	
5	64QAM	1	24	22.33	22.27	22.70	
5	64QAM	12	0	21.61	21.26	21.18	22.7
5	64QAM	12	7	21.68	21.24	21.54	
5	64QAM	12	13	21.36	21.23	21.61	
5	64QAM	25	0	21.64	21.16	21.49	



Band 17							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch./	Power Middle Ch./	Power High Ch./	Tune-up limit (dBm)
Channel				23780	23790	23800	
Frequency (MHz)				709	710	711	
10	QPSK	1	0	24.38	24.29	24.27	25.7
10	QPSK	1	25	24.35	24.27	24.31	
10	QPSK	1	49	24.33	24.40	24.28	
10	QPSK	25	0	23.34	23.36	23.37	24.7
10	QPSK	25	12	23.51	23.39	23.43	
10	QPSK	25	25	23.50	23.51	23.46	
10	QPSK	50	0	23.44	23.37	23.34	24.7
10	16QAM	1	0	23.64	23.67	23.59	
10	16QAM	1	25	23.73	23.67	23.67	
10	16QAM	1	49	23.70	23.70	23.73	23.7
10	16QAM	25	0	22.35	22.28	22.38	
10	16QAM	25	12	22.43	22.42	22.36	
10	16QAM	25	25	22.40	22.45	22.42	23.7
10	16QAM	50	0	22.50	22.35	22.41	
10	64QAM	1	0	22.59	22.53	22.57	
10	64QAM	1	25	22.67	22.66	22.50	23.7
10	64QAM	1	49	22.65	22.65	22.58	
10	64QAM	25	0	21.36	21.43	21.41	
10	64QAM	25	12	21.47	21.43	21.46	22.7
10	64QAM	25	25	21.51	21.55	21.51	
10	64QAM	50	0	21.54	21.40	21.44	
Channel				23765	23790	23825	Tune-up limit (dBm)
Frequency (MHz)				706.5	710	713.5	
5	QPSK	1	0	24.24	24.27	24.26	25.7
5	QPSK	1	12	24.31	24.37	24.39	
5	QPSK	1	24	24.38	24.39	24.31	
5	QPSK	12	0	23.43	23.34	23.35	24.7
5	QPSK	12	7	23.48	23.47	23.43	
5	QPSK	12	13	23.46	23.44	23.40	
5	QPSK	25	0	23.49	23.45	23.42	24.7
5	16QAM	1	0	23.57	23.61	23.61	
5	16QAM	1	12	23.61	23.69	23.63	
5	16QAM	1	24	23.73	23.76	23.68	23.7
5	16QAM	12	0	22.40	22.39	22.36	
5	16QAM	12	7	22.45	22.40	22.38	
5	16QAM	12	13	22.51	22.44	22.43	23.7
5	16QAM	25	0	22.43	22.44	22.49	
5	64QAM	1	0	22.41	22.31	22.54	
5	64QAM	1	12	22.59	22.50	22.51	23.7
5	64QAM	1	24	22.61	22.53	22.49	
5	64QAM	12	0	21.43	21.40	21.44	
5	64QAM	12	7	21.47	21.45	21.53	22.7
5	64QAM	12	13	21.53	21.55	21.51	
5	64QAM	25	0	21.45	21.36	21.40	



Band 25							
Ant 2							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				26140	26340	26590	
Frequency (MHz)				1860	1880	1905	
20	QPSK	1	0	22.29	22.36	22.34	23.8
20	QPSK	1	48	22.27	22.37	22.29	
20	QPSK	1	99	22.32	22.38	22.34	
20	QPSK	50	0	22.38	22.42	22.39	23.8
20	QPSK	50	24	22.48	22.55	22.41	
20	QPSK	50	50	22.44	22.53	22.48	
20	QPSK	100	0	22.48	22.56	22.42	23.8
20	16QAM	1	0	22.60	22.71	22.70	
20	16QAM	1	49	22.68	22.72	22.66	
20	16QAM	1	99	22.66	22.78	22.64	23.7
20	16QAM	50	0	22.29	22.36	22.30	
20	16QAM	50	24	22.39	22.50	22.32	
20	16QAM	50	50	22.38	22.46	22.42	23.7
20	16QAM	100	0	22.36	22.43	22.32	
20	64QAM	1	0	22.39	22.46	22.40	
20	64QAM	1	49	22.32	22.50	22.41	23.7
20	64QAM	1	99	22.40	22.54	22.38	
20	64QAM	50	0	21.33	21.36	21.32	
20	64QAM	50	24	21.40	21.48	21.35	22.7
20	64QAM	50	50	21.38	21.47	21.42	
20	64QAM	100	0	21.40	21.45	21.34	
Channel				26115	26340	26515	Tune-up limit (dBm)
Frequency (MHz)				1857.5	1880	1907.5	
15	QPSK	1	0	22.29	22.41	22.38	23.8
15	QPSK	1	37	22.28	22.39	22.31	
15	QPSK	1	74	22.34	22.42	22.39	
15	QPSK	36	0	22.45	22.47	22.40	23.8
15	QPSK	36	20	22.44	22.53	22.48	
15	QPSK	36	39	22.44	22.51	22.45	
15	QPSK	75	0	22.42	22.54	22.38	23.8
15	16QAM	1	0	22.67	22.70	22.65	
15	16QAM	1	37	22.62	22.74	22.67	
15	16QAM	1	74	22.64	22.77	22.68	23.7
15	16QAM	36	0	22.36	22.37	22.32	
15	16QAM	36	20	22.38	22.45	22.41	
15	16QAM	36	39	22.31	22.43	22.37	23.7
15	16QAM	75	0	22.35	22.45	22.32	
15	64QAM	1	0	22.34	22.48	22.40	
15	64QAM	1	37	22.42	22.56	22.50	23.7
15	64QAM	1	74	22.46	22.55	22.32	
15	64QAM	36	0	21.41	21.42	21.35	
15	64QAM	36	20	21.40	21.47	21.42	22.7
15	64QAM	36	39	21.36	21.45	21.43	
15	64QAM	75	0	21.36	21.45	21.33	
Channel				26090	26340	26640	Tune-up limit (dBm)
Frequency (MHz)				1855	1880	1910	
10	QPSK	1	0	22.23	22.33	22.34	23.8
10	QPSK	1	25	22.22	22.36	22.34	
10	QPSK	1	49	22.27	22.42	22.39	
10	QPSK	25	0	22.37	22.40	22.43	23.8
10	QPSK	25	12	22.39	22.52	22.49	
10	QPSK	25	25	22.44	22.51	22.51	
10	QPSK	50	0	22.41	22.52	22.49	23.8
10	16QAM	1	0	22.70	22.75	22.69	
10	16QAM	1	25	22.63	22.73	22.69	
10	16QAM	1	49	22.67	22.78	22.75	23.7
10	16QAM	25	0	22.28	22.34	22.37	
10	16QAM	25	12	22.31	22.45	22.39	
10	16QAM	25	25	22.29	22.43	22.39	23.7
10	16QAM	50	0	22.30	22.45	22.38	
10	64QAM	1	0	22.39	22.46	22.51	
10	64QAM	1	25	22.40	22.60	22.55	23.7
10	64QAM	1	49	22.43	22.61	22.34	
10	64QAM	25	0	21.30	21.34	21.37	
10	64QAM	25	12	21.36	21.46	21.42	22.7
10	64QAM	25	25	21.34	21.46	21.43	
10	64QAM	50	0	21.34	21.46	21.42	
Channel				26055	26340	26655	Tune-up limit (dBm)
Frequency (MHz)				1852.5	1880	1912.5	
5	QPSK	1	0	22.22	22.31	22.33	23.8
5	QPSK	1	12	22.30	22.43	22.36	
5	QPSK	1	24	22.30	22.43	22.37	
5	QPSK	12	0	22.29	22.45	22.42	23.8
5	QPSK	12	7	22.40	22.55	22.48	
5	QPSK	12	13	22.42	22.53	22.49	
5	QPSK	25	0	22.36	22.52	22.45	23.8
5	16QAM	1	0	22.69	22.69	22.68	
5	16QAM	1	12	22.62	22.75	22.67	
5	16QAM	1	24	22.62	22.77	22.72	23.7
5	16QAM	12	0	22.25	22.36	22.34	
5	16QAM	12	7	22.32	22.45	22.37	
5	16QAM	12	13	22.34	22.46	22.40	23.7
5	16QAM	25	0	22.28	22.41	22.33	
5	64QAM	1	0	22.41	22.51	22.53	
5	64QAM	1	12	22.39	22.55	22.48	23.7
5	64QAM	1	24	22.43	22.65	22.22	
5	64QAM	12	0	21.30	21.41	21.37	
5	64QAM	12	7	21.37	21.49	21.43	22.7
5	64QAM	12	13	21.36	21.52	21.28	
5	64QAM	25	0	21.30	21.43	21.36	
Channel				26055	26340	26675	Tune-up limit (dBm)
Frequency (MHz)				1851.5	1880	1913.5	
3	QPSK	1	0	22.12	22.24	22.28	23.8
3	QPSK	1	8	22.29	22.37	22.27	
3	QPSK	1	14	22.25	22.33	22.35	
3	QPSK	8	0	22.29	22.41	22.35	23.8
3	QPSK	8	4	22.31	22.52	22.41	
3	QPSK	8	7	22.37	22.45	22.45	
3	QPSK	15	0	22.35	22.49	22.41	23.8
3	16QAM	1	0	22.68	22.63	22.63	
3	16QAM	1	8	22.56	22.74	22.62	
3	16QAM	1	14	22.52	22.72	22.70	23.7
3	16QAM	8	0	22.15	22.38	22.26	
3	16QAM	8	4	22.30	22.41	22.36	
3	16QAM	8	7	22.31	22.40	22.37	23.7
3	16QAM	15	0	22.19	22.36	22.32	
3	64QAM	1	0	22.35	22.47	22.53	
3	64QAM	1	8	22.38	22.52	22.41	23.7
3	64QAM	1	14	22.43	22.57	22.15	
3	64QAM	8	0	21.28	21.37	21.28	
3	64QAM	8	4	21.28	21.42	21.42	22.7
3	64QAM	8	7	21.36	21.44	21.16	
3	64QAM	15	0	21.26	21.39	21.29	
Channel				26047	26340	26683	Tune-up limit (dBm)
Frequency (MHz)				1850.7	1880	1914.3	
1.4	QPSK	1	0	22.09	22.22	22.16	23.8
1.4	QPSK	1	3	22.23	22.36	22.27	
1.4	QPSK	1	5	22.19	22.33	22.26	
1.4	QPSK	3	0	22.14	22.30	22.23	23.8
1.4	QPSK	3	1	22.21	22.37	22.28	
1.4	QPSK	3	3	22.20	22.36	22.27	
1.4	QPSK	6	0	22.21	22.38	22.32	23.8
1.4	16QAM	1	0	22.44	22.53	22.52	
1.4	16QAM	1	3	22.58	22.70	22.62	
1.4	16QAM	1	5	22.51	22.68	22.58	23.8
1.4	16QAM	3	0	22.25	22.44	22.34	
1.4	16QAM	3	1	22.31	22.47	22.38	
1.4	16QAM	3	3	22.29	22.44	22.35	23.7
1.4	16QAM	6	0	22.21	22.37	22.28	
1.4	64QAM	1	0	22.23	22.40	22.14	
1.4	64QAM	1	3	22.33	22.53	22.14	23.7
1.4	64QAM	1	5	22.32	22.53	22.04	
1.4	64QAM	3	0	22.24	22.42	22.15	
1.4	64QAM	3	1	22.30	22.48	22.21	23.7
1.4	64QAM	3	3	22.26	22.46	22.12	
1.4	64QAM	6	0	21.15	21.31	21.05	



Band 26							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch./	Power Middle Ch./	Power High Ch./	Tune-up limit (dBm)
Channel				26765	26865	26965	
Frequency (MHz)				821.5	831.5	841.5	
15	QPSK	1	0	24.28	24.16	24.24	25.7
15	QPSK	1	37	24.14	24.24	24.21	
15	QPSK	1	74	24.27	24.52	24.13	
15	QPSK	36	0	23.38	23.39	23.34	24.7
15	QPSK	36	20	23.40	23.31	23.37	
15	QPSK	36	39	23.33	23.34	23.29	
15	QPSK	75	0	23.39	23.35	23.35	24.7
15	16QAM	1	0	23.55	23.58	23.61	
15	16QAM	1	37	23.54	23.54	23.60	
15	16QAM	1	74	23.56	23.63	23.47	23.7
15	16QAM	36	0	22.36	22.42	22.34	
15	16QAM	36	20	22.34	22.33	22.30	
15	16QAM	36	39	22.36	22.36	22.33	23.7
15	16QAM	75	0	22.42	22.38	22.33	
15	64QAM	1	0	22.48	22.42	22.41	
15	64QAM	1	37	22.45	22.49	22.41	23.7
15	64QAM	1	74	22.48	22.48	21.70	
15	64QAM	36	0	21.43	21.45	21.41	
15	64QAM	36	20	21.47	21.43	21.37	22.7
15	64QAM	36	39	21.38	21.44	21.49	
15	64QAM	75	0	21.47	21.36	21.42	
Channel				26740	26865	26990	Tune-up limit (dBm)
Frequency (MHz)				819	831.5	844	
10	QPSK	1	0	24.38	24.29	24.37	25.7
10	QPSK	1	25	24.22	24.25	24.23	
10	QPSK	1	49	24.28	24.29	24.20	
10	QPSK	25	0	23.50	23.36	23.44	24.7
10	QPSK	25	12	23.50	23.41	23.37	
10	QPSK	25	25	23.40	23.42	23.37	
10	QPSK	50	0	23.38	23.41	23.42	24.7
10	16QAM	1	0	23.77	23.60	23.75	
10	16QAM	1	25	23.61	23.73	23.64	
10	16QAM	1	49	23.64	23.67	23.62	23.7
10	16QAM	25	0	22.48	22.36	22.37	
10	16QAM	25	12	22.45	22.42	22.36	
10	16QAM	25	25	22.30	22.44	22.38	22.7
10	16QAM	50	0	22.46	22.37	22.33	
10	64QAM	1	0	22.64	22.51	22.57	
10	64QAM	1	25	22.54	22.66	22.66	23.7
10	64QAM	1	49	22.56	22.60	22.05	
10	64QAM	25	0	21.44	21.42	21.43	
10	64QAM	25	12	21.50	21.47	21.48	22.7
10	64QAM	25	25	21.37	21.41	21.29	
10	64QAM	50	0	21.47	21.37	21.36	
Channel				26715	26865	27015	Tune-up limit (dBm)
Frequency (MHz)				816.5	831.5	846.5	
5	QPSK	1	0	24.45	24.32	24.35	25.7
5	QPSK	1	12	24.38	24.38	24.33	
5	QPSK	1	24	24.30	24.37	24.26	
5	QPSK	12	0	23.50	23.37	23.40	24.7
5	QPSK	12	7	23.51	23.41	23.44	
5	QPSK	12	13	23.44	23.36	23.33	
5	QPSK	25	0	23.44	23.40	23.38	24.7
5	16QAM	1	0	23.78	23.60	23.73	
5	16QAM	1	12	23.72	23.66	23.60	
5	16QAM	1	24	23.66	23.72	23.58	23.7
5	16QAM	12	0	22.49	22.38	22.41	
5	16QAM	12	7	22.45	22.45	22.41	
5	16QAM	12	13	22.44	22.37	22.30	23.7
5	16QAM	25	0	22.43	22.36	22.40	
5	64QAM	1	0	22.73	22.56	22.53	
5	64QAM	1	12	22.54	22.59	21.87	23.7
5	64QAM	1	24	22.56	22.57	21.82	
5	64QAM	12	0	21.58	21.56	21.51	
5	64QAM	12	7	21.59	21.50	20.86	22.7
5	64QAM	12	13	21.54	21.45	20.56	
5	64QAM	25	0	21.50	21.39	21.68	
Channel				26705	26865	27025	Tune-up limit (dBm)
Frequency (MHz)				815.5	831.5	847.5	
3	QPSK	1	0	24.43	24.37	24.37	25.7
3	QPSK	1	8	24.41	24.37	24.32	
3	QPSK	1	14	24.30	24.35	24.26	
3	QPSK	8	0	23.51	23.43	23.27	24.7
3	QPSK	8	4	23.54	23.46	23.33	
3	QPSK	8	7	23.40	23.41	23.37	
3	QPSK	15	0	23.42	23.35	23.30	24.7
3	16QAM	1	0	23.79	23.62	23.67	
3	16QAM	1	8	23.80	23.76	23.49	
3	16QAM	1	14	23.68	23.71	23.56	23.7
3	16QAM	8	0	22.53	22.44	22.45	
3	16QAM	8	4	22.59	22.47	22.41	
3	16QAM	8	7	22.46	22.49	22.36	23.7
3	16QAM	15	0	22.56	22.36	22.37	
3	64QAM	1	0	22.61	22.57	21.91	
3	64QAM	1	8	22.68	22.58	21.70	23.7
3	64QAM	1	14	22.58	22.61	21.71	
3	64QAM	8	0	21.59	21.49	20.70	
3	64QAM	8	4	21.55	21.54	20.57	22.7
3	64QAM	8	7	21.49	21.52	20.57	
3	64QAM	15	0	21.50	21.48	20.64	
Channel				26697	26865	27033	Tune-up limit (dBm)
Frequency (MHz)				814.7	831.5	848.3	
1.4	QPSK	1	0	24.37	24.27	24.21	25.7
1.4	QPSK	1	3	24.42	24.30	24.23	
1.4	QPSK	1	5	24.36	24.21	24.15	
1.4	QPSK	3	0	24.41	24.23	24.20	24.7
1.4	QPSK	3	1	24.41	24.33	24.21	
1.4	QPSK	3	3	24.40	24.32	24.20	
1.4	QPSK	6	0	23.41	23.38	23.30	24.7
1.4	16QAM	1	0	23.71	23.59	23.46	
1.4	16QAM	1	3	23.72	23.62	23.59	
1.4	16QAM	1	5	23.63	23.59	23.46	24.7
1.4	16QAM	3	0	23.56	23.29	23.30	
1.4	16QAM	3	1	23.60	23.39	23.30	
1.4	16QAM	3	3	23.50	23.35	23.24	23.7
1.4	16QAM	6	0	22.50	22.46	22.33	
1.4	64QAM	1	0	22.68	22.47	21.74	
1.4	64QAM	1	3	22.68	22.61	21.70	23.7
1.4	64QAM	1	5	22.62	22.46	21.71	
1.4	64QAM	3	0	22.64	22.46	21.72	
1.4	64QAM	3	1	22.57	22.47	21.71	22.7
1.4	64QAM	3	3	22.56	22.51	21.80	
1.4	64QAM	6	0	21.43	21.42	20.70	



Band 30							
Ant 2							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				27710			
Frequency (MHz)				2310			
10	QPSK	1	0	22.18			23.7
10	QPSK	1	25	22.07			
10	QPSK	1	49	22.09			
10	QPSK	25	0	21.18			22.7
10	QPSK	25	12	21.14			
10	QPSK	25	25	21.23			
10	QPSK	50	0	21.14			22.7
10	16QAM	1	0	21.51			
10	16QAM	1	25	21.44			
10	16QAM	1	49	21.52			21.7
10	16QAM	25	0	20.18			
10	16QAM	25	12	20.25			
10	16QAM	25	25	20.19			21.7
10	16QAM	50	0	20.23			
10	64QAM	1	0	20.35			
10	64QAM	1	25	20.42			21.7
10	64QAM	1	49	20.39			
10	64QAM	25	0	19.24			
10	64QAM	25	12	19.21			20.7
10	64QAM	25	25	19.22			
10	64QAM	50	0	19.21			
Channel				27685 27710 27735			Tune-up limit (dBm)
Frequency (MHz)				2307.5 2310 2312.5			
5	QPSK	1	0	22.04	22.08	22.10	23.7
5	QPSK	1	12	22.18	22.10	22.13	
5	QPSK	1	24	22.11	22.12	22.14	
5	QPSK	12	0	21.14	21.18	21.17	22.7
5	QPSK	12	7	21.27	21.18	21.20	
5	QPSK	12	13	21.32	21.23	21.13	
5	QPSK	25	0	21.24	21.15	21.21	21.7
5	16QAM	1	0	21.36	21.35	21.42	
5	16QAM	1	12	21.47	21.47	21.42	
5	16QAM	1	24	21.55	21.44	21.44	21.7
5	16QAM	12	0	20.15	20.21	20.17	
5	16QAM	12	7	20.20	20.25	20.29	
5	16QAM	12	13	20.22	20.20	20.19	21.7
5	16QAM	25	0	20.24	20.17	20.23	
5	64QAM	1	0	20.27	20.34	20.47	
5	64QAM	1	12	20.39	20.35	20.37	21.7
5	64QAM	1	24	20.53	20.37	20.31	
5	64QAM	12	0	19.25	19.27	19.23	
5	64QAM	12	7	19.29	19.22	19.33	20.7
5	64QAM	12	13	19.31	19.33	19.25	
5	64QAM	25	0	19.27	19.21	19.27	



Band 66							
Ant 2							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				132072	132322	132572	
Frequency (MHz)				1720	1745	1770	
20	QPSK	1	0	23.95	23.87	23.78	25.1
20	QPSK	1	49	23.82	23.71	23.70	
20	QPSK	1	99	23.60	23.75	23.72	
20	QPSK	50	0	23.58	23.46	23.44	24.7
20	QPSK	50	24	23.65	23.51	23.52	
20	QPSK	50	50	23.64	23.48	23.46	
20	QPSK	100	0	23.66	23.48	23.44	24.7
20	16QAM	1	0	23.84	23.76	23.74	
20	16QAM	1	49	23.78	23.55	23.60	
20	16QAM	1	99	23.86	23.63	23.54	23.7
20	16QAM	50	0	22.59	22.47	22.48	
20	16QAM	50	24	22.67	22.52	22.52	
20	16QAM	50	50	22.63	22.46	22.47	23.7
20	16QAM	100	0	22.64	22.49	22.45	
20	64QAM	1	0	22.73	22.62	22.56	
20	64QAM	1	49	22.68	22.49	22.53	23.7
20	64QAM	1	99	22.74	22.56	22.48	
20	64QAM	50	0	21.61	21.49	21.49	
20	64QAM	50	24	21.67	21.52	21.53	22.7
20	64QAM	50	50	21.66	21.49	21.49	
20	64QAM	100	0	21.67	21.50	21.44	
Channel				132047	132322	132597	Tune-up limit (dBm)
Frequency (MHz)				1717.5	1745	1772.5	
15	QPSK	1	0	23.91	23.81	23.79	25.1
15	QPSK	1	37	23.81	23.70	23.70	
15	QPSK	1	74	23.94	23.74	23.74	
15	QPSK	36	0	23.67	23.46	23.45	24.7
15	QPSK	36	20	23.65	23.46	23.42	
15	QPSK	36	39	23.62	23.44	23.47	
15	QPSK	75	0	23.65	23.50	23.46	24.7
15	16QAM	1	0	23.82	23.70	23.73	
15	16QAM	1	37	23.74	23.60	23.64	
15	16QAM	1	74	23.85	23.63	23.61	23.7
15	16QAM	36	0	22.66	22.45	22.45	
15	16QAM	36	20	22.65	22.48	22.42	
15	16QAM	36	39	22.63	22.47	22.43	23.7
15	16QAM	75	0	22.65	22.51	22.45	
15	64QAM	1	0	22.66	22.61	22.53	
15	64QAM	1	37	22.62	22.50	22.49	23.7
15	64QAM	1	74	22.74	22.57	22.53	
15	64QAM	36	0	21.66	21.50	21.53	
15	64QAM	36	20	21.66	21.49	21.46	22.7
15	64QAM	36	39	21.68	21.50	21.50	
15	64QAM	75	0	21.66	21.51	21.47	
Channel				132022	132322	132622	Tune-up limit (dBm)
Frequency (MHz)				1715	1745	1775	
10	QPSK	1	0	23.94	23.77	23.81	25.1
10	QPSK	1	25	23.89	23.76	23.79	
10	QPSK	1	49	23.92	23.75	23.80	
10	QPSK	25	0	23.63	23.43	23.44	24.7
10	QPSK	25	12	23.64	23.50	23.44	
10	QPSK	25	25	23.65	23.47	23.52	
10	QPSK	50	0	23.67	23.52	23.48	24.7
10	16QAM	1	0	23.83	23.79	23.80	
10	16QAM	1	25	23.89	23.73	23.77	
10	16QAM	1	49	23.89	23.71	23.78	23.7
10	16QAM	25	0	22.61	22.43	22.44	
10	16QAM	25	12	22.70	22.52	22.47	
10	16QAM	25	25	22.62	22.46	22.51	23.7
10	16QAM	50	0	22.65	22.45	22.45	
10	64QAM	1	0	22.79	22.63	22.61	
10	64QAM	1	25	22.82	22.63	22.70	23.7
10	64QAM	1	49	22.84	22.64	22.67	
10	64QAM	25	0	21.66	21.48	21.49	
10	64QAM	25	12	21.70	21.54	21.50	22.7
10	64QAM	25	25	21.64	21.50	21.55	
10	64QAM	50	0	21.68	21.55	21.49	
Channel				131997	132322	132647	Tune-up limit (dBm)
Frequency (MHz)				1712.5	1745	1777.5	
5	QPSK	1	0	23.94	23.73	23.81	25.1
5	QPSK	1	12	23.94	23.80	23.85	
5	QPSK	1	24	23.93	23.75	23.79	
5	QPSK	12	0	23.63	23.42	23.50	24.7
5	QPSK	12	7	23.69	23.52	23.52	
5	QPSK	12	13	23.64	23.46	23.47	
5	QPSK	25	0	23.63	23.45	23.50	24.7
5	16QAM	1	0	23.86	23.71	23.76	
5	16QAM	1	12	23.89	23.74	23.75	
5	16QAM	1	24	23.86	23.71	23.75	23.7
5	16QAM	12	0	22.67	22.46	22.54	
5	16QAM	12	7	22.69	22.50	22.56	
5	16QAM	12	13	22.66	22.52	22.54	23.7
5	16QAM	25	0	22.68	22.52	22.54	
5	64QAM	1	0	22.82	22.63	22.72	
5	64QAM	1	12	22.82	22.64	22.68	23.7
5	64QAM	1	24	22.84	22.64	22.67	
5	64QAM	12	0	21.71	21.50	21.59	
5	64QAM	12	7	21.72	21.57	21.62	22.7
5	64QAM	12	13	21.73	21.52	21.59	
5	64QAM	25	0	21.66	21.50	21.54	
Channel				131967	132322	132657	Tune-up limit (dBm)
Frequency (MHz)				1711.5	1745	1778.5	
3	QPSK	1	0	23.88	23.73	23.77	25.1
3	QPSK	1	8	23.83	23.74	23.83	
3	QPSK	1	14	23.84	23.73	23.74	
3	QPSK	8	0	23.67	23.35	23.45	24.7
3	QPSK	8	4	23.64	23.45	23.46	
3	QPSK	8	7	23.61	23.43	23.40	
3	QPSK	15	0	23.63	23.36	23.47	24.7
3	16QAM	1	0	23.77	23.61	23.73	
3	16QAM	1	8	23.83	23.64	23.70	
3	16QAM	1	14	23.79	23.61	23.74	23.7
3	16QAM	8	0	22.66	22.38	22.52	
3	16QAM	8	4	22.64	22.40	22.54	
3	16QAM	8	7	22.59	22.49	22.50	23.7
3	16QAM	15	0	22.68	22.50	22.47	
3	64QAM	1	0	22.73	22.55	22.71	
3	64QAM	1	8	22.77	22.62	22.59	23.7
3	64QAM	1	14	22.84	22.54	22.65	
3	64QAM	8	0	21.71	21.48	21.56	
3	64QAM	8	4	21.66	21.51	21.56	22.7
3	64QAM	8	7	21.71	21.47	21.58	
3	64QAM	15	0	21.56	21.45	21.51	
Channel				131979	132322	132665	Tune-up limit (dBm)
Frequency (MHz)				1710.7	1745	1779.3	
1.4	QPSK	1	0	23.85	23.74	23.70	25.1
1.4	QPSK	1	3	23.86	23.72	23.77	
1.4	QPSK	1	5	23.84	23.76	23.72	
1.4	QPSK	3	0	23.88	23.71	23.78	24.7
1.4	QPSK	3	1	23.91	23.74	23.80	
1.4	QPSK	3	3	23.82	23.71	23.74	
1.4	QPSK	6	0	23.54	23.38	23.40	24.7
1.4	16QAM	1	0	23.73	23.60	23.68	
1.4	16QAM	1	3	23.82	23.66	23.76	
1.4	16QAM	1	5	23.73	23.62	23.67	24.7
1.4	16QAM	3	0	23.54	23.34	23.43	
1.4	16QAM	3	1	23.60	23.46	23.46	
1.4	16QAM	3	3	23.53	23.43	23.44	23.7
1.4	16QAM	6	0	22.58	22.43	22.51	
1.4	64QAM	1	0	22.70	22.57	22.60	
1.4	64QAM	1	3	22.75	22.62	22.63	23.7
1.4	64QAM	1	5	22.67	22.54	22.57	
1.4	64QAM	3	0	22.67	22.54	22.58	
1.4	64QAM	3	1	22.71	22.57	22.61	23.7
1.4	64QAM	3	3	22.67	22.51	22.56	
1.4	64QAM	6	0	21.57	21.39	21.44	



Band 71							
Ant 0							
Band [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				133222	133322	133372	
Frequency (MHz)				673	683	688	
20	QPSK	1	0	24.39	24.32	24.28	25.7
20	QPSK	1	49	24.21	24.25	24.28	
20	QPSK	1	99	24.24	24.21	24.14	
20	QPSK	50	0	23.39	23.37	23.38	24.7
20	QPSK	50	24	23.50	23.42	23.32	
20	QPSK	50	50	23.45	23.39	23.33	
20	QPSK	100	0	23.46	23.30	23.37	24.7
20	16QAM	1	0	23.69	23.66	23.66	
20	16QAM	1	49	23.58	23.58	23.57	
20	16QAM	1	99	23.61	23.58	23.54	23.7
20	16QAM	50	0	22.46	22.32	22.40	
20	16QAM	50	24	22.42	22.33	22.39	
20	16QAM	50	50	22.42	22.39	22.39	23.7
20	16QAM	100	0	22.46	22.34	22.42	
20	64QAM	1	0	21.79	22.29	22.52	
20	64QAM	1	49	22.23	22.43	21.81	23.7
20	64QAM	1	99	22.50	22.00	22.43	
20	64QAM	50	0	20.70	21.36	21.01	
20	64QAM	50	24	20.85	21.40	21.15	22.7
20	64QAM	50	50	21.49	21.04	21.37	
20	64QAM	100	0	21.05	21.36	21.45	
Channel				133197	133297	133397	Tune-up limit (dBm)
Frequency (MHz)				670.5	680.5	690.5	
15	QPSK	1	0	24.23	24.27	24.23	25.7
15	QPSK	1	37	24.23	24.18	24.22	
15	QPSK	1	74	24.28	24.28	24.14	
15	QPSK	36	0	23.41	23.31	23.37	24.7
15	QPSK	36	20	23.45	23.30	23.34	
15	QPSK	36	39	23.38	23.40	23.35	
15	QPSK	75	0	23.36	23.35	23.34	24.7
15	16QAM	1	0	23.68	23.64	23.56	
15	16QAM	1	37	23.38	23.54	23.52	
15	16QAM	1	74	23.54	23.51	23.54	23.7
15	16QAM	36	0	22.28	22.39	22.28	
15	16QAM	36	20	22.31	22.34	22.43	
15	16QAM	36	39	22.45	22.37	22.38	23.7
15	16QAM	75	0	22.45	22.32	22.35	
15	64QAM	1	0	21.71	22.45	22.43	
15	64QAM	1	37	21.70	22.51	22.51	23.7
15	64QAM	1	74	22.41	22.16	22.49	
15	64QAM	36	0	20.70	21.34	20.97	
15	64QAM	36	20	20.44	21.43	21.36	22.7
15	64QAM	36	39	21.00	20.91	21.37	
15	64QAM	75	0	20.86	21.39	21.33	
Channel				133172	133272	133422	Tune-up limit (dBm)
Frequency (MHz)				668	678	683	
10	QPSK	1	0	24.27	24.17	24.29	25.7
10	QPSK	1	25	24.19	24.16	24.20	
10	QPSK	1	49	24.17	24.27	24.18	
10	QPSK	25	0	23.33	23.31	23.33	24.7
10	QPSK	25	12	23.33	23.43	23.26	
10	QPSK	25	25	23.24	23.30	23.27	
10	QPSK	50	0	23.41	23.40	23.26	24.7
10	16QAM	1	0	23.71	23.36	23.60	
10	16QAM	1	25	23.62	23.63	23.53	
10	16QAM	1	49	23.62	23.61	23.47	23.7
10	16QAM	25	0	22.27	22.28	22.30	
10	16QAM	25	12	22.28	22.38	22.33	
10	16QAM	25	25	22.14	22.38	22.23	23.7
10	16QAM	50	0	22.32	22.42	22.24	
10	64QAM	1	0	21.75	21.80	22.44	
10	64QAM	1	25	21.73	22.52	22.48	23.7
10	64QAM	1	49	21.70	22.46	22.13	
10	64QAM	25	0	20.70	21.34	21.35	
10	64QAM	25	12	20.33	21.41	21.36	22.7
10	64QAM	25	25	20.40	21.38	21.31	
10	64QAM	50	0	20.33	21.36	21.30	
Channel				133147	133247	133447	Tune-up limit (dBm)
Frequency (MHz)				665.5	675.5	695.5	
5	QPSK	1	0	24.07	24.21	24.21	25.7
5	QPSK	1	12	24.33	24.20	24.17	
5	QPSK	1	24	24.22	24.20	24.18	
5	QPSK	12	0	23.33	23.35	23.25	24.7
5	QPSK	12	7	23.30	23.36	23.33	
5	QPSK	12	13	23.32	23.30	23.28	
5	QPSK	25	0	23.32	23.37	23.25	24.7
5	16QAM	1	0	23.51	23.53	23.67	
5	16QAM	1	12	23.51	23.55	23.55	
5	16QAM	1	24	23.48	23.53	23.47	23.7
5	16QAM	12	0	22.16	22.40	22.33	
5	16QAM	12	7	22.31	22.37	22.34	
5	16QAM	12	13	22.38	22.34	22.27	23.7
5	16QAM	25	0	22.24	22.39	22.29	
5	64QAM	1	0	21.78	21.74	22.47	
5	64QAM	1	12	21.72	22.51	22.39	23.7
5	64QAM	1	24	21.70	22.56	21.87	
5	64QAM	12	0	20.70	21.16	21.31	
5	64QAM	12	7	20.42	21.41	21.39	22.7
5	64QAM	12	13	20.40	21.40	21.19	
5	64QAM	25	0	20.23	21.10	21.23	



Band 2							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch.	Power Middle Ch.	Power High Ch.	Tune-up limit (dbm)
Channel				18700	18900	19100	
Frequency (MHz)				1860	1880	1900	
20	QPSK	1	0	17.61	17.61	17.62	18.9
20	QPSK	1	49	17.55	17.62	17.50	
20	QPSK	1	99	17.56	17.62	17.56	
20	QPSK	50	0	17.63	17.69	17.73	18.9
20	QPSK	50	24	17.77	17.74	17.75	
20	QPSK	50	50	17.72	17.74	17.71	
20	QPSK	100	0	17.74	17.71	17.72	18.9
20	16QAM	1	0	17.97	17.96	17.96	
20	16QAM	1	49	17.93	17.95	17.90	
20	16QAM	1	99	17.86	17.93	17.88	18.9
20	16QAM	50	0	17.88	17.70	17.72	
20	16QAM	50	24	17.76	17.76	17.75	
20	16QAM	50	50	17.73	17.74	17.74	18.9
20	16QAM	100	0	17.72	17.71	17.71	
20	64QAM	1	0	17.81	17.77	17.67	
20	64QAM	1	49	17.75	17.84	17.78	18.9
20	64QAM	1	99	17.80	17.81	17.74	
20	64QAM	50	0	17.67	17.73	17.74	
20	64QAM	50	24	17.76	17.76	17.77	18.9
20	64QAM	50	50	17.75	17.74	17.76	
20	64QAM	100	0	17.73	17.72	17.74	
Channel				1867.5	18900	19125	Tune-up limit (dbm)
Frequency (MHz)				1857.5	1880	1902.5	
15	QPSK	1	0	17.54	17.57	17.56	18.9
15	QPSK	1	37	17.45	17.52	17.45	
15	QPSK	1	74	17.54	17.52	17.52	
15	QPSK	36	0	17.58	17.65	17.63	18.9
15	QPSK	36	20	17.68	17.66	17.67	
15	QPSK	36	39	17.64	17.72	17.71	
15	QPSK	75	0	17.72	17.65	17.71	18.9
15	16QAM	1	0	17.93	17.96	17.94	
15	16QAM	1	37	17.88	17.87	17.89	
15	16QAM	1	74	17.84	17.84	17.81	18.9
15	16QAM	36	0	17.58	17.70	17.62	
15	16QAM	36	20	17.74	17.71	17.72	
15	16QAM	36	39	17.73	17.70	17.66	18.9
15	16QAM	75	0	17.64	17.69	17.65	
15	64QAM	1	0	17.76	17.73	17.79	
15	64QAM	1	37	17.69	17.74	17.70	18.9
15	64QAM	1	74	17.72	17.80	17.72	
15	64QAM	36	0	17.64	17.66	17.73	
15	64QAM	36	20	17.68	17.72	17.68	18.9
15	64QAM	36	39	17.67	17.73	17.74	
15	64QAM	75	0	17.64	17.66	17.73	
Channel				18650	18900	19150	Tune-up limit (dbm)
Frequency (MHz)				1855	1880	1905	
10	QPSK	1	0	17.52	17.61	17.55	18.9
10	QPSK	1	25	17.51	17.52	17.42	
10	QPSK	1	49	17.53	17.53	17.49	
10	QPSK	25	0	17.69	17.61	17.63	18.9
10	QPSK	25	12	17.74	17.73	17.70	
10	QPSK	25	25	17.72	17.70	17.68	
10	QPSK	50	0	17.70	17.65	17.67	18.9
10	16QAM	1	0	17.91	17.97	17.95	
10	16QAM	1	25	17.91	17.86	17.98	
10	16QAM	1	49	17.84	17.93	17.82	18.9
10	16QAM	25	0	17.67	17.65	17.63	
10	16QAM	25	12	17.75	17.75	17.64	
10	16QAM	25	25	17.71	17.73	17.66	18.9
10	16QAM	50	0	17.67	17.64	17.66	
10	64QAM	1	0	17.76	17.76	17.77	
10	64QAM	1	25	17.74	17.84	17.74	18.9
10	64QAM	1	49	17.71	17.81	17.69	
10	64QAM	25	0	17.64	17.69	17.73	
10	64QAM	25	12	17.74	17.72	17.68	18.9
10	64QAM	25	25	17.69	17.69	17.70	
10	64QAM	50	0	17.69	17.71	17.65	
Channel				18625	18900	19175	Tune-up limit (dbm)
Frequency (MHz)				1852.5	1880	1907.5	
5	QPSK	1	0	17.54	17.52	17.58	18.9
5	QPSK	1	12	17.46	17.58	17.40	
5	QPSK	1	24	17.51	17.54	17.49	
5	QPSK	12	0	17.63	17.67	17.68	18.9
5	QPSK	12	7	17.68	17.69	17.70	
5	QPSK	12	13	17.66	17.73	17.69	
5	QPSK	25	0	17.69	17.62	17.70	18.9
5	16QAM	1	0	17.96	17.96	17.98	
5	16QAM	1	12	17.90	17.94	17.88	
5	16QAM	1	24	17.85	17.86	17.85	18.9
5	16QAM	12	0	17.98	17.86	17.71	
5	16QAM	12	7	17.73	17.76	17.75	
5	16QAM	12	13	17.72	17.65	17.66	18.9
5	16QAM	25	0	17.69	17.62	17.69	
5	64QAM	1	0	17.75	17.77	17.84	
5	64QAM	1	12	17.65	17.77	17.76	18.9
5	64QAM	1	24	17.76	17.76	17.74	
5	64QAM	12	0	17.64	17.72	17.70	
5	64QAM	12	7	17.68	17.68	17.71	18.9
5	64QAM	12	13	17.68	17.74	17.67	
5	64QAM	25	0	17.69	17.64	17.65	
Channel				18615	18900	19185	Tune-up limit (dbm)
Frequency (MHz)				1851.5	1880	1906.5	
3	QPSK	1	0	17.54	17.56	17.55	18.9
3	QPSK	1	8	17.45	17.55	17.43	
3	QPSK	1	14	17.47	17.58	17.47	
3	QPSK	8	0	17.60	17.65	17.72	18.9
3	QPSK	8	4	17.70	17.73	17.75	
3	QPSK	8	7	17.67	17.67	17.65	
3	QPSK	15	0	17.71	17.67	17.64	18.9
3	16QAM	1	0	17.91	17.91	17.88	
3	16QAM	1	8	17.89	17.85	17.82	
3	16QAM	1	14	17.86	17.93	17.88	18.9
3	16QAM	8	0	17.60	17.62	17.68	
3	16QAM	8	4	17.66	17.78	17.74	
3	16QAM	8	7	17.70	17.69	17.64	18.9
3	16QAM	15	0	17.67	17.71	17.71	
3	64QAM	1	0	17.73	17.67	17.66	
3	64QAM	1	8	17.67	17.75	17.77	18.9
3	64QAM	1	14	17.71	17.78	17.71	
3	64QAM	8	0	17.67	17.64	17.74	
3	64QAM	8	4	17.76	17.69	17.70	18.9
3	64QAM	8	7	17.71	17.69	17.76	
3	64QAM	15	0	17.71	17.72	17.69	
Channel				18607	18900	19193	Tune-up limit (dbm)
Frequency (MHz)				1850.7	1880	1909.3	
1.4	QPSK	1	0	17.49	17.58	17.46	18.9
1.4	QPSK	1	3	17.54	17.65	17.58	
1.4	QPSK	1	5	17.53	17.61	17.49	
1.4	QPSK	3	0	17.55	17.63	17.50	18.9
1.4	QPSK	3	1	17.61	17.67	17.63	
1.4	QPSK	3	3	17.59	17.64	17.54	
1.4	QPSK	6	0	17.64	17.67	17.58	18.9
1.4	16QAM	1	0	17.81	17.90	17.81	
1.4	16QAM	1	3	17.84	17.97	17.84	
1.4	16QAM	1	5	17.78	17.90	17.78	18.9
1.4	16QAM	3	0	17.65	17.74	17.63	
1.4	16QAM	3	1	17.71	17.79	17.64	
1.4	16QAM	3	3	17.62	17.74	17.63	18.9
1.4	16QAM	6	0	17.71	17.75	17.65	
1.4	64QAM	1	0	17.74	17.86	17.69	
1.4	64QAM	1	3	17.81	17.90	17.80	18.9
1.4	64QAM	1	5	17.73	17.83	17.72	
1.4	64QAM	3	0	17.72	17.82	17.70	
1.4	64QAM	3	1	17.79	17.88	17.74	18.9
1.4	64QAM	3	3	17.73	17.82	17.72	
1.4	64QAM	6	0	17.65	17.73	17.60	



Band 4							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				20050	20175	20300	
Frequency (MHz)				1720	1732.5	1745	
20	QPSK	1	0	20.05	20.09	19.99	
20	QPSK	1	48	19.93	19.92	19.91	21.1
20	QPSK	1	99	19.95	19.92	19.90	
20	QPSK	50	0	20.10	20.09	20.01	
20	QPSK	50	24	20.16	20.08	20.00	
20	QPSK	50	50	20.07	20.01	19.96	21.1
20	QPSK	100	0	20.11	20.13	19.90	
20	16QAM	1	0	20.39	20.41	20.33	
20	16QAM	1	49	20.28	20.25	20.16	21.1
20	16QAM	1	99	20.30	20.17	20.07	
20	16QAM	50	0	20.13	20.11	20.02	
20	16QAM	50	24	20.15	20.13	20.05	
20	16QAM	50	50	20.10	20.04	19.96	21.1
20	16QAM	100	0	20.12	20.11	19.96	
20	64QAM	1	0	20.21	20.25	20.19	
20	64QAM	1	49	20.13	20.07	20.08	21.1
20	64QAM	1	99	20.16	20.09	20.11	
20	64QAM	50	0	20.14	20.16	20.07	
20	64QAM	50	24	20.15	20.11	20.07	
20	64QAM	50	50	20.09	20.04	19.99	21.1
20	64QAM	100	0	20.12	20.10	19.96	
Channel				20250	20175	20325	
Frequency (MHz)				1717.5	1732.5	1747.5	
15	QPSK	1	0	20.03	20.00	19.92	
15	QPSK	1	37	19.93	19.91	19.90	21.1
15	QPSK	1	74	19.95	19.92	19.92	
15	QPSK	36	0	20.08	20.01	19.93	
15	QPSK	36	20	20.11	20.02	19.90	21.1
15	QPSK	36	39	19.99	19.96	19.90	
15	QPSK	75	0	20.02	20.12	19.91	
15	16QAM	1	0	20.39	20.32	20.23	
15	16QAM	1	37	20.26	20.23	20.06	21.1
15	16QAM	1	74	20.23	20.10	20.00	
15	16QAM	36	0	20.03	20.06	20.01	
15	16QAM	36	20	20.14	20.09	20.01	21.1
15	16QAM	36	39	20.05	20.04	19.91	
15	16QAM	75	0	20.09	20.05	19.96	
15	64QAM	1	0	20.12	20.20	20.14	
15	64QAM	1	37	20.04	19.98	19.98	21.1
15	64QAM	1	74	20.14	20.04	20.07	
15	64QAM	36	0	20.07	20.06	20.01	
15	64QAM	36	20	20.10	20.10	19.98	21.1
15	64QAM	36	39	20.04	20.03	19.96	
15	64QAM	75	0	20.08	20.03	19.90	
Channel				20000	20175	20350	
Frequency (MHz)				1715	1732.5	1750	
10	QPSK	1	0	20.01	20.03	19.98	
10	QPSK	1	25	19.91	19.92	19.93	21.1
10	QPSK	1	49	19.90	19.94	19.91	
10	QPSK	25	0	20.08	20.02	19.91	
10	QPSK	25	12	20.07	19.99	19.91	21.1
10	QPSK	25	25	19.98	20.00	19.96	
10	QPSK	50	0	20.10	20.05	19.92	
10	16QAM	1	0	20.34	20.32	20.27	
10	16QAM	1	25	20.17	20.21	20.05	21.1
10	16QAM	1	49	20.20	20.11	20.06	
10	16QAM	25	0	20.12	20.01	19.98	
10	16QAM	25	12	20.05	20.05	20.01	21.1
10	16QAM	25	25	20.10	19.95	19.92	
10	16QAM	50	0	20.05	20.07	19.93	
10	64QAM	1	0	20.16	20.19	20.13	
10	64QAM	1	25	20.10	19.99	20.01	21.1
10	64QAM	1	49	20.07	20.05	20.07	
10	64QAM	25	0	20.14	20.12	20.04	
10	64QAM	25	12	20.06	20.04	20.00	21.1
10	64QAM	25	25	20.02	20.04	19.93	
10	64QAM	50	0	20.02	20.10	19.94	
Channel				19975	20175	20375	
Frequency (MHz)				1712.5	1732.5	1752.5	
5	QPSK	1	0	19.95	20.00	19.90	
5	QPSK	1	12	19.95	19.92	19.90	21.1
5	QPSK	1	24	19.94	19.92	19.91	
5	QPSK	12	0	20.04	20.01	19.93	
5	QPSK	12	7	20.07	19.99	19.97	21.1
5	QPSK	12	13	20.00	19.95	19.92	
5	QPSK	25	0	20.10	20.06	19.91	
5	16QAM	1	0	20.37	20.41	20.30	
5	16QAM	1	12	20.24	20.16	20.12	21.1
5	16QAM	1	24	20.27	20.15	19.97	
5	16QAM	12	0	20.08	20.06	19.97	
5	16QAM	12	7	20.10	20.10	19.96	21.1
5	16QAM	12	13	20.07	19.95	19.90	
5	16QAM	25	0	20.07	20.06	19.93	
5	64QAM	1	0	20.15	20.25	20.16	
5	64QAM	1	12	20.03	20.01	20.08	21.1
5	64QAM	1	24	20.13	20.03	20.08	
5	64QAM	12	0	20.10	20.15	19.96	
5	64QAM	12	7	20.15	20.03	20.05	21.1
5	64QAM	12	13	20.00	20.02	19.95	
5	64QAM	25	0	20.08	20.08	19.90	
Channel				19965	20175	20385	
Frequency (MHz)				1711.5	1732.5	1753.5	
3	QPSK	1	0	19.98	20.07	19.95	
3	QPSK	1	8	19.94	19.91	19.92	21.1
3	QPSK	1	14	19.94	19.91	19.90	
3	QPSK	8	0	20.01	20.05	19.99	
3	QPSK	8	4	20.12	19.96	20.00	21.1
3	QPSK	8	7	20.04	19.96	19.93	
3	QPSK	15	0	20.03	20.12	19.91	
3	16QAM	1	0	20.33	20.36	20.26	
3	16QAM	1	8	20.17	20.14	20.14	21.1
3	16QAM	1	14	20.22	20.10	20.01	
3	16QAM	8	0	20.06	20.05	19.96	
3	16QAM	8	4	20.11	20.07	20.01	21.1
3	16QAM	8	7	20.06	19.95	19.90	
3	16QAM	15	0	20.04	20.06	19.95	
3	64QAM	1	0	20.14	20.25	20.16	
3	64QAM	1	8	20.06	19.97	20.07	21.1
3	64QAM	1	14	20.14	20.06	20.05	
3	64QAM	8	0	20.07	20.14	20.01	
3	64QAM	8	4	20.14	20.01	20.03	21.1
3	64QAM	8	7	20.04	19.97	19.96	
3	64QAM	15	0	20.04	20.07	19.91	
Channel				19957	20175	20393	
Frequency (MHz)				1710.7	1732.5	1754.3	
1.4	QPSK	1	0	19.95	19.93	19.92	
1.4	QPSK	1	3	20.01	19.97	19.94	21.1
1.4	QPSK	1	5	19.91	19.94	19.90	
1.4	QPSK	3	0	19.98	19.91	19.90	
1.4	QPSK	3	1	20.02	19.95	19.90	21.1
1.4	QPSK	3	3	19.99	19.90	19.92	
1.4	QPSK	6	0	20.04	20.00	19.92	
1.4	16QAM	1	0	20.27	20.16	20.10	
1.4	16QAM	1	3	20.30	20.25	20.15	
1.4	16QAM	1	5	20.25	20.21	20.08	21.1
1.4	16QAM	3	0	20.02	19.95	19.93	
1.4	16QAM	3	1	20.05	20.01	19.96	
1.4	16QAM	3	3	20.01	19.94	19.91	21.1
1.4	16QAM	6	0	20.12	20.03	19.96	
1.4	64QAM	1	0	20.23	20.17	20.02	
1.4	64QAM	1	3	20.27	20.20	20.04	21.1
1.4	64QAM	1	5	20.22	20.13	19.94	
1.4	64QAM	3	0	20.18	20.12	19.98	
1.4	64QAM	3	1	20.23	20.18	20.04	
1.4	64QAM	3	3	20.17	20.13	19.98	21.1
1.4	64QAM	6	0	20.04	20.00	19.90	



Band 5							
Ant 1							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low (Ch.)	Power Middle (Ch.)	Power High (Ch.)	Tune-up limit (dBm)
Channel				20450	20525	20600	
Frequency (MHz)				829	836.5	844	
10	QPSK	1	0	24.09	24.12	24.20	25.7
10	QPSK	1	25	23.99	24.14	24.15	
10	QPSK	1	49	24.18	24.24	24.16	
10	QPSK	25	0	23.22	23.22	23.21	24.7
10	QPSK	25	12	23.27	23.24	23.31	
10	QPSK	25	25	23.26	23.28	23.27	
10	QPSK	50	0	23.24	23.26	23.25	24.7
10	16QAM	1	0	23.42	23.48	23.50	
10	16QAM	1	25	23.44	23.49	23.59	
10	16QAM	1	49	23.55	23.64	23.48	23.7
10	16QAM	25	0	22.17	22.28	22.24	
10	16QAM	25	12	22.32	22.27	22.30	
10	16QAM	25	25	22.19	22.25	22.38	23.7
10	16QAM	50	0	22.31	22.26	22.33	
10	64QAM	1	0	22.88	22.77	22.86	
10	64QAM	1	25	22.95	22.74	22.89	23.7
10	64QAM	1	49	22.95	22.56	22.14	
10	64QAM	25	0	21.70	21.80	21.65	
10	64QAM	25	12	21.81	21.83	21.85	22.7
10	64QAM	25	25	21.83	21.79	21.64	
10	64QAM	50	0	21.88	21.80	21.51	
Channel				20425	20525	20625	Tune-up limit (dBm)
Frequency (MHz)				826.5	836.5	846.5	
5	QPSK	1	0	24.19	24.13	24.18	25.7
5	QPSK	1	12	24.09	24.21	23.89	
5	QPSK	1	24	24.08	24.12	23.96	
5	QPSK	12	0	23.30	23.27	23.23	24.7
5	QPSK	12	7	23.23	23.30	23.00	
5	QPSK	12	13	23.14	23.25	23.05	
5	QPSK	25	0	23.22	23.21	23.15	24.7
5	16QAM	1	0	23.57	23.50	23.47	
5	16QAM	1	12	23.39	23.54	23.21	
5	16QAM	1	24	23.39	23.55	23.17	23.7
5	16QAM	12	0	22.26	22.34	22.26	
5	16QAM	12	7	22.20	22.31	22.18	
5	16QAM	12	13	22.19	22.30	22.22	23.7
5	16QAM	25	0	22.26	22.22	22.30	
5	64QAM	1	0	22.94	22.94	22.53	
5	64QAM	1	12	22.83	22.89	21.92	23.7
5	64QAM	1	24	22.81	22.82	21.84	
5	64QAM	12	0	21.84	21.90	21.19	
5	64QAM	12	7	21.75	21.81	20.82	22.7
5	64QAM	12	13	21.78	21.83	21.71	
5	64QAM	25	0	21.70	21.81	20.89	
Channel				20415	20525	20635	Tune-up limit (dBm)
Frequency (MHz)				825.5	836.5	847.5	
3	QPSK	1	0	24.12	24.15	23.99	25.7
3	QPSK	1	8	24.17	24.20	23.99	
3	QPSK	1	14	24.08	24.13	24.04	
3	QPSK	8	0	23.28	23.24	22.89	24.7
3	QPSK	8	4	23.19	23.27	23.03	
3	QPSK	8	7	23.25	23.23	23.20	
3	QPSK	15	0	23.20	23.22	23.02	24.7
3	16QAM	1	0	23.50	23.43	23.20	
3	16QAM	1	8	23.50	23.53	23.21	
3	16QAM	1	14	23.41	23.51	23.27	23.7
3	16QAM	8	0	22.33	22.29	22.05	
3	16QAM	8	4	22.23	22.39	22.15	
3	16QAM	8	7	22.24	22.33	22.19	23.7
3	16QAM	15	0	22.30	22.30	22.10	
3	64QAM	1	0	22.91	22.86	21.84	
3	64QAM	1	8	22.90	23.03	21.82	23.7
3	64QAM	1	14	22.90	22.88	21.79	
3	64QAM	8	0	21.75	21.80	21.63	
3	64QAM	8	4	21.83	21.88	21.73	22.7
3	64QAM	8	7	21.76	21.80	20.75	
3	64QAM	15	0	21.78	21.85	20.77	
Channel				20407	20525	20643	Tune-up limit (dBm)
Frequency (MHz)				824.7	836.5	848.3	
1.4	QPSK	1	0	24.11	24.14	24.03	25.7
1.4	QPSK	1	3	24.10	24.10	24.15	
1.4	QPSK	1	5	23.95	24.09	24.02	
1.4	QPSK	3	0	24.15	24.08	24.06	24.7
1.4	QPSK	3	1	24.10	24.13	24.19	
1.4	QPSK	3	3	24.09	24.08	24.12	
1.4	QPSK	6	0	23.11	23.27	23.23	24.7
1.4	16QAM	1	0	23.38	23.40	23.32	
1.4	16QAM	1	3	23.38	23.55	23.53	
1.4	16QAM	1	5	23.33	23.42	23.39	24.7
1.4	16QAM	3	0	23.15	23.20	23.11	
1.4	16QAM	3	1	23.22	23.29	23.23	
1.4	16QAM	3	3	23.13	23.20	23.15	23.7
1.4	16QAM	6	0	22.19	22.29	22.31	
1.4	64QAM	1	0	22.79	22.85	21.81	
1.4	64QAM	1	3	22.82	22.95	21.84	23.7
1.4	64QAM	1	5	22.75	22.82	21.98	
1.4	64QAM	3	0	22.75	22.76	21.77	
1.4	64QAM	3	1	22.79	22.89	21.84	23.7
1.4	64QAM	3	3	22.74	22.88	22.00	
1.4	64QAM	6	0	21.70	21.79	21.65	



Band 7							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				20850	21100	21350	
Frequency (MHz)				2510	2535	2560	
20	QPSK	1	0	20.46	20.57	20.58	21.6
20	QPSK	1	49	20.52	20.66	20.62	
20	QPSK	1	99	20.62	20.72	20.63	
20	QPSK	50	0	20.58	20.71	20.69	21.6
20	QPSK	50	24	20.68	20.75	20.72	
20	QPSK	50	50	20.69	20.84	20.76	
20	QPSK	100	0	20.69	20.73	20.70	21.6
20	16QAM	1	0	20.80	20.89	20.96	
20	16QAM	1	49	20.88	21.02	20.95	
20	16QAM	1	99	21.02	21.11	21.00	21.6
20	16QAM	50	0	20.56	20.72	20.70	
20	16QAM	50	24	20.73	20.76	20.73	
20	16QAM	50	50	20.71	20.85	20.80	21.6
20	16QAM	100	0	20.67	20.73	20.70	
20	64QAM	1	0	20.61	20.70	20.76	
20	64QAM	1	49	20.73	20.82	20.79	21.6
20	64QAM	1	99	20.90	20.96	20.88	
20	64QAM	50	0	20.59	20.71	20.69	
20	64QAM	50	24	20.71	20.76	20.73	21.6
20	64QAM	50	50	20.73	20.84	20.77	
20	64QAM	100	0	20.71	20.75	20.69	
Channel				20925	21100	21375	Tune-up limit (dBm)
Frequency (MHz)				2507.5	2535	2562.5	
15	QPSK	1	0	20.47	20.42	20.43	21.6
15	QPSK	1	37	20.41	20.48	20.45	
15	QPSK	1	74	20.40	20.55	20.48	
15	QPSK	36	0	20.44	20.52	20.49	21.6
15	QPSK	36	20	20.49	20.56	20.63	
15	QPSK	36	39	20.50	20.63	20.57	
15	QPSK	75	0	20.45	20.54	20.58	21.6
15	16QAM	1	0	20.63	20.78	20.73	
15	16QAM	1	37	20.68	20.82	20.75	
15	16QAM	1	74	20.75	20.89	20.78	21.6
15	16QAM	36	0	20.46	20.53	20.49	
15	16QAM	36	20	20.49	20.55	20.58	
15	16QAM	36	39	20.48	20.64	20.57	21.6
15	16QAM	75	0	20.46	20.56	20.59	
15	64QAM	1	0	20.49	20.59	20.62	
15	64QAM	1	37	20.57	20.74	20.67	21.6
15	64QAM	1	74	20.59	20.78	20.70	
15	64QAM	36	0	20.39	20.56	20.62	
15	64QAM	36	20	20.52	20.59	20.59	21.6
15	64QAM	36	39	20.51	20.68	20.58	
15	64QAM	75	0	20.47	20.56	20.56	
Channel				20800	21100	21400	Tune-up limit (dBm)
Frequency (MHz)				2505	2535	2565	
10	QPSK	1	0	20.43	20.40	20.47	21.6
10	QPSK	1	25	20.45	20.40	20.46	
10	QPSK	1	49	20.53	20.48	20.40	
10	QPSK	25	0	20.43	20.52	20.47	21.6
10	QPSK	25	12	20.45	20.53	20.48	
10	QPSK	25	25	20.46	20.59	20.54	
10	QPSK	50	0	20.44	20.55	20.47	21.6
10	16QAM	1	0	20.62	20.74	20.71	
10	16QAM	1	25	20.64	20.61	20.73	
10	16QAM	1	49	20.67	20.85	20.77	21.6
10	16QAM	25	0	20.41	20.49	20.45	
10	16QAM	25	12	20.45	20.54	20.47	
10	16QAM	25	25	20.44	20.60	20.52	21.6
10	16QAM	50	0	20.45	20.52	20.47	
10	64QAM	1	0	20.52	20.62	20.61	
10	64QAM	1	25	20.56	20.76	20.70	21.6
10	64QAM	1	49	20.56	20.76	20.72	
10	64QAM	25	0	20.42	20.57	20.49	
10	64QAM	25	12	20.48	20.61	20.55	21.6
10	64QAM	25	25	20.46	20.66	20.59	
10	64QAM	50	0	20.47	20.59	20.53	
Channel				20775	21100	21425	Tune-up limit (dBm)
Frequency (MHz)				2502.5	2535	2567.5	
5	QPSK	1	0	20.40	20.40	20.40	21.6
5	QPSK	1	12	20.40	20.48	20.41	
5	QPSK	1	24	20.40	20.48	20.40	
5	QPSK	12	0	20.41	20.54	20.52	21.6
5	QPSK	12	7	20.47	20.53	20.54	
5	QPSK	12	13	20.44	20.61	20.51	
5	QPSK	25	0	20.44	20.55	20.52	21.6
5	16QAM	1	0	20.68	20.75	20.73	
5	16QAM	1	12	20.62	20.73	20.70	
5	16QAM	1	24	20.68	20.80	20.73	21.6
5	16QAM	12	0	20.49	20.56	20.56	
5	16QAM	12	7	20.46	20.54	20.51	
5	16QAM	12	13	20.43	20.66	20.52	21.6
5	16QAM	25	0	20.42	20.55	20.55	
5	64QAM	1	0	20.52	20.68	20.65	
5	64QAM	1	12	20.50	20.75	20.65	21.6
5	64QAM	1	24	20.54	20.74	20.65	
5	64QAM	12	0	20.49	20.65	20.60	
5	64QAM	12	7	20.48	20.60	20.58	21.6
5	64QAM	12	13	20.48	20.67	20.57	
5	64QAM	25	0	20.43	20.59	20.57	



Band 12							
Ant 1							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low [dB]	Power Middle [dB]	Power High [dB]	Tune-up limit [dBm]
Channel				23060	23095	23130	
Frequency (MHz)				704	707.5	711	
10	QPSK	1	0	23.86	23.82	23.80	25.7
10	QPSK	1	25	23.75	23.85	23.77	
10	QPSK	1	49	23.89	23.88	23.81	
10	QPSK	25	0	22.95	22.92	22.90	
10	QPSK	25	12	23.03	22.92	22.98	24.7
10	QPSK	25	25	23.01	22.94	22.95	
10	QPSK	50	0	22.97	22.99	22.97	
10	16QAM	1	0	23.25	23.19	23.14	24.7
10	16QAM	1	25	23.25	23.24	23.19	
10	16QAM	1	49	23.30	23.28	23.19	
10	16QAM	25	0	21.94	21.92	21.86	
10	16QAM	25	12	22.01	21.86	21.92	23.7
10	16QAM	25	25	21.88	22.00	21.87	
10	16QAM	50	0	22.02	21.94	21.88	
10	64QAM	1	0	22.58	22.50	22.58	23.7
10	64QAM	1	25	22.63	22.67	22.64	
10	64QAM	1	49	22.68	22.68	22.58	
10	64QAM	25	0	21.49	21.44	21.40	
10	64QAM	25	12	21.58	21.43	21.57	22.7
10	64QAM	25	25	21.47	21.47	21.41	
10	64QAM	50	0	21.59	21.45	21.45	
Channel				23035	23095	23155	Tune-up limit [dBm]
Frequency (MHz)				701.5	707.5	713.5	
5	QPSK	1	0	23.88	23.80	23.79	
5	QPSK	1	12	23.88	23.84	23.84	25.7
5	QPSK	1	24	23.78	23.82	23.80	
5	QPSK	12	0	22.91	22.93	22.91	
5	QPSK	12	7	23.00	22.86	22.96	24.7
5	QPSK	12	13	22.93	22.94	22.85	
5	QPSK	25	0	22.99	22.87	22.91	
5	16QAM	1	0	23.20	23.22	23.09	24.7
5	16QAM	1	12	23.14	23.21	23.15	
5	16QAM	1	24	23.14	23.15	23.09	
5	16QAM	12	0	21.99	21.98	21.94	
5	16QAM	12	7	21.98	21.89	21.93	23.7
5	16QAM	12	13	21.96	21.92	21.87	
5	16QAM	25	0	21.94	21.98	21.92	
5	64QAM	1	0	22.69	22.61	22.58	
5	64QAM	1	12	22.59	22.54	22.60	23.7
5	64QAM	1	24	22.66	22.63	22.56	
5	64QAM	12	0	21.51	21.50	21.41	
5	64QAM	12	7	21.50	21.45	21.50	22.7
5	64QAM	12	13	21.52	21.45	21.42	
5	64QAM	25	0	21.44	21.45	21.39	
Channel				23025	23095	23165	Tune-up limit [dBm]
Frequency (MHz)				700.5	707.5	714.5	
3	QPSK	1	0	23.84	23.80	23.81	
3	QPSK	1	8	23.85	23.84	23.80	25.7
3	QPSK	1	14	23.85	23.83	23.77	
3	QPSK	8	0	23.01	22.94	22.90	
3	QPSK	8	4	22.92	22.95	22.91	24.7
3	QPSK	8	7	22.90	22.87	22.84	
3	QPSK	15	0	22.90	22.92	22.84	
3	16QAM	1	0	23.24	23.15	23.17	24.7
3	16QAM	1	8	23.19	23.23	23.16	
3	16QAM	1	14	23.23	23.22	23.18	
3	16QAM	8	0	22.06	21.94	21.94	
3	16QAM	8	4	22.01	22.06	22.01	23.7
3	16QAM	8	7	22.03	21.92	21.88	
3	16QAM	15	0	22.01	21.86	21.86	
3	64QAM	1	0	22.70	22.60	22.53	23.7
3	64QAM	1	8	22.68	22.72	22.60	
3	64QAM	1	14	22.66	22.60	22.57	
3	64QAM	8	0	21.60	21.44	21.47	
3	64QAM	8	4	21.60	21.50	21.53	22.7
3	64QAM	8	7	21.47	21.45	21.41	
3	64QAM	15	0	21.45	21.39	21.36	
Channel				23017	23095	23173	Tune-up limit [dBm]
Frequency (MHz)				699.7	707.5	715.3	
1.4	QPSK	1	0	23.80	23.74	23.79	
1.4	QPSK	1	3	23.81	23.79	23.77	25.7
1.4	QPSK	1	5	23.80	23.74	23.70	
1.4	QPSK	3	0	23.82	23.73	23.71	
1.4	QPSK	3	1	23.84	23.75	23.79	
1.4	QPSK	3	3	23.78	23.75	23.71	
1.4	QPSK	6	0	22.97	22.78	22.79	24.7
1.4	16QAM	1	0	23.15	23.06	23.09	
1.4	16QAM	1	3	23.18	23.21	23.09	
1.4	16QAM	1	5	23.08	23.08	22.98	24.7
1.4	16QAM	3	0	22.96	22.81	22.80	
1.4	16QAM	3	1	22.96	22.87	22.88	
1.4	16QAM	3	3	22.92	22.88	22.78	23.7
1.4	16QAM	6	0	21.94	21.86	21.82	
1.4	64QAM	1	0	22.59	22.48	22.43	
1.4	64QAM	1	3	22.69	22.57	22.48	
1.4	64QAM	1	5	22.55	22.46	22.43	23.7
1.4	64QAM	3	0	22.57	22.51	22.45	
1.4	64QAM	3	1	22.55	22.45	22.53	
1.4	64QAM	3	3	22.55	22.57	22.46	
1.4	64QAM	6	0	21.40	21.32	21.31	22.7



Band 13							
Ant 1							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				23230			
Frequency (MHz)				762			
10	QPSK	1	0	23.60			25.2
10	QPSK	1	25	23.47			
10	QPSK	1	49	23.51			
10	QPSK	25	0	22.56			24.2
10	QPSK	25	12	22.65			
10	QPSK	25	25	22.56			
10	QPSK	50	0	22.58			24.2
10	16QAM	1	0	22.75			
10	16QAM	1	25	22.82			
10	16QAM	1	49	22.75			23.2
10	16QAM	25	0	21.59			
10	16QAM	25	12	21.62			
10	16QAM	25	25	21.61			23.2
10	16QAM	50	0	21.57			
10	64QAM	1	0	23.07			
10	64QAM	1	25	23.04			23.2
10	64QAM	1	49	23.01			
10	64QAM	25	0	22.07			
10	64QAM	25	12	22.06			22.2
10	64QAM	25	25	22.02			
10	64QAM	50	0	22.04			
Channel				23206 23230 23255			Tune-up limit (dBm)
Frequency (MHz)				779.5 762 784.5			
5	QPSK	1	0	23.50	23.45	23.49	25.2
5	QPSK	1	12	23.45	23.54	23.52	
5	QPSK	1	24	23.50	23.51	23.52	
5	QPSK	12	0	22.63	22.56	22.61	24.2
5	QPSK	12	7	22.67	22.64	22.57	
5	QPSK	12	13	22.67	22.62	22.52	
5	QPSK	25	0	22.64	22.57	22.55	24.2
5	16QAM	1	0	22.71	22.71	22.78	
5	16QAM	1	12	22.78	22.85	22.79	
5	16QAM	1	24	22.82	22.85	22.72	23.2
5	16QAM	12	0	21.70	21.62	21.68	
5	16QAM	12	7	21.68	21.57	21.60	
5	16QAM	12	13	21.69	21.60	21.70	23.2
5	16QAM	25	0	21.63	21.64	21.54	
5	64QAM	1	0	22.14	22.25	22.17	
5	64QAM	1	12	22.26	22.30	22.21	23.2
5	64QAM	1	24	22.26	22.23	22.15	
5	64QAM	12	0	21.19	21.11	21.20	
5	64QAM	12	7	21.24	21.14	21.08	22.2
5	64QAM	12	13	21.15	21.17	21.08	
5	64QAM	25	0	21.21	21.11	21.10	



Band 14							
Ant 1							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				23330	23330		
Frequency (MHz)				793			
10	QPSK	1	0	24.23			25.7
10	QPSK	1	25	24.12			
10	QPSK	1	49	24.04			
10	QPSK	25	0	23.11			
10	QPSK	25	12	23.16			24.7
10	QPSK	25	25	23.16			
10	QPSK	50	0	23.15			
10	16QAM	1	0	23.49			24.7
10	16QAM	1	25	23.41			
10	16QAM	1	49	23.37			
10	16QAM	25	0	22.10			
10	16QAM	25	12	22.09			23.7
10	16QAM	25	25	22.19			
10	16QAM	50	0	22.16			
10	64QAM	1	0	22.81			23.7
10	64QAM	1	25	22.86			
10	64QAM	1	49	22.73			
10	64QAM	25	0	21.72			
10	64QAM	25	12	21.81			22.7
10	64QAM	25	25	21.67			
10	64QAM	50	0	21.66			
Channel				23306	23330	23356	Tune-up limit (dBm)
Frequency (MHz)				790.5	793	795.5	
5	QPSK	1	0	23.98	24.04	24.05	
5	QPSK	1	12	24.14	24.19	24.14	25.7
5	QPSK	1	24	24.08	24.07	24.05	
5	QPSK	12	0	23.13	23.12	23.08	
5	QPSK	12	7	23.21	23.21	23.14	24.7
5	QPSK	12	13	23.14	23.16	23.12	
5	QPSK	25	0	23.11	23.12	23.03	
5	16QAM	1	0	23.40	23.37	23.34	
5	16QAM	1	12	23.47	23.44	23.43	24.7
5	16QAM	1	24	23.45	23.34	23.39	
5	16QAM	12	0	22.13	22.09	22.10	
5	16QAM	12	7	22.24	22.13	22.18	23.7
5	16QAM	12	13	22.15	22.19	22.15	
5	16QAM	25	0	22.17	22.07	22.08	
5	64QAM	1	0	22.75	22.83	22.82	
5	64QAM	1	12	22.89	22.72	22.82	23.7
5	64QAM	1	24	22.71	22.80	22.80	
5	64QAM	12	0	21.63	21.70	21.65	
5	64QAM	12	7	21.69	21.72	21.71	22.7
5	64QAM	12	13	21.75	21.67	21.65	
5	64QAM	25	0	21.71	21.66	21.61	



Band 17							
Ant 1							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch./	Power Middle Ch./	Power High Ch./	Tune-up limit (dBm)
Channel				23780	23790	23800	
Frequency (MHz)				709	710	711	
10	QPSK	1	0	24.25	24.20	24.11	25.7
10	QPSK	1	25	24.30	24.35	24.15	
10	QPSK	1	49	24.30	24.21	24.20	
10	QPSK	25	0	23.29	23.30	23.28	24.7
10	QPSK	25	12	23.40	23.30	23.28	
10	QPSK	25	25	23.38	23.36	23.44	
10	QPSK	50	0	23.35	23.29	23.30	24.7
10	16QAM	1	0	23.62	23.59	23.59	
10	16QAM	1	25	23.66	23.61	23.58	
10	16QAM	1	49	23.60	23.63	23.62	23.7
10	16QAM	25	0	22.29	22.27	22.30	
10	16QAM	25	12	22.41	22.37	22.28	
10	16QAM	25	25	22.44	22.35	22.45	23.7
10	16QAM	50	0	22.37	22.35	22.25	
10	64QAM	1	0	23.01	22.91	22.99	
10	64QAM	1	25	23.11	23.02	23.01	23.7
10	64QAM	1	49	23.05	23.02	22.93	
10	64QAM	25	0	21.81	21.82	21.78	
10	64QAM	25	12	21.95	21.88	21.82	22.7
10	64QAM	25	25	21.89	21.92	21.97	
10	64QAM	50	0	21.95	21.82	21.85	
Channel				23765	23790	23825	Tune-up limit (dBm)
Frequency (MHz)				706.5	710	713.5	
5	QPSK	1	0	24.16	24.23	24.17	25.7
5	QPSK	1	12	24.32	24.33	24.24	
5	QPSK	1	24	24.30	24.32	24.28	
5	QPSK	12	0	23.28	23.30	23.29	24.7
5	QPSK	12	7	23.31	23.30	23.32	
5	QPSK	12	13	23.40	23.37	23.34	
5	QPSK	25	0	23.34	23.27	23.38	24.7
5	16QAM	1	0	23.61	23.57	23.51	
5	16QAM	1	12	23.64	23.63	23.59	
5	16QAM	1	24	23.62	23.61	23.59	23.7
5	16QAM	12	0	22.38	22.40	22.27	
5	16QAM	12	7	22.39	22.35	22.30	
5	16QAM	12	13	22.34	22.35	22.30	23.7
5	16QAM	25	0	22.35	22.38	22.37	
5	64QAM	1	0	22.79	22.83	23.01	
5	64QAM	1	12	23.01	23.08	22.96	23.7
5	64QAM	1	24	23.04	23.07	22.97	
5	64QAM	12	0	21.93	21.92	21.91	
5	64QAM	12	7	21.96	21.91	21.94	22.7
5	64QAM	12	13	21.92	21.96	21.92	
5	64QAM	25	0	21.86	21.84	21.91	



Band 25							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				26140	26340	26590	
Frequency (MHz)				1860	1880	1905	
20	QPSK	1	0	17.68	17.70	17.58	
20	QPSK	1	49	17.58	17.66	17.56	18.9
20	QPSK	1	99	17.59	17.66	17.55	
20	QPSK	50	0	17.74	17.77	17.68	
20	QPSK	50	24	17.83	17.82	17.89	
20	QPSK	50	50	17.78	17.78	17.75	18.9
20	QPSK	100	0	17.81	17.78	17.64	
20	16QAM	1	0	18.01	17.98	17.98	
20	16QAM	1	49	17.93	17.95	17.93	18.9
20	16QAM	1	99	17.91	17.95	17.92	
20	16QAM	50	0	17.77	17.77	17.85	
20	16QAM	50	24	17.80	17.83	17.70	18.9
20	16QAM	50	50	17.77	17.84	17.73	
20	16QAM	100	0	17.77	17.78	17.63	
20	64QAM	1	0	17.91	17.84	17.75	
20	64QAM	1	49	17.80	17.88	17.77	18.9
20	64QAM	1	99	17.81	17.91	17.79	
20	64QAM	50	0	17.78	17.76	17.70	
20	64QAM	50	24	17.82	17.86	17.70	18.9
20	64QAM	50	50	17.80	17.83	17.79	
20	64QAM	100	0	17.79	17.82	17.68	
Channel				26115	26340	26615	Tune-up limit (dBm)
Frequency (MHz)				1857.5	1880	1907.5	
15	QPSK	1	0	17.60	17.61	17.52	
15	QPSK	1	37	17.53	17.64	17.48	18.9
15	QPSK	1	74	17.52	17.57	17.54	
15	QPSK	36	0	17.66	17.71	17.63	
15	QPSK	36	20	17.73	17.77	17.81	18.9
15	QPSK	36	39	17.71	17.77	17.75	
15	QPSK	75	0	17.72	17.73	17.57	
15	16QAM	1	0	18.01	17.95	17.88	
15	16QAM	1	37	17.89	17.95	17.85	18.9
15	16QAM	1	74	17.90	17.92	17.84	
15	16QAM	36	0	17.73	17.76	17.57	
15	16QAM	36	20	17.79	17.77	17.70	18.9
15	16QAM	36	39	17.76	17.74	17.69	
15	16QAM	75	0	17.69	17.71	17.61	
15	64QAM	1	0	17.84	17.76	17.72	
15	64QAM	1	37	17.71	17.78	17.70	18.9
15	64QAM	1	74	17.72	17.85	17.70	
15	64QAM	36	0	17.76	17.76	17.60	
15	64QAM	36	20	17.72	17.63	17.69	18.9
15	64QAM	36	39	17.70	17.78	17.78	
15	64QAM	75	0	17.75	17.76	17.63	
Channel				26090	26340	26640	Tune-up limit (dBm)
Frequency (MHz)				1855	1880	1910	
10	QPSK	1	0	17.58	17.70	17.55	
10	QPSK	1	25	17.54	17.66	17.56	18.9
10	QPSK	1	49	17.51	17.62	17.54	
10	QPSK	25	0	17.74	17.76	17.60	
10	QPSK	25	12	17.74	17.81	17.65	18.9
10	QPSK	25	25	17.78	17.71	17.67	
10	QPSK	50	0	17.74	17.75	17.63	
10	16QAM	1	0	18.01	17.92	17.94	
10	16QAM	1	25	17.86	17.92	17.83	18.9
10	16QAM	1	49	17.91	17.89	17.91	
10	16QAM	25	0	17.73	17.67	17.59	
10	16QAM	25	12	17.79	17.80	17.65	18.9
10	16QAM	25	25	17.75	17.75	17.67	
10	16QAM	50	0	17.73	17.72	17.63	
10	64QAM	1	0	17.83	17.80	17.75	
10	64QAM	1	25	17.74	17.83	17.76	18.9
10	64QAM	1	49	17.81	17.85	17.71	
10	64QAM	25	0	17.74	17.71	17.66	
10	64QAM	25	12	17.77	17.79	17.64	18.9
10	64QAM	25	25	17.74	17.76	17.78	
10	64QAM	50	0	17.72	17.71	17.66	
Channel				26055	26340	26695	Tune-up limit (dBm)
Frequency (MHz)				1852.5	1880	1912.5	
5	QPSK	1	0	17.68	17.66	17.50	
5	QPSK	1	12	17.46	17.58	17.53	18.9
5	QPSK	1	24	17.52	17.60	17.52	
5	QPSK	12	0	17.67	17.74	17.65	
5	QPSK	12	7	17.60	17.79	17.68	18.9
5	QPSK	12	13	17.75	17.70	17.75	
5	QPSK	25	0	17.80	17.78	17.64	
5	16QAM	1	0	17.93	17.95	17.91	
5	16QAM	1	12	17.87	17.88	17.90	18.9
5	16QAM	1	24	17.84	17.88	17.92	
5	16QAM	12	0	17.77	17.86	17.75	
5	16QAM	12	7	17.75	17.75	17.66	18.9
5	16QAM	12	13	17.74	17.80	17.72	
5	16QAM	25	0	17.70	17.73	17.59	
5	64QAM	1	0	17.81	17.76	17.68	
5	64QAM	1	12	17.79	17.87	17.75	18.9
5	64QAM	1	24	17.74	17.85	17.75	
5	64QAM	12	0	17.74	17.77	17.63	
5	64QAM	12	7	17.80	17.81	17.70	18.9
5	64QAM	12	13	17.76	17.75	17.71	
5	64QAM	25	0	17.72	17.80	17.68	
Channel				26055	26340	26675	Tune-up limit (dBm)
Frequency (MHz)				1851.5	1880	1913.5	
3	QPSK	1	0	17.68	17.64	17.53	
3	QPSK	1	8	17.46	17.63	17.53	18.9
3	QPSK	1	14	17.51	17.63	17.53	
3	QPSK	8	0	17.74	17.71	17.67	
3	QPSK	8	4	17.80	17.72	17.60	18.9
3	QPSK	8	7	17.78	17.71	17.69	
3	QPSK	15	0	17.78	17.76	17.63	
3	16QAM	1	0	17.88	17.91	17.93	
3	16QAM	1	8	17.84	17.93	17.84	18.9
3	16QAM	1	14	17.85	17.90	17.90	
3	16QAM	8	0	17.70	17.77	17.66	
3	16QAM	8	4	17.71	17.75	17.65	18.9
3	16QAM	8	7	17.71	17.78	17.73	
3	16QAM	15	0	17.71	17.68	17.57	
3	64QAM	1	0	17.91	17.76	17.65	
3	64QAM	1	8	17.73	17.82	17.71	18.9
3	64QAM	1	14	17.79	17.90	17.75	
3	64QAM	8	0	17.68	17.78	17.67	
3	64QAM	8	4	17.78	17.81	17.64	18.9
3	64QAM	8	7	17.79	17.75	17.75	
3	64QAM	15	0	17.74	17.75	17.68	
Channel				26047	26340	26883	Tune-up limit (dBm)
Frequency (MHz)				1850.7	1880	1914.3	
1.4	QPSK	1	0	17.53	17.50	17.43	
1.4	QPSK	1	3	17.65	17.65	17.55	18.9
1.4	QPSK	1	5	17.61	17.61	17.49	
1.4	QPSK	3	0	17.59	17.59	17.47	
1.4	QPSK	3	1	17.66	17.65	17.50	18.9
1.4	QPSK	3	3	17.65	17.64	17.51	
1.4	QPSK	6	0	17.69	17.68	17.55	18.9
1.4	16QAM	1	0	17.90	17.85	17.77	
1.4	16QAM	1	3	17.99	18.01	17.92	
1.4	16QAM	1	5	17.85	17.97	17.81	18.9
1.4	16QAM	3	0	17.68	17.71	17.55	
1.4	16QAM	3	1	17.72	17.81	17.59	
1.4	16QAM	3	3	17.70	17.71	17.58	18.9
1.4	16QAM	6	0	17.82	17.82	17.67	
1.4	64QAM	1	0	17.72	17.69	17.68	
1.4	64QAM	1	3	17.84	17.87	17.78	18.9
1.4	64QAM	1	5	17.81	17.83	17.74	
1.4	64QAM	3	0	17.77	17.80	17.66	
1.4	64QAM	3	1	17.85	17.88	17.70	18.9
1.4	64QAM	3	3	17.81	17.83	17.70	
1.4	64QAM	6	0	17.68	17.71	17.57	18.9



Band 26							
Ant 1							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				26765	26865	26965	
Frequency (MHz)				821.5	831.5	841.5	
15	QPSK	1	0	24.04	24.05	24.03	25.7
15	QPSK	1	37	23.98	24.02	24.02	
15	QPSK	1	74	24.10	24.33	23.96	
15	QPSK	36	0	23.17	23.22	23.18	
15	QPSK	36	20	23.23	23.18	23.12	24.7
15	QPSK	36	39	23.19	23.19	23.15	
15	QPSK	75	0	23.23	23.17	23.12	
15	16QAM	1	0	23.36	23.36	23.39	24.7
15	16QAM	1	37	23.38	23.42	23.42	
15	16QAM	1	74	23.43	23.44	23.29	
15	16QAM	36	0	22.16	22.22	22.16	
15	16QAM	36	20	22.17	22.15	22.16	23.7
15	16QAM	36	39	22.14	22.17	22.23	
15	16QAM	75	0	22.17	22.15	22.22	
15	64QAM	1	0	22.79	22.70	22.74	23.7
15	64QAM	1	37	22.72	22.50	22.79	
15	64QAM	1	74	22.80	22.76	22.16	
15	64QAM	36	0	21.64	21.76	21.77	
15	64QAM	36	20	21.66	21.73	21.65	22.7
15	64QAM	36	39	21.67	21.70	21.78	
15	64QAM	75	0	21.76	21.65	21.77	
Channel				26740	26865	26990	Tune-up limit (dBm)
Frequency (MHz)				819	831.5	844	
10	QPSK	1	0	24.13	24.13	24.21	25.7
10	QPSK	1	25	24.03	24.13	24.12	
10	QPSK	1	49	24.09	24.17	24.09	
10	QPSK	25	0	23.22	23.12	23.21	
10	QPSK	25	12	23.20	23.20	23.20	24.7
10	QPSK	25	25	23.16	23.23	23.20	
10	QPSK	50	0	23.23	23.14	23.16	
10	16QAM	1	0	23.45	23.52	23.59	24.7
10	16QAM	1	25	23.55	23.51	23.52	
10	16QAM	1	49	23.53	23.49	23.45	
10	16QAM	25	0	22.22	22.20	22.21	
10	16QAM	25	12	22.23	22.21	22.15	23.7
10	16QAM	25	25	22.17	22.23	22.08	
10	16QAM	50	0	22.20	22.19	22.19	
10	64QAM	1	0	22.96	22.76	22.91	23.7
10	64QAM	1	25	22.81	22.91	22.98	
10	64QAM	1	49	22.93	22.91	22.96	
10	64QAM	25	0	21.76	21.73	21.76	22.7
10	64QAM	25	12	21.62	21.75	21.78	
10	64QAM	25	25	21.70	21.75	21.48	
10	64QAM	50	0	21.74	21.68	21.72	
Channel				26715	26865	27015	Tune-up limit (dBm)
Frequency (MHz)				816.5	831.5	846.5	
5	QPSK	1	0	24.31	24.13	24.11	25.7
5	QPSK	1	19	24.24	24.19	24.09	
5	QPSK	1	24	24.07	24.24	24.16	
5	QPSK	12	0	23.33	23.23	23.21	
5	QPSK	12	7	23.27	23.27	23.22	24.7
5	QPSK	12	13	23.26	23.24	23.11	
5	QPSK	25	0	23.28	23.13	23.20	
5	16QAM	1	0	23.63	23.43	23.45	24.7
5	16QAM	1	12	23.43	23.51	23.32	
5	16QAM	1	24	23.44	23.49	23.31	
5	16QAM	12	0	22.38	22.22	22.22	
5	16QAM	12	7	22.32	22.24	22.21	23.7
5	16QAM	12	13	22.21	22.25	22.18	
5	16QAM	25	0	22.22	22.21	22.21	
5	64QAM	1	0	23.02	22.85	22.80	23.7
5	64QAM	1	12	22.84	22.89	22.19	
5	64QAM	1	24	22.68	22.92	22.34	
5	64QAM	12	0	21.90	21.84	21.65	
5	64QAM	12	7	21.89	21.81	21.18	22.7
5	64QAM	12	13	21.75	21.82	21.02	
5	64QAM	25	0	21.82	21.69	21.56	
Channel				26705	26865	27025	Tune-up limit (dBm)
Frequency (MHz)				815.5	831.5	847.5	
3	QPSK	1	0	24.19	24.16	24.20	25.7
3	QPSK	1	8	24.24	24.27	24.13	
3	QPSK	1	14	24.07	24.18	24.11	
3	QPSK	8	0	23.34	23.18	23.17	
3	QPSK	8	4	23.25	23.25	23.22	24.7
3	QPSK	8	7	23.29	23.24	23.10	
3	QPSK	15	0	23.24	23.18	23.13	
3	16QAM	1	0	23.53	23.45	23.50	24.7
3	16QAM	1	8	23.59	23.51	23.39	
3	16QAM	1	14	23.50	23.53	23.35	
3	16QAM	8	0	22.35	22.23	22.26	23.7
3	16QAM	8	4	22.30	22.37	22.25	
3	16QAM	8	7	22.27	22.33	22.13	
3	16QAM	15	0	22.38	22.17	22.16	
3	64QAM	1	0	22.92	22.87	22.25	23.7
3	64QAM	1	8	23.00	22.93	22.12	
3	64QAM	1	14	22.89	22.94	22.30	
3	64QAM	8	0	21.87	21.79	21.08	22.7
3	64QAM	8	4	21.84	21.88	21.07	
3	64QAM	8	7	21.88	21.80	21.14	
3	64QAM	15	0	21.81	21.79	21.12	
Channel				26697	26865	27033	Tune-up limit (dBm)
Frequency (MHz)				814.7	831.5	848.3	
1.4	QPSK	1	0	24.16	24.04	24.05	25.7
1.4	QPSK	1	3	24.24	24.13	24.07	
1.4	QPSK	1	5	24.12	24.08	23.93	
1.4	QPSK	3	0	24.23	24.06	24.02	
1.4	QPSK	3	1	24.21	24.05	24.03	
1.4	QPSK	3	3	24.16	24.14	23.99	24.7
1.4	QPSK	6	0	23.25	23.20	23.04	
1.4	16QAM	1	0	23.52	23.37	23.36	24.7
1.4	16QAM	1	3	23.54	23.47	23.35	
1.4	16QAM	1	5	23.41	23.39	23.29	
1.4	16QAM	3	0	23.23	23.16	23.12	24.7
1.4	16QAM	3	1	23.23	23.20	23.14	
1.4	16QAM	3	3	23.27	23.11	23.09	
1.4	16QAM	6	0	22.34	22.26	22.14	23.7
1.4	64QAM	1	0	22.85	22.81	22.16	
1.4	64QAM	1	3	22.96	22.89	22.39	
1.4	64QAM	1	5	22.79	22.75	22.41	23.7
1.4	64QAM	3	0	22.92	22.76	22.11	
1.4	64QAM	3	1	22.90	22.81	22.20	
1.4	64QAM	3	3	22.84	22.75	22.38	
1.4	64QAM	6	0	21.75	21.73	21.14	22.7



Band 30							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				27710			
Frequency (MHz)				2310			
10	QPSK	1	0	20.54			21.6
10	QPSK	1	25	20.50			
10	QPSK	1	49	20.51			
10	QPSK	25	0	20.55			
10	QPSK	25	12	20.60			
10	QPSK	25	25	20.59			21.6
10	QPSK	50	0	20.75			
10	16QAM	1	0	20.65			21.6
10	16QAM	1	25	20.67			
10	16QAM	1	49	20.65			
10	16QAM	25	0	20.33			
10	16QAM	25	12	20.37			21.6
10	16QAM	25	25	20.34			
10	16QAM	50	0	20.40			
10	64QAM	1	0	20.54			21.6
10	64QAM	1	25	20.53			
10	64QAM	1	49	20.49			
10	64QAM	25	0	19.46			
10	64QAM	25	12	19.53			20.6
10	64QAM	25	25	19.55			
10	64QAM	50	0	19.52			
Channel				27685	27710	27735	Tune-up limit (dBm)
Frequency (MHz)				2307.5	2310	2312.5	
5	QPSK	1	0	20.10	20.15	20.19	21.6
5	QPSK	1	12	20.26	20.30	20.24	
5	QPSK	1	24	20.28	20.22	20.25	
5	QPSK	12	0	20.24	20.28	20.28	
5	QPSK	12	7	20.35	20.29	20.31	21.6
5	QPSK	12	13	20.33	20.32	20.31	
5	QPSK	25	0	20.31	20.28	20.28	
5	16QAM	1	0	20.42	20.42	20.56	21.6
5	16QAM	1	12	20.50	20.55	20.46	
5	16QAM	1	24	20.56	20.53	20.56	
5	16QAM	12	0	20.26	20.29	20.27	21.6
5	16QAM	12	7	20.38	20.34	20.33	
5	16QAM	12	13	20.38	20.31	20.34	
5	16QAM	25	0	20.30	20.29	20.33	
5	64QAM	1	0	20.36	20.43	20.44	21.6
5	64QAM	1	12	20.47	20.50	20.46	
5	64QAM	1	24	20.55	20.49	20.50	
5	64QAM	12	0	19.41	19.44	19.46	20.6
5	64QAM	12	7	19.51	19.47	19.49	
5	64QAM	12	13	19.51	19.44	19.49	
5	64QAM	25	0	19.46	19.42	19.42	



Band 66							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				132072	132322	132572	
Frequency (MHz)				1720	1745	1770	
20	QPSK	1	0	20.05	19.96	19.93	21.1
20	QPSK	1	48	19.91	19.90	19.96	
20	QPSK	1	99	19.92	19.91	19.96	
20	QPSK	50	0	19.98	19.93	19.90	
20	QPSK	50	24	20.17	20.00	20.03	21.1
20	QPSK	50	50	20.05	19.90	19.91	
20	QPSK	100	0	20.02	19.90	19.90	
20	16QAM	1	0	20.29	20.20	20.14	21.1
20	16QAM	1	49	20.21	20.05	20.08	
20	16QAM	1	99	20.29	20.05	19.96	
20	16QAM	50	0	20.00	19.92	19.91	
20	16QAM	50	24	20.06	19.93	19.97	21.1
20	16QAM	50	50	20.05	19.90	19.92	
20	16QAM	100	0	20.06	19.91	19.92	
20	64QAM	1	0	20.12	20.01	19.98	21.1
20	64QAM	1	49	20.01	19.92	19.92	
20	64QAM	1	99	20.11	19.98	19.92	
20	64QAM	50	0	20.00	19.92	19.92	
20	64QAM	50	24	20.07	19.93	19.97	21.1
20	64QAM	50	50	20.05	19.91	19.93	
20	64QAM	100	0	20.04	19.89	19.87	
Channel				132047	132322	132597	
Frequency (MHz)				1717.5	1745	1772.5	
15	QPSK	1	0	19.97	19.97	19.92	21.1
15	QPSK	1	37	19.91	19.95	19.94	
15	QPSK	1	74	19.92	19.94	19.93	
15	QPSK	36	0	20.07	19.93	19.96	21.1
15	QPSK	36	20	20.12	20.00	19.98	
15	QPSK	36	39	20.08	19.99	19.95	
15	QPSK	75	0	20.02	19.96	19.96	
15	16QAM	1	0	20.22	20.18	20.18	21.1
15	16QAM	1	37	20.21	20.15	20.18	
15	16QAM	1	74	20.20	20.08	20.02	
15	16QAM	36	0	20.06	19.97	19.92	21.1
15	16QAM	36	20	20.15	19.95	20.02	
15	16QAM	36	39	20.12	19.93	20.02	
15	16QAM	75	0	20.07	19.96	20.00	
15	64QAM	1	0	20.17	20.09	19.98	21.1
15	64QAM	1	37	20.05	20.00	20.01	
15	64QAM	1	74	20.19	20.00	19.93	
15	64QAM	36	0	20.02	19.90	19.95	21.1
15	64QAM	36	20	20.14	19.93	20.07	
15	64QAM	36	39	20.12	19.99	19.98	
15	64QAM	75	0	20.09	19.96	19.95	
Channel				132022	132322	132622	
Frequency (MHz)				1715	1745	1775	
10	QPSK	1	0	19.99	19.96	19.91	21.1
10	QPSK	1	25	19.91	19.92	19.92	
10	QPSK	1	49	19.95	19.90	19.92	
10	QPSK	25	0	20.03	19.90	20.00	21.1
10	QPSK	25	12	20.12	19.97	19.99	
10	QPSK	25	25	20.13	19.97	19.95	
10	QPSK	50	0	20.04	19.91	19.96	21.1
10	16QAM	1	0	20.22	20.22	20.23	21.1
10	16QAM	1	25	20.21	20.07	20.09	
10	16QAM	1	49	20.25	20.12	20.02	
10	16QAM	25	0	20.00	19.97	19.97	21.1
10	16QAM	25	12	20.07	20.03	20.06	
10	16QAM	25	25	20.06	19.95	20.00	
10	16QAM	50	0	20.14	19.95	19.95	21.1
10	64QAM	1	0	20.13	20.10	20.08	21.1
10	64QAM	1	25	20.04	20.02	19.92	
10	64QAM	1	49	20.21	19.98	19.92	
10	64QAM	25	0	20.02	19.90	19.99	21.1
10	64QAM	25	12	20.12	19.95	20.03	
10	64QAM	25	25	20.11	19.93	19.94	
10	64QAM	50	0	20.05	19.91	19.93	
Channel				131997	132322	132647	
Frequency (MHz)				1712.5	1745	1777.5	
5	QPSK	1	0	20.02	19.95	19.91	21.1
5	QPSK	1	12	19.91	19.90	19.91	
5	QPSK	1	24	19.96	19.91	19.92	
5	QPSK	12	0	20.08	19.97	19.97	21.1
5	QPSK	12	7	20.10	19.94	20.00	
5	QPSK	12	13	20.10	19.91	19.95	
5	QPSK	25	0	20.10	19.92	19.93	21.1
5	16QAM	1	0	20.26	20.26	20.24	21.1
5	16QAM	1	12	20.24	20.11	20.09	
5	16QAM	1	24	20.25	20.12	20.06	
5	16QAM	12	0	20.02	19.95	19.94	21.1
5	16QAM	12	7	20.13	20.00	20.06	
5	16QAM	12	13	20.07	19.99	20.02	
5	16QAM	25	0	20.14	19.95	19.99	21.1
5	64QAM	1	0	20.17	20.04	20.04	21.1
5	64QAM	1	12	20.02	19.92	19.97	
5	64QAM	1	24	20.19	20.00	19.96	
5	64QAM	12	0	20.09	19.97	20.00	21.1
5	64QAM	12	7	20.17	19.99	19.97	
5	64QAM	12	13	20.15	19.97	20.03	
5	64QAM	25	0	20.11	19.93	19.94	
Channel				131987	132322	132657	
Frequency (MHz)				1711.5	1745	1776.5	
3	QPSK	1	0	19.97	19.92	19.91	21.1
3	QPSK	1	8	19.95	19.90	19.91	
3	QPSK	1	14	19.92	19.90	19.91	
3	QPSK	8	0	20.03	19.96	19.92	21.1
3	QPSK	8	4	20.11	19.96	19.99	
3	QPSK	8	7	20.09	19.95	20.00	
3	16QAM	15	0	20.04	19.97	19.98	21.1
3	16QAM	1	0	20.23	20.25	20.15	21.1
3	16QAM	1	8	20.27	20.08	20.18	
3	16QAM	1	14	20.24	20.07	20.03	
3	16QAM	8	0	20.00	19.98	20.01	21.1
3	16QAM	8	4	20.12	19.99	20.02	
3	16QAM	8	7	20.06	19.98	19.92	
3	16QAM	15	0	20.16	20.00	19.94	21.1
3	64QAM	1	0	20.22	20.04	20.08	21.1
3	64QAM	1	8	20.04	20.02	19.96	
3	64QAM	1	14	20.21	19.98	20.01	
3	64QAM	8	0	20.07	19.92	19.97	21.1
3	64QAM	8	4	20.14	20.01	20.04	
3	64QAM	8	7	20.08	19.95	19.93	
3	64QAM	15	0	20.14	19.99	19.98	
Channel				131979	132322	132665	
Frequency (MHz)				1710.7	1745	1779.3	
1.4	QPSK	1	0	19.96	19.91	19.92	21.1
1.4	QPSK	1	3	20.04	19.90	19.95	
1.4	QPSK	1	5	19.97	19.91	19.93	
1.4	QPSK	3	0	20.01	19.92	19.93	21.1
1.4	QPSK	3	1	20.07	19.90	19.93	
1.4	QPSK	3	3	20.01	19.90	19.91	
1.4	QPSK	6	0	20.09	19.94	19.95	21.1
1.4	16QAM	1	0	20.21	20.24	20.21	21.1
1.4	16QAM	1	3	20.23	20.25	20.27	
1.4	16QAM	1	5	20.28	20.14	20.18	
1.4	16QAM	3	0	20.08	19.98	20.00	21.1
1.4	16QAM	3	1	20.16	20.02	20.03	
1.4	16QAM	3	3	20.06	19.95	19.96	
1.4	16QAM	6	0	20.17	20.02	20.08	21.1
1.4	64QAM	1	0	20.23	20.13	20.16	
1.4	64QAM	1	3	20.28	20.16	20.19	
1.4	64QAM	1	5	20.18	20.10	20.14	21.1
1.4	64QAM	3	0	20.20	20.10	20.11	
1.4	64QAM	3	1	20.24	20.14	20.18	
1.4	64QAM	3	3	20.19	20.10	20.11	
1.4	64QAM	6	0	20.07	20.00	19.98	21.1



Band 71							
Ant 1							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. /	Power Middle Ch. /	Power High Ch. /	Tune-up limit (dBm)
Channel				133222	133322	133372	
Frequency (MHz)				673	683	688	
20	QPSK	1	0	24.35	24.17	24.20	25.7
20	QPSK	1	49	24.15	24.16	24.15	
20	QPSK	1	99	24.12	24.09	24.08	
20	QPSK	50	0	23.28	23.24	23.26	24.7
20	QPSK	50	24	23.33	23.28	23.17	
20	QPSK	50	50	23.32	23.27	23.27	
20	QPSK	100	0	23.33	23.32	23.28	24.7
20	16QAM	1	0	23.68	23.52	23.53	
20	16QAM	1	49	23.58	23.54	23.49	
20	16QAM	1	99	23.49	23.49	23.45	23.7
20	16QAM	50	0	22.34	22.30	22.30	
20	16QAM	50	24	22.34	22.27	22.24	
20	16QAM	50	50	22.30	22.25	22.28	23.7
20	16QAM	100	0	22.32	22.30	22.26	
20	64QAM	1	0	22.18	22.70	23.01	
20	64QAM	1	49	22.76	22.59	22.38	23.7
20	64QAM	1	99	23.01	22.51	22.88	
20	64QAM	50	0	20.82	21.86	21.50	
20	64QAM	50	24	21.49	21.70	21.76	22.7
20	64QAM	50	50	21.96	21.50	21.85	
20	64QAM	100	0	21.50	21.89	21.87	
Channel				133197	133287	133387	Tune-up limit (dBm)
Frequency (MHz)				670.5	680.5	690.5	
15	QPSK	1	0	24.33	24.17	24.13	25.7
15	QPSK	1	37	24.01	24.14	24.11	
15	QPSK	1	74	24.16	24.11	24.11	
15	QPSK	36	0	23.24	23.26	23.27	24.7
15	QPSK	36	20	23.29	23.26	23.37	
15	QPSK	36	39	23.31	23.33	23.26	
15	QPSK	75	0	23.34	23.30	23.20	24.7
15	16QAM	1	0	23.56	23.53	23.49	
15	16QAM	1	37	23.28	23.50	23.41	
15	16QAM	1	74	23.38	23.43	23.38	23.7
15	16QAM	36	0	22.15	22.31	22.26	
15	16QAM	36	20	22.31	22.25	22.34	
15	16QAM	36	39	22.38	22.33	22.28	23.7
15	16QAM	75	0	22.37	22.19	22.18	
15	64QAM	1	0	22.13	22.80	22.90	
15	64QAM	1	37	21.73	23.04	23.04	23.7
15	64QAM	1	74	22.53	22.63	22.97	
15	64QAM	36	0	20.81	21.92	21.51	
15	64QAM	36	20	20.88	21.74	21.92	22.7
15	64QAM	36	39	21.49	21.44	21.88	
15	64QAM	75	0	21.38	21.79	21.77	
Channel				133172	133272	133422	Tune-up limit (dBm)
Frequency (MHz)				668	678	683	
10	QPSK	1	0	24.30	24.14	24.17	25.7
10	QPSK	1	25	24.11	24.10	24.12	
10	QPSK	1	49	24.13	24.14	24.01	
10	QPSK	25	0	23.36	23.26	23.22	24.7
10	QPSK	25	12	23.13	23.25	23.22	
10	QPSK	25	25	23.19	23.31	23.23	
10	QPSK	50	0	23.29	23.18	23.16	24.7
10	16QAM	1	0	23.62	23.47	23.53	
10	16QAM	1	25	23.47	23.51	23.45	
10	16QAM	1	49	23.46	23.44	23.39	23.7
10	16QAM	25	0	22.05	22.17	22.16	
10	16QAM	25	12	22.07	22.24	22.20	
10	16QAM	25	25	22.00	22.24	22.19	23.7
10	16QAM	50	0	22.28	22.17	22.22	
10	64QAM	1	0	21.83	22.96	22.99	
10	64QAM	1	25	21.88	23.08	23.07	23.7
10	64QAM	1	49	22.12	22.23	22.55	
10	64QAM	25	0	20.70	21.87	21.82	
10	64QAM	25	12	20.70	21.74	21.85	22.7
10	64QAM	25	25	20.68	21.37	21.72	
10	64QAM	50	0	20.79	21.60	21.80	
Channel				133147	133247	133447	Tune-up limit (dBm)
Frequency (MHz)				665.5	675.5	685.5	
5	QPSK	1	0	24.03	24.23	24.23	25.7
5	QPSK	1	12	24.13	24.24	24.12	
5	QPSK	1	24	24.11	24.10	24.10	
5	QPSK	12	0	23.15	23.26	23.19	24.7
5	QPSK	12	7	23.15	23.32	23.26	
5	QPSK	12	13	23.13	23.22	23.16	
5	QPSK	25	0	23.15	23.26	23.20	24.7
5	16QAM	1	0	23.29	23.53	23.52	
5	16QAM	1	12	23.38	23.54	23.50	
5	16QAM	1	24	23.40	23.49	23.42	23.7
5	16QAM	12	0	22.04	22.36	22.29	
5	16QAM	12	7	22.12	22.30	22.29	
5	16QAM	12	13	22.25	22.25	22.21	23.7
5	16QAM	25	0	22.06	22.21	22.22	
5	64QAM	1	0	21.70	22.98	23.00	
5	64QAM	1	12	21.82	22.93	22.81	23.7
5	64QAM	1	24	22.03	22.71	22.37	
5	64QAM	12	0	20.74	21.93	21.85	
5	64QAM	12	7	20.91	21.89	21.91	22.7
5	64QAM	12	13	20.87	21.70	21.89	
5	64QAM	25	0	20.69	21.73	21.61	



Band 38 HPUE							
Art 2							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)
Channel				37850	38000	38150	
Frequency (MHz)				2575	2595	2610	
20	QPSK	1	0	26.05	26.04	26.01	27.5
20	QPSK	1	49	26.04	26.09	26.03	
20	QPSK	1	99	26.16	26.12	26.04	
20	QPSK	50	0	25.27	25.32	25.27	26.5
20	QPSK	50	24	25.34	25.33	25.28	
20	QPSK	50	50	25.34	25.40	25.34	
20	QPSK	100	0	25.36	25.34	25.28	26.5
20	16QAM	1	0	25.37	25.38	25.32	
20	16QAM	1	49	25.43	25.47	25.35	
20	16QAM	1	99	25.43	25.49	25.38	26.5
20	16QAM	50	0	24.28	24.34	24.31	
20	16QAM	50	24	24.36	24.35	24.32	
20	16QAM	50	50	24.37	24.42	24.37	26.5
20	16QAM	100	0	24.37	24.35	24.28	
20	64QAM	1	0	24.20	24.22	24.17	
20	64QAM	1	49	24.27	24.28	24.24	26.5
20	64QAM	1	99	24.28	24.31	24.26	
20	64QAM	50	0	23.28	23.33	23.29	
20	64QAM	50	24	23.37	23.36	23.31	24.5
20	64QAM	50	50	23.38	23.42	23.37	
20	64QAM	100	0	23.34	23.34	23.29	
Channel				37855	38000	38175	
Frequency (MHz)				2577.5	2595	2612.5	
15	QPSK	1	0	26.06	26.10	26.10	27.5
15	QPSK	1	37	26.04	26.09	26.06	
15	QPSK	1	74	26.11	26.13	26.11	
15	QPSK	36	0	25.31	25.26	25.28	26.5
15	QPSK	36	20	25.30	25.25	25.37	
15	QPSK	36	39	25.31	25.32	25.33	
15	QPSK	75	0	25.29	25.24	25.27	26.5
15	16QAM	1	0	25.38	25.37	25.38	
15	16QAM	1	37	25.38	25.42	25.35	
15	16QAM	1	74	25.41	25.44	25.38	26.5
15	16QAM	36	0	24.29	24.22	24.23	
15	16QAM	36	20	24.29	24.22	24.32	
15	16QAM	36	39	24.30	24.32	24.31	26.5
15	16QAM	75	0	24.33	24.27	24.25	
15	64QAM	1	0	24.18	24.18	24.14	
15	64QAM	1	37	24.27	24.30	24.26	26.5
15	64QAM	1	74	24.31	24.34	24.26	
15	64QAM	36	0	23.33	23.28	23.29	
15	64QAM	36	20	23.33	23.26	23.36	24.5
15	64QAM	36	39	23.34	23.36	23.36	
15	64QAM	75	0	23.33	23.27	23.28	
Channel				37900	38000	38200	
Frequency (MHz)				2575	2595	2615	
10	QPSK	1	0	26.14	26.06	26.02	27.5
10	QPSK	1	25	26.07	26.12	26.06	
10	QPSK	1	49	26.15	26.14	26.09	
10	QPSK	25	0	25.32	25.29	25.23	26.5
10	QPSK	25	12	25.33	25.30	25.24	
10	QPSK	25	25	25.35	25.35	25.32	
10	QPSK	50	0	25.36	25.29	25.25	26.5
10	16QAM	1	0	25.51	25.46	25.48	
10	16QAM	1	25	25.46	25.50	25.45	
10	16QAM	1	49	25.53	25.49	25.46	26.5
10	16QAM	25	0	24.35	24.25	24.23	
10	16QAM	25	12	24.37	24.34	24.27	
10	16QAM	25	25	24.34	24.35	24.29	26.5
10	16QAM	50	0	24.36	24.31	24.26	
10	64QAM	1	0	24.46	24.35	24.35	
10	64QAM	1	25	24.42	24.49	24.43	26.5
10	64QAM	1	49	24.38	24.45	24.40	
10	64QAM	25	0	23.42	23.38	23.35	
10	64QAM	25	12	23.43	23.36	23.34	24.5
10	64QAM	25	25	23.44	23.43	23.40	
10	64QAM	50	0	23.36	23.34	23.30	
Channel				37775	38000	38225	
Frequency (MHz)				2572.5	2595	2617.5	
5	QPSK	1	0	26.13	26.09	26.11	27.5
5	QPSK	1	12	26.08	26.09	26.06	
5	QPSK	1	24	26.11	26.15	26.10	
5	QPSK	12	0	25.31	25.25	25.27	26.5
5	QPSK	12	7	25.29	25.36	25.30	
5	QPSK	12	13	25.28	25.32	25.28	
5	QPSK	25	0	25.30	25.25	25.25	26.5
5	16QAM	1	0	25.40	25.42	25.42	
5	16QAM	1	12	25.43	25.46	25.41	
5	16QAM	1	24	25.45	25.47	25.46	26.5
5	16QAM	12	0	24.34	24.30	24.32	
5	16QAM	12	7	24.37	24.38	24.38	
5	16QAM	12	13	24.33	24.34	24.32	26.5
5	16QAM	25	0	24.33	24.32	24.34	
5	64QAM	1	0	24.36	24.30	24.33	
5	64QAM	1	12	24.33	24.37	24.30	26.5
5	64QAM	1	24	24.37	24.40	24.38	
5	64QAM	12	0	23.38	23.33	23.30	
5	64QAM	12	7	23.39	23.39	23.36	24.5
5	64QAM	12	13	23.33	23.36	23.32	
5	64QAM	25	0	23.36	23.33	23.33	



Band 38							
Ant 2							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)
Channel				37850	38000	38150	
Frequency (MHz)				2590	2595	2610	
20	QPSK	1	0	24.27	24.23	24.31	25.7
20	QPSK	1	49	24.32	24.24	24.23	
20	QPSK	1	99	24.25	24.27	24.22	
20	QPSK	50	0	23.46	23.35	23.38	24.7
20	QPSK	50	24	23.42	23.38	23.44	
20	QPSK	50	50	23.38	23.39	23.40	
20	QPSK	100	0	23.50	23.46	23.34	24.7
20	16QAM	1	0	23.43	23.43	23.40	
20	16QAM	1	49	23.31	23.34	23.31	
20	16QAM	1	99	23.37	23.30	23.33	23.7
20	16QAM	50	0	22.49	22.44	22.42	
20	16QAM	50	24	22.48	22.45	22.51	
20	16QAM	50	50	22.48	22.39	22.43	23.7
20	16QAM	100	0	22.47	22.40	22.32	
20	64QAM	1	0	22.17	22.09	22.03	
20	64QAM	1	49	22.05	22.01	22.03	23.7
20	64QAM	1	99	22.05	22.05	22.03	
20	64QAM	50	0	21.46	21.38	21.41	
20	64QAM	50	24	21.52	21.45	21.46	22.7
20	64QAM	50	50	21.49	21.48	21.40	
20	64QAM	100	0	21.47	21.50	21.43	
Channel				37825	38000	38175	Upper limit (dBm)
Frequency (MHz)				2577.5	2595	2615.5	
15	QPSK	1	0	24.29	24.28	24.21	25.7
15	QPSK	1	37	24.25	24.20	24.25	
15	QPSK	1	74	24.19	24.29	24.25	
15	QPSK	36	0	23.48	23.31	23.40	24.7
15	QPSK	36	20	23.39	23.47	23.42	
15	QPSK	36	39	23.42	23.43	23.34	
15	QPSK	75	0	23.41	23.44	23.37	24.7
15	16QAM	1	0	23.36	23.34	23.31	
15	16QAM	1	37	23.25	23.20	23.28	
15	16QAM	1	74	23.36	23.38	23.30	23.7
15	16QAM	36	0	22.42	22.34	22.34	
15	16QAM	36	20	22.36	22.35	22.35	
15	16QAM	36	39	22.39	22.40	22.31	23.7
15	16QAM	75	0	22.41	22.41	22.31	
15	64QAM	1	0	22.13	22.05	22.04	
15	64QAM	1	37	22.17	22.13	22.08	23.7
15	64QAM	1	74	22.08	22.04	22.03	
15	64QAM	36	0	21.49	21.34	21.34	
15	64QAM	36	20	21.42	21.44	21.45	22.7
15	64QAM	36	39	21.43	21.39	21.47	
15	64QAM	75	0	21.42	21.43	21.33	
Channel				37800	38000	38200	Upper limit (dBm)
Frequency (MHz)				2575	2595	2615	
10	QPSK	1	0	24.16	24.19	24.22	25.7
10	QPSK	1	25	24.19	24.18	24.21	
10	QPSK	1	49	24.08	24.18	24.20	
10	QPSK	25	0	23.38	23.36	23.35	24.7
10	QPSK	25	12	23.33	23.45	23.39	
10	QPSK	25	25	23.35	23.38	23.29	
10	QPSK	50	0	23.39	23.42	23.28	24.7
10	16QAM	1	0	23.38	23.37	23.31	
10	16QAM	1	25	23.24	23.15	23.22	
10	16QAM	1	49	23.25	23.31	23.30	23.7
10	16QAM	25	0	22.37	22.19	22.32	
10	16QAM	25	12	22.38	22.31	22.36	
10	16QAM	25	25	22.32	22.27	22.36	23.7
10	16QAM	50	0	22.50	22.30	22.36	
10	64QAM	1	0	22.04	22.01	22.02	
10	64QAM	1	25	22.12	22.02	22.04	23.7
10	64QAM	1	49	22.06	22.04	22.02	
10	64QAM	25	0	21.48	21.32	21.35	
10	64QAM	25	12	21.40	21.41	21.39	22.7
10	64QAM	25	25	21.47	21.26	21.37	
10	64QAM	50	0	21.42	21.43	21.31	
Channel				37775	38000	38225	Upper limit (dBm)
Frequency (MHz)				2572.5	2595	2617.5	
5	QPSK	1	0	24.30	24.19	24.17	25.7
5	QPSK	1	12	24.16	24.21	24.20	
5	QPSK	1	24	24.16	24.12	24.25	
5	QPSK	12	0	23.35	23.30	23.41	24.7
5	QPSK	12	7	23.39	23.43	23.40	
5	QPSK	12	13	23.43	23.32	23.29	
5	QPSK	25	0	23.41	23.39	23.33	24.7
5	16QAM	1	0	23.45	23.25	23.42	
5	16QAM	1	12	23.34	23.37	23.31	
5	16QAM	1	24	23.39	23.44	23.35	23.7
5	16QAM	12	0	22.38	22.24	22.39	
5	16QAM	12	7	22.34	22.38	22.35	
5	16QAM	12	13	22.38	22.30	22.29	23.7
5	16QAM	25	0	22.43	22.39	22.39	
5	64QAM	1	0	22.14	22.00	22.09	
5	64QAM	1	12	22.20	22.09	22.09	23.7
5	64QAM	1	24	22.13	22.17	22.05	
5	64QAM	12	0	21.43	21.35	21.38	
5	64QAM	12	7	21.44	21.37	21.36	22.7
5	64QAM	12	13	21.44	21.42	21.37	
5	64QAM	25	0	21.46	21.42	21.36	



Band 41										
Ant 2										
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Low Middle Ch. / Freq.	Power Middle Ch. / Freq.	Power High Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)	
Channel				39760	40185	40620	41055	41490		
Frequency (MHz)				2500.5	2545.5	2593	2638.5	2690		
20	QPSK	1	0	24.11	24.14	24.15	24.13	23.98	25.7	
20	QPSK	1	49	24.05	24.13	24.04	24.37	24.31		
20	QPSK	1	99	24.09	24.13	24.10	23.93	24.17		
20	QPSK	50	0	23.19	23.23	23.17	23.31	23.32		
20	QPSK	50	24	23.28	23.32	23.22	23.44	23.41	24.7	
20	QPSK	50	50	23.25	23.27	23.20	23.28	23.39		
20	QPSK	100	0	23.27	23.30	23.24	23.34	23.34		
20	16QAM	1	0	23.26	23.27	23.31	23.22	23.08	24.7	
20	16QAM	1	49	23.16	23.22	23.13	23.46	23.43		
20	16QAM	1	99	23.15	23.27	23.21	23.03	23.26		
20	16QAM	50	0	22.23	22.25	22.18	22.32	22.32	23.7	
20	16QAM	50	24	22.31	22.34	22.25	22.45	22.45		
20	16QAM	50	50	22.29	22.31	22.22	22.29	22.41		
20	16QAM	100	0	22.30	22.34	22.25	22.35	22.35		
20	64QAM	1	0	21.95	21.91	21.92	21.85	21.76	23.7	
20	64QAM	1	49	21.88	21.99	21.85	22.25	22.16		
20	64QAM	1	99	21.67	22.07	21.80	21.80	21.93		
20	64QAM	50	0	21.25	21.27	21.19	21.34	21.28	22.7	
20	64QAM	50	24	21.33	21.36	21.29	21.44	21.44		
20	64QAM	50	50	21.29	21.31	21.22	21.30	21.43		
20	64QAM	100	0	21.31	21.35	21.24	21.36	21.36	Tune-up limit (dBm)	
Channel				39765	40173	40620	41080	41515		
Frequency (MHz)				2501.5	2548.3	2593	2639.8	2692.5		
15	QPSK	1	0	24.11	24.07	24.14	24.04	23.89	25.7	
15	QPSK	1	37	23.95	24.11	23.99	24.27	24.25		
15	QPSK	1	74	24.02	24.09	24.10	23.91	24.16		
15	QPSK	36	0	23.17	23.21	23.13	23.30	23.29	24.7	
15	QPSK	36	20	23.25	23.30	23.22	23.36	23.31		
15	QPSK	36	39	23.15	23.27	23.19	23.23	23.31		
15	QPSK	75	0	23.21	23.29	23.21	23.33	23.30	24.7	
15	16QAM	1	0	23.21	23.27	23.27	23.13	23.00		
15	16QAM	1	37	23.16	23.20	23.08	23.44	23.37		
15	16QAM	1	74	23.12	23.27	23.21	23.00	23.21	23.7	
15	16QAM	36	0	22.20	22.19	22.15	22.30	22.23		
15	16QAM	36	20	22.25	22.26	22.19	22.41	22.45	23.7	
15	16QAM	36	39	22.20	22.27	22.15	22.28	22.37		
15	16QAM	75	0	22.21	22.30	22.20	22.29	22.35	23.7	
15	64QAM	1	0	21.81	21.89	21.89	21.82	21.75		
15	64QAM	1	37	21.67	21.98	21.79	22.22	22.15		
15	64QAM	1	74	21.85	22.03	21.79	21.76	21.87	22.7	
15	64QAM	36	0	21.21	21.20	21.12	21.33	21.23		
15	64QAM	36	20	21.24	21.27	21.26	21.38	21.37		
15	64QAM	36	39	21.23	21.26	21.12	21.22	21.43	Tune-up limit (dBm)	
15	64QAM	75	0	21.27	21.27	21.21	21.34	21.27		
Channel				39700	40160	40620	41080	41540		
Frequency (MHz)				2501	2547	2593	2639	2685		
10	QPSK	1	0	24.10	24.12	24.15	24.12	23.93	25.7	
10	QPSK	1	25	24.02	24.04	23.97	24.37	24.31		
10	QPSK	1	49	24.00	24.05	24.04	23.83	24.12		
10	QPSK	25	0	23.18	23.20	23.08	23.23	23.23	24.7	
10	QPSK	25	12	23.28	23.30	23.17	23.40	23.35		
10	QPSK	25	25	23.15	23.19	23.18	23.18	23.36		
10	QPSK	50	0	23.25	23.30	23.22	23.34	23.27	24.7	
10	16QAM	1	0	23.26	23.25	23.26	23.20	23.00		
10	16QAM	1	25	23.07	23.20	23.07	23.45	23.43	23.7	
10	16QAM	1	49	23.14	23.18	23.18	23.01	23.17		
10	16QAM	25	0	22.14	22.24	22.14	22.31	22.30	23.7	
10	16QAM	25	12	22.22	22.26	22.16	22.45	22.40		
10	16QAM	25	25	22.24	22.30	22.12	22.22	22.40		
10	16QAM	50	0	22.24	22.27	22.16	22.28	22.28	23.7	
10	64QAM	1	0	21.89	21.99	21.83	21.85	21.75	23.7	
10	64QAM	1	25	21.80	21.95	21.78	22.15	22.07		
10	64QAM	1	49	21.81	22.07	21.80	21.78	21.90		
10	64QAM	25	0	21.24	21.21	21.19	21.30	21.21	22.7	
10	64QAM	25	12	21.32	21.26	21.26	21.36	21.44		
10	64QAM	25	25	21.23	21.27	21.16	21.28	21.35		
10	64QAM	50	0	21.29	21.30	21.22	21.34	21.34	Tune-up limit (dBm)	
Channel				39875	40148	40620	41083	41565		
Frequency (MHz)				2496.5	2545.8	2593	2640.30	2687.5		
5	QPSK	1	0	24.02	24.10	24.14	24.11	23.91	25.7	
5	QPSK	1	12	23.99	24.06	23.99	24.28	24.25		
5	QPSK	1	24	24.07	24.06	24.10	23.87	24.11		
5	QPSK	12	0	23.11	23.17	23.08	23.22	23.28	24.7	
5	QPSK	12	7	23.18	23.30	23.14	23.37	23.40		
5	QPSK	12	13	23.21	23.17	23.12	23.22	23.33		
5	QPSK	25	0	23.23	23.28	23.20	23.33	23.24	24.7	
5	16QAM	1	0	23.22	23.26	23.31	23.17	23.02		
5	16QAM	1	12	23.16	23.15	23.08	23.40	23.35	23.7	
5	16QAM	1	24	23.05	23.24	23.19	23.02	23.20		
5	16QAM	12	0	22.21	22.16	22.13	22.28	22.29	23.7	
5	16QAM	12	7	22.29	22.34	22.16	22.37	22.40		
5	16QAM	12	13	22.20	22.21	22.17	22.21	22.35		
5	16QAM	25	0	22.20	22.25	22.23	22.31	22.29	23.7	
5	64QAM	1	0	21.90	21.90	21.85	21.78	21.70		
5	64QAM	1	12	21.86	21.93	21.81	22.17	22.07		
5	64QAM	1	24	21.82	22.01	21.72	21.74	21.83	22.7	
5	64QAM	12	0	21.18	21.18	21.14	21.25	21.25		
5	64QAM	12	7	21.24	21.31	21.20	21.35	21.35		
5	64QAM	12	13	21.08	21.22	21.19	21.29	21.33		
5	64QAM	25	0	21.30	21.32	21.19	21.28	21.33	Tune-up limit (dBm)	



Band 48							
Ant 7							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Low Middle Ch. / Freq.	Power High Middle Ch. / Freq.	Power High Ch. / Freq.
Channel				55340	55830	56150	56640
Frequency (MHz)				3559	3599	3641	3683
20	QPSK	1	0	23.07	23.00	23.01	23.11
20	QPSK	1	49	22.79	22.81	22.78	22.89
20	QPSK	1	99	22.82	22.79	22.76	22.89
20	QPSK	50	0	22.09	22.06	22.03	22.09
20	QPSK	50	24	22.05	21.92	22.01	22.07
20	QPSK	50	50	21.85	21.86	21.96	22.07
20	QPSK	100	0	22.06	21.93	22.03	22.07
20	16QAM	1	0	22.11	22.21	22.15	22.29
20	16QAM	1	49	21.96	21.88	21.96	21.93
20	16QAM	1	99	21.98	21.86	21.95	21.95
20	16QAM	50	0	21.07	21.11	21.09	21.16
20	16QAM	50	24	21.01	20.93	21.02	21.06
20	16QAM	50	50	20.93	20.94	20.92	21.01
20	16QAM	100	0	21.04	20.89	21.01	21.08
20	64QAM	1	0	20.88	20.89	20.84	20.93
20	64QAM	1	49	20.69	20.72	20.71	20.71
20	64QAM	1	99	20.65	20.58	20.67	20.76
20	64QAM	50	0	20.15	20.05	20.10	20.14
20	64QAM	50	24	20.11	20.00	20.01	20.15
20	64QAM	50	50	19.92	19.91	19.94	20.01
20	64QAM	100	0	20.05	19.98	20.03	20.14
Channel				55375	55820	56160	56605
Frequency (MHz)				3557.5	3606	3642	3682.5
15	QPSK	1	0	22.93	22.89	22.97	23.00
15	QPSK	1	37	22.83	22.78	22.81	22.91
15	QPSK	1	74	22.82	22.78	22.83	22.92
15	QPSK	36	0	22.01	22.07	21.98	22.11
15	QPSK	36	20	21.90	21.90	22.03	22.06
15	QPSK	36	39	21.89	21.89	21.92	22.00
15	QPSK	75	0	21.99	21.88	21.98	22.08
15	16QAM	1	0	22.06	22.06	22.14	22.20
15	16QAM	1	37	21.87	21.85	21.87	21.96
15	16QAM	1	74	22.04	21.93	21.96	22.08
15	16QAM	36	0	20.98	20.95	20.98	21.02
15	16QAM	36	20	20.88	20.82	21.00	21.03
15	16QAM	36	39	20.80	20.85	20.93	21.01
15	16QAM	75	0	21.00	20.89	21.03	21.12
15	64QAM	1	0	20.82	20.89	20.85	20.86
15	64QAM	1	37	20.76	20.64	20.72	20.75
15	64QAM	1	74	20.67	20.70	20.69	20.83
15	64QAM	36	0	20.08	20.08	20.02	20.18
15	64QAM	36	20	19.91	19.94	19.95	20.08
15	64QAM	36	39	19.92	19.95	19.94	20.03
15	64QAM	75	0	19.99	20.00	20.03	20.02
Channel				55200	55615	56165	56600
Frequency (MHz)				3555	3607.5	3642.5	3695
10	QPSK	1	0	23.05	22.99	22.95	23.04
10	QPSK	1	25	22.79	22.81	22.71	22.85
10	QPSK	1	49	22.72	22.78	22.72	22.81
10	QPSK	25	0	21.96	22.07	22.01	22.03
10	QPSK	25	12	21.95	21.90	21.99	21.97
10	QPSK	25	25	21.79	21.78	21.84	21.96
10	QPSK	50	0	21.95	21.83	22.00	22.01
10	16QAM	1	0	22.01	22.04	22.06	22.24
10	16QAM	1	25	21.95	21.92	21.87	21.96
10	16QAM	1	49	21.89	21.89	21.91	21.88
10	16QAM	25	0	21.09	20.98	20.99	21.16
10	16QAM	25	12	20.91	20.86	20.93	21.02
10	16QAM	25	25	20.89	20.81	20.91	21.05
10	16QAM	50	0	20.96	20.90	21.05	21.06
10	64QAM	1	0	20.74	20.88	20.87	20.87
10	64QAM	1	25	20.59	20.64	20.66	20.65
10	64QAM	1	49	20.69	20.64	20.64	20.71
10	64QAM	25	0	20.14	20.05	20.10	20.10
10	64QAM	25	12	20.01	19.93	19.99	20.03
10	64QAM	25	25	19.94	19.82	19.97	19.97
10	64QAM	50	0	19.94	19.92	19.88	20.05
Channel				55265	55810	56170	56715
Frequency (MHz)				3552.5	3607	3643	3697.5
5	QPSK	1	0	22.89	22.98	22.97	23.04
5	QPSK	1	12	22.88	22.9	22.9	22.95
5	QPSK	1	24	22.88	22.78	22.85	22.97
5	QPSK	12	0	22.06	22.03	22.02	22.15
5	QPSK	12	7	22.02	22.03	22.05	22.14
5	QPSK	12	13	22	21.95	22	22.09
5	QPSK	25	0	21.99	22.02	22.01	22.1
5	16QAM	1	0	22.05	21.99	22.09	22.14
5	16QAM	1	12	22.15	22.08	22.12	22.18
5	16QAM	1	24	22.11	22.02	22.08	22.07
5	16QAM	12	0	21.03	20.93	21.02	21.11
5	16QAM	12	7	21.1	20.98	20.98	21.06
5	16QAM	12	13	21.07	20.95	21.04	21.01
5	16QAM	25	0	21.12	21.08	21.02	21.12
5	64QAM	1	0	20.81	20.83	20.84	20.93
5	64QAM	1	12	20.89	20.74	20.76	20.83
5	64QAM	1	24	20.85	20.75	20.79	20.82
5	64QAM	12	0	20.17	20.07	20.07	20.15
5	64QAM	12	7	20.09	20.03	20.12	20.22
5	64QAM	12	13	20.06	20.08	20.05	20.1
5	64QAM	25	0	20.09	20.06	20.09	20.11



Band 38 HPUE							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)
Channel				37850	38000	38150	
Frequency (MHz)				2553	2562	2510	
20	QPSK	1	0	26.10	26.07	26.00	27.5
20	QPSK	1	49	26.20	26.08	25.99	
20	QPSK	1	99	26.14	26.09	26.00	
20	QPSK	50	0	25.35	25.32	25.23	26.5
20	QPSK	50	24	25.45	25.33	25.24	
20	QPSK	50	50	25.43	25.38	25.27	
20	QPSK	100	0	25.44	25.34	25.25	26.5
20	16QAM	1	0	25.46	25.44	25.34	
20	16QAM	1	49	25.49	25.45	25.34	
20	16QAM	1	99	25.47	25.43	25.34	26.5
20	16QAM	50	0	24.37	24.35	24.25	
20	16QAM	50	24	24.45	24.33	24.26	
20	16QAM	50	50	24.45	24.42	24.32	26.5
20	16QAM	100	0	24.46	24.35	24.23	
20	64QAM	1	0	24.29	24.27	24.18	
20	64QAM	1	49	24.31	24.27	24.23	26.5
20	64QAM	1	99	24.20	24.32	24.21	
20	64QAM	50	0	23.22	23.14	23.17	
20	64QAM	50	24	23.19	23.17	23.17	24.5
20	64QAM	50	50	23.17	23.20	23.13	
20	64QAM	100	0	23.11	23.00	22.93	
Channel				37025	38000	38175	
Frequency (MHz)				2377.5	2595	2612.5	
15	QPSK	1	0	26.12	26.12	26.03	27.5
15	QPSK	1	37	26.19	26.11	26.05	
15	QPSK	1	74	26.15	26.10	26.04	
15	QPSK	36	0	25.38	25.30	25.19	26.5
15	QPSK	36	20	25.38	25.27	25.25	
15	QPSK	36	39	25.37	25.34	25.23	
15	QPSK	75	0	25.38	25.28	25.18	26.5
15	16QAM	1	0	25.46	25.43	25.29	
15	16QAM	1	37	25.43	25.41	25.31	
15	16QAM	1	74	25.44	25.42	25.33	26.5
15	16QAM	36	0	24.38	24.27	24.18	
15	16QAM	36	20	24.37	24.24	24.22	
15	16QAM	36	39	24.35	24.31	24.21	26.5
15	16QAM	75	0	24.38	24.30	24.19	
15	64QAM	1	0	24.13	24.15	24.11	
15	64QAM	1	37	24.22	24.15	24.22	26.5
15	64QAM	1	74	24.01	24.21	24.13	
15	64QAM	36	0	23.17	23.13	23.13	
15	64QAM	36	20	23.19	23.14	23.24	24.5
15	64QAM	36	39	23.12	23.12	23.12	
15	64QAM	75	0	23.20	23.14	23.12	
Channel				37600	38000	38200	
Frequency (MHz)				2575	2595	2615	
10	QPSK	1	0	26.17	26.11	26.00	27.5
10	QPSK	1	25	26.10	26.08	26.01	
10	QPSK	1	49	26.19	26.15	26.00	
10	QPSK	25	0	25.36	25.24	25.17	26.5
10	QPSK	25	12	25.37	25.27	25.19	
10	QPSK	25	25	25.38	25.32	25.25	
10	QPSK	50	0	25.38	25.27	25.19	26.5
10	16QAM	1	0	25.57	25.49	25.42	
10	16QAM	1	25	25.50	25.48	25.41	
10	16QAM	1	49	25.55	25.49	25.37	26.5
10	16QAM	25	0	24.40	24.27	24.17	
10	16QAM	25	12	24.43	24.32	24.22	
10	16QAM	25	25	24.39	24.35	24.26	26.5
10	16QAM	50	0	24.43	24.31	24.21	
10	64QAM	1	0	24.18	24.27	24.32	
10	64QAM	1	25	24.22	24.14	24.14	26.5
10	64QAM	1	49	24.04	24.13	24.17	
10	64QAM	25	0	23.29	23.15	23.18	
10	64QAM	25	12	23.30	23.20	23.19	24.5
10	64QAM	25	25	23.25	23.13	23.12	
10	64QAM	50	0	23.18	23.07	23.06	
Channel				37775	38000	38225	
Frequency (MHz)				2572.5	2595	2617.5	
5	QPSK	1	0	26.17	26.11	26.10	27.5
5	QPSK	1	12	26.15	26.16	26.03	
5	QPSK	1	24	26.16	26.17	26.07	
5	QPSK	12	0	25.40	25.28	25.26	26.5
5	QPSK	12	7	25.41	25.34	25.26	
5	QPSK	12	13	25.36	25.36	25.25	
5	QPSK	25	0	25.34	25.28	25.22	26.5
5	16QAM	1	0	25.51	25.44	25.43	
5	16QAM	1	12	25.51	25.50	25.36	
5	16QAM	1	24	25.54	25.50	25.42	26.5
5	16QAM	12	0	24.43	24.31	24.28	
5	16QAM	12	7	24.41	24.44	24.32	
5	16QAM	12	13	24.43	24.40	24.30	26.5
5	16QAM	25	0	24.40	24.32	24.29	
5	64QAM	1	0	24.17	24.18	24.16	
5	64QAM	1	12	24.20	24.26	24.29	26.5
5	64QAM	1	24	24.15	24.24	24.32	
5	64QAM	12	0	23.25	23.23	23.27	
5	64QAM	12	7	23.29	23.32	23.36	24.5
5	64QAM	12	13	23.26	23.27	23.30	
5	64QAM	25	0	23.29	23.28	23.25	



Band 38							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)
Channel				37850	38000	38150	
Frequency (MHz)				2590	2595	2610	
20	QPSK	1	0	24.59	24.55	24.54	25.7
20	QPSK	1	49	24.57	24.56	24.49	
20	QPSK	1	99	24.56	24.54	24.47	
20	QPSK	50	0	23.68	23.71	23.63	24.7
20	QPSK	50	24	23.77	23.67	23.61	
20	QPSK	50	50	23.73	23.72	23.65	
20	QPSK	100	0	23.75	23.67	23.61	24.7
20	16QAM	1	0	23.71	23.71	23.64	
20	16QAM	1	49	23.61	23.62	23.58	
20	16QAM	1	99	23.65	23.64	23.59	23.7
20	16QAM	50	0	22.72	22.71	22.65	
20	16QAM	50	24	22.77	22.69	22.63	
20	16QAM	50	50	22.76	22.75	22.68	23.7
20	16QAM	100	0	22.76	22.69	22.62	
20	64QAM	1	0	22.43	22.40	22.31	
20	64QAM	1	49	22.39	22.37	22.31	23.7
20	64QAM	1	99	22.37	22.39	22.30	
20	64QAM	50	0	21.74	21.73	21.67	
20	64QAM	50	24	21.77	21.73	21.64	22.7
20	64QAM	50	50	21.75	21.75	21.67	
20	64QAM	100	0	21.78	21.69	21.64	
Channel				37925	38000	38175	Upper limit (dBm)
Frequency (MHz)				2577.5	2585	2615.5	
15	QPSK	1	0	24.59	24.57	24.51	25.7
15	QPSK	1	37	24.54	24.54	24.49	
15	QPSK	1	74	24.54	24.53	24.47	
15	QPSK	36	0	23.79	23.69	23.63	24.7
15	QPSK	36	20	23.72	23.65	23.68	
15	QPSK	36	39	23.72	23.70	23.64	
15	QPSK	75	0	23.75	23.67	23.58	24.7
15	16QAM	1	0	23.71	23.70	23.64	
15	16QAM	1	37	23.60	23.59	23.49	
15	16QAM	1	74	23.67	23.66	23.57	23.7
15	16QAM	36	0	22.75	22.67	22.57	
15	16QAM	36	20	22.71	22.61	22.62	
15	16QAM	36	39	22.69	22.66	22.59	23.7
15	16QAM	75	0	22.77	22.69	22.60	
15	64QAM	1	0	22.41	22.38	22.30	
15	64QAM	1	37	22.42	22.39	22.34	23.7
15	64QAM	1	74	22.36	22.40	22.31	
15	64QAM	36	0	21.79	21.71	21.63	
15	64QAM	36	20	21.76	21.63	21.67	22.7
15	64QAM	36	39	21.76	21.73	21.66	
15	64QAM	75	0	21.77	21.70	21.61	
Channel				37900	38000	38200	Upper limit (dBm)
Frequency (MHz)				2575	2595	2615	
10	QPSK	1	0	24.58	24.57	24.47	25.7
10	QPSK	1	25	24.52	24.52	24.43	
10	QPSK	1	49	24.51	24.48	24.42	
10	QPSK	25	0	23.77	23.59	23.68	24.7
10	QPSK	25	12	23.68	23.62	23.68	
10	QPSK	25	25	23.62	23.70	23.60	
10	QPSK	50	0	23.67	23.58	23.56	24.7
10	16QAM	1	0	23.70	23.67	23.54	
10	16QAM	1	25	23.50	23.53	23.43	
10	16QAM	1	49	23.67	23.66	23.46	23.7
10	16QAM	25	0	22.75	22.67	22.55	
10	16QAM	25	12	22.65	22.54	22.59	
10	16QAM	25	25	22.59	22.61	22.56	23.7
10	16QAM	50	0	22.77	22.65	22.55	
10	64QAM	1	0	22.33	22.29	22.30	
10	64QAM	1	25	22.38	22.30	22.31	23.7
10	64QAM	1	49	22.31	22.39	22.26	
10	64QAM	25	0	21.71	21.62	21.54	
10	64QAM	25	12	21.67	21.58	21.58	22.7
10	64QAM	25	25	21.73	21.68	21.57	
10	64QAM	50	0	21.76	21.63	21.54	
Channel				37775	38000	38225	Upper limit (dBm)
Frequency (MHz)				2572.5	2595	2617.5	
5	QPSK	1	0	24.64	24.59	24.53	25.7
5	QPSK	1	12	24.62	24.63	24.50	
5	QPSK	1	24	24.62	24.57	24.50	
5	QPSK	12	0	23.76	23.69	23.62	24.7
5	QPSK	12	7	23.76	23.77	23.67	
5	QPSK	12	13	23.72	23.73	23.63	
5	QPSK	25	0	23.72	23.67	23.63	24.7
5	16QAM	1	0	23.82	23.72	23.71	
5	16QAM	1	12	23.83	23.80	23.68	
5	16QAM	1	24	23.82	23.78	23.67	23.7
5	16QAM	12	0	22.71	22.67	22.62	
5	16QAM	12	7	22.73	22.73	22.62	
5	16QAM	12	13	22.69	22.72	22.60	23.7
5	16QAM	25	0	22.76	22.66	22.64	
5	64QAM	1	0	22.96	22.47	22.42	
5	64QAM	1	12	22.55	22.51	22.40	23.7
5	64QAM	1	24	22.55	22.54	22.43	
5	64QAM	12	0	21.76	21.68	21.66	
5	64QAM	12	7	21.77	21.77	21.70	22.7
5	64QAM	12	13	21.80	21.73	21.67	
5	64QAM	25	0	21.81	21.74	21.70	



Band 41										
Ant 0										
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Low Middle Ch. / Freq.	Power Middle Ch. / Freq.	Power High Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)	
Channel				39760	40185	40620	41055	41490		
Frequency (MHz)				2503.5	2546.5	2593	2635.5	2680		
20	QPSK	1	0	24.07	24.02	24.07	24.22	23.73	25.7	
20	QPSK	1	49	23.99	24.01	23.97	24.21	24.09		
20	QPSK	1	99	23.99	24.01	24.00	23.76	23.96		
20	QPSK	50	0	23.14	23.10	23.08	23.20	23.07		
20	QPSK	50	24	23.22	23.20	23.14	23.31	23.16	24.7	
20	QPSK	50	50	23.17	23.18	23.12	23.15	23.15		
20	QPSK	100	0	23.21	23.19	23.15	23.22	23.11		
20	16QAM	1	0	23.21	23.13	23.20	23.12	22.84		
20	16QAM	1	49	23.09	23.12	23.08	23.32	23.18	24.7	
20	16QAM	1	99	23.10	23.14	23.13	22.86	23.04		
20	16QAM	50	0	22.17	22.15	22.13	22.22	22.07		
20	16QAM	50	24	22.23	22.24	22.17	22.35	22.19		
20	16QAM	50	50	22.20	22.20	22.17	22.17	22.17	23.7	
20	16QAM	100	0	22.23	22.20	22.17	22.24	22.12		
20	64QAM	1	0	21.82	21.83	21.83	21.78	21.54		
20	64QAM	1	49	21.83	21.87	21.79	22.11	21.95	23.7	
20	64QAM	1	99	21.85	21.89	21.84	21.56	21.76		
20	64QAM	50	0	21.21	21.16	21.13	21.24	21.11		
20	64QAM	50	24	21.27	21.24	21.20	21.33	21.21	22.7	
20	64QAM	50	50	21.22	21.22	21.17	21.17	21.19		
20	64QAM	100	0	21.25	21.22	21.18	21.27	21.13		
Channel				39720	40170	40620	41080	41515	Tune-up limit (dBm)	
Frequency (MHz)				2503.5	2548.3	2593	2639.3	2682.5		
15	QPSK	1	0	24.04	24.03	24.00	24.12	23.88	25.7	
15	QPSK	1	37	24.00	23.95	23.96	24.20	24.04		
15	QPSK	1	74	23.99	24.07	24.05	23.94	24.01		
15	QPSK	36	0	23.20	23.09	23.07	23.20	23.06	24.7	
15	QPSK	36	20	23.20	23.16	23.13	23.22	23.18		
15	QPSK	36	39	23.16	23.16	23.10	23.17	23.15		
15	QPSK	75	0	23.20	23.18	23.13	23.17	23.11		
15	16QAM	1	0	23.22	23.15	23.14	23.25	22.97	24.7	
15	16QAM	1	37	23.06	23.04	23.04	23.30	23.16		
15	16QAM	1	74	23.15	23.22	23.16	23.06	23.17		
15	16QAM	36	0	22.18	22.07	22.03	22.16	22.04	23.7	
15	16QAM	36	20	22.18	22.13	22.08	22.20	22.12		
15	16QAM	36	39	22.13	22.14	22.11	22.14	22.11		
15	16QAM	75	0	22.24	22.19	22.16	22.19	22.14	23.7	
15	64QAM	1	0	21.83	21.83	21.77	21.83	21.70		
15	64QAM	1	37	21.88	21.87	21.79	22.08	21.85	22.7	
15	64QAM	1	74	21.86	21.96	21.90	21.82	21.92		
15	64QAM	36	0	21.23	21.15	21.09	21.22	21.12		
15	64QAM	36	20	21.22	21.18	21.14	21.26	21.21	22.7	
15	64QAM	36	39	21.17	21.19	21.13	21.23	21.17		
15	64QAM	75	0	21.24	21.22	21.15	21.19	21.16		
Channel				39700	40160	40620	41080	41540	Tune-up limit (dBm)	
Frequency (MHz)				2501	2547	2593	2639	2685		
10	QPSK	1	0	24.00	23.96	23.98	24.12	23.82	25.7	
10	QPSK	1	25	23.99	23.92	23.90	24.16	24.00		
10	QPSK	1	49	23.89	24.00	24.04	23.85	23.99		
10	QPSK	25	0	23.15	23.09	23.02	23.12	23.06	24.7	
10	QPSK	25	12	23.13	23.15	23.10	23.16	23.18		
10	QPSK	25	25	23.08	23.15	23.04	23.11	23.05		
10	QPSK	50	0	23.16	23.16	23.05	23.09	23.08	24.7	
10	16QAM	1	0	23.16	23.15	23.09	23.17	22.94		
10	16QAM	1	25	23.02	23.01	23.04	23.20	23.11		
10	16QAM	1	49	23.08	23.14	23.10	22.98	23.17	23.7	
10	16QAM	25	0	22.09	22.01	22.03	22.13	21.95		
10	16QAM	25	12	22.17	22.12	22.05	22.18	22.06		
10	16QAM	25	25	22.08	22.04	22.10	22.08	22.05	23.7	
10	16QAM	50	0	22.23	22.19	22.10	22.13	22.13		
10	64QAM	1	0	21.84	21.76	21.78	21.90	21.70	23.7	
10	64QAM	1	25	21.81	21.80	21.71	22.04	21.91		
10	64QAM	1	49	21.86	21.93	21.85	21.74	21.88		
10	64QAM	25	0	21.16	21.15	21.00	21.12	21.11	22.7	
10	64QAM	25	12	21.12	21.16	21.10	21.19	21.13		
10	64QAM	25	25	21.15	21.13	21.13	21.18	21.15		
10	64QAM	50	0	21.23	21.12	21.15	21.09	21.15		
Channel				39675	40148	40620	41083	41565	Tune-up limit (dBm)	
Frequency (MHz)				2496.5	2545.8	2593	2640.30	2687.5		
5	QPSK	1	0	24.13	23.95	23.96	24.20	24.06	25.7	
5	QPSK	1	12	24.09	24.01	24.00	24.17	24.06		
5	QPSK	1	24	24.01	24.00	23.95	24.15	24.01		
5	QPSK	12	0	23.20	23.17	23.13	23.33	23.20	24.7	
5	QPSK	12	7	23.24	23.19	23.17	23.34	23.21		
5	QPSK	12	13	23.18	23.17	23.14	23.28	23.18		
5	QPSK	25	0	23.20	23.18	23.14	23.32	23.17	24.7	
5	16QAM	1	0	23.27	23.11	23.09	23.37	23.21		
5	16QAM	1	12	23.06	23.20	23.24	23.42	23.28	23.7	
5	16QAM	1	24	23.24	23.17	23.18	23.34	23.19		
5	16QAM	12	0	22.20	22.15	22.14	22.30	22.17		
5	16QAM	12	7	22.23	22.16	22.14	22.31	22.18	23.7	
5	16QAM	12	13	22.21	22.14	22.11	22.27	22.17		
5	16QAM	25	0	22.24	22.20	22.15	22.35	22.25		
5	64QAM	1	0	22.04	21.85	21.85	22.12	21.92	23.7	
5	64QAM	1	12	21.96	21.91	21.89	22.14	21.92		
5	64QAM	1	24	21.88	21.95	21.92	22.08	21.92		
5	64QAM	12	0	21.27	21.18	21.21	21.35	21.23	22.7	
5	64QAM	12	7	21.26	21.22	21.22	21.37	21.25		
5	64QAM	12	13	21.24	21.19	21.18	21.35	21.22		
5	64QAM	25	0	21.25	21.22	21.22	21.38	21.27		



Band 48									
Ant 2									
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Low Middle Ch. / Freq.	Power High Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)	
Channel				55340	55830	56150	56640		
Frequency (MHz)				3559	3599	3641	3683		
20	QPSK	1	0	21.54	21.64	21.61	21.48		22.6
20	QPSK	1	49	21.40	21.44	21.41	21.19		
20	QPSK	1	99	21.39	21.42	21.33	21.07		21.6
20	QPSK	50	0	20.63	20.65	20.64	20.47		
20	QPSK	50	24	20.60	20.60	20.56	20.36		21.6
20	QPSK	50	50	20.52	20.54	20.49	20.26		
20	QPSK	100	0	20.55	20.61	20.54	20.35		21.6
20	16QAM	1	0	20.68	20.76	20.73	20.59		
20	16QAM	1	49	20.51	20.52	20.51	20.28		21.6
20	16QAM	1	99	20.52	20.50	20.42	20.18		
20	16QAM	50	0	19.65	19.70	19.68	19.46		20.6
20	16QAM	50	24	19.61	19.66	19.62	19.43		
20	16QAM	50	50	19.57	19.59	19.53	19.29		20.6
20	16QAM	100	0	19.59	19.65	19.58	19.40		
20	64QAM	1	0	19.44	19.48	19.45	19.32		20.6
20	64QAM	1	49	19.26	19.28	19.23	19.02		
20	64QAM	1	99	19.31	19.24	19.15	18.93		19.6
20	64QAM	50	0	18.64	18.70	18.67	18.51		
20	64QAM	50	24	18.63	18.67	18.64	18.42		19.6
20	64QAM	50	50	18.57	18.58	18.54	18.31		
20	64QAM	100	0	18.61	18.64	18.60	18.41		
Channel				55375	55820	56190	56665		
Frequency (MHz)				3537.5	3598	3642	3692.5		
15	QPSK	1	0	21.50	21.56	21.53	21.34		22.6
15	QPSK	1	37	21.39	21.41	21.40	21.14		
15	QPSK	1	74	21.43	21.39	21.32	21.09		21.6
15	QPSK	36	0	20.61	20.64	20.62	20.43		
15	QPSK	36	20	20.57	20.58	20.57	20.32		21.6
15	QPSK	36	39	20.55	20.57	20.51	20.27		
15	QPSK	75	0	20.57	20.63	20.54	20.34		21.6
15	16QAM	1	0	20.63	20.68	20.66	20.51		
15	16QAM	1	37	20.45	20.49	20.39	20.21		20.6
15	16QAM	1	74	20.66	20.59	20.51	20.26		
15	16QAM	36	0	19.58	19.60	19.56	19.39		20.6
15	16QAM	36	20	19.53	19.56	19.51	19.31		
15	16QAM	36	39	19.51	19.53	19.49	19.22		20.6
15	16QAM	75	0	19.60	19.61	19.58	19.37		
15	64QAM	1	0	19.37	19.44	19.39	19.24		20.6
15	64QAM	1	37	19.29	19.29	19.25	19.03		
15	64QAM	1	74	19.32	19.34	19.19	18.99		19.6
15	64QAM	36	0	18.62	18.66	18.64	18.44		
15	64QAM	36	20	18.59	18.62	18.56	18.34		19.6
15	64QAM	36	39	18.55	18.59	18.51	18.26		
15	64QAM	75	0	18.59	18.63	18.50	18.37		
Channel				55200	55615	56165	56690		
Frequency (MHz)				3555	3607.5	3642.5	3695		
10	QPSK	1	0	21.50	21.56	21.52	21.31		22.6
10	QPSK	1	25	21.30	21.31	21.31	21.14		
10	QPSK	1	49	21.34	21.37	21.24	21.01		21.6
10	QPSK	25	0	20.57	20.60	20.61	20.43		
10	QPSK	25	12	20.49	20.53	20.57	20.25		21.6
10	QPSK	25	25	20.53	20.54	20.44	20.26		
10	QPSK	50	0	20.53	20.60	20.53	20.30		21.6
10	16QAM	1	0	20.61	20.64	20.58	20.45		
10	16QAM	1	25	20.36	20.45	20.36	20.11		20.6
10	16QAM	1	49	20.59	20.59	20.44	20.23		
10	16QAM	25	0	19.56	19.53	19.49	19.34		20.6
10	16QAM	25	12	19.50	19.48	19.44	19.31		
10	16QAM	25	25	19.42	19.50	19.43	19.14		19.6
10	16QAM	50	0	19.53	19.56	19.57	19.31		
10	64QAM	1	0	19.29	19.40	19.39	19.17		20.6
10	64QAM	1	25	19.29	19.19	19.22	18.97		
10	64QAM	1	49	19.24	19.32	19.14	18.90		19.6
10	64QAM	25	0	18.56	18.59	18.59	18.41		
10	64QAM	25	12	18.59	18.62	18.51	18.31		19.6
10	64QAM	25	25	18.54	18.50	18.47	18.26		
10	64QAM	50	0	18.40	18.55	18.53	18.37		
Channel				55265	55810	56170	56715		
Frequency (MHz)				3552.5	3607	3643	3697.5		
5	QPSK	1	0	21.46	21.52	21.47	21.27		22.6
5	QPSK	1	12	21.41	21.47	21.41	21.18		
5	QPSK	1	24	21.40	21.40	21.37	21.11		21.6
5	QPSK	12	0	20.54	20.64	20.63	20.38		
5	QPSK	12	7	20.62	20.66	20.60	20.34		21.6
5	QPSK	12	13	20.54	20.56	20.54	20.28		
5	QPSK	25	0	20.58	20.58	20.57	20.30		21.6
5	16QAM	1	0	20.55	20.62	20.58	20.36		
5	16QAM	1	12	20.64	20.67	20.64	20.36		21.6
5	16QAM	1	24	20.56	20.63	20.55	20.30		
5	16QAM	12	0	19.55	19.59	19.62	19.31		20.6
5	16QAM	12	7	19.55	19.62	19.58	19.33		
5	16QAM	12	13	19.55	19.60	19.54	19.31		20.6
5	16QAM	25	0	19.59	19.63	19.60	19.36		
5	64QAM	1	0	19.36	19.41	19.36	19.10		20.6
5	64QAM	1	12	19.36	19.40	19.33	19.08		
5	64QAM	1	24	19.33	19.37	19.32	19.04		19.6
5	64QAM	12	0	18.62	18.66	18.61	18.40		
5	64QAM	12	7	18.65	18.69	18.64	18.42		19.6
5	64QAM	12	13	18.64	18.62	18.62	18.31		
5	64QAM	25	0	18.66	18.70	18.63	18.40		



Band 38 HPUE								
Art 2								
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)	
Channel				37850	38000	38150		
Frequency (MHz)				2575	2595	2610		
20	QPSK	1	0	26.05	26.04	26.01	27.5	
20	QPSK	1	49	26.04	26.09	26.03		
20	QPSK	1	99	26.16	26.12	26.04		
20	QPSK	50	0	25.27	25.32	25.27		
20	QPSK	50	24	25.34	25.33	25.28		
20	QPSK	50	50	25.34	25.40	25.34		
20	QPSK	100	0	25.36	25.34	25.28	26.5	
20	16QAM	1	0	25.37	25.38	25.32		
20	16QAM	1	49	25.43	25.47	25.35		
20	16QAM	1	99	25.43	25.49	25.38		
20	16QAM	50	0	24.28	24.34	24.31		
20	16QAM	50	24	24.36	24.35	24.32		
20	16QAM	50	50	24.37	24.42	24.37	25.5	
20	16QAM	100	0	24.37	24.35	24.28		
20	64QAM	1	0	24.20	24.22	24.17		
20	64QAM	1	49	24.27	24.28	24.24		
20	64QAM	1	99	24.28	24.31	24.26		
20	64QAM	50	0	23.28	23.33	23.29		
20	64QAM	50	24	23.37	23.36	23.31	24.5	
20	64QAM	50	50	23.38	23.42	23.37		
20	64QAM	100	0	23.34	23.34	23.29		
Channel				37855	38000	38175		
Frequency (MHz)				2577.5	2595	2612.5		
15	QPSK	1	0	26.06	26.10	26.10		27.5
15	QPSK	1	37	26.04	26.09	26.06		
15	QPSK	1	74	26.11	26.13	26.11		
15	QPSK	36	0	25.31	25.26	25.28		
15	QPSK	36	20	25.30	25.25	25.37		
15	QPSK	36	39	25.31	25.32	25.33		
15	QPSK	75	0	25.29	25.24	25.27	26.5	
15	16QAM	1	0	25.38	25.37	25.38		
15	16QAM	1	37	25.38	25.42	25.35		
15	16QAM	1	74	25.41	25.44	25.38		
15	16QAM	36	0	24.29	24.22	24.23		
15	16QAM	36	20	24.29	24.22	24.32		
15	16QAM	36	39	24.30	24.32	24.31	25.5	
15	16QAM	75	0	24.33	24.27	24.25		
15	64QAM	1	0	24.18	24.18	24.14		
15	64QAM	1	37	24.27	24.30	24.26		
15	64QAM	1	74	24.31	24.34	24.26		
15	64QAM	36	0	23.33	23.28	23.29		
15	64QAM	36	20	23.33	23.26	23.36	24.5	
15	64QAM	36	39	23.34	23.36	23.36		
15	64QAM	75	0	23.33	23.27	23.28		
Channel				37900	38000	38200		
Frequency (MHz)				2575	2595	2615		
10	QPSK	1	0	26.14	26.06	26.02		27.5
10	QPSK	1	25	26.07	26.12	26.06		
10	QPSK	1	49	26.15	26.14	26.09		
10	QPSK	25	0	25.32	25.29	25.23		
10	QPSK	25	12	25.33	25.30	25.24		
10	QPSK	25	25	25.35	25.35	25.32		
10	QPSK	50	0	25.36	25.29	25.25	26.5	
10	16QAM	1	0	25.51	25.46	25.48		
10	16QAM	1	25	25.46	25.50	25.45		
10	16QAM	1	49	25.53	25.49	25.46		
10	16QAM	25	0	24.35	24.25	24.23		
10	16QAM	25	12	24.37	24.34	24.27		
10	16QAM	25	25	24.34	24.35	24.29	25.5	
10	16QAM	50	0	24.36	24.31	24.26		
10	64QAM	1	0	24.46	24.35	24.35		
10	64QAM	1	25	24.42	24.49	24.43		
10	64QAM	1	49	24.38	24.45	24.40		
10	64QAM	25	0	23.42	23.38	23.35		
10	64QAM	25	12	23.43	23.36	23.34	24.5	
10	64QAM	25	25	23.44	23.43	23.40		
10	64QAM	50	0	23.36	23.34	23.30		
Channel				37775	38000	38225		
Frequency (MHz)				2572.5	2595	2617.5		
5	QPSK	1	0	26.13	26.09	26.11		27.5
5	QPSK	1	12	26.08	26.09	26.06		
5	QPSK	1	24	26.11	26.15	26.10		
5	QPSK	12	0	25.31	25.25	25.27		
5	QPSK	12	7	25.29	25.36	25.30		
5	QPSK	12	13	25.28	25.32	25.28		
5	QPSK	25	0	25.30	25.25	25.25	26.5	
5	16QAM	1	0	25.40	25.42	25.42		
5	16QAM	1	12	25.43	25.46	25.41		
5	16QAM	1	24	25.45	25.47	25.46		
5	16QAM	12	0	24.34	24.30	24.32		
5	16QAM	12	7	24.37	24.38	24.38		
5	16QAM	12	13	24.33	24.34	24.32	25.5	
5	16QAM	25	0	24.33	24.32	24.34		
5	64QAM	1	0	24.36	24.30	24.33		
5	64QAM	1	12	24.33	24.37	24.30		
5	64QAM	1	24	24.37	24.40	24.38		
5	64QAM	12	0	23.38	23.33	23.30		
5	64QAM	12	7	23.39	23.39	23.36	24.5	
5	64QAM	12	13	23.33	23.36	23.32		
5	64QAM	25	0	23.36	23.33	23.33		



Band 38							
Ant 2							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)
Channel				37850	38000	38150	
Frequency (MHz)				2590	2595	2610	
20	QPSK	1	0	24.27	24.23	24.31	25.7
20	QPSK	1	49	24.32	24.24	24.23	
20	QPSK	1	99	24.25	24.27	24.22	
20	QPSK	50	0	23.46	23.35	23.38	24.7
20	QPSK	50	24	23.42	23.38	23.44	
20	QPSK	50	50	23.38	23.39	23.40	
20	QPSK	100	0	23.50	23.46	23.34	24.7
20	16QAM	1	0	23.43	23.43	23.40	
20	16QAM	1	49	23.31	23.34	23.31	
20	16QAM	1	99	23.37	23.30	23.33	23.7
20	16QAM	50	0	22.49	22.44	22.42	
20	16QAM	50	24	22.48	22.45	22.51	
20	16QAM	50	50	22.48	22.39	22.43	23.7
20	16QAM	100	0	22.47	22.40	22.32	
20	64QAM	1	0	22.17	22.09	22.03	
20	64QAM	1	49	22.05	22.01	22.03	23.7
20	64QAM	1	99	22.05	22.05	22.03	
20	64QAM	50	0	21.46	21.38	21.41	
20	64QAM	50	24	21.52	21.45	21.46	22.7
20	64QAM	50	50	21.49	21.48	21.40	
20	64QAM	100	0	21.47	21.50	21.43	
Channel				37825	38000	38175	Upper limit (dBm)
Frequency (MHz)				2577.5	2595	2615.5	
15	QPSK	1	0	24.29	24.28	24.21	25.7
15	QPSK	1	37	24.25	24.20	24.25	
15	QPSK	1	74	24.19	24.29	24.25	
15	QPSK	36	0	23.48	23.31	23.40	24.7
15	QPSK	36	20	23.39	23.47	23.42	
15	QPSK	36	39	23.42	23.43	23.34	
15	QPSK	75	0	23.41	23.44	23.37	24.7
15	16QAM	1	0	23.36	23.34	23.31	
15	16QAM	1	37	23.25	23.20	23.28	
15	16QAM	1	74	23.36	23.38	23.30	23.7
15	16QAM	36	0	22.42	22.34	22.34	
15	16QAM	36	20	22.36	22.35	22.35	
15	16QAM	36	39	22.39	22.40	22.31	23.7
15	16QAM	75	0	22.41	22.41	22.31	
15	64QAM	1	0	22.13	22.05	22.04	
15	64QAM	1	37	22.17	22.13	22.08	23.7
15	64QAM	1	74	22.08	22.04	22.03	
15	64QAM	36	0	21.49	21.34	21.34	
15	64QAM	36	20	21.42	21.44	21.45	22.7
15	64QAM	36	39	21.43	21.39	21.47	
15	64QAM	75	0	21.42	21.43	21.33	
Channel				37800	38000	38200	Upper limit (dBm)
Frequency (MHz)				2575	2595	2615	
10	QPSK	1	0	24.16	24.19	24.22	25.7
10	QPSK	1	25	24.19	24.18	24.21	
10	QPSK	1	49	24.08	24.18	24.20	
10	QPSK	25	0	23.38	23.36	23.35	24.7
10	QPSK	25	12	23.33	23.45	23.39	
10	QPSK	25	25	23.35	23.38	23.29	
10	QPSK	50	0	23.39	23.42	23.28	24.7
10	16QAM	1	0	23.38	23.37	23.31	
10	16QAM	1	25	23.24	23.15	23.22	
10	16QAM	1	49	23.25	23.31	23.30	23.7
10	16QAM	25	0	22.37	22.19	22.32	
10	16QAM	25	12	22.38	22.31	22.36	
10	16QAM	25	25	22.32	22.27	22.36	23.7
10	16QAM	50	0	22.50	22.30	22.36	
10	64QAM	1	0	22.04	22.01	22.02	
10	64QAM	1	25	22.12	22.02	22.04	23.7
10	64QAM	1	49	22.06	22.04	22.02	
10	64QAM	25	0	21.48	21.32	21.35	
10	64QAM	25	12	21.40	21.41	21.39	22.7
10	64QAM	25	25	21.47	21.26	21.37	
10	64QAM	50	0	21.42	21.43	21.31	
Channel				37775	38000	38225	Upper limit (dBm)
Frequency (MHz)				2572.5	2595	2617.5	
5	QPSK	1	0	24.30	24.19	24.17	25.7
5	QPSK	1	12	24.16	24.21	24.20	
5	QPSK	1	24	24.16	24.12	24.25	
5	QPSK	12	0	23.35	23.30	23.41	24.7
5	QPSK	12	7	23.39	23.43	23.40	
5	QPSK	12	13	23.43	23.32	23.29	
5	QPSK	25	0	23.41	23.39	23.33	24.7
5	16QAM	1	0	23.45	23.25	23.42	
5	16QAM	1	12	23.34	23.37	23.31	
5	16QAM	1	24	23.39	23.44	23.35	23.7
5	16QAM	12	0	22.38	22.24	22.39	
5	16QAM	12	7	22.34	22.38	22.35	
5	16QAM	12	13	22.38	22.30	22.29	23.7
5	16QAM	25	0	22.43	22.39	22.39	
5	64QAM	1	0	22.14	22.00	22.09	
5	64QAM	1	12	22.20	22.09	22.09	23.7
5	64QAM	1	24	22.13	22.17	22.05	
5	64QAM	12	0	21.43	21.35	21.38	
5	64QAM	12	7	21.44	21.37	21.36	22.7
5	64QAM	12	13	21.44	21.42	21.37	
5	64QAM	25	0	21.46	21.42	21.36	



Band 41										
Ant 2										
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Low Middle Ch. / Freq.	Power Middle Ch. / Freq.	Power High Middle Ch. / Freq.	Power High Ch. / Freq.		Tune-up limit (dBm)
Channel				39760	40185	40620	41055	41490		
Frequency (MHz)				2500.5	2545.5	2593	2638.5	2690		
20	QPSK	1	0	24.11	24.14	24.15	24.13	23.98		25.7
20	QPSK	1	49	24.05	24.13	24.04	24.37	24.31		
20	QPSK	1	99	24.09	24.13	24.10	23.93	24.17		
20	QPSK	50	0	23.19	23.23	23.17	23.31	23.32		
20	QPSK	50	24	23.28	23.32	23.22	23.44	23.41		24.7
20	QPSK	50	50	23.25	23.27	23.20	23.28	23.39		
20	QPSK	100	0	23.27	23.30	23.24	23.34	23.34		
20	16QAM	1	0	23.26	23.27	23.31	23.22	23.08		
20	16QAM	1	49	23.16	23.22	23.13	23.46	23.43		24.7
20	16QAM	1	99	23.15	23.27	23.21	23.03	23.26		
20	16QAM	50	0	22.23	22.25	22.16	22.32	22.32		
20	16QAM	50	24	22.31	22.34	22.25	22.45	22.45		
20	16QAM	50	50	22.29	22.31	22.22	22.29	22.41		23.7
20	16QAM	100	0	22.30	22.34	22.25	22.35	22.35		
20	64QAM	1	0	21.95	21.91	21.92	21.85	21.76		
20	64QAM	1	49	21.88	21.99	21.85	22.25	22.16		23.7
20	64QAM	1	99	21.67	22.07	21.80	21.80	21.93		
20	64QAM	50	0	21.25	21.27	21.19	21.34	21.28		
20	64QAM	50	24	21.33	21.36	21.29	21.44	21.44		22.7
20	64QAM	50	50	21.29	21.31	21.22	21.30	21.43		
20	64QAM	100	0	21.31	21.35	21.24	21.36	21.36		
Channel				39765	40173	40620	41080	41515		Tune-up limit (dBm)
Frequency (MHz)				2501.5	2548.3	2593	2639.8	2692.5		
15	QPSK	1	0	24.11	24.07	24.14	24.04	23.89		25.7
15	QPSK	1	37	23.95	24.11	23.99	24.27	24.25		
15	QPSK	1	74	24.02	24.09	24.10	23.91	24.16		
15	QPSK	36	0	23.17	23.21	23.13	23.30	23.29		
15	QPSK	36	20	23.25	23.30	23.22	23.36	23.31		24.7
15	QPSK	36	39	23.15	23.27	23.19	23.23	23.31		
15	QPSK	75	0	23.21	23.29	23.21	23.33	23.30		
15	16QAM	1	0	23.21	23.27	23.27	23.13	23.00		
15	16QAM	1	37	23.16	23.20	23.08	23.44	23.37		24.7
15	16QAM	1	74	23.12	23.27	23.21	23.00	23.21		
15	16QAM	36	0	22.20	22.19	22.15	22.30	22.23		
15	16QAM	36	20	22.25	22.26	22.19	22.41	22.45		23.7
15	16QAM	36	39	22.20	22.27	22.15	22.28	22.37		
15	16QAM	75	0	22.21	22.30	22.20	22.29	22.35		
15	64QAM	1	0	21.81	21.89	21.89	21.82	21.75		
15	64QAM	1	37	21.67	21.99	21.79	22.22	22.15		23.7
15	64QAM	1	74	21.85	22.03	21.79	21.76	21.87		
15	64QAM	36	0	21.21	21.20	21.12	21.33	21.23		
15	64QAM	36	20	21.24	21.27	21.26	21.38	21.37		22.7
15	64QAM	36	39	21.23	21.26	21.12	21.22	21.43		
15	64QAM	75	0	21.27	21.27	21.21	21.34	21.27		
Channel				39700	40160	40620	41080	41540		Tune-up limit (dBm)
Frequency (MHz)				2501	2547	2593	2639	2685		
10	QPSK	1	0	24.10	24.12	24.15	24.12	23.93		25.7
10	QPSK	1	25	24.02	24.04	23.97	24.37	24.31		
10	QPSK	1	49	24.00	24.05	24.04	23.83	24.12		
10	QPSK	25	0	23.18	23.20	23.08	23.23	23.23		
10	QPSK	25	12	23.28	23.30	23.17	23.40	23.35		24.7
10	QPSK	25	25	23.15	23.19	23.18	23.18	23.36		
10	QPSK	50	0	23.25	23.30	23.22	23.34	23.27		
10	16QAM	1	0	23.26	23.25	23.26	23.20	23.00		
10	16QAM	1	25	23.07	23.20	23.07	23.45	23.43		24.7
10	16QAM	1	49	23.14	23.18	23.18	23.01	23.17		
10	16QAM	25	0	22.14	22.24	22.14	22.31	22.30		
10	16QAM	25	12	22.22	22.26	22.16	22.45	22.40		23.7
10	16QAM	25	25	22.24	22.30	22.12	22.22	22.40		
10	16QAM	50	0	22.24	22.27	22.16	22.28	22.28		
10	64QAM	1	0	21.89	21.99	21.83	21.85	21.75		
10	64QAM	1	25	21.80	21.95	21.78	22.15	22.07		23.7
10	64QAM	1	49	21.81	22.07	21.80	21.78	21.90		
10	64QAM	25	0	21.24	21.21	21.19	21.30	21.21		
10	64QAM	25	12	21.32	21.26	21.26	21.36	21.44		22.7
10	64QAM	25	25	21.23	21.27	21.16	21.28	21.35		
10	64QAM	50	0	21.29	21.30	21.22	21.34	21.34		
Channel				39875	40148	40620	41083	41565		Tune-up limit (dBm)
Frequency (MHz)				2496.5	2545.8	2593	2640.30	2687.5		
5	QPSK	1	0	24.02	24.10	24.14	24.11	23.91		25.7
5	QPSK	1	12	23.99	24.06	23.99	24.28	24.25		
5	QPSK	1	24	24.07	24.06	24.10	23.87	24.11		
5	QPSK	12	0	23.11	23.17	23.08	23.22	23.28		
5	QPSK	12	7	23.18	23.30	23.14	23.37	23.40		24.7
5	QPSK	12	13	23.21	23.17	23.12	23.22	23.33		
5	QPSK	25	0	23.23	23.28	23.20	23.33	23.24		
5	16QAM	1	0	23.22	23.26	23.31	23.17	23.02		
5	16QAM	1	12	23.16	23.15	23.08	23.40	23.35		24.7
5	16QAM	1	24	23.05	23.24	23.19	23.02	23.20		
5	16QAM	12	0	22.21	22.16	22.13	22.28	22.29		
5	16QAM	12	7	22.29	22.34	22.16	22.37	22.40		23.7
5	16QAM	12	13	22.20	22.21	22.17	22.21	22.35		
5	16QAM	25	0	22.20	22.25	22.23	22.31	22.29		
5	64QAM	1	0	21.90	21.90	21.85	21.78	21.70		
5	64QAM	1	12	21.86	21.93	21.81	22.17	22.07		23.7
5	64QAM	1	24	21.82	22.01	21.72	21.74	21.83		
5	64QAM	12	0	21.18	21.18	21.14	21.25	21.25		
5	64QAM	12	7	21.24	21.31	21.20	21.35	21.35		22.7
5	64QAM	12	13	21.08	21.22	21.19	21.29	21.33		
5	64QAM	25	0	21.30	21.32	21.19	21.28	21.33		



Band 48							
Ant 7							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Low Middle Ch. / Freq.	Power High Middle Ch. / Freq.	Power High Ch. / Freq.
Channel				55340	55830	56150	56640
Frequency (MHz)				3559	3599	3641	3683
20	QPSK	1	0	23.07	23.00	23.01	23.11
20	QPSK	1	49	22.79	22.81	22.78	22.89
20	QPSK	1	99	22.82	22.79	22.76	22.89
20	QPSK	50	0	22.09	22.06	22.03	22.09
20	QPSK	50	24	22.05	21.92	22.01	22.07
20	QPSK	50	50	21.85	21.86	21.96	22.07
20	QPSK	100	0	22.06	21.93	22.03	22.07
20	16QAM	1	0	22.11	22.21	22.15	22.29
20	16QAM	1	49	21.96	21.88	21.96	21.93
20	16QAM	1	99	21.98	21.86	21.95	21.95
20	16QAM	50	0	21.07	21.11	21.09	21.16
20	16QAM	50	24	21.01	20.93	21.02	21.06
20	16QAM	50	50	20.93	20.94	20.92	21.01
20	16QAM	100	0	21.04	20.89	21.01	21.08
20	64QAM	1	0	20.88	20.89	20.84	20.93
20	64QAM	1	49	20.69	20.72	20.71	20.71
20	64QAM	1	99	20.65	20.58	20.67	20.76
20	64QAM	50	0	20.15	20.05	20.10	20.14
20	64QAM	50	24	20.11	20.00	20.01	20.15
20	64QAM	50	50	19.92	19.91	19.94	20.01
20	64QAM	100	0	20.05	19.98	20.03	20.14
Channel				55375	55820	56160	56605
Frequency (MHz)				3557.5	3598	3642	3687.5
15	QPSK	1	0	22.93	22.89	22.97	23.00
15	QPSK	1	37	22.83	22.78	22.81	22.91
15	QPSK	1	74	22.82	22.78	22.83	22.92
15	QPSK	36	0	22.01	22.07	21.98	22.11
15	QPSK	36	20	21.90	21.90	22.03	22.06
15	QPSK	36	39	21.89	21.89	21.92	22.00
15	QPSK	75	0	21.99	21.88	21.98	22.08
15	16QAM	1	0	22.06	22.06	22.14	22.20
15	16QAM	1	37	21.87	21.85	21.87	21.96
15	16QAM	1	74	22.04	21.93	21.96	22.08
15	16QAM	36	0	20.98	20.95	20.98	21.02
15	16QAM	36	20	20.88	20.82	21.00	21.03
15	16QAM	36	39	20.80	20.85	20.93	21.01
15	16QAM	75	0	21.00	20.89	21.03	21.12
15	64QAM	1	0	20.82	20.89	20.85	20.86
15	64QAM	1	37	20.76	20.64	20.72	20.75
15	64QAM	1	74	20.67	20.70	20.69	20.83
15	64QAM	36	0	20.08	20.08	20.02	20.18
15	64QAM	36	20	19.91	19.94	19.95	20.08
15	64QAM	36	39	19.92	19.95	19.94	20.03
15	64QAM	75	0	19.99	20.00	20.03	20.02
Channel				55200	55615	56165	56600
Frequency (MHz)				3555	3607.5	3642.5	3695
10	QPSK	1	0	23.05	22.99	22.95	23.04
10	QPSK	1	25	22.79	22.81	22.71	22.85
10	QPSK	1	49	22.72	22.78	22.72	22.81
10	QPSK	25	0	21.96	22.07	22.01	22.03
10	QPSK	25	12	21.95	21.90	21.99	21.97
10	QPSK	25	25	21.79	21.78	21.84	21.96
10	QPSK	50	0	21.95	21.83	22.00	22.01
10	16QAM	1	0	22.01	22.04	22.06	22.24
10	16QAM	1	25	21.95	21.92	21.87	21.96
10	16QAM	1	49	21.89	21.89	21.91	21.88
10	16QAM	25	0	21.09	20.98	20.99	21.16
10	16QAM	25	12	20.91	20.86	20.93	21.02
10	16QAM	25	25	20.89	20.81	20.91	21.05
10	16QAM	50	0	20.96	20.90	21.05	21.06
10	64QAM	1	0	20.74	20.88	20.87	20.87
10	64QAM	1	25	20.59	20.64	20.66	20.65
10	64QAM	1	49	20.69	20.64	20.64	20.71
10	64QAM	25	0	20.14	20.05	20.10	20.10
10	64QAM	25	12	20.01	19.93	19.99	20.03
10	64QAM	25	25	19.94	19.82	19.97	19.97
10	64QAM	50	0	19.94	19.92	19.88	20.05
Channel				55265	55610	56170	56715
Frequency (MHz)				3552.5	3607	3643	3697.5
5	QPSK	1	0	22.89	22.98	22.97	23.04
5	QPSK	1	12	22.88	22.90	22.90	22.95
5	QPSK	1	24	22.85	22.78	22.85	22.97
5	QPSK	12	0	22.06	22.03	22.02	22.15
5	QPSK	12	7	22.02	22.03	22.05	22.14
5	QPSK	12	13	22.00	21.95	22.00	22.09
5	QPSK	25	0	21.99	22.02	22.01	22.10
5	16QAM	1	0	22.05	21.99	22.09	22.14
5	16QAM	1	12	22.15	22.08	22.12	22.19
5	16QAM	1	24	22.11	22.02	22.08	22.07
5	16QAM	12	0	21.03	20.93	21.02	21.11
5	16QAM	12	7	21.10	20.98	20.98	21.06
5	16QAM	12	13	21.07	20.95	21.04	21.01
5	16QAM	25	0	21.12	21.08	21.02	21.12
5	64QAM	1	0	20.81	20.83	20.84	20.93
5	64QAM	1	12	20.89	20.74	20.76	20.83
5	64QAM	1	24	20.85	20.75	20.79	20.82
5	64QAM	12	0	20.17	20.07	20.07	20.15
5	64QAM	12	7	20.09	20.03	20.12	20.22
5	64QAM	12	13	20.06	20.08	20.05	20.10
5	64QAM	25	0	20.09	20.06	20.09	20.11



Band 38 HPUE							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)
Channel				37850	38000	38150	
Frequency (MHz)				2553	2565	2510	
20	QPSK	1	0	26.10	26.07	26.00	27.5
20	QPSK	1	49	26.20	26.08	25.99	
20	QPSK	1	99	26.14	26.09	26.00	
20	QPSK	50	0	25.35	25.32	25.23	26.5
20	QPSK	50	24	25.45	25.33	25.24	
20	QPSK	50	50	25.43	25.38	25.27	
20	QPSK	100	0	25.44	25.34	25.25	26.5
20	16QAM	1	0	25.46	25.44	25.34	
20	16QAM	1	49	25.49	25.45	25.34	
20	16QAM	1	99	25.47	25.43	25.34	25.5
20	16QAM	50	0	24.37	24.35	24.25	
20	16QAM	50	24	24.45	24.33	24.26	
20	16QAM	50	50	24.45	24.42	24.32	25.5
20	16QAM	100	0	24.46	24.35	24.23	
20	64QAM	1	0	24.29	24.27	24.18	
20	64QAM	1	49	24.31	24.27	24.23	25.5
20	64QAM	1	99	24.20	24.32	24.21	
20	64QAM	50	0	23.22	23.14	23.17	
20	64QAM	50	24	23.19	23.17	23.17	24.5
20	64QAM	50	50	23.17	23.20	23.13	
20	64QAM	100	0	23.11	23.00	22.93	
Channel				37025	38000	38175	
Frequency (MHz)				2377.5	2595	2612.5	
15	QPSK	1	0	26.12	26.12	26.03	27.5
15	QPSK	1	37	26.19	26.11	26.05	
15	QPSK	1	74	26.15	26.10	26.04	
15	QPSK	36	0	25.38	25.30	25.19	26.5
15	QPSK	36	20	25.38	25.27	25.25	
15	QPSK	36	39	25.37	25.34	25.23	
15	QPSK	75	0	25.38	25.28	25.18	26.5
15	16QAM	1	0	25.46	25.43	25.29	
15	16QAM	1	37	25.43	25.41	25.31	
15	16QAM	1	74	25.44	25.42	25.33	25.5
15	16QAM	36	0	24.38	24.27	24.18	
15	16QAM	36	20	24.37	24.24	24.22	
15	16QAM	36	39	24.35	24.31	24.21	25.5
15	16QAM	75	0	24.38	24.30	24.19	
15	64QAM	1	0	24.13	24.15	24.11	
15	64QAM	1	37	24.22	24.15	24.22	25.5
15	64QAM	1	74	24.01	24.21	24.13	
15	64QAM	36	0	23.17	23.13	23.13	
15	64QAM	36	20	23.19	23.14	23.24	24.5
15	64QAM	36	39	23.12	23.12	23.12	
15	64QAM	75	0	23.20	23.14	23.12	
Channel				37600	38000	38200	
Frequency (MHz)				2575	2595	2615	
10	QPSK	1	0	26.17	26.11	26.00	27.5
10	QPSK	1	25	26.10	26.08	26.01	
10	QPSK	1	49	26.19	26.15	26.00	
10	QPSK	25	0	25.36	25.24	25.17	26.5
10	QPSK	25	12	25.37	25.27	25.19	
10	QPSK	25	25	25.38	25.32	25.25	
10	QPSK	50	0	25.38	25.27	25.19	26.5
10	16QAM	1	0	25.57	25.49	25.42	
10	16QAM	1	25	25.50	25.48	25.41	
10	16QAM	1	49	25.55	25.49	25.37	25.5
10	16QAM	25	0	24.40	24.27	24.17	
10	16QAM	25	12	24.43	24.32	24.22	
10	16QAM	25	25	24.39	24.35	24.26	25.5
10	16QAM	50	0	24.43	24.31	24.21	
10	64QAM	1	0	24.18	24.27	24.32	
10	64QAM	1	25	24.22	24.14	24.14	25.5
10	64QAM	1	49	24.04	24.13	24.17	
10	64QAM	25	0	23.29	23.15	23.18	
10	64QAM	25	12	23.30	23.20	23.19	24.5
10	64QAM	25	25	23.25	23.13	23.12	
10	64QAM	50	0	23.18	23.07	23.06	
Channel				37775	38000	38225	
Frequency (MHz)				2572.5	2595	2617.5	
5	QPSK	1	0	26.17	26.11	26.10	27.5
5	QPSK	1	12	26.15	26.16	26.03	
5	QPSK	1	24	26.16	26.17	26.07	
5	QPSK	12	0	25.40	25.28	25.26	26.5
5	QPSK	12	7	25.41	25.34	25.26	
5	QPSK	12	13	25.36	25.36	25.25	
5	QPSK	25	0	25.34	25.28	25.22	26.5
5	16QAM	1	0	25.51	25.44	25.43	
5	16QAM	1	12	25.51	25.50	25.36	
5	16QAM	1	24	25.54	25.50	25.42	25.5
5	16QAM	12	0	24.43	24.31	24.28	
5	16QAM	12	7	24.41	24.44	24.32	
5	16QAM	12	13	24.43	24.40	24.30	25.5
5	16QAM	25	0	24.40	24.32	24.29	
5	64QAM	1	0	24.17	24.18	24.16	
5	64QAM	1	12	24.20	24.26	24.29	25.5
5	64QAM	1	24	24.15	24.24	24.32	
5	64QAM	12	0	23.25	23.23	23.27	
5	64QAM	12	7	23.29	23.32	23.36	24.5
5	64QAM	12	13	23.26	23.27	23.30	
5	64QAM	25	0	23.29	23.28	23.25	



Band 38							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)
Channel				37850	38000	38150	
Frequency (MHz)				2590	2595	2610	
20	QPSK	1	0	24.59	24.55	24.54	25.7
20	QPSK	1	49	24.57	24.56	24.49	
20	QPSK	1	99	24.56	24.54	24.47	
20	QPSK	50	0	23.68	23.71	23.63	24.7
20	QPSK	50	24	23.77	23.67	23.61	
20	QPSK	50	50	23.73	23.72	23.65	
20	QPSK	100	0	23.75	23.67	23.61	24.7
20	16QAM	1	0	23.71	23.71	23.64	
20	16QAM	1	49	23.61	23.62	23.58	
20	16QAM	1	99	23.65	23.64	23.59	23.7
20	16QAM	50	0	22.72	22.71	22.65	
20	16QAM	50	24	22.77	22.69	22.63	
20	16QAM	50	50	22.76	22.75	22.68	23.7
20	16QAM	100	0	22.76	22.69	22.62	
20	64QAM	1	0	22.43	22.40	22.31	
20	64QAM	1	49	22.39	22.37	22.31	23.7
20	64QAM	1	99	22.37	22.39	22.30	
20	64QAM	50	0	21.74	21.73	21.67	
20	64QAM	50	24	21.77	21.73	21.64	22.7
20	64QAM	50	50	21.75	21.75	21.67	
20	64QAM	100	0	21.78	21.69	21.64	
Channel				37925	38000	38175	Upper limit (dBm)
Frequency (MHz)				2577.5	2585	2615.5	
15	QPSK	1	0	24.59	24.57	24.51	25.7
15	QPSK	1	37	24.54	24.54	24.49	
15	QPSK	1	74	24.54	24.53	24.47	
15	QPSK	36	0	23.79	23.69	23.63	24.7
15	QPSK	36	20	23.72	23.65	23.68	
15	QPSK	36	39	23.72	23.70	23.64	
15	QPSK	75	0	23.75	23.67	23.58	24.7
15	16QAM	1	0	23.71	23.70	23.64	
15	16QAM	1	37	23.60	23.59	23.49	
15	16QAM	1	74	23.67	23.66	23.57	23.7
15	16QAM	36	0	22.75	22.67	22.57	
15	16QAM	36	20	22.71	22.61	22.62	
15	16QAM	36	39	22.69	22.66	22.59	23.7
15	16QAM	75	0	22.77	22.69	22.60	
15	64QAM	1	0	22.41	22.38	22.30	
15	64QAM	1	37	22.42	22.39	22.34	23.7
15	64QAM	1	74	22.36	22.40	22.31	
15	64QAM	36	0	21.79	21.71	21.63	
15	64QAM	36	20	21.76	21.63	21.67	22.7
15	64QAM	36	39	21.76	21.73	21.66	
15	64QAM	75	0	21.77	21.70	21.61	
Channel				37900	38000	38200	Upper limit (dBm)
Frequency (MHz)				2575	2595	2615	
10	QPSK	1	0	24.58	24.57	24.47	25.7
10	QPSK	1	25	24.52	24.52	24.43	
10	QPSK	1	49	24.51	24.48	24.42	
10	QPSK	25	0	23.77	23.59	23.58	24.7
10	QPSK	25	12	23.68	23.62	23.68	
10	QPSK	25	25	23.62	23.70	23.60	
10	QPSK	50	0	23.67	23.58	23.56	24.7
10	16QAM	1	0	23.70	23.67	23.54	
10	16QAM	1	25	23.50	23.53	23.43	
10	16QAM	1	49	23.67	23.66	23.46	23.7
10	16QAM	25	0	22.75	22.67	22.55	
10	16QAM	25	12	22.65	22.54	22.59	
10	16QAM	25	25	22.59	22.61	22.56	23.7
10	16QAM	50	0	22.77	22.65	22.55	
10	64QAM	1	0	22.33	22.29	22.30	
10	64QAM	1	25	22.38	22.30	22.31	23.7
10	64QAM	1	49	22.31	22.39	22.26	
10	64QAM	25	0	21.71	21.62	21.54	
10	64QAM	25	12	21.67	21.58	21.58	22.7
10	64QAM	25	25	21.73	21.68	21.57	
10	64QAM	50	0	21.76	21.63	21.54	
Channel				37775	38000	38225	Upper limit (dBm)
Frequency (MHz)				2572.5	2595	2617.5	
5	QPSK	1	0	24.64	24.59	24.53	25.7
5	QPSK	1	12	24.62	24.63	24.50	
5	QPSK	1	24	24.62	24.57	24.50	
5	QPSK	12	0	23.76	23.69	23.62	24.7
5	QPSK	12	7	23.76	23.77	23.67	
5	QPSK	12	13	23.72	23.73	23.63	
5	QPSK	25	0	23.72	23.67	23.63	24.7
5	16QAM	1	0	23.82	23.72	23.71	
5	16QAM	1	12	23.83	23.80	23.68	
5	16QAM	1	24	23.82	23.78	23.67	23.7
5	16QAM	12	0	22.71	22.67	22.62	
5	16QAM	12	7	22.73	22.73	22.62	
5	16QAM	12	13	22.69	22.72	22.60	23.7
5	16QAM	25	0	22.76	22.66	22.64	
5	64QAM	1	0	22.96	22.47	22.42	
5	64QAM	1	12	22.55	22.51	22.40	23.7
5	64QAM	1	24	22.55	22.54	22.43	
5	64QAM	12	0	21.76	21.68	21.66	
5	64QAM	12	7	21.77	21.77	21.70	22.7
5	64QAM	12	13	21.80	21.73	21.67	
5	64QAM	25	0	21.81	21.74	21.70	



Band 41										
Ant 0										
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Low Middle Ch. / Freq.	Power Middle Ch. / Freq.	Power High Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)	
Channel				39760	40185	40620	41055	41490		
Frequency (MHz)				2503.5	2546.5	2593	2635.5	2680		
20	QPSK	1	0	24.07	24.02	24.07	24.22	23.73	25.7	
20	QPSK	1	49	23.99	24.01	23.97	24.21	24.09		
20	QPSK	1	99	23.99	24.01	24.00	23.76	23.96		
20	QPSK	50	0	23.14	23.10	23.08	23.20	23.07		
20	QPSK	50	24	23.22	23.20	23.14	23.31	23.16	24.7	
20	QPSK	50	50	23.17	23.18	23.12	23.15	23.13		
20	QPSK	100	0	23.21	23.19	23.15	23.22	23.11		
20	16QAM	1	0	23.21	23.13	23.20	23.12	22.84	24.7	
20	16QAM	1	49	23.09	23.12	23.08	23.32	23.18		
20	16QAM	1	99	23.10	23.14	23.13	22.86	23.04		
20	16QAM	50	0	22.17	22.15	22.13	22.22	22.07		
20	16QAM	50	24	22.23	22.24	22.17	22.35	22.19	23.7	
20	16QAM	50	50	22.20	22.20	22.17	22.17	22.17		
20	16QAM	100	0	22.23	22.20	22.17	22.24	22.12		
20	64QAM	1	0	21.82	21.83	21.83	21.78	21.54	23.7	
20	64QAM	1	49	21.83	21.87	21.79	22.11	21.95		
20	64QAM	1	99	21.85	21.89	21.84	21.56	21.76		
20	64QAM	50	0	21.21	21.16	21.13	21.24	21.11		
20	64QAM	50	24	21.27	21.24	21.20	21.33	21.21	22.7	
20	64QAM	50	50	21.22	21.22	21.17	21.17	21.19		
20	64QAM	100	0	21.25	21.22	21.18	21.27	21.13	Tune-up limit (dBm)	
Channel				39720	40170	40620	41080	41515		
Frequency (MHz)				2503.5	2543.5	2593	2639.5	2682.5		
15	QPSK	1	0	24.04	24.03	24.00	24.12	23.88	25.7	
15	QPSK	1	37	24.00	23.95	23.96	24.20	24.04		
15	QPSK	1	74	23.99	24.07	24.05	23.94	24.01		
15	QPSK	36	0	23.20	23.09	23.07	23.20	23.06	24.7	
15	QPSK	36	20	23.20	23.16	23.13	23.22	23.18		
15	QPSK	36	39	23.16	23.16	23.10	23.17	23.15		
15	QPSK	75	0	23.20	23.18	23.13	23.17	23.11		
15	16QAM	1	0	23.22	23.15	23.14	23.25	22.97	24.7	
15	16QAM	1	37	23.06	23.04	23.04	23.30	23.16		
15	16QAM	1	74	23.15	23.22	23.16	23.08	23.17		
15	16QAM	36	0	22.18	22.07	22.03	22.16	22.04	23.7	
15	16QAM	36	20	22.18	22.13	22.08	22.20	22.12		
15	16QAM	36	39	22.13	22.14	22.11	22.14	22.11		
15	16QAM	75	0	22.24	22.19	22.16	22.19	22.14		
15	64QAM	1	0	21.83	21.83	21.77	21.83	21.70	23.7	
15	64QAM	1	37	21.88	21.87	21.79	22.08	21.85		
15	64QAM	1	74	21.86	21.96	21.90	21.82	21.92		
15	64QAM	36	0	21.23	21.15	21.09	21.22	21.12	22.7	
15	64QAM	36	20	21.22	21.18	21.14	21.26	21.21		
15	64QAM	36	39	21.17	21.19	21.13	21.23	21.17		
15	64QAM	75	0	21.24	21.22	21.15	21.19	21.16	Tune-up limit (dBm)	
Channel				39700	40160	40620	41080	41540		
Frequency (MHz)				2501	2547	2593	2639	2685		
10	QPSK	1	0	24.00	23.96	23.98	24.12	23.82	25.7	
10	QPSK	1	25	23.99	23.92	23.90	24.16	24.00		
10	QPSK	1	49	23.89	24.00	24.04	23.85	23.99		
10	QPSK	25	0	23.15	23.09	23.02	23.12	23.06	24.7	
10	QPSK	25	12	23.13	23.15	23.10	23.16	23.18		
10	QPSK	25	25	23.08	23.15	23.04	23.11	23.05		
10	QPSK	50	0	23.16	23.16	23.05	23.09	23.08	24.7	
10	16QAM	1	0	23.16	23.15	23.09	23.17	22.94		
10	16QAM	1	25	23.02	23.01	23.04	23.20	23.11		
10	16QAM	1	49	23.08	23.14	23.10	22.88	23.17	23.7	
10	16QAM	25	0	22.09	22.01	22.03	22.13	21.95		
10	16QAM	25	12	22.17	22.12	22.05	22.18	22.06		
10	16QAM	25	25	22.08	22.04	22.10	22.08	22.05		
10	16QAM	50	0	22.23	22.19	22.10	22.13	22.13	23.7	
10	64QAM	1	0	21.84	21.76	21.78	21.90	21.70		
10	64QAM	1	25	21.81	21.80	21.71	22.04	21.91	23.7	
10	64QAM	1	49	21.86	21.93	21.85	21.74	21.88		
10	64QAM	25	0	21.16	21.15	21.00	21.12	21.11	22.7	
10	64QAM	25	12	21.12	21.16	21.10	21.19	21.13		
10	64QAM	25	25	21.15	21.13	21.13	21.18	21.15		
10	64QAM	50	0	21.23	21.12	21.15	21.09	21.15	Tune-up limit (dBm)	
Channel				39675	40148	40620	41083	41565		
Frequency (MHz)				2496.5	2545.8	2593	2640.30	2687.5		
5	QPSK	1	0	24.13	23.95	23.96	24.20	24.06	25.7	
5	QPSK	1	12	24.09	24.01	24.00	24.17	24.06		
5	QPSK	1	24	24.01	24.00	23.95	24.15	24.01		
5	QPSK	12	0	23.20	23.17	23.13	23.33	23.20	24.7	
5	QPSK	12	7	23.24	23.19	23.17	23.34	23.21		
5	QPSK	12	13	23.18	23.17	23.14	23.28	23.18		
5	QPSK	25	0	23.20	23.18	23.14	23.32	23.17	24.7	
5	16QAM	1	0	23.27	23.11	23.09	23.37	23.21		
5	16QAM	1	12	23.08	23.20	23.24	23.42	23.28		
5	16QAM	1	24	23.24	23.17	23.18	23.34	23.19	23.7	
5	16QAM	12	0	22.20	22.15	22.14	22.30	22.17		
5	16QAM	12	7	22.23	22.16	22.14	22.31	22.18		
5	16QAM	12	13	22.21	22.14	22.11	22.27	22.17	23.7	
5	16QAM	25	0	22.24	22.20	22.15	22.35	22.25		
5	64QAM	1	0	22.04	21.85	21.85	22.12	21.92	23.7	
5	64QAM	1	12	21.96	21.91	21.89	22.14	21.92		
5	64QAM	1	24	21.88	21.95	21.92	22.08	21.92		
5	64QAM	12	0	21.27	21.18	21.21	21.35	21.23	22.7	
5	64QAM	12	7	21.26	21.22	21.22	21.37	21.25		
5	64QAM	12	13	21.24	21.19	21.18	21.35	21.22		
5	64QAM	25	0	21.25	21.22	21.22	21.38	21.27		



Band 48								
Ant 2								
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq	Power Low Middle Ch. / Freq	Power High Middle Ch. / Freq	Power High Ch. / Freq	
Channel				55340	55830	56150	56640	
Frequency (MHz)				3559	3599	3641	3693	
20	QPSK	1	0	21.54	21.64	21.61	21.48	22.6
20	QPSK	1	49	21.40	21.44	21.41	21.19	
20	QPSK	1	99	21.39	21.42	21.33	21.07	21.6
20	QPSK	50	0	20.63	20.65	20.64	20.47	
20	QPSK	50	24	20.60	20.60	20.56	20.36	21.6
20	QPSK	50	50	20.52	20.54	20.49	20.26	
20	QPSK	100	0	20.55	20.61	20.54	20.35	21.6
20	16QAM	1	0	20.68	20.76	20.73	20.59	
20	16QAM	1	49	20.51	20.52	20.51	20.28	21.6
20	16QAM	1	99	20.52	20.50	20.42	20.18	
20	16QAM	50	0	19.65	19.70	19.68	19.46	20.6
20	16QAM	50	24	19.61	19.66	19.62	19.43	
20	16QAM	50	50	19.57	19.59	19.53	19.29	20.6
20	16QAM	100	0	19.59	19.65	19.58	19.40	
20	64QAM	1	0	19.44	19.48	19.45	19.32	20.6
20	64QAM	1	49	19.26	19.28	19.23	19.02	
20	64QAM	1	99	19.31	19.24	19.15	18.93	19.6
20	64QAM	50	0	18.64	18.70	18.67	18.51	
20	64QAM	50	24	18.63	18.67	18.64	18.42	19.6
20	64QAM	50	50	18.57	18.58	18.54	18.31	
20	64QAM	100	0	18.61	18.64	18.60	18.41	Tune-up limit (dBm)
Channel				55375	55820	56190	56695	
Frequency (MHz)				3557.5	3598	3642	3692.5	
15	QPSK	1	0	21.50	21.56	21.53	21.34	22.6
15	QPSK	1	37	21.39	21.41	21.40	21.14	
15	QPSK	1	74	21.43	21.39	21.32	21.09	21.6
15	QPSK	36	0	20.61	20.64	20.62	20.43	
15	QPSK	36	20	20.57	20.58	20.57	20.32	21.6
15	QPSK	36	39	20.55	20.57	20.51	20.27	
15	QPSK	75	0	20.57	20.63	20.54	20.34	21.6
15	16QAM	1	0	20.63	20.68	20.66	20.51	
15	16QAM	1	37	20.45	20.49	20.39	20.21	20.6
15	16QAM	1	74	20.66	20.59	20.51	20.26	
15	16QAM	36	0	19.58	19.60	19.56	19.39	20.6
15	16QAM	36	20	19.53	19.56	19.51	19.31	
15	16QAM	36	39	19.51	19.53	19.49	19.22	20.6
15	16QAM	75	0	19.60	19.61	19.58	19.37	
15	64QAM	1	0	19.37	19.44	19.39	19.24	20.6
15	64QAM	1	37	19.29	19.29	19.25	19.03	
15	64QAM	1	74	19.32	19.34	19.19	18.99	19.6
15	64QAM	36	0	18.62	18.66	18.64	18.44	
15	64QAM	36	20	18.59	18.62	18.56	18.34	19.6
15	64QAM	36	39	18.55	18.59	18.51	18.26	
15	64QAM	75	0	18.59	18.63	18.50	18.37	Tune-up limit (dBm)
Channel				55200	55615	56165	56890	
Frequency (MHz)				3555	3607.5	3642.5	3695	
10	QPSK	1	0	21.50	21.56	21.52	21.31	22.6
10	QPSK	1	25	21.30	21.31	21.31	21.14	
10	QPSK	1	49	21.34	21.37	21.24	21.01	21.6
10	QPSK	25	0	20.57	20.60	20.61	20.43	
10	QPSK	25	12	20.49	20.53	20.57	20.25	21.6
10	QPSK	25	25	20.53	20.54	20.44	20.26	
10	QPSK	50	0	20.53	20.60	20.53	20.30	21.6
10	16QAM	1	0	20.61	20.64	20.58	20.45	
10	16QAM	1	25	20.36	20.45	20.36	20.11	20.6
10	16QAM	1	49	20.59	20.59	20.44	20.23	
10	16QAM	25	0	19.55	19.53	19.49	19.34	20.6
10	16QAM	25	12	19.50	19.48	19.44	19.31	
10	16QAM	25	25	19.42	19.50	19.43	19.14	19.6
10	16QAM	50	0	19.53	19.56	19.57	19.31	
10	64QAM	1	0	19.29	19.40	19.39	19.17	20.6
10	64QAM	1	25	19.29	19.19	19.22	18.97	
10	64QAM	1	49	19.24	19.32	19.14	18.90	19.6
10	64QAM	25	0	18.56	18.59	18.59	18.41	
10	64QAM	25	12	18.59	18.62	18.51	18.31	19.6
10	64QAM	25	25	18.54	18.50	18.47	18.26	
10	64QAM	50	0	18.40	18.55	18.53	18.37	Tune-up limit (dBm)
Channel				55265	55810	56170	56715	
Frequency (MHz)				3552.5	3607	3643	3697.5	
5	QPSK	1	0	21.46	21.52	21.47	21.27	22.6
5	QPSK	1	12	21.41	21.47	21.41	21.18	
5	QPSK	1	24	21.40	21.40	21.37	21.11	21.6
5	QPSK	12	0	20.54	20.64	20.63	20.38	
5	QPSK	12	7	20.62	20.66	20.60	20.34	21.6
5	QPSK	12	13	20.54	20.56	20.54	20.28	
5	QPSK	25	0	20.58	20.58	20.57	20.30	21.6
5	16QAM	1	0	20.55	20.62	20.58	20.36	
5	16QAM	1	12	20.64	20.67	20.54	20.36	21.6
5	16QAM	1	24	20.56	20.63	20.55	20.30	
5	16QAM	12	0	19.55	19.59	19.62	19.31	20.6
5	16QAM	12	7	19.55	19.62	19.58	19.33	
5	16QAM	12	13	19.55	19.60	19.54	19.31	20.6
5	16QAM	25	0	19.59	19.63	19.60	19.36	
5	64QAM	1	0	19.36	19.41	19.36	19.10	20.6
5	64QAM	1	12	19.36	19.40	19.33	19.08	
5	64QAM	1	24	19.33	19.37	19.32	19.04	19.6
5	64QAM	12	0	18.62	18.66	18.61	18.40	
5	64QAM	12	7	18.65	18.69	18.64	18.42	19.6
5	64QAM	12	13	18.64	18.62	18.62	18.31	
5	64QAM	25	0	18.66	18.70	18.63	18.40	19.6



Band 38 HPUE							
Art 2							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)
Channel				37850	38000	38150	
Frequency (MHz)				2553	2565	2510	
20	QPSK	1	0	25.30	25.30	25.23	27.2
20	QPSK	1	49	25.32	25.27	25.26	
20	QPSK	1	99	25.33	25.28	25.24	
20	QPSK	50	0	25.32	25.30	25.27	
20	QPSK	50	24	25.40	25.30	25.26	26.2
20	QPSK	50	50	25.39	25.36	25.32	
20	QPSK	100	0	25.40	25.31	25.27	
20	16QAM	1	0	25.47	25.45	25.36	
20	16QAM	1	49	25.79	25.42	25.34	26.2
20	16QAM	1	99	25.45	25.43	25.37	
20	16QAM	50	0	24.45	24.47	24.39	
20	16QAM	50	24	24.53	24.48	24.37	25.2
20	16QAM	50	50	24.52	24.54	24.45	
20	16QAM	100	0	24.57	24.46	24.38	
20	64QAM	1	0	24.42	24.38	24.27	
20	64QAM	1	49	24.45	24.37	24.32	25.2
20	64QAM	1	99	24.43	24.40	24.33	
20	64QAM	50	0	23.47	23.48	23.39	
20	64QAM	50	24	23.54	23.47	23.38	24.2
20	64QAM	50	50	23.52	23.53	23.45	
20	64QAM	100	0	23.51	23.46	23.38	
Channel				37855	38000	38175	
Frequency (MHz)				2577.5	2595	2612.5	
15	QPSK	1	0	25.25	25.24	25.20	
15	QPSK	1	37	25.32	25.27	25.23	27.2
15	QPSK	1	74	25.29	25.23	25.25	
15	QPSK	36	0	25.51	25.41	25.39	
15	QPSK	36	20	25.45	25.38	25.44	26.2
15	QPSK	36	39	25.48	25.43	25.38	
15	QPSK	75	0	25.49	25.37	25.33	
15	16QAM	1	0	25.56	25.59	25.48	
15	16QAM	1	37	25.56	25.54	25.47	26.2
15	16QAM	1	74	25.61	25.54	25.50	
15	16QAM	36	0	24.57	24.53	24.44	
15	16QAM	36	20	24.55	24.49	24.50	25.2
15	16QAM	36	39	24.55	24.55	24.46	
15	16QAM	75	0	24.62	24.52	24.44	
15	64QAM	1	0	24.49	24.43	24.38	
15	64QAM	1	37	24.55	24.62	24.43	25.2
15	64QAM	1	74	24.56	24.50	24.41	
15	64QAM	36	0	23.62	23.67	23.48	
15	64QAM	36	20	23.62	23.63	23.52	24.2
15	64QAM	36	39	23.58	23.61	23.53	
15	64QAM	75	0	23.62	23.64	23.48	
Channel				37800	38000	38200	
Frequency (MHz)				2575	2595	2615	
10	QPSK	1	0	25.43	25.31	25.24	
10	QPSK	1	25	25.37	25.34	25.22	27.2
10	QPSK	1	49	25.41	25.35	25.28	
10	QPSK	25	0	25.50	25.45	25.38	
10	QPSK	25	12	25.58	25.48	25.40	26.2
10	QPSK	25	25	25.50	25.56	25.44	
10	QPSK	50	0	25.45	25.43	25.36	
10	16QAM	1	0	26.70	25.55	25.55	
10	16QAM	1	25	25.70	25.65	25.54	26.2
10	16QAM	1	49	25.69	25.73	25.59	
10	16QAM	25	0	24.72	24.65	24.53	
10	16QAM	25	12	24.63	24.71	24.61	25.2
10	16QAM	25	25	24.70	24.63	24.55	
10	16QAM	50	0	24.67	24.54	24.61	
10	64QAM	1	0	24.63	24.54	24.58	
10	64QAM	1	25	24.64	24.64	24.61	25.2
10	64QAM	1	49	24.65	24.74	24.57	
10	64QAM	25	0	23.74	23.64	23.61	
10	64QAM	25	12	23.75	23.72	23.54	24.2
10	64QAM	25	25	23.69	23.62	23.60	
10	64QAM	50	0	23.76	23.60	23.61	
Channel				37775	38000	38225	
Frequency (MHz)				2572.5	2595	2617.5	
5	QPSK	1	0	25.45	25.36	25.29	
5	QPSK	1	12	25.39	25.38	25.26	27.2
5	QPSK	1	24	25.43	25.39	25.29	
5	QPSK	12	0	25.59	25.49	25.46	
5	QPSK	12	7	25.64	25.57	25.49	26.2
5	QPSK	12	13	25.58	25.58	25.45	
5	QPSK	25	0	25.55	25.46	25.44	
5	16QAM	1	0	25.74	25.62	25.63	
5	16QAM	1	12	25.71	25.69	25.50	26.2
5	16QAM	1	24	25.76	25.73	25.66	
5	16QAM	12	0	24.74	24.65	24.60	
5	16QAM	12	7	24.72	24.74	24.64	25.2
5	16QAM	12	13	24.71	24.69	24.61	
5	16QAM	25	0	24.71	24.63	24.52	
5	64QAM	1	0	24.73	24.64	24.62	
5	64QAM	1	12	24.72	24.69	24.61	25.2
5	64QAM	1	24	24.74	24.74	24.67	
5	64QAM	12	0	23.74	23.67	23.63	
5	64QAM	12	7	23.76	23.75	23.62	24.2
5	64QAM	12	13	23.74	23.70	23.61	
5	64QAM	25	0	23.77	23.66	23.66	



Band 38							
Ant 2							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)
Channel				37850	38000	38150	
Frequency (MHz)				2350	2355	2360	
20	QPSK	1	0	23.48	23.45	23.40	25.4
20	QPSK	1	49	23.49	23.46	23.40	
20	QPSK	1	99	23.51	23.46	23.40	
20	QPSK	50	0	23.58	23.54	23.48	24.4
20	QPSK	50	24	23.72	23.56	23.47	
20	QPSK	50	50	23.83	23.61	23.53	
20	QPSK	100	0	23.85	23.55	23.47	24.4
20	16QAM	1	0	23.59	23.58	23.49	
20	16QAM	1	49	23.55	23.53	23.45	
20	16QAM	1	99	23.56	23.55	23.47	23.4
20	16QAM	50	0	22.51	22.58	22.48	
20	16QAM	50	24	22.68	22.58	22.50	
20	16QAM	50	50	22.67	22.64	22.56	23.4
20	16QAM	100	0	22.67	22.56	22.48	
20	64QAM	1	0	22.32	22.25	22.15	
20	64QAM	1	49	22.28	22.28	22.18	23.4
20	64QAM	1	99	22.32	22.28	22.16	
20	64QAM	50	0	21.82	21.59	21.51	
20	64QAM	50	24	21.69	21.59	21.50	22.4
20	64QAM	50	50	21.88	21.64	21.57	
20	64QAM	100	0	21.88	21.57	21.50	
Channel				37925	38000	38175	Upper limit (dBm)
Frequency (MHz)				2377.5	2355	2345.5	
15	QPSK	1	0	23.51	23.45	23.48	25.4
15	QPSK	1	37	23.47	23.45	23.47	
15	QPSK	1	74	23.48	23.46	23.40	
15	QPSK	36	0	23.66	23.57	23.49	24.4
15	QPSK	36	20	23.68	23.55	23.54	
15	QPSK	36	39	23.65	23.61	23.53	
15	QPSK	75	0	23.67	23.55	23.46	24.4
15	16QAM	1	0	23.82	23.61	23.49	
15	16QAM	1	37	23.51	23.49	23.41	
15	16QAM	1	74	23.65	23.60	23.50	23.4
15	16QAM	36	0	22.66	22.56	22.45	
15	16QAM	36	20	22.63	22.51	22.54	
15	16QAM	36	39	22.62	22.60	22.50	23.4
15	16QAM	75	0	22.69	22.58	22.50	
15	64QAM	1	0	22.30	22.27	22.17	
15	64QAM	1	37	22.37	22.30	22.21	23.4
15	64QAM	1	74	22.33	22.31	22.18	
15	64QAM	36	0	21.71	21.59	21.51	
15	64QAM	36	20	21.88	21.58	21.58	22.4
15	64QAM	36	39	21.69	21.66	21.57	
15	64QAM	75	0	21.72	21.57	21.52	
Channel				37800	38000	38200	Upper limit (dBm)
Frequency (MHz)				2375	2355	2315	
10	QPSK	1	0	23.47	23.48	23.42	25.4
10	QPSK	1	25	23.49	23.49	23.49	
10	QPSK	1	49	23.45	23.42	23.43	
10	QPSK	25	0	23.57	23.53	23.49	24.4
10	QPSK	25	12	23.61	23.69	23.49	
10	QPSK	25	25	23.58	23.58	23.49	
10	QPSK	50	0	23.82	23.58	23.55	24.4
10	16QAM	1	0	23.70	23.53	23.47	
10	16QAM	1	25	23.61	23.63	23.51	
10	16QAM	1	49	23.65	23.62	23.51	23.4
10	16QAM	25	0	22.64	22.50	22.51	
10	16QAM	25	12	22.67	22.63	22.51	
10	16QAM	25	25	22.58	22.54	22.47	23.4
10	16QAM	50	0	22.60	22.55	22.46	
10	64QAM	1	0	22.46	22.28	22.24	
10	64QAM	1	25	22.36	22.40	22.19	23.4
10	64QAM	1	49	22.37	22.38	22.29	
10	64QAM	25	0	21.71	21.56	21.49	
10	64QAM	25	12	21.69	21.64	21.57	22.4
10	64QAM	25	25	21.69	21.62	21.52	
10	64QAM	50	0	21.76	21.60	21.53	
Channel				37775	38000	38225	Upper limit (dBm)
Frequency (MHz)				2372.5	2355	2317.5	
5	QPSK	1	0	23.55	23.51	23.46	25.4
5	QPSK	1	12	23.53	23.50	23.40	
5	QPSK	1	24	23.51	23.48	23.40	
5	QPSK	12	0	23.65	23.60	23.56	24.4
5	QPSK	12	7	23.69	23.69	23.58	
5	QPSK	12	13	23.66	23.68	23.57	
5	QPSK	25	0	23.65	23.60	23.55	24.4
5	16QAM	1	0	23.66	23.59	23.55	
5	16QAM	1	12	23.60	23.66	23.58	
5	16QAM	1	24	23.66	23.66	23.57	23.4
5	16QAM	12	0	22.66	22.59	22.55	
5	16QAM	12	7	22.69	22.68	22.56	
5	16QAM	12	13	22.64	22.60	22.55	23.4
5	16QAM	25	0	22.70	22.62	22.56	
5	64QAM	1	0	22.47	22.35	22.29	
5	64QAM	1	12	22.46	22.42	22.29	23.4
5	64QAM	1	24	22.46	22.42	22.30	
5	64QAM	12	0	21.73	21.66	21.57	
5	64QAM	12	7	21.73	21.71	21.65	22.4
5	64QAM	12	13	21.73	21.69	21.62	
5	64QAM	25	0	21.76	21.64	21.62	



Band 41										
Ant 2										
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Low Middle Ch. / Freq.	Power Middle Ch. / Freq.	Power High Middle Ch. / Freq.	Power High Ch. / Freq.		Tune-up limit (dBm)
Channel				39760	40185	40620	41055	41490		
Frequency (MHz)				2503	2545.5	2593	2635.5	2690		
20	QPSK	1	0	23.29	23.45	23.52	23.23	23.01		25.4
20	QPSK	1	49	23.40	23.51	23.46	23.52	23.38		
20	QPSK	1	99	23.34	23.50	23.50	23.06	23.25		
20	QPSK	50	0	23.39	23.53	23.55	23.46	23.37		
20	QPSK	50	24	23.50	23.75	23.62	23.59	23.50		24.4
20	QPSK	50	50	23.46	23.63	23.60	23.43	23.46		
20	QPSK	100	0	23.50	23.65	23.62	23.50	23.41		
20	16QAM	1	0	23.42	23.55	23.65	23.35	23.12		
20	16QAM	1	49	23.39	23.58	23.53	23.63	23.51		24.4
20	16QAM	1	99	23.42	23.63	23.60	23.16	23.34		
20	16QAM	50	0	22.45	22.59	22.57	22.68	22.99		
20	16QAM	50	24	22.54	22.69	22.63	22.84	22.50		23.4
20	16QAM	50	50	22.54	22.67	22.64	22.69	22.68		
20	16QAM	100	0	22.63	22.67	22.64	22.72	22.63		
20	84QAM	1	0	22.13	22.17	22.26	22.18	21.99		
20	84QAM	1	49	22.10	22.30	22.25	22.61	22.48		23.4
20	84QAM	1	99	22.16	22.37	22.28	22.15	22.23		
20	84QAM	50	0	21.45	21.58	21.58	21.70	21.58		
20	84QAM	50	24	21.63	21.68	21.66	21.84	21.74		22.4
20	84QAM	50	50	21.63	21.68	21.64	21.66	21.69		
20	84QAM	100	0	21.53	21.67	21.65	21.74	21.63		
Channel				39720	40170	40620	41080	41515		Tune-up limit (dBm)
Frequency (MHz)				2503.5	2548.5	2593	2639.5	2692.5		
15	QPSK	1	0	23.40	23.50	23.49	23.47	23.40		25.4
15	QPSK	1	37	23.43	23.47	23.47	23.50	23.47		
15	QPSK	1	74	23.48	23.58	23.60	23.49	23.43		
15	QPSK	36	0	23.47	23.55	23.57	23.50	23.39		24.4
15	QPSK	36	20	23.50	23.66	23.64	23.53	23.50		
15	QPSK	36	39	23.47	23.64	23.62	23.51	23.44		
15	QPSK	75	0	23.51	23.64	23.65	23.46	23.42		
15	16QAM	1	0	23.43	23.58	23.60	23.51	23.27		24.4
15	16QAM	1	37	23.34	23.54	23.54	23.61	23.50		
15	16QAM	1	74	23.47	23.74	23.70	23.44	23.42		23.4
15	16QAM	36	0	22.45	22.53	22.65	22.70	22.55		
15	16QAM	36	20	22.47	22.61	22.59	22.69	22.65		23.4
15	16QAM	36	39	22.46	22.63	22.59	22.69	22.62		
15	16QAM	75	0	22.54	22.68	22.65	22.70	22.66		
15	84QAM	1	0	22.12	22.25	22.28	22.43	22.16		
15	84QAM	1	37	22.14	22.33	22.30	22.61	22.42		23.4
15	84QAM	1	74	22.13	22.46	22.38	22.40	22.32		
15	84QAM	36	0	21.49	21.59	21.59	21.71	21.59		
15	84QAM	36	20	21.62	21.84	21.66	21.74	21.71		22.4
15	84QAM	36	39	21.51	21.68	21.65	21.70	21.68		
15	84QAM	75	0	21.65	21.68	21.66	21.70	21.66		
Channel				39700	40160	40620	41080	41540		Tune-up limit (dBm)
Frequency (MHz)				2501	2547	2593	2639	2685		
10	QPSK	1	0	23.51	23.49	23.52	23.61	23.43		25.4
10	QPSK	1	25	23.43	23.62	23.59	23.57	23.41		
10	QPSK	1	49	23.46	23.65	23.51	23.61	23.40		
10	QPSK	25	0	23.60	23.66	23.64	23.66	23.50		24.4
10	QPSK	25	12	23.56	23.64	23.63	23.66	23.45		
10	QPSK	25	25	23.45	23.66	23.66	23.54	23.43		
10	QPSK	50	0	23.45	23.67	23.61	23.58	23.45		
10	16QAM	1	0	23.47	23.55	23.57	23.63	23.49		24.4
10	16QAM	1	25	23.47	23.69	23.72	23.70	23.62		
10	16QAM	1	49	23.56	23.66	23.70	23.57	23.41		
10	16QAM	25	0	22.47	22.63	22.58	22.79	22.64		23.4
10	16QAM	25	12	22.50	22.63	22.63	22.80	22.62		
10	16QAM	25	25	22.41	22.55	22.62	22.76	22.59		
10	16QAM	50	0	22.62	22.72	22.68	22.67	22.67		
10	84QAM	1	0	22.27	22.35	22.32	22.55	22.35		23.4
10	84QAM	1	25	22.29	22.47	22.35	22.64	22.40		
10	84QAM	1	49	22.24	22.48	22.34	22.60	22.35		
10	84QAM	25	0	21.46	21.65	21.65	21.89	21.65		
10	84QAM	25	12	21.53	21.69	21.62	21.83	21.73		22.4
10	84QAM	25	25	21.46	21.64	21.65	21.86	21.60		
10	84QAM	50	0	21.50	21.70	21.70	21.89	21.66		
Channel				39675	40148	40620	41083	41665		Tune-up limit (dBm)
Frequency (MHz)				2496.5	2545.6	2593	2640.30	2687.5		
5	QPSK	1	0	23.44	23.47	23.47	23.55	23.40		25.4
5	QPSK	1	12	23.40	23.53	23.58	23.55	23.40		
5	QPSK	1	24	23.40	23.57	23.51	23.51	23.40		
5	QPSK	12	0	23.51	23.67	23.68	23.63	23.49		24.4
5	QPSK	12	7	23.56	23.71	23.71	23.66	23.53		
5	QPSK	12	13	23.61	23.69	23.68	23.64	23.47		
5	QPSK	25	0	23.50	23.69	23.66	23.65	23.49		
5	16QAM	1	0	23.62	23.62	23.62	23.67	23.53		24.4
5	16QAM	1	12	23.67	23.71	23.70	23.71	23.63		
5	16QAM	1	24	23.57	23.71	23.72	23.67	23.51		
5	16QAM	12	0	22.47	22.65	22.66	22.85	22.67		23.4
5	16QAM	12	7	22.54	22.70	22.66	22.85	22.71		
5	16QAM	12	13	22.50	22.64	22.65	22.80	22.67		
5	16QAM	25	0	22.55	22.72	22.71	22.90	22.72		
5	84QAM	1	0	22.30	22.37	22.36	22.65	22.42		23.4
5	84QAM	1	12	22.29	22.47	22.45	22.67	22.45		
5	84QAM	1	24	22.31	22.49	22.44	22.63	22.35		
5	84QAM	12	0	21.65	21.74	21.71	21.90	21.73		22.4
5	84QAM	12	7	21.67	21.76	21.71	21.80	21.76		
5	84QAM	12	13	21.62	21.73	21.74	21.87	21.70		
5	84QAM	25	0	21.59	21.77	21.75	21.90	21.74		



Band 48									
Ant 7									
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Low Middle Ch. / Freq.	Power High Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)	
Channel				55340	55830	56150	56640		
Frequency (MHz)				3559	3599	3641	3683		
20	QPSK	1	0	22.70	22.79	22.84	22.93	24.2	
20	QPSK	1	49	22.55	22.57	22.64	22.71		
20	QPSK	1	99	22.54	22.57	22.59	22.67		
20	QPSK	50	0	22.05	22.11	22.14	22.23		
20	QPSK	50	24	22.02	22.03	22.08	22.19	23.2	
20	QPSK	50	50	21.94	21.99	22.04	22.08		
20	QPSK	100	0	21.97	22.05	22.08	22.16		
20	16QAM	1	0	22.13	22.21	22.26	22.34	23.2	
20	16QAM	1	49	21.92	21.97	22.00	22.09		
20	16QAM	1	99	21.95	21.99	21.97	22.09		
20	16QAM	50	0	21.07	21.12	21.19	21.27		
20	16QAM	50	24	21.03	21.10	21.13	21.20	22.2	
20	16QAM	50	50	20.96	21.03	21.05	21.14		
20	16QAM	100	0	20.99	21.08	21.13	21.19		
20	64QAM	1	0	20.88	20.96	20.96	21.09	22.2	
20	64QAM	1	49	20.65	20.71	20.74	20.83		
20	64QAM	1	99	20.72	20.74	20.67	20.82		
20	64QAM	50	0	20.08	20.12	20.16	20.27		
20	64QAM	50	24	20.04	20.06	20.11	20.19	21.2	
20	64QAM	50	50	19.96	20.01	20.07	20.13		
20	64QAM	100	0	20.02	20.06	20.12	20.20		
Channel				55375	55820	56160	56605		
Frequency (MHz)				3537.5	3586	3642	3692.5		
15	QPSK	1	0	22.60	22.69	22.73	22.84	24.2	
15	QPSK	1	37	22.48	22.56	22.58	22.68		
15	QPSK	1	74	22.52	22.58	22.59	22.69		
15	QPSK	36	0	22.01	22.09	22.13	22.25		
15	QPSK	36	20	21.96	22.02	22.07	22.16	23.2	
15	QPSK	36	39	21.92	22.01	22.04	22.11		
15	QPSK	75	0	21.95	22.07	22.09	22.19		
15	16QAM	1	0	22.06	22.15	22.21	22.28	23.2	
15	16QAM	1	37	21.84	21.93	21.95	22.03		
15	16QAM	1	74	21.96	22.05	22.04	22.16		
15	16QAM	36	0	20.95	21.05	21.09	21.21		
15	16QAM	36	20	20.91	21.00	21.03	21.13	22.2	
15	16QAM	36	39	20.90	20.97	21.01	21.10		
15	16QAM	75	0	20.97	21.07	21.11	21.20		
15	64QAM	1	0	20.79	20.90	20.96	21.00	22.2	
15	64QAM	1	37	20.66	20.74	20.75	20.86		
15	64QAM	1	74	20.73	20.81	20.73	20.92		
15	64QAM	36	0	20.01	20.13	20.14	20.24		
15	64QAM	36	20	19.96	20.06	20.08	20.18	21.2	
15	64QAM	36	39	19.95	20.02	20.03	20.13		
15	64QAM	75	0	20.00	20.07	20.09	20.20		
Channel				55200	55615	56165	56690		
Frequency (MHz)				3555	3607.5	3642.5	3695		
10	QPSK	1	0	22.60	22.66	22.69	22.74	24.2	
10	QPSK	1	25	22.38	22.53	22.51	22.64		
10	QPSK	1	49	22.51	22.57	22.58	22.64		
10	QPSK	25	0	21.95	22.09	22.11	22.21		
10	QPSK	25	12	21.88	22.01	22.07	22.11	23.2	
10	QPSK	25	25	21.83	21.97	22.00	22.06		
10	QPSK	50	0	21.85	22.07	22.04	22.11		
10	16QAM	1	0	22.05	22.13	22.12	22.18	23.2	
10	16QAM	1	25	21.81	21.84	21.88	21.93		
10	16QAM	1	49	21.97	22.01	22.02	22.11		
10	16QAM	25	0	20.93	21.05	21.02	21.16		
10	16QAM	25	12	20.87	20.98	20.98	21.06	22.2	
10	16QAM	25	25	20.80	20.89	20.96	21.08		
10	16QAM	50	0	20.87	21.01	21.04	21.20		
10	64QAM	1	0	20.79	20.91	20.93	20.94	22.2	
10	64QAM	1	25	20.65	20.68	20.69	20.83		
10	64QAM	1	49	20.69	20.77	20.70	20.83		
10	64QAM	25	0	19.95	20.13	20.10	20.23		
10	64QAM	25	12	19.94	20.06	20.05	20.11	21.2	
10	64QAM	25	25	19.90	19.92	20.00	20.13		
10	64QAM	50	0	19.96	20.05	20.05	20.10		
Channel				55265	55810	56170	56715		
Frequency (MHz)				3525.5	3567	3643	3697.5		
5	QPSK	1	0	22.81	22.84	22.74	22.84	24.2	
5	QPSK	1	12	22.57	22.61	22.68	22.77		
5	QPSK	1	24	22.49	22.62	22.61	22.71		
5	QPSK	12	0	21.97	22.10	22.12	22.20		
5	QPSK	12	7	21.99	22.09	22.15	22.22	23.2	
5	QPSK	12	13	21.97	22.02	22.08	22.21		
5	QPSK	25	0	21.96	22.02	22.10	22.21		
5	16QAM	1	0	21.96	22.07	22.15	22.22	23.2	
5	16QAM	1	12	22.04	22.15	22.17	22.26		
5	16QAM	1	24	22.02	22.08	22.12	22.17		
5	16QAM	12	0	20.98	21.07	21.13	21.21		
5	16QAM	12	7	20.95	21.10	21.09	21.21	22.2	
5	16QAM	12	13	20.95	21.00	21.07	21.15		
5	16QAM	25	0	21.00	21.08	21.13	21.21		
5	64QAM	1	0	20.78	20.83	20.88	20.97	22.2	
5	64QAM	1	12	20.77	20.83	20.85	20.97		
5	64QAM	1	24	20.75	20.79	20.88	20.96		
5	64QAM	12	0	20.01	20.07	20.18	20.27		
5	64QAM	12	7	20.01	20.09	20.18	20.27	21.2	
5	64QAM	12	13	20.01	20.09	20.10	20.19		
5	64QAM	25	0	20.03	20.11	20.16	20.25		



Band 38 HPUE							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)
Channel				37850	38000	38150	
Frequency (MHz)				2575	2595	2610	
20	QPSK	1	0	24.63	24.59	24.56	25.8
20	QPSK	1	49	24.56	24.59	24.51	
20	QPSK	1	99	24.55	24.54	24.47	
20	QPSK	50	0	24.81	24.81	24.77	25.8
20	QPSK	50	24	24.85	24.79	24.73	
20	QPSK	50	50	24.85	24.84	24.77	
20	QPSK	100	0	24.88	24.78	24.73	25.8
20	16QAM	1	0	24.98	24.95	24.96	
20	16QAM	1	49	24.97	24.90	24.87	
20	16QAM	1	99	24.95	24.91	24.83	25.3
20	16QAM	50	0	24.53	24.55	24.51	
20	16QAM	50	24	24.61	24.53	24.47	
20	16QAM	50	50	24.61	24.58	24.52	25.3
20	16QAM	100	0	24.62	24.54	24.46	
20	64QAM	1	0	24.53	24.50	24.43	
20	64QAM	1	49	24.48	24.50	24.43	25.3
20	64QAM	1	99	24.37	24.50	24.43	
20	64QAM	50	0	23.49	23.40	23.45	
20	64QAM	50	24	23.47	23.47	23.46	24.3
20	64QAM	50	50	23.39	23.42	23.43	
20	64QAM	100	0	23.35	23.29	23.25	
Channel				37855	38000	38175	Tune-up limit (dBm)
Frequency (MHz)				2577.5	2595	2612.5	
15	QPSK	1	0	24.61	24.64	24.59	25.8
15	QPSK	1	37	24.60	24.66	24.60	
15	QPSK	1	74	24.59	24.65	24.56	
15	QPSK	36	0	24.83	24.79	24.69	25.8
15	QPSK	36	20	24.79	24.75	24.75	
15	QPSK	36	39	24.77	24.79	24.72	
15	QPSK	75	0	24.81	24.75	24.69	25.8
15	16QAM	1	0	24.88	24.86	24.83	
15	16QAM	1	37	24.85	24.85	24.78	
15	16QAM	1	74	24.83	24.92	24.80	25.3
15	16QAM	36	0	24.51	24.41	24.37	
15	16QAM	36	20	24.46	24.39	24.38	
15	16QAM	36	39	24.47	24.45	24.39	25.3
15	16QAM	75	0	24.51	24.44	24.39	
15	64QAM	1	0	24.38	24.39	24.35	
15	64QAM	1	37	24.46	24.34	24.36	25.3
15	64QAM	1	74	24.30	24.41	24.33	
15	64QAM	36	0	23.46	23.34	23.31	
15	64QAM	36	20	23.41	23.38	23.40	24.3
15	64QAM	36	39	23.35	23.30	23.28	
15	64QAM	75	0	23.43	23.33	23.35	
Channel				37900	38000	38200	Tune-up limit (dBm)
Frequency (MHz)				2575	2595	2615	
10	QPSK	1	0	24.70	24.54	24.49	25.8
10	QPSK	1	25	24.56	24.55	24.47	
10	QPSK	1	49	24.62	24.66	24.49	
10	QPSK	25	0	24.81	24.74	24.66	25.8
10	QPSK	25	12	24.82	24.75	24.67	
10	QPSK	25	25	24.78	24.78	24.73	
10	QPSK	50	0	24.79	24.75	24.65	25.8
10	16QAM	1	0	24.97	24.96	24.89	
10	16QAM	1	25	24.92	24.94	24.87	
10	16QAM	1	49	24.96	24.95	24.88	25.3
10	16QAM	25	0	24.50	24.39	24.33	
10	16QAM	25	12	24.51	24.45	24.39	
10	16QAM	25	25	24.49	24.48	24.39	25.3
10	16QAM	50	0	24.51	24.45	24.36	
10	64QAM	1	0	24.35	24.22	24.47	
10	64QAM	1	25	24.38	24.36	24.29	25.3
10	64QAM	1	49	24.20	24.33	24.30	
10	64QAM	25	0	23.45	23.38	23.39	
10	64QAM	25	12	23.46	23.42	23.39	24.3
10	64QAM	25	25	23.40	23.33	23.31	
10	64QAM	50	0	23.33	23.28	23.26	
Channel				37775	38000	38225	Tune-up limit (dBm)
Frequency (MHz)				2572.5	2595	2617.5	
5	QPSK	1	0	24.59	24.53	24.51	25.8
5	QPSK	1	12	24.60	24.54	24.46	
5	QPSK	1	24	24.56	24.67	24.46	
5	QPSK	12	0	24.73	24.73	24.66	25.8
5	QPSK	12	7	24.80	24.80	24.70	
5	QPSK	12	13	24.78	24.75	24.70	
5	QPSK	25	0	24.72	24.68	24.67	25.8
5	16QAM	1	0	24.92	24.89	24.83	
5	16QAM	1	12	24.91	24.90	24.82	
5	16QAM	1	24	24.92	24.95	24.82	25.3
5	16QAM	12	0	24.48	24.42	24.40	
5	16QAM	12	7	24.49	24.53	24.42	
5	16QAM	12	13	24.46	24.49	24.36	25.3
5	16QAM	25	0	24.50	24.45	24.39	
5	64QAM	1	0	24.36	24.22	24.22	
5	64QAM	1	12	24.37	24.37	24.34	25.3
5	64QAM	1	24	24.32	24.37	24.38	
5	64QAM	12	0	23.42	23.35	23.33	
5	64QAM	12	7	23.44	23.45	23.40	24.3
5	64QAM	12	13	23.38	23.40	23.38	
5	64QAM	25	0	23.40	23.40	23.35	



Band 38							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)
Channel				37850	38000	38150	
Frequency (MHz)				2593	2595	2597	
20	QPSK	1	0	23.04	23.02	22.97	24
20	QPSK	1	49	23.00	23.01	22.95	
20	QPSK	1	99	23.00	22.99	22.91	
20	QPSK	50	0	23.11	23.10	23.04	
20	QPSK	50	24	23.18	23.09	23.01	24
20	QPSK	50	50	23.14	23.13	23.06	
20	QPSK	100	0	23.17	23.10	23.02	
20	16QAM	1	0	23.19	23.11	23.08	24
20	16QAM	1	49	23.11	23.08	23.02	
20	16QAM	1	99	23.07	23.08	23.00	
20	16QAM	50	0	22.75	22.74	22.69	
20	16QAM	50	24	22.78	22.72	22.64	23.5
20	16QAM	50	50	22.77	22.76	22.69	
20	16QAM	100	0	22.78	22.70	22.64	
20	64QAM	1	0	22.42	22.41	22.35	23.5
20	64QAM	1	49	22.39	22.35	22.33	
20	64QAM	1	99	22.39	22.41	22.30	
20	64QAM	50	0	21.73	21.76	21.68	
20	64QAM	50	24	21.82	21.73	21.66	22.5
20	64QAM	50	50	21.78	21.77	21.71	
20	64QAM	100	0	21.78	21.71	21.65	
Channel				37825	38000	38175	
Frequency (MHz)				2577.5	2595	2612.5	Upper limit (dBm)
15	QPSK	1	0	22.99	22.99	22.92	24
15	QPSK	1	37	22.95	22.94	22.85	
15	QPSK	1	74	22.97	22.96	22.88	
15	QPSK	36	0	23.18	23.08	23.03	24
15	QPSK	36	20	23.16	23.05	23.06	
15	QPSK	36	39	23.13	23.11	23.04	
15	QPSK	75	0	23.15	23.08	22.98	
15	16QAM	1	0	23.13	23.10	23.06	24
15	16QAM	1	37	23.01	23.03	22.91	
15	16QAM	1	74	23.09	23.11	23.02	
15	16QAM	36	0	22.74	22.65	22.55	23.5
15	16QAM	36	20	22.71	22.61	22.62	
15	16QAM	36	39	22.70	22.67	22.61	
15	16QAM	75	0	22.76	22.67	22.58	
15	64QAM	1	0	22.40	22.38	22.28	23.5
15	64QAM	1	37	22.42	22.40	22.32	
15	64QAM	1	74	22.36	22.39	22.28	
15	64QAM	36	0	21.78	21.72	21.63	22.5
15	64QAM	36	20	21.78	21.67	21.68	
15	64QAM	36	39	21.75	21.74	21.66	
15	64QAM	75	0	21.78	21.67	21.63	
Channel				37800	38000	38200	
Frequency (MHz)				2575	2595	2615	Upper limit (dBm)
10	QPSK	1	0	22.97	22.95	22.88	24
10	QPSK	1	25	22.90	22.94	22.80	
10	QPSK	1	49	22.90	22.96	22.79	
10	QPSK	25	0	23.15	23.04	23.03	24
10	QPSK	25	12	23.09	22.96	23.06	
10	QPSK	25	25	23.10	23.05	22.96	
10	QPSK	50	0	23.10	23.03	22.88	
10	16QAM	1	0	23.04	23.09	23.00	24
10	16QAM	1	25	22.96	22.96	22.87	
10	16QAM	1	49	23.04	23.07	22.99	
10	16QAM	25	0	22.66	22.62	22.55	23.5
10	16QAM	25	12	22.64	22.56	22.62	
10	16QAM	25	25	22.64	22.58	22.59	
10	16QAM	50	0	22.76	22.65	22.55	
10	64QAM	1	0	22.32	22.35	22.20	23.5
10	64QAM	1	25	22.32	22.36	22.27	
10	64QAM	1	49	22.29	22.32	22.18	
10	64QAM	25	0	21.77	21.63	21.55	22.5
10	64QAM	25	12	21.72	21.60	21.67	
10	64QAM	25	25	21.70	21.65	21.64	
10	64QAM	50	0	21.71	21.59	21.61	
Channel				37775	38000	38225	
Frequency (MHz)				2572.5	2595	2617.5	Upper limit (dBm)
5	QPSK	1	0	23.04	22.96	22.92	24
5	QPSK	1	12	22.98	22.98	22.89	
5	QPSK	1	24	22.97	23.00	22.90	
5	QPSK	12	0	23.12	23.06	23.04	24
5	QPSK	12	7	23.17	23.16	23.04	
5	QPSK	12	13	23.15	23.11	23.02	
5	QPSK	25	0	23.15	23.08	23.02	
5	16QAM	1	0	23.17	23.07	23.06	24
5	16QAM	1	12	23.17	23.15	23.06	
5	16QAM	1	24	23.17	23.17	23.04	
5	16QAM	12	0	22.73	22.67	22.60	23.5
5	16QAM	12	7	22.74	22.69	22.64	
5	16QAM	12	13	22.68	22.71	22.62	
5	16QAM	25	0	22.74	22.67	22.64	
5	64QAM	1	0	22.83	22.47	22.39	23.5
5	64QAM	1	12	22.54	22.51	22.39	
5	64QAM	1	24	22.54	22.52	22.39	
5	64QAM	12	0	21.77	21.69	21.69	22.5
5	64QAM	12	7	21.79	21.77	21.68	
5	64QAM	12	13	21.77	21.75	21.66	
5	64QAM	25	0	21.81	21.74	21.65	



Band 41										
Ant 0										
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Low Middle Ch. / Freq.	Power Middle Ch. / Freq.	Power High Middle Ch. / Freq.	Power High Ch. / Freq.		Tune-up limit (dBm)
Channel				39760	40185	40620	41055	41490		
Frequency (MHz)				2503.5	2546.5	2593	2636.5	2680		
20	QPSK	1	0	22.48	22.43	22.55	22.21	22.00		24
20	QPSK	1	49	22.42	22.42	22.40	22.44	22.29		24
20	QPSK	1	99	22.40	22.41	22.50	22.05	22.14		24
20	QPSK	50	0	22.52	22.50	22.52	22.41	22.22		24
20	QPSK	50	24	22.57	22.58	22.60	22.51	22.36		24
20	QPSK	50	50	22.56	22.57	22.58	22.35	22.34		24
20	QPSK	100	0	22.59	22.60	22.61	22.42	22.29		24
20	16QAM	1	0	22.63	22.58	22.66	22.32	22.02		24
20	16QAM	1	49	22.62	22.54	22.49	22.57	22.36		24
20	16QAM	1	99	22.49	22.57	22.54	22.06	22.25		24
20	16QAM	50	0	22.17	22.15	22.14	22.24	22.06		23.5
20	16QAM	50	24	22.23	22.22	22.19	22.33	22.19		23.5
20	16QAM	50	50	22.19	22.21	22.17	22.19	22.17		23.5
20	16QAM	100	0	22.23	22.22	22.17	22.24	22.11		23.5
20	64QAM	1	0	21.93	21.82	21.87	21.75	21.50		23.5
20	64QAM	1	49	21.81	21.85	21.85	22.12	21.93		23.5
20	64QAM	1	99	21.86	21.92	21.84	21.57	21.76		23.5
20	64QAM	50	0	21.20	21.16	21.15	21.23	21.13		22.5
20	64QAM	50	24	21.27	21.23	21.19	21.34	21.20		22.5
20	64QAM	50	50	21.22	21.22	21.18	21.19	21.16		22.5
20	64QAM	100	0	21.26	21.22	21.21	21.25	21.13		22.5
Channel				39720	40170	40620	41080	41515		
Frequency (MHz)				2503.5	2543.5	2593	2639.5	2682.5		
15	QPSK	1	0	22.45	22.40	22.42	22.30	22.03		24
15	QPSK	1	37	22.38	22.35	22.38	22.36	22.20		24
15	QPSK	1	74	22.36	22.45	22.49	22.10	22.19		24
15	QPSK	36	0	22.58	22.48	22.49	22.41	22.26		24
15	QPSK	36	20	22.56	22.55	22.56	22.40	22.36		24
15	QPSK	36	39	22.52	22.53	22.53	22.38	22.32		24
15	QPSK	75	0	22.58	22.56	22.56	22.34	22.30		24
15	16QAM	1	0	22.63	22.56	22.50	22.43	22.15		24
15	16QAM	1	37	22.41	22.44	22.39	22.43	22.36		24
15	16QAM	1	74	22.51	22.53	22.62	22.25	22.34		24
15	16QAM	36	0	22.17	22.07	22.05	22.17	22.03		23.5
15	16QAM	36	20	22.14	22.12	22.10	22.18	22.13		23.5
15	16QAM	36	39	22.12	22.12	22.09	22.15	22.11		23.5
15	16QAM	75	0	22.22	22.18	22.15	22.17	22.12		23.5
15	64QAM	1	0	21.87	21.80	21.79	21.88	21.61		23.5
15	64QAM	1	37	21.83	21.84	21.81	22.06	21.91		23.5
15	64QAM	1	74	21.78	21.97	21.88	21.78	21.84		23.5
15	64QAM	36	0	21.19	21.12	21.09	21.24	21.10		22.5
15	64QAM	36	20	21.22	21.19	21.15	21.23	21.19		22.5
15	64QAM	36	39	21.17	21.19	21.13	21.20	21.18		22.5
15	64QAM	75	0	21.22	21.20	21.16	21.17	21.12		22.5
Channel				39700	40160	40620	41080	41540		
Frequency (MHz)				2501	2547	2593	2639	2685		
10	QPSK	1	0	22.41	22.40	22.41	22.21	22.00		24
10	QPSK	1	25	22.34	22.28	22.36	22.34	22.15		24
10	QPSK	1	49	22.35	22.36	22.43	22.05	22.17		24
10	QPSK	25	0	22.49	22.42	22.41	22.35	22.18		24
10	QPSK	25	12	22.54	22.53	22.53	22.38	22.30		24
10	QPSK	25	25	22.50	22.50	22.50	22.38	22.30		24
10	QPSK	50	0	22.65	22.46	22.51	22.33	22.29		24
10	16QAM	1	0	22.57	22.51	22.50	22.35	22.14		24
10	16QAM	1	25	22.36	22.42	22.38	22.39	22.29		24
10	16QAM	1	49	22.45	22.63	22.55	22.18	22.08		24
10	16QAM	25	0	22.08	21.97	22.04	22.08	21.94		23.5
10	16QAM	25	12	22.10	22.06	22.07	22.18	22.03		23.5
10	16QAM	25	25	22.06	22.05	22.05	22.08	22.10		23.5
10	16QAM	50	0	22.16	22.17	22.10	22.08	22.08		23.5
10	64QAM	1	0	21.77	21.76	21.70	21.81	21.55		23.5
10	64QAM	1	25	21.76	21.80	21.78	22.05	21.81		23.5
10	64QAM	1	49	21.77	21.87	21.82	21.70	21.82		23.5
10	64QAM	25	0	21.14	21.10	21.09	21.22	21.08		22.5
10	64QAM	25	12	21.20	21.12	21.13	21.19	21.15		22.5
10	64QAM	25	25	21.11	21.09	21.03	21.15	21.09		22.5
10	64QAM	50	0	21.21	21.20	21.09	21.13	21.07		22.5
Channel				39675	40148	40620	41083	41565		
Frequency (MHz)				2496.5	2545.8	2593	2640.30	2687.5		
5	QPSK	1	0	22.54	22.42	22.43	22.43	22.26		24
5	QPSK	1	12	22.56	22.49	22.46	22.43	22.26		24
5	QPSK	1	24	22.54	22.47	22.42	22.38	22.17		24
5	QPSK	12	0	22.64	22.56	22.58	22.53	22.38		24
5	QPSK	12	7	22.63	22.59	22.58	22.54	22.43		24
5	QPSK	12	13	22.64	22.58	22.58	22.53	22.35		24
5	QPSK	25	0	22.62	22.58	22.57	22.53	22.40		24
5	16QAM	1	0	22.65	22.52	22.53	22.55	22.41		24
5	16QAM	1	12	22.64	22.63	22.65	22.63	22.51		24
5	16QAM	1	24	22.65	22.64	22.61	22.54	22.42		24
5	16QAM	12	0	22.22	22.15	22.13	22.33	22.20		23.5
5	16QAM	12	7	22.23	22.20	22.16	22.35	22.20		23.5
5	16QAM	12	13	22.21	22.17	22.15	22.31	22.16		23.5
5	16QAM	25	0	22.25	22.22	22.21	22.39	22.22		23.5
5	64QAM	1	0	22.02	21.88	21.84	22.13	21.97		23.5
5	64QAM	1	12	21.97	21.94	21.93	22.14	21.88		23.5
5	64QAM	1	24	21.97	21.97	21.95	22.08	21.93		23.5
5	64QAM	12	0	21.31	21.23	21.21	21.38	21.25		22.5
5	64QAM	12	7	21.28	21.25	21.25	21.40	21.26		22.5
5	64QAM	12	13	21.28	21.23	21.20	21.33	21.18		22.5
5	64QAM	25	0	21.29	21.26	21.20	21.39	21.25		22.5



Band 48									
Ant 2									
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Low Middle Ch. / Freq.	Power High Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)	
Channel				55340	55830	56150	56640		
Frequency (MHz)				3550	3600	3641	3690		
20	QPSK	1	0	21.16	21.17	21.13	21.00	22.2	
20	QPSK	1	49	20.83	20.96	20.92	20.72	21.6	
20	QPSK	1	99	20.85	20.84	20.87	20.60	20.6	
20	QPSK	50	0	20.83	20.86	20.85	20.68	21.6	
20	QPSK	50	24	20.82	20.82	20.81	20.60	20.6	
20	QPSK	50	50	20.76	20.77	20.71	20.47	21.6	
20	QPSK	100	0	20.80	20.81	20.76	20.58	20.6	
20	16QAM	1	0	20.90	20.96	20.95	20.81	21.6	
20	16QAM	1	49	20.71	20.74	20.70	20.48	20.6	
20	16QAM	1	99	20.75	20.72	20.64	20.42	20.6	
20	16QAM	50	0	19.87	19.91	19.86	19.71	20.6	
20	16QAM	50	24	18.84	19.85	19.83	19.62	19.6	
20	16QAM	50	50	19.78	19.79	19.76	19.50	20.6	
20	16QAM	100	0	19.80	19.83	19.83	19.61	20.6	
20	64QAM	1	0	19.68	19.74	19.69	19.54	20.6	
20	64QAM	1	49	19.46	19.48	19.45	19.24	19.6	
20	64QAM	1	99	19.52	19.47	19.35	19.16	20.6	
20	64QAM	50	0	18.85	18.92	18.86	18.72	19.6	
20	64QAM	50	24	18.84	18.89	18.81	18.65	20.6	
20	64QAM	50	50	18.78	18.82	18.74	18.51	19.6	
20	64QAM	100	0	18.83	18.85	18.81	18.62	20.6	
Channel				55370	55820	56160	56695		
Frequency (MHz)				3557.5	3606	3642	3693.5		
15	QPSK	1	0	20.57	20.86	20.84	20.69	22.2	
15	QPSK	1	37	20.50	20.72	20.69	20.48	21.6	
15	QPSK	1	74	20.54	20.75	20.65	20.41	20.6	
15	QPSK	36	0	20.62	20.64	20.60	20.45	21.6	
15	QPSK	36	20	20.57	20.59	20.55	20.35	20.6	
15	QPSK	36	39	20.54	20.57	20.52	20.25	20.6	
15	QPSK	75	0	20.57	20.64	20.57	20.36	21.6	
15	16QAM	1	0	20.65	20.69	20.67	20.53	20.6	
15	16QAM	1	37	20.44	20.50	20.43	20.21	20.6	
15	16QAM	1	74	20.58	20.56	20.52	20.27	20.6	
15	16QAM	36	0	19.57	19.62	19.58	19.40	20.6	
15	16QAM	36	20	19.53	19.56	19.52	19.31	20.6	
15	16QAM	36	39	19.51	19.54	19.48	19.24	20.6	
15	16QAM	75	0	19.61	19.63	19.60	19.36	20.6	
15	64QAM	1	0	19.38	19.44	19.43	19.27	19.6	
15	64QAM	1	37	19.26	19.29	19.24	19.03	20.6	
15	64QAM	1	74	19.34	19.34	19.22	19.00	19.6	
15	64QAM	36	0	18.63	18.67	18.64	18.45	20.6	
15	64QAM	36	20	18.58	18.64	18.57	18.35	19.6	
15	64QAM	36	39	18.56	18.56	18.52	18.26	20.6	
15	64QAM	75	0	18.61	18.64	18.50	18.37	20.6	
Channel				55290	55615	56165	56690		
Frequency (MHz)				3555	3607.5	3642.5	3695		
10	QPSK	1	0	20.59	20.77	20.71	20.57	22.2	
10	QPSK	1	25	20.53	20.73	20.73	20.49	21.6	
10	QPSK	1	49	20.50	20.68	20.65	20.38	20.6	
10	QPSK	25	0	20.57	20.61	20.55	20.34	21.6	
10	QPSK	25	12	20.55	20.62	20.59	20.35	20.6	
10	QPSK	25	25	20.58	20.62	20.52	20.26	21.6	
10	QPSK	50	0	20.56	20.62	20.49	20.24	20.6	
10	16QAM	1	0	20.56	20.58	20.57	20.28	21.6	
10	16QAM	1	25	20.60	20.64	20.63	20.41	20.6	
10	16QAM	1	49	20.53	20.59	20.51	20.26	20.6	
10	16QAM	25	0	19.57	19.56	19.54	19.33	20.6	
10	16QAM	25	12	19.62	19.57	19.54	19.25	20.6	
10	16QAM	25	25	19.53	19.55	19.51	19.27	20.6	
10	16QAM	50	0	19.49	19.57	19.51	19.31	19.6	
10	64QAM	1	0	19.25	19.33	19.30	19.03	20.6	
10	64QAM	1	25	19.31	19.29	19.27	19.08	20.6	
10	64QAM	1	49	19.25	19.28	19.29	18.97	20.6	
10	64QAM	25	0	18.54	18.59	18.64	18.34	19.6	
10	64QAM	25	12	18.62	18.58	18.62	18.33	20.6	
10	64QAM	25	25	18.61	18.56	18.51	18.31	20.6	
10	64QAM	50	0	18.64	18.62	18.54	18.35	20.6	
Channel				55285	55810	56170	56715		
Frequency (MHz)				3552.5	3607	3643	3697.5		
5	QPSK	1	0	20.61	20.84	20.80	20.60	22.2	
5	QPSK	1	12	20.56	20.79	20.75	20.51	21.6	
5	QPSK	1	24	20.51	20.72	20.73	20.43	20.6	
5	QPSK	12	0	20.60	20.61	20.58	20.35	21.6	
5	QPSK	12	7	20.63	20.63	20.61	20.36	20.6	
5	QPSK	12	13	20.59	20.62	20.59	20.33	21.6	
5	QPSK	25	0	20.59	20.61	20.57	20.32	20.6	
5	16QAM	1	0	20.58	20.65	20.63	20.36	21.6	
5	16QAM	1	12	20.64	20.70	20.64	20.41	20.6	
5	16QAM	1	24	20.55	20.62	20.56	20.29	20.6	
5	16QAM	12	0	19.59	19.63	19.59	19.37	20.6	
5	16QAM	12	7	19.62	19.60	19.62	19.34	20.6	
5	16QAM	12	13	19.53	19.59	19.57	19.28	20.6	
5	16QAM	25	0	19.59	19.64	19.62	19.37	20.6	
5	64QAM	1	0	19.35	19.40	19.37	19.11	20.6	
5	64QAM	1	12	19.35	19.39	19.33	19.08	19.6	
5	64QAM	1	24	19.33	19.35	19.34	19.07	20.6	
5	64QAM	12	0	18.61	18.69	18.65	18.37	20.6	
5	64QAM	12	7	18.64	18.64	18.58	18.37	19.6	
5	64QAM	12	13	18.64	18.64	18.61	18.36	20.6	
5	64QAM	25	0	18.65	18.67	18.64	18.38	20.6	



Band 38 HPUE								
Art 2								
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)	
Channel				37850	38000	38150		
Frequency (MHz)				2558	2595	2610		
20	QPSK	1	0	25.30	25.33	25.23	26.4	
20	QPSK	1	49	25.32	25.27	25.26		
20	QPSK	1	99	25.32	25.28	25.24		
20	QPSK	50	0	25.32	25.30	25.27		
20	QPSK	50	24	25.40	25.30	25.26		
20	QPSK	50	50	25.39	25.36	25.32		
20	QPSK	100	0	25.40	25.31	25.27	26.4	
20	16QAM	1	0	25.47	25.45	25.36		
20	16QAM	1	49	25.79	25.42	25.34		
20	16QAM	1	99	25.45	25.43	25.37		
20	16QAM	50	0	24.45	24.47	24.39		
20	16QAM	50	24	24.53	24.48	24.37		
20	16QAM	50	50	24.52	24.54	24.45	25.4	
20	16QAM	100	0	24.57	24.46	24.38		
20	64QAM	1	0	24.42	24.38	24.27		
20	64QAM	1	49	24.45	24.37	24.32		
20	64QAM	1	99	24.43	24.40	24.33		
20	64QAM	50	0	23.47	23.48	23.39		
20	64QAM	50	24	23.54	23.47	23.38	24.4	
20	64QAM	50	50	23.52	23.53	23.45		
20	64QAM	100	0	23.51	23.46	23.38		
Channel				37855	38000	38175		Tune-up limit (dBm)
Frequency (MHz)				2577.5	2595	2612.5		
15	QPSK	1	0	25.25	25.24	25.20		26.4
15	QPSK	1	37	25.32	25.27	25.23		
15	QPSK	1	74	25.29	25.23	25.25		
15	QPSK	36	0	25.51	25.41	25.39		
15	QPSK	36	20	25.45	25.38	25.44		
15	QPSK	36	39	25.48	25.43	25.38		
15	QPSK	75	0	25.49	25.37	25.33	26.4	
15	16QAM	1	0	25.56	25.59	25.48		
15	16QAM	1	37	25.56	25.54	25.47		
15	16QAM	1	74	25.61	25.54	25.50		
15	16QAM	36	0	24.57	24.53	24.44		
15	16QAM	36	20	24.55	24.49	24.50		
15	16QAM	36	39	24.55	24.55	24.46	25.4	
15	16QAM	75	0	24.62	24.52	24.44		
15	64QAM	1	0	24.49	24.43	24.38		
15	64QAM	1	37	24.55	24.62	24.43		
15	64QAM	1	74	24.56	24.50	24.41		
15	64QAM	36	0	23.62	23.67	23.48		
15	64QAM	36	20	23.62	23.63	23.52	24.4	
15	64QAM	36	39	23.58	23.61	23.53		
15	64QAM	75	0	23.62	23.64	23.48		
Channel				37860	38000	38200		Tune-up limit (dBm)
Frequency (MHz)				2575	2595	2615		
10	QPSK	1	0	25.43	25.31	25.24		26.4
10	QPSK	1	25	25.37	25.34	25.22		
10	QPSK	1	49	25.41	25.35	25.28		
10	QPSK	25	0	25.50	25.45	25.38		
10	QPSK	25	12	25.58	25.48	25.40		
10	QPSK	25	25	25.50	25.56	25.44		
10	QPSK	50	0	25.45	25.43	25.36	26.4	
10	16QAM	1	0	26.70	25.55	25.55		
10	16QAM	1	25	25.70	25.65	25.54		
10	16QAM	1	49	25.69	25.73	25.59		
10	16QAM	25	0	24.72	24.65	24.53		
10	16QAM	25	12	24.63	24.71	24.61		
10	16QAM	25	25	24.70	24.63	24.55	25.4	
10	16QAM	50	0	24.67	24.54	24.61		
10	64QAM	1	0	24.63	24.54	24.58		
10	64QAM	1	25	24.64	24.64	24.61		
10	64QAM	1	49	24.65	24.74	24.57		
10	64QAM	25	0	23.74	23.64	23.61		
10	64QAM	25	12	23.75	23.72	23.54	24.4	
10	64QAM	25	25	23.69	23.62	23.60		
10	64QAM	50	0	23.76	23.60	23.61		
Channel				37775	38000	38225		Tune-up limit (dBm)
Frequency (MHz)				2572.5	2595	2617.5		
5	QPSK	1	0	25.45	25.36	25.29		26.4
5	QPSK	1	12	25.39	25.38	25.26		
5	QPSK	1	24	25.43	25.39	25.29		
5	QPSK	12	0	25.59	25.49	25.46		
5	QPSK	12	7	25.64	25.57	25.49		
5	QPSK	12	13	25.58	25.58	25.45		
5	QPSK	25	0	25.55	25.46	25.44	26.4	
5	16QAM	1	0	25.74	25.62	25.63		
5	16QAM	1	12	25.71	25.69	25.50		
5	16QAM	1	24	25.76	25.73	25.66		
5	16QAM	12	0	24.74	24.65	24.60		
5	16QAM	12	7	24.72	24.74	24.64		
5	16QAM	12	13	24.71	24.69	24.61	25.4	
5	16QAM	25	0	24.71	24.63	24.52		
5	64QAM	1	0	24.73	24.64	24.62		
5	64QAM	1	12	24.72	24.69	24.61		
5	64QAM	1	24	24.74	24.74	24.67		
5	64QAM	12	0	23.74	23.67	23.63		
5	64QAM	12	7	23.76	23.75	23.62	24.4	
5	64QAM	12	13	23.74	23.70	23.61		
5	64QAM	25	0	23.77	23.66	23.66		



Band 38							
Ant 2							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)
Channel				37850	38000	38150	
Frequency (MHz)				2580	2595	2610	
20	QPSK	1	0	23.48	23.45	23.40	24.6
20	QPSK	1	49	23.49	23.46	23.40	
20	QPSK	1	99	23.51	23.46	23.40	
20	QPSK	50	0	23.58	23.54	23.48	24.6
20	QPSK	50	24	23.72	23.56	23.47	
20	QPSK	50	50	23.83	23.61	23.53	
20	QPSK	100	0	23.85	23.55	23.47	24.6
20	16QAM	1	0	23.59	23.58	23.49	
20	16QAM	1	49	23.55	23.53	23.45	
20	16QAM	1	99	23.56	23.55	23.47	23.6
20	16QAM	50	0	22.51	22.58	22.48	
20	16QAM	50	24	22.68	22.58	22.50	
20	16QAM	50	50	22.67	22.64	22.56	23.6
20	16QAM	100	0	22.67	22.56	22.48	
20	64QAM	1	0	22.32	22.25	22.15	
20	64QAM	1	49	22.28	22.28	22.18	23.6
20	64QAM	1	99	22.32	22.28	22.16	
20	64QAM	50	0	21.82	21.59	21.51	
20	64QAM	50	24	21.69	21.59	21.50	22.6
20	64QAM	50	50	21.88	21.64	21.57	
20	64QAM	100	0	21.88	21.57	21.50	
Channel				37925	38000	38175	Tune-up limit (dBm)
Frequency (MHz)				2577.5	2595	2615.5	
15	QPSK	1	0	23.51	23.45	23.48	24.6
15	QPSK	1	37	23.47	23.45	23.47	
15	QPSK	1	74	23.48	23.46	23.40	
15	QPSK	36	0	23.66	23.57	23.49	24.6
15	QPSK	36	20	23.68	23.55	23.54	
15	QPSK	36	39	23.65	23.61	23.53	
15	QPSK	75	0	23.67	23.55	23.46	24.6
15	16QAM	1	0	23.82	23.61	23.49	
15	16QAM	1	37	23.51	23.49	23.41	
15	16QAM	1	74	23.65	23.60	23.50	23.6
15	16QAM	36	0	22.66	22.56	22.45	
15	16QAM	36	20	22.63	22.51	22.54	
15	16QAM	36	39	22.62	22.60	22.50	23.6
15	16QAM	75	0	22.69	22.58	22.50	
15	64QAM	1	0	22.30	22.27	22.17	
15	64QAM	1	37	22.37	22.30	22.21	23.6
15	64QAM	1	74	22.33	22.31	22.18	
15	64QAM	36	0	21.71	21.59	21.51	
15	64QAM	36	20	21.88	21.58	21.58	22.6
15	64QAM	36	39	21.69	21.66	21.57	
15	64QAM	75	0	21.72	21.57	21.52	
Channel				37800	38000	38200	Tune-up limit (dBm)
Frequency (MHz)				2575	2595	2615	
10	QPSK	1	0	23.47	23.48	23.42	24.6
10	QPSK	1	25	23.49	23.49	23.49	
10	QPSK	1	49	23.45	23.42	23.43	
10	QPSK	25	0	23.57	23.53	23.49	24.6
10	QPSK	25	12	23.61	23.69	23.49	
10	QPSK	25	25	23.58	23.58	23.49	
10	QPSK	50	0	23.82	23.58	23.55	24.6
10	16QAM	1	0	23.70	23.53	23.47	
10	16QAM	1	25	23.61	23.63	23.51	
10	16QAM	1	49	23.65	23.62	23.51	23.6
10	16QAM	25	0	22.64	22.50	22.51	
10	16QAM	25	12	22.67	22.63	22.51	
10	16QAM	25	25	22.58	22.54	22.47	23.6
10	16QAM	50	0	22.60	22.55	22.46	
10	64QAM	1	0	22.46	22.28	22.24	
10	64QAM	1	25	22.36	22.40	22.19	23.6
10	64QAM	1	49	22.37	22.38	22.29	
10	64QAM	25	0	21.71	21.56	21.49	
10	64QAM	25	12	21.69	21.64	21.57	22.6
10	64QAM	25	25	21.69	21.62	21.52	
10	64QAM	50	0	21.76	21.60	21.53	
Channel				37775	38000	38225	Tune-up limit (dBm)
Frequency (MHz)				2572.5	2595	2617.5	
5	QPSK	1	0	23.55	23.51	23.46	24.6
5	QPSK	1	12	23.53	23.50	23.40	
5	QPSK	1	24	23.51	23.48	23.40	
5	QPSK	12	0	23.65	23.60	23.56	24.6
5	QPSK	12	7	23.69	23.69	23.58	
5	QPSK	12	13	23.66	23.68	23.57	
5	QPSK	25	0	23.65	23.60	23.55	24.6
5	16QAM	1	0	23.66	23.59	23.55	
5	16QAM	1	12	23.60	23.66	23.58	
5	16QAM	1	24	23.66	23.66	23.57	23.6
5	16QAM	12	0	22.66	22.59	22.55	
5	16QAM	12	7	22.69	22.68	22.56	
5	16QAM	12	13	22.64	22.60	22.55	23.6
5	16QAM	25	0	22.70	22.62	22.56	
5	64QAM	1	0	22.47	22.35	22.29	
5	64QAM	1	12	22.46	22.42	22.29	23.6
5	64QAM	1	24	22.46	22.42	22.30	
5	64QAM	12	0	21.73	21.66	21.57	
5	64QAM	12	7	21.73	21.71	21.65	22.6
5	64QAM	12	13	21.73	21.69	21.62	
5	64QAM	25	0	21.76	21.64	21.62	



Band 41										
Ant 2										
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Low Middle Ch. / Freq.	Power Middle Ch. / Freq.	Power High Middle Ch. / Freq.	Power High Ch. / Freq.		Tune-up limit (dBm)
Channel				39760	40185	40620	41055	41490		
Frequency (MHz)				2535	2543.5	2553	2563.5	2570		
20	QPSK	1	0	23.29	23.45	23.52	23.23	23.01		24.6
20	QPSK	1	49	23.36	23.51	23.46	23.52	23.38		
20	QPSK	1	99	23.34	23.50	23.50	23.06	23.25		
20	QPSK	50	0	23.39	23.53	23.55	23.46	23.37		
20	QPSK	50	24	23.50	23.75	23.62	23.59	23.50		24.6
20	QPSK	50	50	23.49	23.63	23.60	23.43	23.46		
20	QPSK	50	0	23.50	23.65	23.62	23.50	23.41		
20	16QAM	1	0	23.42	23.55	23.65	23.35	23.12		
20	16QAM	1	49	23.39	23.58	23.53	23.63	23.51		24.6
20	16QAM	1	99	23.42	23.63	23.60	23.16	23.34		
20	16QAM	50	0	22.45	22.59	22.57	22.68	22.99		
20	16QAM	50	24	22.54	22.69	22.63	22.84	22.50		23.6
20	16QAM	50	50	22.54	22.67	22.64	22.69	22.68		
20	16QAM	100	0	22.63	22.67	22.64	22.72	22.63		
20	84QAM	1	0	22.13	22.17	22.26	22.18	21.99		
20	84QAM	1	49	22.10	22.30	22.25	22.61	22.48		23.6
20	84QAM	1	99	22.16	22.37	22.28	22.15	22.23		
20	84QAM	50	0	21.45	21.58	21.58	21.70	21.58		
20	84QAM	50	24	21.63	21.68	21.66	21.84	21.74		22.6
20	84QAM	50	50	21.63	21.68	21.64	21.66	21.69		
20	84QAM	100	0	21.53	21.67	21.65	21.74	21.63		
Channel				39720	40170	40620	41080	41510		
Frequency (MHz)				2503.5	2543.5	2593	2633.5	2682.5		
15	QPSK	1	0	23.40	23.50	23.49	23.47	23.40		24.6
15	QPSK	1	37	23.43	23.47	23.47	23.50	23.47		
15	QPSK	1	74	23.48	23.58	23.60	23.49	23.43		
15	QPSK	36	0	23.47	23.55	23.57	23.50	23.39		24.6
15	QPSK	36	20	23.50	23.66	23.64	23.53	23.50		
15	QPSK	36	39	23.47	23.64	23.62	23.51	23.44		
15	QPSK	75	0	23.51	23.64	23.65	23.46	23.42		
15	16QAM	1	0	23.43	23.58	23.60	23.51	23.27		24.6
15	16QAM	1	37	23.34	23.54	23.54	23.61	23.50		
15	16QAM	1	74	23.47	23.74	23.70	23.44	23.42		23.6
15	16QAM	36	0	22.45	22.53	22.65	22.70	22.55		
15	16QAM	36	20	22.47	22.61	22.59	22.69	22.65		23.6
15	16QAM	36	39	22.46	22.63	22.59	22.69	22.62		
15	16QAM	75	0	22.54	22.68	22.65	22.70	22.66		
15	84QAM	1	0	22.12	22.25	22.25	22.43	22.16		
15	84QAM	1	37	22.14	22.33	22.30	22.61	22.42		23.6
15	84QAM	1	74	22.13	22.46	22.38	22.40	22.32		
15	84QAM	36	0	21.49	21.59	21.59	21.71	21.59		
15	84QAM	36	20	21.62	21.84	21.66	21.74	21.71		22.6
15	84QAM	36	39	21.51	21.68	21.65	21.70	21.68		
15	84QAM	75	0	21.65	21.68	21.66	21.70	21.66		
Channel				39700	40160	40620	41080	41540		
Frequency (MHz)				2501	2547	2593	2639	2685		
10	QPSK	1	0	23.51	23.49	23.52	23.61	23.43		24.6
10	QPSK	1	25	23.43	23.62	23.59	23.57	23.41		
10	QPSK	1	49	23.46	23.65	23.51	23.61	23.40		
10	QPSK	25	0	23.60	23.66	23.64	23.66	23.50		24.6
10	QPSK	25	25	23.56	23.64	23.63	23.66	23.45		
10	QPSK	25	25	23.45	23.66	23.66	23.54	23.43		
10	QPSK	50	0	23.45	23.67	23.61	23.58	23.45		
10	16QAM	1	0	23.47	23.55	23.57	23.63	23.49		24.6
10	16QAM	1	25	23.47	23.69	23.72	23.70	23.62		
10	16QAM	1	49	23.56	23.66	23.70	23.57	23.41		
10	16QAM	25	0	22.47	22.63	22.58	22.79	22.64		23.6
10	16QAM	25	12	22.50	22.63	22.63	22.80	22.62		
10	16QAM	25	25	22.41	22.55	22.62	22.76	22.59		
10	16QAM	50	0	22.62	22.72	22.68	22.67	22.67		
10	84QAM	1	0	22.27	22.35	22.32	22.55	22.35		23.6
10	84QAM	1	25	22.29	22.47	22.35	22.64	22.40		
10	84QAM	1	49	22.24	22.48	22.34	22.60	22.35		
10	84QAM	25	0	21.46	21.65	21.65	21.89	21.65		
10	84QAM	25	12	21.53	21.69	21.62	21.83	21.73		22.6
10	84QAM	25	25	21.46	21.64	21.65	21.86	21.60		
10	84QAM	50	0	21.50	21.70	21.70	21.89	21.66		
Channel				39675	40148	40620	41083	41665		
Frequency (MHz)				2496.5	2545.8	2593	2640.30	2687.5		
5	QPSK	1	0	23.44	23.47	23.47	23.55	23.40		24.6
5	QPSK	1	12	23.40	23.53	23.58	23.55	23.40		
5	QPSK	1	24	23.40	23.57	23.51	23.51	23.40		
5	QPSK	12	0	23.51	23.67	23.68	23.63	23.49		24.6
5	QPSK	12	7	23.56	23.71	23.71	23.66	23.53		
5	QPSK	12	13	23.61	23.69	23.68	23.64	23.47		
5	QPSK	25	0	23.50	23.69	23.66	23.65	23.49		
5	16QAM	1	0	23.62	23.62	23.62	23.67	23.53		24.6
5	16QAM	1	12	23.67	23.71	23.70	23.71	23.63		
5	16QAM	1	24	23.57	23.71	23.72	23.67	23.51		
5	16QAM	12	0	22.47	22.65	22.66	22.85	22.67		23.6
5	16QAM	12	7	22.54	22.70	22.66	22.85	22.71		
5	16QAM	12	13	22.50	22.64	22.65	22.80	22.67		
5	16QAM	25	0	22.55	22.72	22.71	22.90	22.72		
5	84QAM	1	0	22.30	22.37	22.36	22.65	22.42		23.6
5	84QAM	1	12	22.29	22.47	22.45	22.67	22.45		
5	84QAM	1	24	22.31	22.49	22.44	22.63	22.35		
5	84QAM	12	0	21.65	21.74	21.71	21.90	21.73		22.6
5	84QAM	12	7	21.67	21.76	21.71	21.80	21.76		
5	84QAM	12	13	21.62	21.73	21.74	21.87	21.70		
5	84QAM	25	0	21.59	21.77	21.75	21.90	21.74		



Band 48										
Ant 7										
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Low Middle Ch. / Freq.	Power High Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)		
Channel				55340	55830	56150	56640			
Frequency (MHz)				3559	3599	3641	3683			
20	QPSK	1	0	22.70	22.79	22.84	22.93	23.8		
20	QPSK	1	49	22.55	22.57	22.64	22.71			
20	QPSK	1	99	22.54	22.57	22.59	22.67			
20	QPSK	50	0	22.05	22.11	22.14	22.23			
20	QPSK	50	24	22.02	22.03	22.08	22.19	23.2		
20	QPSK	50	50	21.94	21.99	22.04	22.08			
20	QPSK	100	0	21.97	22.05	22.08	22.16			
20	16QAM	1	0	22.13	22.21	22.26	22.34			
20	16QAM	1	49	21.92	21.97	22.00	22.09	23.2		
20	16QAM	1	99	21.95	21.99	21.97	22.09			
20	16QAM	50	0	21.07	21.15	21.19	21.27			
20	16QAM	50	24	21.03	21.10	21.13	21.20			
20	16QAM	50	50	20.96	21.03	21.05	21.14	22.2		
20	16QAM	100	0	20.99	21.08	21.13	21.19			
20	64QAM	1	0	20.88	20.96	20.96	21.09			
20	64QAM	1	49	20.65	20.71	20.74	20.83			
20	64QAM	1	99	20.72	20.74	20.67	20.82	22.2		
20	64QAM	50	0	20.08	20.12	20.16	20.27			
20	64QAM	50	24	20.04	20.06	20.11	20.19			
20	64QAM	50	50	19.96	20.01	20.07	20.13			
20	64QAM	100	0	20.02	20.06	20.12	20.20	21.2		
Channel				55375	55820	56160	56605			
Frequency (MHz)				3537.5	3586	3642	3692.5			
15	QPSK	1	0	22.60	22.69	22.73	22.84		23.8	
15	QPSK	1	37	22.48	22.56	22.58	22.68			
15	QPSK	1	74	22.52	22.58	22.59	22.69			
15	QPSK	36	0	22.01	22.09	22.13	22.25			
15	QPSK	36	20	21.96	22.02	22.07	22.16	23.2		
15	QPSK	36	39	21.92	22.01	22.04	22.11			
15	QPSK	75	0	21.95	22.07	22.09	22.19			
15	16QAM	1	0	22.06	22.15	22.21	22.28			
15	16QAM	1	37	21.84	21.93	21.95	22.03	23.2		
15	16QAM	1	74	21.96	22.05	22.04	22.16			
15	16QAM	36	0	20.95	21.05	21.09	21.21			
15	16QAM	36	20	20.91	21.00	21.03	21.13			
15	16QAM	36	39	20.90	20.97	21.01	21.10	22.2		
15	16QAM	75	0	20.97	21.07	21.11	21.20			
15	64QAM	1	0	20.79	20.90	20.96	21.00			
15	64QAM	1	37	20.66	20.74	20.75	20.89			
15	64QAM	1	74	20.73	20.81	20.73	20.92	21.2		
15	64QAM	36	0	20.01	20.13	20.14	20.24			
15	64QAM	36	20	19.96	20.06	20.08	20.18			
15	64QAM	36	39	19.95	20.02	20.03	20.13			
15	64QAM	75	0	20.00	20.07	20.09	20.20	Tune-up limit (dBm)		
Channel				55200	55615	56165	56690			
Frequency (MHz)				3555	3607.5	3642.5	3695			
10	QPSK	1	0	22.60	22.66	22.69	22.74		23.8	
10	QPSK	1	25	22.38	22.53	22.51	22.64			
10	QPSK	1	49	22.51	22.57	22.58	22.64			
10	QPSK	25	0	21.95	22.09	22.11	22.21			
10	QPSK	25	12	21.88	22.01	22.07	22.11	23.2		
10	QPSK	25	25	21.83	21.97	22.00	22.06			
10	QPSK	50	0	21.85	22.07	22.04	22.11			
10	16QAM	1	0	22.05	22.13	22.12	22.18			
10	16QAM	1	25	21.81	21.84	21.88	21.93	23.2		
10	16QAM	1	49	21.97	22.01	22.02	22.11			
10	16QAM	25	0	20.93	21.05	21.02	21.16			
10	16QAM	25	12	20.87	20.98	20.98	21.06			
10	16QAM	25	25	20.80	20.89	20.96	21.08	22.2		
10	16QAM	50	0	20.87	21.01	21.04	21.20			
10	64QAM	1	0	20.79	20.81	20.93	20.94			
10	64QAM	1	25	20.65	20.68	20.69	20.83			
10	64QAM	1	49	20.69	20.77	20.70	20.83	21.2		
10	64QAM	25	0	19.95	20.13	20.10	20.23			
10	64QAM	25	12	19.94	20.06	20.05	20.11			
10	64QAM	25	25	19.90	19.92	20.00	20.13			
10	64QAM	50	0	19.96	20.05	20.05	20.10	Tune-up limit (dBm)		
Channel				55265	55810	56170	56715			
Frequency (MHz)				3525.5	3567	3643	3697.5			
5	QPSK	1	0	22.81	22.84	22.74	22.84		23.8	
5	QPSK	1	12	22.57	22.61	22.68	22.77			
5	QPSK	1	24	22.49	22.62	22.61	22.71			
5	QPSK	12	0	21.97	22.10	22.12	22.20			
5	QPSK	12	7	21.99	22.09	22.15	22.22	23.2		
5	QPSK	12	13	21.97	22.02	22.08	22.21			
5	QPSK	25	0	21.96	22.02	22.10	22.21			
5	16QAM	1	0	21.96	22.07	22.15	22.22			
5	16QAM	1	12	22.04	22.15	22.17	22.26	23.2		
5	16QAM	1	24	22.02	22.08	22.12	22.17			
5	16QAM	12	0	20.98	21.07	21.13	21.21			
5	16QAM	12	7	20.95	21.10	21.09	21.21			
5	16QAM	12	13	20.95	21.00	21.07	21.15	22.2		
5	16QAM	25	0	21.00	21.06	21.13	21.21			
5	64QAM	1	0	20.78	20.83	20.88	20.97			
5	64QAM	1	12	20.77	20.83	20.85	20.97			
5	64QAM	1	24	20.75	20.79	20.88	20.96	22.2		
5	64QAM	12	0	20.01	20.07	20.18	20.27			
5	64QAM	12	7	20.01	20.09	20.18	20.27			
5	64QAM	12	13	20.01	20.09	20.10	20.19			
5	64QAM	25	0	20.03	20.11	20.16	20.25	21.2		



Band 38 HPUE							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)
Channel				37850	38000	38150	
Frequency (MHz)				2572.5	2595	2617.5	
20	QPSK	1	0	23.86	23.83	23.78	25
20	QPSK	1	49	23.78	23.78	23.74	
20	QPSK	1	99	23.82	23.77	23.69	
20	QPSK	50	0	24.04	24.06	23.97	
20	QPSK	50	24	24.13	23.99	23.93	25
20	QPSK	50	50	24.08	24.05	23.99	
20	QPSK	100	0	24.10	24.00	23.95	
20	16QAM	1	0	24.20	24.22	24.18	
20	16QAM	1	49	24.15	24.19	24.11	25
20	16QAM	1	99	24.14	24.15	24.09	
20	16QAM	50	0	24.09	24.10	24.03	
20	16QAM	50	24	24.15	24.05	24.01	25
20	16QAM	50	50	24.15	24.10	24.06	
20	16QAM	100	0	24.15	24.04	23.99	
20	64QAM	1	0	24.02	23.99	23.92	
20	64QAM	1	49	23.96	23.96	23.93	25
20	64QAM	1	99	24.00	23.88	23.92	
20	64QAM	50	0	23.45	23.39	23.45	
20	64QAM	50	24	23.43	23.45	23.47	24.5
20	64QAM	50	50	23.40	23.38	23.45	
20	64QAM	100	0	23.33	23.26	23.24	
Channel				37855	38000	38175	
Frequency (MHz)				2577.5	2595	2612.5	
15	QPSK	1	0	23.78	23.78	23.70	25
15	QPSK	1	37	23.78	23.80	23.73	
15	QPSK	1	74	23.79	23.78	23.67	
15	QPSK	36	0	24.02	23.93	23.85	25
15	QPSK	36	20	23.97	23.89	23.88	
15	QPSK	36	39	23.95	23.93	23.86	
15	QPSK	75	0	23.99	23.88	23.83	
15	16QAM	1	0	24.12	24.07	24.02	25
15	16QAM	1	37	24.04	24.05	23.99	
15	16QAM	1	74	24.09	24.08	23.96	
15	16QAM	36	0	24.02	23.93	23.84	25
15	16QAM	36	20	23.96	23.88	23.88	
15	16QAM	36	39	23.96	23.84	23.85	
15	16QAM	75	0	24.01	23.92	23.85	
15	64QAM	1	0	23.88	23.84	23.77	25
15	64QAM	1	37	23.90	23.88	23.80	
15	64QAM	1	74	23.87	23.89	23.78	
15	64QAM	36	0	23.36	23.28	23.28	24.5
15	64QAM	36	20	23.35	23.28	23.37	
15	64QAM	36	39	23.30	23.25	23.25	
15	64QAM	75	0	23.37	23.29	23.28	
Channel				37860	38000	38200	
Frequency (MHz)				2575	2595	2615	
10	QPSK	1	0	23.83	23.73	23.64	25
10	QPSK	1	25	23.70	23.70	23.65	
10	QPSK	1	49	23.83	23.81	23.72	
10	QPSK	25	0	23.96	23.87	23.83	25
10	QPSK	25	12	23.97	23.89	23.83	
10	QPSK	25	25	23.94	23.95	23.91	
10	QPSK	50	0	23.94	23.87	23.81	
10	16QAM	1	0	24.17	24.11	24.05	25
10	16QAM	1	25	24.11	24.11	24.05	
10	16QAM	1	49	24.16	24.13	24.02	
10	16QAM	25	0	24.01	23.89	23.85	25
10	16QAM	25	12	24.02	23.93	23.84	
10	16QAM	25	25	23.96	23.94	23.85	
10	16QAM	50	0	23.99	23.92	23.85	
10	64QAM	1	0	24.00	24.03	23.95	25
10	64QAM	1	25	24.02	24.10	24.00	
10	64QAM	1	49	24.05	24.05	23.94	
10	64QAM	25	0	23.44	23.34	23.37	24.5
10	64QAM	25	12	23.45	23.38	23.36	
10	64QAM	25	25	23.40	23.29	23.29	
10	64QAM	50	0	23.33	23.24	23.17	
Channel				37775	38000	38225	
Frequency (MHz)				2572.5	2595	2617.5	
5	QPSK	1	0	23.77	23.73	23.68	25
5	QPSK	1	12	23.69	23.72	23.64	
5	QPSK	1	24	23.74	23.77	23.65	
5	QPSK	12	0	23.93	23.86	23.83	25
5	QPSK	12	7	23.95	23.94	23.88	
5	QPSK	12	13	23.91	23.92	23.86	
5	QPSK	25	0	23.93	23.87	23.83	
5	16QAM	1	0	24.13	24.07	24.03	25
5	16QAM	1	12	24.10	24.10	24.01	
5	16QAM	1	24	24.10	24.15	24.04	
5	16QAM	12	0	23.96	23.93	23.90	25
5	16QAM	12	7	23.98	23.97	23.94	
5	16QAM	12	13	23.98	23.98	23.88	
5	16QAM	25	0	23.99	23.92	23.89	
5	64QAM	1	0	23.99	23.95	23.93	25
5	64QAM	1	12	23.98	23.98	23.87	
5	64QAM	1	24	24.01	24.04	23.91	
5	64QAM	12	0	23.33	23.31	23.32	24.5
5	64QAM	12	7	23.34	23.31	23.36	
5	64QAM	12	13	23.28	23.27	23.37	
5	64QAM	25	0	23.31	23.27	23.28	



Band 38							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)
Channel				37850	38000	38150	
Frequency (MHz)				2593	2595	2510	
20	QPSK	1	0	22.19	22.22	22.17	23.2
20	QPSK	1	49	22.21	22.21	22.15	
20	QPSK	1	99	22.19	22.17	22.10	
20	QPSK	50	0	22.30	22.33	22.26	23.2
20	QPSK	50	24	22.35	22.29	22.24	
20	QPSK	50	50	22.35	22.34	22.29	
20	QPSK	100	0	22.37	22.29	22.21	23.2
20	16QAM	1	0	22.39	22.43	22.32	
20	16QAM	1	49	22.31	22.30	22.25	
20	16QAM	1	99	22.32	22.33	22.24	23.2
20	16QAM	50	0	22.35	22.33	22.28	
20	16QAM	50	24	22.39	22.33	22.25	
20	16QAM	50	50	22.38	22.38	22.30	23.2
20	16QAM	100	0	22.39	22.29	22.25	
20	64QAM	1	0	22.04	22.06	21.95	
20	64QAM	1	49	21.98	21.99	21.95	23.2
20	64QAM	1	99	21.99	22.01	21.92	
20	64QAM	50	0	21.76	21.75	21.71	
20	64QAM	50	24	21.81	21.72	21.67	22.7
20	64QAM	50	50	21.78	21.77	21.69	
20	64QAM	100	0	21.80	21.71	21.66	
Channel				37825	38000	38175	
Frequency (MHz)				2577.5	2595	2615.5	100% up limit (dBm)
15	QPSK	1	0	22.23	22.19	22.13	23.2
15	QPSK	1	37	22.15	22.14	22.08	
15	QPSK	1	74	22.18	22.16	22.10	
15	QPSK	36	0	22.38	22.29	22.24	23.2
15	QPSK	36	20	22.36	22.25	22.29	
15	QPSK	36	39	22.33	22.31	22.24	
15	QPSK	75	0	22.36	22.28	22.21	23.2
15	16QAM	1	0	22.36	22.35	22.27	
15	16QAM	1	37	22.26	22.27	22.22	
15	16QAM	1	74	22.34	22.34	22.25	23.2
15	16QAM	36	0	22.35	22.25	22.22	
15	16QAM	36	20	22.33	22.24	22.26	
15	16QAM	36	39	22.31	22.28	22.22	23.2
15	16QAM	75	0	22.39	22.29	22.23	
15	64QAM	1	0	22.01	22.00	21.93	
15	64QAM	1	37	22.05	22.02	21.94	23.2
15	64QAM	1	74	22.00	22.02	21.92	
15	64QAM	36	0	21.80	21.74	21.64	
15	64QAM	36	20	21.78	21.70	21.72	22.7
15	64QAM	36	39	21.76	21.75	21.68	
15	64QAM	75	0	21.78	21.69	21.61	
Channel				37800	38000	38200	
Frequency (MHz)				2575	2595	2615	100% up limit (dBm)
10	QPSK	1	0	22.23	22.10	22.07	23.2
10	QPSK	1	25	22.15	22.05	21.98	
10	QPSK	1	49	22.13	22.09	22.00	
10	QPSK	25	0	22.32	22.21	22.20	23.2
10	QPSK	25	12	22.27	22.22	22.26	
10	QPSK	25	25	22.31	22.30	22.23	
10	QPSK	50	0	22.33	22.23	22.19	23.2
10	16QAM	1	0	22.28	22.35	22.17	
10	16QAM	1	25	22.22	22.16	22.20	
10	16QAM	1	49	22.28	22.32	22.24	23.2
10	16QAM	25	0	22.27	22.25	22.21	
10	16QAM	25	12	22.32	22.19	22.23	
10	16QAM	25	25	22.26	22.24	22.18	23.2
10	16QAM	50	0	22.39	22.24	22.23	
10	64QAM	1	0	21.92	21.95	21.83	
10	64QAM	1	25	21.97	22.01	21.85	23.2
10	64QAM	1	49	21.97	21.96	21.91	
10	64QAM	25	0	21.73	21.70	21.62	
10	64QAM	25	12	21.74	21.69	21.70	22.7
10	64QAM	25	25	21.76	21.65	21.65	
10	64QAM	50	0	21.69	21.69	21.54	
Channel				37775	38000	38225	
Frequency (MHz)				2572.5	2595	2617.5	100% up limit (dBm)
5	QPSK	1	0	22.30	22.20	22.18	23.2
5	QPSK	1	12	22.24	22.17	22.14	
5	QPSK	1	24	22.23	22.21	22.11	
5	QPSK	12	0	22.38	22.31	22.26	23.2
5	QPSK	12	7	22.38	22.36	22.26	
5	QPSK	12	13	22.35	22.32	22.24	
5	QPSK	25	0	22.32	22.30	22.27	23.2
5	16QAM	1	0	22.42	22.32	22.30	
5	16QAM	1	12	22.42	22.37	22.30	
5	16QAM	1	24	22.42	22.39	22.29	23.2
5	16QAM	12	0	22.34	22.28	22.24	
5	16QAM	12	7	22.38	22.33	22.24	
5	16QAM	12	13	22.33	22.29	22.20	23.2
5	16QAM	25	0	22.40	22.32	22.29	
5	64QAM	1	0	22.13	22.05	21.99	
5	64QAM	1	12	22.13	22.09	22.00	23.2
5	64QAM	1	24	22.13	22.10	22.00	
5	64QAM	12	0	21.78	21.73	21.72	
5	64QAM	12	7	21.81	21.81	21.69	22.7
5	64QAM	12	13	21.80	21.77	21.67	
5	64QAM	25	0	21.82	21.76	21.68	



Band 41										
Ant 0										
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Low Middle Ch. / Freq.	Power Middle Ch. / Freq.	Power High Middle Ch. / Freq.	Power High Ch. / Freq.		Tune-up limit (dBm)
Channel				39760	40185	40620	41055	41490		
Frequency (MHz)				2593	2593.5	2593	2639.5	2593		
20	QPSK	1	0	21.89	21.80	21.65	21.44	21.20		23.2
20	QPSK	1	49	21.66	21.71	21.63	21.79	21.52		
20	QPSK	1	99	21.62	21.65	21.65	21.22	21.35		
20	QPSK	50	0	21.75	21.72	21.73	21.61	21.45		
20	QPSK	50	24	21.80	21.90	21.78	21.89	21.57		23.2
20	QPSK	50	50	21.76	21.78	21.75	21.65	21.55		
20	QPSK	100	0	21.81	21.83	21.78	21.65	21.49		
20	16QAM	1	0	21.87	21.76	21.92	21.47	21.20		
20	16QAM	1	49	21.70	21.76	21.67	21.73	21.58		23.2
20	16QAM	1	99	21.71	21.79	21.73	21.24	21.43		
20	16QAM	50	0	21.76	21.79	21.76	21.63	21.48		
20	16QAM	50	24	21.85	21.88	21.82	21.75	21.60		
20	16QAM	50	50	21.79	21.86	21.80	21.56	21.57		23.2
20	16QAM	100	0	21.79	21.84	21.79	21.66	21.51		
20	84QAM	1	0	21.55	21.44	21.45	21.22	21.21		
20	84QAM	1	49	21.43	21.48	21.47	21.55	21.35		23.2
20	84QAM	1	99	21.46	21.53	21.44	21.20	21.22		
20	84QAM	50	0	21.20	21.16	21.15	21.25	21.09		
20	84QAM	50	24	21.28	21.27	21.21	21.36	21.20		22.7
20	84QAM	50	50	21.22	21.24	21.19	21.21	21.18		
20	84QAM	100	0	21.27	21.25	21.19	21.27	21.12		
Channel				39720	40173	40620	41058	41519		Tune-up limit (dBm)
Frequency (MHz)				2593.5	2543.3	2593	2639.3	2593.5		
15	QPSK	1	0	21.75	21.73	21.72	21.63	21.34		
15	QPSK	1	37	21.74	21.70	21.68	21.69	21.53		23.2
15	QPSK	1	74	21.70	21.79	21.80	21.45	21.49		
15	QPSK	36	0	21.80	21.80	21.78	21.73	21.56		
15	QPSK	36	20	21.89	21.88	21.84	21.72	21.68		23.2
15	QPSK	36	39	21.84	21.86	21.82	21.70	21.65		
15	QPSK	75	0	21.80	21.81	21.84	21.66	21.61		
15	16QAM	1	0	21.82	21.85	21.88	21.71	21.45		
15	16QAM	1	37	21.74	21.80	21.76	21.75	21.63		23.2
15	16QAM	1	74	21.76	21.87	21.85	21.53	21.65		
15	16QAM	36	0	21.85	21.80	21.80	21.68	21.68		
15	16QAM	36	20	21.84	21.87	21.82	21.66	21.64		23.2
15	16QAM	36	39	21.81	21.87	21.80	21.67	21.60		
15	16QAM	75	0	21.80	21.83	21.90	21.69	21.63		
15	84QAM	1	0	21.58	21.51	21.48	21.47	21.20		
15	84QAM	1	37	21.65	21.57	21.53	21.59	21.44		23.2
15	84QAM	1	74	21.53	21.67	21.62	21.28	21.42		
15	84QAM	36	0	21.35	21.25	21.20	21.33	21.23		
15	84QAM	36	20	21.34	21.31	21.25	21.37	21.31		22.7
15	84QAM	36	39	21.28	21.29	21.25	21.32	21.26		
15	84QAM	75	0	21.35	21.32	21.27	21.31	21.25		
Channel				39700	40160	40620	41060	41540		Tune-up limit (dBm)
Frequency (MHz)				2591	2547	2593	2639	2595		
10	QPSK	1	0	21.65	21.63	21.62	21.53	21.25		
10	QPSK	1	25	21.68	21.70	21.65	21.63	21.46		23.2
10	QPSK	1	49	21.61	21.77	21.70	21.38	21.40		
10	QPSK	25	0	21.63	21.72	21.75	21.69	21.55		
10	QPSK	25	12	21.85	21.78	21.75	21.62	21.67		23.2
10	QPSK	25	25	21.76	21.76	21.72	21.65	21.60		
10	QPSK	50	0	21.84	21.85	21.79	21.64	21.53		
10	16QAM	1	0	21.82	21.84	21.83	21.70	21.36		
10	16QAM	1	25	21.68	21.70	21.67	21.70	21.57		23.2
10	16QAM	1	49	21.72	21.66	21.66	21.51	21.60		
10	16QAM	25	0	21.78	21.73	21.71	21.66	21.50		
10	16QAM	25	12	21.82	21.79	21.81	21.66	21.61		23.2
10	16QAM	25	25	21.77	21.85	21.76	21.59	21.50		
10	16QAM	50	0	21.85	21.83	21.88	21.66	21.58		
10	84QAM	1	0	21.48	21.44	21.44	21.48	21.22		
10	84QAM	1	25	21.53	21.51	21.53	21.52	21.42		23.2
10	84QAM	1	49	21.51	21.63	21.60	21.28	21.35		
10	84QAM	25	0	21.25	21.18	21.20	21.31	21.13		
10	84QAM	25	12	21.26	21.24	21.22	21.34	21.21		22.7
10	84QAM	25	25	21.16	21.26	21.21	21.32	21.26		
10	84QAM	50	0	21.28	21.25	21.24	21.21	21.20		
Channel				39675	40148	40620	41083	41665		Tune-up limit (dBm)
Frequency (MHz)				2496.5	2545.6	2593	2640.30	2567.5		
5	QPSK	1	0	21.77	21.60	21.55	21.60	21.45		
5	QPSK	1	12	21.71	21.63	21.67	21.58	21.48		23.2
5	QPSK	1	24	21.71	21.63	21.59	21.55	21.36		
5	QPSK	12	0	21.84	21.77	21.76	21.74	21.58		
5	QPSK	12	7	21.87	21.82	21.79	21.76	21.57		23.2
5	QPSK	12	13	21.82	21.76	21.77	21.68	21.55		
5	QPSK	25	0	21.82	21.77	21.76	21.71	21.55		
5	16QAM	1	0	21.86	21.80	21.73	21.82	21.69		23.2
5	16QAM	1	12	21.89	21.82	21.84	21.79	21.69		
5	16QAM	1	24	21.86	21.89	21.86	21.76	21.56		
5	16QAM	12	0	21.83	21.77	21.78	21.72	21.58		
5	16QAM	12	7	21.85	21.79	21.78	21.73	21.60		23.2
5	16QAM	12	13	21.81	21.75	21.74	21.66	21.51		
5	16QAM	25	0	21.85	21.83	21.83	21.75	21.61		
5	84QAM	1	0	21.66	21.46	21.42	21.50	21.35		23.2
5	84QAM	1	12	21.81	21.54	21.53	21.52	21.34		
5	84QAM	1	24	21.63	21.56	21.52	21.48	21.32		
5	84QAM	12	0	21.27	21.22	21.20	21.38	21.22		
5	84QAM	12	7	21.31	21.25	21.23	21.40	21.23		22.7
5	84QAM	12	13	21.26	21.24	21.22	21.32	21.22		
5	84QAM	25	0	21.28	21.24	21.22	21.39	21.25		



Band 48									
Ant 2									
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Low Middle Ch. / Freq.	Power High Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)	
Channel				55340	55830	56150	56640		
Frequency (MHz)				3559	3609	3641	3690		
20	QPSK	1	0	21.16	21.17	21.13	21.00		21.4
20	QPSK	1	49	20.83	20.96	20.92	20.72		
20	QPSK	1	99	20.85	20.84	20.87	20.60		
20	QPSK	50	0	20.83	20.86	20.85	20.68		
20	QPSK	50	24	20.82	20.82	20.81	20.60		21.4
20	QPSK	50	50	20.76	20.77	20.71	20.47		
20	QPSK	100	0	20.80	20.81	20.76	20.58		
20	16QAM	1	0	20.90	20.96	20.95	20.81		
20	16QAM	1	49	20.71	20.74	20.70	20.48		21.4
20	16QAM	1	99	20.75	20.72	20.64	20.42		
20	16QAM	50	0	19.87	19.91	19.86	19.71		
20	16QAM	50	24	19.84	19.85	19.83	19.62		20.6
20	16QAM	50	50	19.78	19.79	19.76	19.50		
20	16QAM	100	0	19.80	19.83	19.83	19.61		
20	64QAM	1	0	19.88	19.74	19.69	19.54		
20	64QAM	1	49	19.46	19.48	19.45	19.24		20.6
20	64QAM	1	99	19.52	19.47	19.35	19.16		
20	64QAM	50	0	19.85	19.92	18.86	18.72		
20	64QAM	50	24	18.84	18.89	18.81	18.65		19.6
20	64QAM	50	50	18.78	18.82	18.74	18.51		
20	64QAM	100	0	18.83	18.85	18.81	18.62		
Channel				55375	55820	56160	56695		
Frequency (MHz)				3537.5	3606	3642	3692.5		
15	QPSK	1	0	20.57	20.66	20.84	20.69		21.4
15	QPSK	1	37	20.50	20.72	20.69	20.48		
15	QPSK	1	74	20.54	20.75	20.65	20.41		
15	QPSK	36	0	20.62	20.64	20.60	20.45		
15	QPSK	36	20	20.57	20.59	20.55	20.35		21.4
15	QPSK	36	39	20.54	20.57	20.52	20.25		
15	QPSK	75	0	20.57	20.64	20.57	20.38		
15	16QAM	1	0	20.65	20.69	20.67	20.53		
15	16QAM	1	37	20.44	20.50	20.43	20.21		21.4
15	16QAM	1	74	20.56	20.56	20.52	20.27		
15	16QAM	36	0	19.57	19.62	19.56	19.40		
15	16QAM	36	20	19.53	19.56	19.52	19.31		20.6
15	16QAM	36	39	19.51	19.54	19.46	19.24		
15	16QAM	75	0	19.61	19.63	19.60	19.38		
15	64QAM	1	0	19.38	19.44	19.43	19.27		20.6
15	64QAM	1	37	19.26	19.29	19.24	19.03		
15	64QAM	1	74	19.34	19.34	19.22	19.00		
15	64QAM	36	0	18.63	18.67	18.64	18.45		
15	64QAM	36	20	18.58	18.64	18.57	18.35		19.6
15	64QAM	36	39	18.56	18.56	18.52	18.26		
15	64QAM	75	0	18.61	18.64	18.60	18.37		
Channel				55200	55615	56165	56690		
Frequency (MHz)				3555	3607.5	3642.5	3695		
10	QPSK	1	0	20.59	20.77	20.71	20.57		21.4
10	QPSK	1	25	20.53	20.73	20.73	20.49		
10	QPSK	1	49	20.50	20.68	20.65	20.38		
10	QPSK	25	0	20.57	20.61	20.55	20.34		
10	QPSK	25	12	20.55	20.62	20.59	20.35		21.4
10	QPSK	25	25	20.58	20.52	20.52	20.26		
10	QPSK	50	0	20.56	20.52	20.49	20.24		
10	16QAM	1	0	20.56	20.58	20.57	20.28		21.4
10	16QAM	1	25	20.60	20.64	20.63	20.41		
10	16QAM	1	49	20.53	20.59	20.51	20.26		
10	16QAM	25	0	19.57	19.56	19.54	19.33		
10	16QAM	25	12	19.62	19.67	19.54	19.25		20.6
10	16QAM	25	25	19.53	19.55	19.51	19.27		
10	16QAM	50	0	19.49	19.57	19.61	19.31		
10	64QAM	1	0	19.25	19.33	19.30	19.03		
10	64QAM	1	25	19.31	19.29	19.27	19.08		20.6
10	64QAM	1	49	19.25	19.28	19.29	18.97		
10	64QAM	25	0	18.54	18.59	18.64	18.34		
10	64QAM	25	12	18.62	18.58	18.62	18.33		19.6
10	64QAM	25	25	18.61	18.56	18.61	18.31		
10	64QAM	50	0	18.64	18.62	18.54	18.35		
Channel				55265	55810	56170	56715		
Frequency (MHz)				3552.5	3607	3643	3697.5		
5	QPSK	1	0	20.61	20.84	20.80	20.60		21.4
5	QPSK	1	12	20.56	20.79	20.75	20.51		
5	QPSK	1	24	20.51	20.72	20.73	20.43		
5	QPSK	12	0	20.60	20.61	20.58	20.35		
5	QPSK	12	7	20.63	20.63	20.61	20.36		21.4
5	QPSK	12	13	20.59	20.62	20.59	20.33		
5	QPSK	25	0	20.59	20.61	20.57	20.32		
5	16QAM	1	0	20.56	20.55	20.63	20.36		
5	16QAM	1	12	20.64	20.70	20.64	20.41		21.4
5	16QAM	1	24	20.55	20.62	20.56	20.29		
5	16QAM	12	0	19.59	19.63	19.59	19.37		
5	16QAM	12	7	19.62	19.60	19.62	19.34		20.6
5	16QAM	12	13	19.53	19.59	19.57	19.28		
5	16QAM	25	0	19.59	19.64	19.52	19.37		
5	64QAM	1	0	19.35	19.40	19.37	19.11		
5	64QAM	1	12	19.35	19.39	19.33	19.08		20.6
5	64QAM	1	24	19.33	19.35	19.34	19.07		
5	64QAM	12	0	18.61	18.69	18.65	18.37		
5	64QAM	12	7	18.64	18.64	18.66	18.37		19.6
5	64QAM	12	13	18.64	18.64	18.61	18.36		
5	64QAM	25	0	18.65	18.67	18.64	18.38		



Band 38 HPUE								
Art 2								
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)	
Channel				37850	38000	38150		
Frequency (MHz)				2575	2595	2610		
20	QPSK	1	0	26.05	26.04	26.01	27.5	
20	QPSK	1	49	26.04	26.09	26.03		
20	QPSK	1	99	26.16	26.12	26.04		
20	QPSK	50	0	25.27	25.32	25.27		
20	QPSK	50	24	25.34	25.33	25.28	26.5	
20	QPSK	50	50	25.34	25.40	25.34		
20	QPSK	100	0	25.36	25.34	25.28		
20	16QAM	1	0	25.37	25.38	25.32		
20	16QAM	1	49	25.43	25.47	25.35	26.5	
20	16QAM	1	99	25.43	25.49	25.38		
20	16QAM	50	0	24.28	24.34	24.31		
20	16QAM	50	24	24.36	24.35	24.32		
20	16QAM	50	50	24.37	24.42	24.37	25.5	
20	16QAM	100	0	24.37	24.35	24.28		
20	64QAM	1	0	24.20	24.22	24.17		
20	64QAM	1	49	24.27	24.28	24.24		
20	64QAM	1	99	24.28	24.31	24.26	25.5	
20	64QAM	50	0	23.28	23.33	23.29		
20	64QAM	50	24	23.37	23.36	23.31		
20	64QAM	50	50	23.38	23.42	23.37		
20	64QAM	100	0	23.34	23.34	23.29	24.5	
Channel				37855	38000	38175		
Frequency (MHz)				2577.5	2595	2612.5		
15	QPSK	1	0	26.06	26.10	26.10		27.5
15	QPSK	1	37	26.04	26.09	26.06		
15	QPSK	1	74	26.11	26.13	26.11		
15	QPSK	36	0	25.31	25.26	25.28		
15	QPSK	36	20	25.30	25.25	25.37	26.5	
15	QPSK	36	39	25.31	25.32	25.33		
15	QPSK	75	0	25.29	25.24	25.27		
15	16QAM	1	0	25.38	25.37	25.38		
15	16QAM	1	37	25.38	25.42	25.35	26.5	
15	16QAM	1	74	25.41	25.44	25.38		
15	16QAM	36	0	24.29	24.22	24.23		
15	16QAM	36	20	24.29	24.22	24.32		
15	16QAM	36	39	24.30	24.32	24.31	25.5	
15	16QAM	75	0	24.33	24.27	24.25		
15	64QAM	1	0	24.18	24.18	24.14		
15	64QAM	1	37	24.27	24.30	24.26		
15	64QAM	1	74	24.31	24.34	24.26	25.5	
15	64QAM	36	0	23.33	23.28	23.29		
15	64QAM	36	20	23.33	23.26	23.36		
15	64QAM	36	39	23.34	23.36	23.36		
15	64QAM	75	0	23.33	23.27	23.28	24.5	
Channel				37900	38000	38200		
Frequency (MHz)				2575	2595	2615		
10	QPSK	1	0	26.14	26.06	26.02		27.5
10	QPSK	1	25	26.07	26.12	26.06		
10	QPSK	1	49	26.15	26.14	26.09		
10	QPSK	25	0	25.32	25.29	25.23		
10	QPSK	25	12	25.33	25.30	25.24	26.5	
10	QPSK	25	25	25.35	25.35	25.32		
10	QPSK	50	0	25.36	25.29	25.25		
10	16QAM	1	0	25.51	25.46	25.48		
10	16QAM	1	25	25.46	25.50	25.45	26.5	
10	16QAM	1	49	25.53	25.49	25.46		
10	16QAM	25	0	24.35	24.25	24.23		
10	16QAM	25	12	24.37	24.34	24.27		
10	16QAM	25	25	24.34	24.35	24.29	25.5	
10	16QAM	50	0	24.36	24.31	24.26		
10	64QAM	1	0	24.46	24.35	24.35		
10	64QAM	1	25	24.42	24.49	24.43		
10	64QAM	1	49	24.38	24.45	24.40	25.5	
10	64QAM	25	0	23.42	23.38	23.35		
10	64QAM	25	12	23.43	23.36	23.34		
10	64QAM	25	25	23.44	23.43	23.40		
10	64QAM	50	0	23.36	23.34	23.30	24.5	
Channel				37775	38000	38225		
Frequency (MHz)				2572.5	2595	2617.5		
5	QPSK	1	0	26.13	26.09	26.11		27.5
5	QPSK	1	12	26.08	26.09	26.06		
5	QPSK	1	24	26.11	26.15	26.10		
5	QPSK	12	0	25.31	25.25	25.27		
5	QPSK	12	7	25.29	25.36	25.30	26.5	
5	QPSK	12	13	25.28	25.32	25.28		
5	QPSK	25	0	25.30	25.25	25.25		
5	16QAM	1	0	25.40	25.42	25.42		
5	16QAM	1	12	25.43	25.46	25.41	26.5	
5	16QAM	1	24	25.45	25.47	25.46		
5	16QAM	12	0	24.34	24.30	24.32		
5	16QAM	12	7	24.37	24.38	24.38		
5	16QAM	12	13	24.33	24.34	24.32	25.5	
5	16QAM	25	0	24.33	24.32	24.34		
5	64QAM	1	0	24.36	24.30	24.33		
5	64QAM	1	12	24.33	24.37	24.30		
5	64QAM	1	24	24.37	24.40	24.38	25.5	
5	64QAM	12	0	23.38	23.33	23.30		
5	64QAM	12	7	23.39	23.39	23.36		
5	64QAM	12	13	23.33	23.36	23.32		
5	64QAM	25	0	23.36	23.33	23.33	24.5	



Band 38							
Ant 2							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)
Channel				37850	38000	38150	
Frequency (MHz)				2590	2595	2610	
20	QPSK	1	0	24.27	24.23	24.31	25.7
20	QPSK	1	49	24.32	24.24	24.23	
20	QPSK	1	99	24.25	24.27	24.22	
20	QPSK	50	0	23.46	23.35	23.38	24.7
20	QPSK	50	24	23.42	23.38	23.44	
20	QPSK	50	50	23.38	23.39	23.40	
20	QPSK	100	0	23.50	23.46	23.34	24.7
20	16QAM	1	0	23.43	23.43	23.40	
20	16QAM	1	49	23.31	23.34	23.31	
20	16QAM	1	99	23.37	23.30	23.33	23.7
20	16QAM	50	0	22.49	22.44	22.42	
20	16QAM	50	24	22.48	22.45	22.51	
20	16QAM	50	50	22.48	22.39	22.43	23.7
20	16QAM	100	0	22.47	22.40	22.32	
20	64QAM	1	0	22.17	22.09	22.03	
20	64QAM	1	49	22.05	22.01	22.03	23.7
20	64QAM	1	99	22.05	22.05	22.03	
20	64QAM	50	0	21.46	21.38	21.41	
20	64QAM	50	24	21.52	21.45	21.46	22.7
20	64QAM	50	50	21.49	21.48	21.40	
20	64QAM	100	0	21.47	21.50	21.43	
Channel				37925	38000	38175	Upper limit (dBm)
Frequency (MHz)				2577.5	2595	2615.5	
15	QPSK	1	0	24.29	24.28	24.21	25.7
15	QPSK	1	37	24.25	24.20	24.25	
15	QPSK	1	74	24.19	24.29	24.25	
15	QPSK	36	0	23.48	23.31	23.40	24.7
15	QPSK	36	20	23.39	23.47	23.42	
15	QPSK	36	39	23.42	23.43	23.34	
15	QPSK	75	0	23.41	23.44	23.37	24.7
15	16QAM	1	0	23.36	23.34	23.31	
15	16QAM	1	37	23.25	23.20	23.28	
15	16QAM	1	74	23.36	23.38	23.30	23.7
15	16QAM	36	0	22.42	22.34	22.34	
15	16QAM	36	20	22.36	22.35	22.35	
15	16QAM	36	39	22.39	22.40	22.31	23.7
15	16QAM	75	0	22.41	22.41	22.31	
15	64QAM	1	0	22.13	22.05	22.04	
15	64QAM	1	37	22.17	22.13	22.08	23.7
15	64QAM	1	74	22.08	22.04	22.03	
15	64QAM	36	0	21.49	21.34	21.34	
15	64QAM	36	20	21.42	21.44	21.45	22.7
15	64QAM	36	39	21.43	21.39	21.47	
15	64QAM	75	0	21.42	21.43	21.33	
Channel				37800	38000	38200	Upper limit (dBm)
Frequency (MHz)				2575	2595	2615	
10	QPSK	1	0	24.16	24.19	24.22	25.7
10	QPSK	1	25	24.19	24.18	24.21	
10	QPSK	1	49	24.08	24.18	24.20	
10	QPSK	25	0	23.38	23.36	23.35	24.7
10	QPSK	25	12	23.33	23.45	23.39	
10	QPSK	25	25	23.35	23.38	23.29	
10	QPSK	50	0	23.39	23.42	23.28	24.7
10	16QAM	1	0	23.38	23.37	23.31	
10	16QAM	1	25	23.24	23.15	23.22	
10	16QAM	1	49	23.25	23.31	23.30	23.7
10	16QAM	25	0	22.37	22.19	22.32	
10	16QAM	25	12	22.38	22.31	22.36	
10	16QAM	25	25	22.32	22.27	22.36	23.7
10	16QAM	50	0	22.50	22.30	22.36	
10	64QAM	1	0	22.04	22.01	22.02	
10	64QAM	1	25	22.12	22.02	22.04	23.7
10	64QAM	1	49	22.06	22.04	22.02	
10	64QAM	25	0	21.48	21.32	21.35	
10	64QAM	25	12	21.40	21.41	21.39	22.7
10	64QAM	25	25	21.47	21.26	21.37	
10	64QAM	50	0	21.42	21.43	21.31	
Channel				37775	38000	38225	Upper limit (dBm)
Frequency (MHz)				2572.5	2595	2617.5	
5	QPSK	1	0	24.30	24.19	24.17	25.7
5	QPSK	1	12	24.16	24.21	24.20	
5	QPSK	1	24	24.16	24.12	24.25	
5	QPSK	12	0	23.35	23.30	23.41	24.7
5	QPSK	12	7	23.39	23.43	23.40	
5	QPSK	12	13	23.43	23.32	23.29	
5	QPSK	25	0	23.41	23.39	23.33	24.7
5	16QAM	1	0	23.45	23.25	23.42	
5	16QAM	1	12	23.34	23.37	23.31	
5	16QAM	1	24	23.39	23.44	23.35	23.7
5	16QAM	12	0	22.38	22.24	22.39	
5	16QAM	12	7	22.34	22.38	22.35	
5	16QAM	12	13	22.38	22.30	22.29	23.7
5	16QAM	25	0	22.43	22.39	22.39	
5	64QAM	1	0	22.14	22.00	22.09	
5	64QAM	1	12	22.20	22.09	22.09	23.7
5	64QAM	1	24	22.13	22.17	22.05	
5	64QAM	12	0	21.43	21.35	21.38	
5	64QAM	12	7	21.44	21.37	21.36	22.7
5	64QAM	12	13	21.44	21.42	21.37	
5	64QAM	25	0	21.46	21.42	21.36	



Band 41										
Ant 2										
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Low Middle Ch. / Freq.	Power Middle Ch. / Freq.	Power High Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)	
Channel				39760	40185	40620	41055	41490		
Frequency (MHz)				2500.5	2543.5	2587	2630.5	2674		
20	QPSK	1	0	24.11	24.14	24.15	24.13	23.98	25.7	
20	QPSK	1	49	24.05	24.13	24.04	24.37	24.31		
20	QPSK	1	99	24.09	24.13	24.10	23.93	24.17		
20	QPSK	50	0	23.19	23.23	23.17	23.31	23.32		
20	QPSK	50	24	23.28	23.32	23.22	23.44	23.41	24.7	
20	QPSK	50	50	23.25	23.27	23.20	23.28	23.39		
20	QPSK	100	0	23.27	23.30	23.24	23.34	23.34		
20	16QAM	1	0	23.26	23.27	23.31	23.22	23.08	24.7	
20	16QAM	1	49	23.16	23.22	23.13	23.46	23.43		
20	16QAM	1	99	23.15	23.27	23.21	23.03	23.26		
20	16QAM	50	0	22.23	22.25	22.18	22.32	22.32	23.7	
20	16QAM	50	24	22.31	22.34	22.25	22.45	22.45		
20	16QAM	50	50	22.29	22.31	22.22	22.29	22.41		
20	16QAM	100	0	22.30	22.34	22.25	22.35	22.35		
20	64QAM	1	0	21.95	21.91	21.92	21.85	21.76	23.7	
20	64QAM	1	49	21.88	21.99	21.85	22.25	22.16		
20	64QAM	1	99	21.67	22.07	21.80	21.80	21.83		
20	64QAM	50	0	21.25	21.27	21.19	21.34	21.28	22.7	
20	64QAM	50	24	21.33	21.36	21.29	21.44	21.44		
20	64QAM	50	50	21.29	21.31	21.22	21.30	21.43		
20	64QAM	100	0	21.31	21.35	21.24	21.36	21.36	Tune-up limit (dBm)	
Channel				39765	40193	40620	41080	41515		
Frequency (MHz)				2501.5	2544.3	2587	2630.8	2674.5		
15	QPSK	1	0	24.11	24.07	24.14	24.04	23.89	25.7	
15	QPSK	1	37	23.95	24.11	23.99	24.27	24.25		
15	QPSK	1	74	24.02	24.09	24.10	23.91	24.16		
15	QPSK	36	0	23.17	23.21	23.13	23.30	23.29	24.7	
15	QPSK	36	20	23.25	23.30	23.22	23.36	23.31		
15	QPSK	36	39	23.15	23.27	23.19	23.23	23.31		
15	QPSK	75	0	23.21	23.29	23.21	23.33	23.30		
15	16QAM	1	0	23.21	23.27	23.27	23.13	23.00	24.7	
15	16QAM	1	37	23.16	23.20	23.08	23.44	23.37		
15	16QAM	1	74	23.12	23.27	23.21	23.00	23.21	23.7	
15	16QAM	36	0	22.20	22.19	22.15	22.30	22.23		
15	16QAM	36	20	22.25	22.26	22.19	22.41	22.45	23.7	
15	16QAM	36	39	22.20	22.27	22.15	22.28	22.37		
15	16QAM	75	0	22.21	22.30	22.20	22.29	22.35		
15	64QAM	1	0	21.81	21.89	21.89	21.82	21.75	23.7	
15	64QAM	1	37	21.67	21.98	21.79	22.22	22.15		
15	64QAM	1	74	21.85	22.03	21.79	21.76	21.87		
15	64QAM	36	0	21.21	21.20	21.12	21.33	21.23	22.7	
15	64QAM	36	20	21.24	21.27	21.26	21.38	21.37		
15	64QAM	36	39	21.23	21.26	21.12	21.22	21.43		
15	64QAM	75	0	21.27	21.27	21.21	21.34	21.27	Tune-up limit (dBm)	
Channel				39700	40160	40620	41080	41540		
Frequency (MHz)				2501	2547	2593	2639	2685		
10	QPSK	1	0	24.10	24.12	24.15	24.12	23.93	25.7	
10	QPSK	1	25	24.02	24.04	23.97	24.37	24.31		
10	QPSK	1	49	24.00	24.05	24.04	23.83	24.12		
10	QPSK	25	0	23.18	23.20	23.08	23.23	23.23	24.7	
10	QPSK	25	12	23.28	23.30	23.17	23.40	23.35		
10	QPSK	25	25	23.15	23.19	23.18	23.18	23.36		
10	QPSK	50	0	23.25	23.30	23.22	23.34	23.27		
10	16QAM	1	0	23.26	23.25	23.26	23.20	23.00	24.7	
10	16QAM	1	25	23.07	23.20	23.07	23.45	23.43		
10	16QAM	1	49	23.14	23.18	23.18	23.01	23.17	23.7	
10	16QAM	25	0	22.14	22.24	22.14	22.31	22.30		
10	16QAM	25	12	22.22	22.26	22.16	22.45	22.40		
10	16QAM	25	25	22.24	22.30	22.12	22.22	22.40		
10	16QAM	50	0	22.24	22.27	22.16	22.28	22.28	23.7	
10	64QAM	1	0	21.89	21.99	21.83	21.85	21.75	23.7	
10	64QAM	1	25	21.80	21.95	21.78	22.15	22.07		
10	64QAM	1	49	21.81	22.07	21.80	21.78	21.90		
10	64QAM	25	0	21.24	21.21	21.19	21.30	21.21	22.7	
10	64QAM	25	12	21.32	21.26	21.26	21.36	21.44		
10	64QAM	25	25	21.23	21.27	21.16	21.28	21.35		
10	64QAM	50	0	21.29	21.30	21.22	21.34	21.34	Tune-up limit (dBm)	
Channel				39875	40148	40620	41083	41565		
Frequency (MHz)				2496.5	2545.8	2593	2640.30	2687.5		
5	QPSK	1	0	24.02	24.10	24.14	24.11	23.91	25.7	
5	QPSK	1	12	23.99	24.06	23.99	24.28	24.25		
5	QPSK	1	24	24.07	24.06	24.10	23.87	24.11		
5	QPSK	12	0	23.11	23.17	23.08	23.22	23.28	24.7	
5	QPSK	12	7	23.18	23.30	23.14	23.37	23.40		
5	QPSK	12	13	23.21	23.17	23.12	23.22	23.33		
5	QPSK	25	0	23.23	23.28	23.20	23.33	23.24	24.7	
5	16QAM	1	0	23.22	23.26	23.31	23.17	23.02		
5	16QAM	1	12	23.16	23.15	23.08	23.40	23.35		
5	16QAM	1	24	23.05	23.24	23.19	23.02	23.20	23.7	
5	16QAM	12	0	22.21	22.16	22.13	22.28	22.29		
5	16QAM	12	7	22.29	22.34	22.16	22.37	22.40		
5	16QAM	12	13	22.20	22.21	22.17	22.21	22.35		
5	16QAM	25	0	22.20	22.25	22.23	22.31	22.29	23.7	
5	64QAM	1	0	21.90	21.90	21.85	21.78	21.70		
5	64QAM	1	12	21.86	21.93	21.81	22.17	22.07		
5	64QAM	1	24	21.82	22.01	21.72	21.74	21.83	22.7	
5	64QAM	12	0	21.18	21.18	21.14	21.25	21.25		
5	64QAM	12	7	21.24	21.31	21.20	21.35	21.35		
5	64QAM	12	13	21.08	21.22	21.19	21.29	21.33		
5	64QAM	25	0	21.30	21.32	21.19	21.28	21.33		



Band 48							
Ant 7							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Low Middle Ch. / Freq.	Power High Middle Ch. / Freq.	Power High Ch. / Freq.
Channel				55340	55830	56150	56640
Frequency (MHz)				3559	3599	3641	3683
20	QPSK	1	0	23.07	23.00	23.01	23.11
20	QPSK	1	49	22.79	22.81	22.78	22.89
20	QPSK	1	99	22.82	22.79	22.76	22.89
20	QPSK	50	0	22.09	22.06	22.03	22.09
20	QPSK	50	24	22.05	21.92	22.01	22.07
20	QPSK	50	50	21.85	21.86	21.96	22.07
20	QPSK	100	0	22.06	21.93	22.03	22.07
20	16QAM	1	0	22.11	22.21	22.15	22.29
20	16QAM	1	49	21.96	21.88	21.96	21.93
20	16QAM	1	99	21.98	21.86	21.95	21.95
20	16QAM	50	0	21.07	21.11	21.09	21.16
20	16QAM	50	24	21.01	20.93	21.02	21.06
20	16QAM	50	50	20.93	20.94	20.92	21.01
20	16QAM	100	0	21.04	20.89	21.01	21.08
20	64QAM	1	0	20.88	20.89	20.84	20.93
20	64QAM	1	49	20.69	20.72	20.71	20.71
20	64QAM	1	99	20.65	20.58	20.67	20.76
20	64QAM	50	0	20.15	20.05	20.10	20.14
20	64QAM	50	24	20.11	20.00	20.01	20.15
20	64QAM	50	50	19.92	19.91	19.94	20.01
20	64QAM	100	0	20.05	19.98	20.03	20.14
Channel				55375	55820	56160	56605
Frequency (MHz)				3557.5	3598	3642	3682.5
15	QPSK	1	0	22.93	22.89	22.97	23.00
15	QPSK	1	37	22.83	22.78	22.81	22.91
15	QPSK	1	74	22.82	22.78	22.83	22.92
15	QPSK	36	0	22.01	22.07	21.98	22.11
15	QPSK	36	20	21.90	21.90	22.03	22.06
15	QPSK	36	39	21.89	21.89	21.92	22.00
15	QPSK	75	0	21.99	21.88	21.98	22.08
15	16QAM	1	0	22.06	22.06	22.14	22.20
15	16QAM	1	37	21.87	21.85	21.87	21.96
15	16QAM	1	74	22.04	21.93	21.96	22.08
15	16QAM	36	0	20.98	20.95	20.98	21.02
15	16QAM	36	20	20.88	20.82	21.00	21.03
15	16QAM	36	39	20.80	20.85	20.93	21.01
15	16QAM	75	0	21.00	20.89	21.03	21.12
15	64QAM	1	0	20.82	20.89	20.85	20.86
15	64QAM	1	37	20.76	20.64	20.72	20.75
15	64QAM	1	74	20.67	20.70	20.69	20.83
15	64QAM	36	0	20.08	20.08	20.02	20.18
15	64QAM	36	20	19.91	19.94	19.95	20.08
15	64QAM	36	39	19.92	19.95	19.94	20.03
15	64QAM	75	0	19.99	20.00	20.03	20.02
Channel				55200	55615	56165	56600
Frequency (MHz)				3555	3607.5	3642.5	3695
10	QPSK	1	0	23.05	22.99	22.95	23.04
10	QPSK	1	25	22.79	22.81	22.71	22.85
10	QPSK	1	49	22.72	22.78	22.72	22.81
10	QPSK	25	0	21.96	22.07	22.01	22.03
10	QPSK	25	12	21.95	21.90	21.99	21.97
10	QPSK	25	25	21.79	21.78	21.84	21.96
10	QPSK	50	0	21.95	21.83	22.00	22.01
10	16QAM	1	0	22.01	22.04	22.06	22.24
10	16QAM	1	25	21.95	21.92	21.87	21.96
10	16QAM	1	49	21.89	21.89	21.91	21.88
10	16QAM	25	0	21.09	20.98	20.99	21.16
10	16QAM	25	12	20.91	20.86	20.93	21.02
10	16QAM	25	25	20.89	20.81	20.91	21.05
10	16QAM	50	0	20.96	20.90	21.05	21.06
10	64QAM	1	0	20.74	20.88	20.87	20.87
10	64QAM	1	25	20.59	20.64	20.66	20.65
10	64QAM	1	49	20.69	20.64	20.64	20.71
10	64QAM	25	0	20.14	20.05	20.10	20.10
10	64QAM	25	12	20.01	19.93	19.99	20.03
10	64QAM	25	25	19.94	19.82	19.97	19.97
10	64QAM	50	0	19.94	19.92	19.88	20.05
Channel				55265	55610	56170	56715
Frequency (MHz)				3552.5	3607	3643	3697.5
5	QPSK	1	0	22.89	22.98	22.97	23.04
5	QPSK	1	12	22.88	22.90	22.90	22.95
5	QPSK	1	24	22.85	22.78	22.85	22.97
5	QPSK	12	0	22.06	22.03	22.02	22.15
5	QPSK	12	7	22.02	22.03	22.05	22.14
5	QPSK	12	13	22.00	21.95	22.00	22.09
5	QPSK	25	0	21.99	22.02	22.01	22.10
5	16QAM	1	0	22.05	21.99	22.09	22.14
5	16QAM	1	12	22.15	22.08	22.12	22.19
5	16QAM	1	24	22.11	22.02	22.08	22.07
5	16QAM	12	0	21.03	20.93	21.02	21.11
5	16QAM	12	7	21.10	20.98	20.98	21.06
5	16QAM	12	13	21.07	20.95	21.04	21.01
5	16QAM	25	0	21.12	21.08	21.02	21.12
5	64QAM	1	0	20.81	20.83	20.84	20.93
5	64QAM	1	12	20.89	20.74	20.76	20.83
5	64QAM	1	24	20.85	20.75	20.79	20.82
5	64QAM	12	0	20.17	20.07	20.07	20.15
5	64QAM	12	7	20.09	20.03	20.12	20.22
5	64QAM	12	13	20.06	20.08	20.05	20.10
5	64QAM	25	0	20.09	20.06	20.09	20.11



Band 38 HPUE							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)
Channel				37850	38000	38150	
Frequency (MHz)				2553	2562	2510	
20	QPSK	1	0	26.10	26.07	26.00	27.5
20	QPSK	1	49	26.20	26.08	25.99	
20	QPSK	1	99	26.14	26.09	26.00	
20	QPSK	50	0	25.35	25.32	25.23	26.5
20	QPSK	50	24	25.45	25.33	25.24	
20	QPSK	50	50	25.43	25.38	25.27	
20	QPSK	100	0	25.44	25.34	25.25	26.5
20	16QAM	1	0	25.46	25.44	25.34	
20	16QAM	1	49	25.49	25.45	25.34	
20	16QAM	1	99	25.47	25.43	25.34	25.5
20	16QAM	50	0	24.37	24.35	24.25	
20	16QAM	50	24	24.45	24.33	24.26	
20	16QAM	50	50	24.45	24.42	24.32	25.5
20	16QAM	100	0	24.46	24.35	24.23	
20	64QAM	1	0	24.29	24.27	24.18	
20	64QAM	1	49	24.31	24.27	24.23	25.5
20	64QAM	1	99	24.20	24.32	24.21	
20	64QAM	50	0	23.22	23.14	23.17	
20	64QAM	50	24	23.19	23.17	23.17	24.5
20	64QAM	50	50	23.17	23.20	23.13	
20	64QAM	100	0	23.11	23.00	22.93	
Channel				37025	38000	38175	
Frequency (MHz)				2577.5	2595	2512.5	
15	QPSK	1	0	26.12	26.12	26.03	27.5
15	QPSK	1	37	26.19	26.11	26.05	
15	QPSK	1	74	26.15	26.10	26.04	
15	QPSK	36	0	25.38	25.30	25.19	26.5
15	QPSK	36	20	25.39	25.27	25.25	
15	QPSK	36	39	25.37	25.34	25.23	
15	QPSK	75	0	25.38	25.28	25.18	26.5
15	16QAM	1	0	25.46	25.43	25.29	
15	16QAM	1	37	25.43	25.41	25.31	
15	16QAM	1	74	25.44	25.42	25.33	25.5
15	16QAM	36	0	24.38	24.27	24.18	
15	16QAM	36	20	24.37	24.24	24.22	
15	16QAM	36	39	24.35	24.31	24.21	25.5
15	16QAM	75	0	24.38	24.30	24.19	
15	64QAM	1	0	24.13	24.15	24.11	
15	64QAM	1	37	24.22	24.15	24.22	25.5
15	64QAM	1	74	24.01	24.21	24.13	
15	64QAM	36	0	23.17	23.13	23.13	
15	64QAM	36	20	23.19	23.14	23.24	24.5
15	64QAM	36	39	23.12	23.12	23.12	
15	64QAM	75	0	23.20	23.14	23.12	
Channel				37600	38000	38200	
Frequency (MHz)				2575	2595	2615	
10	QPSK	1	0	26.17	26.11	26.00	27.5
10	QPSK	1	25	26.10	26.08	26.01	
10	QPSK	1	49	26.19	26.15	26.00	
10	QPSK	25	0	25.36	25.24	25.17	26.5
10	QPSK	25	12	25.37	25.27	25.19	
10	QPSK	25	25	25.38	25.32	25.25	
10	QPSK	50	0	25.36	25.27	25.19	26.5
10	16QAM	1	0	25.57	25.49	25.42	
10	16QAM	1	25	25.50	25.48	25.41	
10	16QAM	1	49	25.56	25.49	25.37	25.5
10	16QAM	25	0	24.40	24.27	24.17	
10	16QAM	25	12	24.43	24.32	24.22	
10	16QAM	25	25	24.39	24.35	24.26	25.5
10	16QAM	50	0	24.43	24.31	24.21	
10	64QAM	1	0	24.16	24.27	24.32	
10	64QAM	1	25	24.22	24.14	24.14	25.5
10	64QAM	1	49	24.04	24.13	24.17	
10	64QAM	25	0	23.29	23.15	23.18	
10	64QAM	25	12	23.30	23.20	23.19	24.5
10	64QAM	25	25	23.25	23.13	23.12	
10	64QAM	50	0	23.18	23.07	23.06	
Channel				37775	38000	38225	
Frequency (MHz)				2572.5	2595	2617.5	
5	QPSK	1	0	26.17	26.11	26.10	27.5
5	QPSK	1	12	26.15	26.16	26.03	
5	QPSK	1	24	26.16	26.17	26.07	
5	QPSK	12	0	25.40	25.28	25.26	26.5
5	QPSK	12	7	25.41	25.34	25.26	
5	QPSK	12	13	25.36	25.36	25.25	
5	QPSK	25	0	25.34	25.28	25.22	26.5
5	16QAM	1	0	25.51	25.44	25.43	
5	16QAM	1	12	25.51	25.50	25.36	
5	16QAM	1	24	25.54	25.50	25.42	26.5
5	16QAM	12	0	24.43	24.31	24.28	
5	16QAM	12	7	24.41	24.44	24.32	
5	16QAM	12	13	24.43	24.40	24.30	25.5
5	16QAM	25	0	24.40	24.32	24.29	
5	64QAM	1	0	24.17	24.18	24.16	
5	64QAM	1	12	24.20	24.26	24.29	25.5
5	64QAM	1	24	24.15	24.24	24.32	
5	64QAM	12	0	23.25	23.23	23.27	
5	64QAM	12	7	23.29	23.32	23.36	24.5
5	64QAM	12	13	23.26	23.27	23.30	
5	64QAM	25	0	23.29	23.28	23.25	



Band 38							
Ant 0							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)
Channel				37850	38000	38150	
Frequency (MHz)				2580	2595	2610	
20	QPSK	1	0	24.59	24.55	24.54	25.7
20	QPSK	1	49	24.57	24.56	24.49	
20	QPSK	1	99	24.56	24.54	24.47	
20	QPSK	50	0	23.68	23.71	23.63	24.7
20	QPSK	50	24	23.77	23.67	23.61	
20	QPSK	50	50	23.73	23.72	23.65	
20	QPSK	100	0	23.75	23.67	23.61	24.7
20	16QAM	1	0	23.71	23.71	23.64	
20	16QAM	1	49	23.61	23.62	23.58	
20	16QAM	1	99	23.65	23.64	23.59	23.7
20	16QAM	50	0	22.72	22.71	22.65	
20	16QAM	50	24	22.77	22.69	22.63	
20	16QAM	50	50	22.76	22.75	22.68	23.7
20	16QAM	100	0	22.76	22.69	22.62	
20	64QAM	1	0	22.43	22.40	22.31	
20	64QAM	1	49	22.39	22.37	22.31	23.7
20	64QAM	1	99	22.37	22.39	22.30	
20	64QAM	50	0	21.74	21.73	21.67	
20	64QAM	50	24	21.77	21.73	21.64	22.7
20	64QAM	50	50	21.75	21.75	21.67	
20	64QAM	100	0	21.78	21.69	21.64	
Channel				37825	38000	38175	Use up limit (dBm)
Frequency (MHz)				2577.5	2595	2612.5	
15	QPSK	1	0	24.59	24.57	24.51	25.7
15	QPSK	1	37	24.54	24.54	24.49	
15	QPSK	1	74	24.54	24.53	24.47	
15	QPSK	36	0	23.79	23.69	23.63	24.7
15	QPSK	36	20	23.72	23.66	23.68	
15	QPSK	36	39	23.72	23.70	23.64	
15	QPSK	75	0	23.75	23.67	23.58	24.7
15	16QAM	1	0	23.71	23.70	23.64	
15	16QAM	1	37	23.60	23.59	23.49	
15	16QAM	1	74	23.67	23.66	23.57	23.7
15	16QAM	36	0	22.75	22.67	22.57	
15	16QAM	36	20	22.71	22.61	22.62	
15	16QAM	36	39	22.69	22.66	22.59	23.7
15	16QAM	75	0	22.77	22.69	22.60	
15	64QAM	1	0	22.41	22.38	22.30	
15	64QAM	1	37	22.42	22.39	22.34	23.7
15	64QAM	1	74	22.39	22.40	22.31	
15	64QAM	36	0	21.79	21.71	21.63	
15	64QAM	36	20	21.76	21.63	21.67	22.7
15	64QAM	36	39	21.76	21.73	21.66	
15	64QAM	75	0	21.77	21.70	21.61	
Channel				37900	38000	38200	Use up limit (dBm)
Frequency (MHz)				2575	2595	2615	
10	QPSK	1	0	24.58	24.57	24.47	25.7
10	QPSK	1	25	24.52	24.52	24.43	
10	QPSK	1	49	24.51	24.48	24.42	
10	QPSK	25	0	23.77	23.59	23.58	24.7
10	QPSK	25	12	23.68	23.62	23.68	
10	QPSK	25	25	23.62	23.70	23.60	
10	QPSK	50	0	23.67	23.58	23.56	24.7
10	16QAM	1	0	23.70	23.67	23.54	
10	16QAM	1	25	23.50	23.53	23.43	
10	16QAM	1	49	23.67	23.66	23.48	23.7
10	16QAM	25	0	22.75	22.67	22.55	
10	16QAM	25	12	22.65	22.54	22.59	
10	16QAM	25	25	22.59	22.61	22.56	23.7
10	16QAM	50	0	22.77	22.65	22.55	
10	64QAM	1	0	22.33	22.29	22.30	
10	64QAM	1	25	22.38	22.30	22.31	23.7
10	64QAM	1	49	22.31	22.39	22.26	
10	64QAM	25	0	21.71	21.62	21.54	
10	64QAM	25	12	21.67	21.58	21.58	22.7
10	64QAM	25	25	21.73	21.66	21.57	
10	64QAM	50	0	21.76	21.63	21.54	
Channel				37775	38000	38225	Use up limit (dBm)
Frequency (MHz)				2572.5	2595	2617.5	
5	QPSK	1	0	24.64	24.59	24.53	25.7
5	QPSK	1	12	24.62	24.63	24.50	
5	QPSK	1	24	24.62	24.57	24.50	
5	QPSK	12	0	23.76	23.69	23.62	24.7
5	QPSK	12	7	23.76	23.77	23.67	
5	QPSK	12	13	23.72	23.73	23.63	
5	QPSK	25	0	23.72	23.67	23.63	24.7
5	16QAM	1	0	23.82	23.72	23.71	
5	16QAM	1	12	23.83	23.80	23.68	
5	16QAM	1	24	23.82	23.78	23.67	23.7
5	16QAM	12	0	22.71	22.67	22.62	
5	16QAM	12	7	22.73	22.73	22.62	
5	16QAM	12	13	22.69	22.72	22.60	23.7
5	16QAM	25	0	22.76	22.66	22.64	
5	64QAM	1	0	22.96	22.47	22.42	
5	64QAM	1	12	22.55	22.51	22.40	23.7
5	64QAM	1	24	22.55	22.54	22.43	
5	64QAM	12	0	21.76	21.68	21.66	
5	64QAM	12	7	21.77	21.77	21.70	22.7
5	64QAM	12	13	21.80	21.73	21.67	
5	64QAM	25	0	21.81	21.74	21.70	



Band 41										
Ant 0										
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Low Middle Ch. / Freq.	Power Middle Ch. / Freq.	Power High Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)	
Channel				39760	40185	40620	41055	41490		
Frequency (MHz)				2503	2545.5	2593	2635.5	2690		
20	QPSK	1	0	24.07	24.02	24.07	24.22	23.73	25.7	
20	QPSK	1	49	23.99	24.01	23.97	24.21	24.09		
20	QPSK	1	99	23.99	24.01	24.00	23.76	23.96		
20	QPSK	50	0	23.14	23.10	23.08	23.20	23.07		
20	QPSK	50	24	23.22	23.20	23.14	23.31	23.18	24.7	
20	QPSK	50	50	23.17	23.18	23.12	23.15	23.15		
20	QPSK	100	0	23.21	23.19	23.15	23.22	23.11		
20	16QAM	1	0	23.21	23.13	23.20	23.12	22.84	24.7	
20	16QAM	1	49	23.09	23.12	23.08	23.32	23.18		
20	16QAM	1	99	23.10	23.14	23.13	22.86	23.04		
20	16QAM	50	0	22.17	22.15	22.13	22.22	22.07		
20	16QAM	50	24	22.23	22.24	22.17	22.35	22.16	23.7	
20	16QAM	50	50	22.20	22.20	22.17	22.17	22.17		
20	16QAM	100	0	22.23	22.20	22.17	22.24	22.12		
20	64QAM	1	0	21.82	21.83	21.83	21.78	21.54	23.7	
20	64QAM	1	49	21.83	21.87	21.79	22.11	21.95		
20	64QAM	1	99	21.85	21.89	21.84	21.56	21.78		
20	64QAM	50	0	21.21	21.16	21.13	21.24	21.11		
20	64QAM	50	24	21.27	21.24	21.20	21.33	21.21	22.7	
20	64QAM	50	50	21.22	21.22	21.17	21.17	21.19		
20	64QAM	100	0	21.25	21.22	21.18	21.27	21.13	Tune-up limit (dBm)	
Channel				39725	40173	40650	41068	41515		
Frequency (MHz)				2503.5	2548.3	2593	2637.8	2692.5		
15	QPSK	1	0	24.04	24.03	24.00	24.12	23.88	25.7	
15	QPSK	1	37	24.00	23.95	23.96	24.20	24.04		
15	QPSK	1	74	23.99	24.07	24.05	23.94	24.01		
15	QPSK	36	0	23.20	23.09	23.07	23.20	23.06	24.7	
15	QPSK	36	20	23.20	23.16	23.13	23.22	23.18		
15	QPSK	36	39	23.16	23.16	23.10	23.17	23.15		
15	QPSK	75	0	23.20	23.18	23.13	23.17	23.11	24.7	
15	16QAM	1	0	23.22	23.15	23.14	23.25	22.97		
15	16QAM	1	37	23.06	23.04	23.04	23.30	23.16		
15	16QAM	1	74	23.15	23.22	23.16	23.08	23.17	23.7	
15	16QAM	36	0	22.18	22.07	22.03	22.16	22.04		
15	16QAM	36	20	22.18	22.13	22.08	22.20	22.12		
15	16QAM	36	39	22.13	22.14	22.11	22.14	22.11	22.7	
15	16QAM	75	0	22.24	22.19	22.16	22.19	22.14		
15	64QAM	1	0	21.83	21.83	21.77	21.83	21.70	23.7	
15	64QAM	1	37	21.88	21.87	21.79	22.08	21.95		
15	64QAM	1	74	21.86	21.98	21.90	21.82	21.92		
15	64QAM	36	0	21.23	21.15	21.09	21.22	21.12	22.7	
15	64QAM	36	20	21.22	21.18	21.14	21.26	21.21		
15	64QAM	36	39	21.17	21.19	21.13	21.23	21.17		
15	64QAM	75	0	21.24	21.22	21.15	21.19	21.16	Tune-up limit (dBm)	
Channel				39700	40160	40620	41080	41540		
Frequency (MHz)				2501	2547	2593	2639	2685		
10	QPSK	1	0	24.00	23.96	23.98	24.12	23.82	25.7	
10	QPSK	1	25	23.99	23.92	23.90	24.16	24.00		
10	QPSK	1	49	23.99	24.00	24.04	23.85	23.99		
10	QPSK	25	0	23.15	23.09	23.02	23.12	23.06	24.7	
10	QPSK	25	12	23.13	23.15	23.10	23.16	23.18		
10	QPSK	25	25	23.08	23.15	23.04	23.11	23.05		
10	QPSK	50	0	23.16	23.16	23.05	23.09	23.08	24.7	
10	16QAM	1	0	23.16	23.15	23.09	23.17	22.94		
10	16QAM	1	25	23.02	23.01	23.04	23.20	23.11	23.7	
10	16QAM	1	49	23.09	23.14	23.10	22.98	23.17		
10	16QAM	25	0	22.09	22.01	22.03	22.13	21.95		
10	16QAM	25	12	22.17	22.12	22.05	22.18	22.06		
10	16QAM	25	25	22.08	22.04	22.10	22.08	22.05	23.7	
10	16QAM	50	0	22.23	22.19	22.10	22.13	22.13		
10	64QAM	1	0	21.84	21.76	21.76	21.80	21.70	23.7	
10	64QAM	1	25	21.81	21.80	21.71	22.04	21.91		
10	64QAM	1	49	21.86	21.93	21.85	21.74	21.88		
10	64QAM	25	0	21.16	21.15	21.00	21.12	21.11	22.7	
10	64QAM	25	12	21.12	21.16	21.10	21.19	21.13		
10	64QAM	25	25	21.15	21.13	21.13	21.18	21.15		
10	64QAM	50	0	21.23	21.12	21.15	21.09	21.15	Tune-up limit (dBm)	
Channel				39875	40148	40620	41083	41665		
Frequency (MHz)				2496.5	2545.8	2593	2640.30	2687.5		
5	QPSK	1	0	24.13	23.95	23.96	24.20	24.06	25.7	
5	QPSK	1	12	24.09	24.01	24.00	24.17	24.06		
5	QPSK	1	24	24.01	24.00	23.95	24.15	24.01		
5	QPSK	12	0	23.20	23.17	23.13	23.33	23.20	24.7	
5	QPSK	12	7	23.24	23.19	23.17	23.34	23.21		
5	QPSK	12	13	23.18	23.17	23.14	23.28	23.18		
5	QPSK	25	0	23.20	23.18	23.14	23.32	23.17	24.7	
5	16QAM	1	0	23.27	23.11	23.09	23.37	23.21		
5	16QAM	1	12	23.26	23.20	23.24	23.42	23.28		
5	16QAM	1	24	23.24	23.17	23.18	23.34	23.19	23.7	
5	16QAM	12	0	22.20	22.15	22.14	22.30	22.17		
5	16QAM	12	7	22.23	22.16	22.14	22.31	22.18		
5	16QAM	12	13	22.21	22.14	22.11	22.27	22.17	23.7	
5	16QAM	25	0	22.24	22.20	22.15	22.35	22.25		
5	64QAM	1	0	22.04	21.85	21.85	22.12	21.92	23.7	
5	64QAM	1	12	21.96	21.91	21.89	22.14	21.92		
5	64QAM	1	24	21.88	21.95	21.92	22.08	21.92		
5	64QAM	12	0	21.27	21.18	21.21	21.35	21.23	22.7	
5	64QAM	12	7	21.28	21.22	21.22	21.37	21.25		
5	64QAM	12	13	21.24	21.19	21.18	21.35	21.22		
5	64QAM	25	0	21.25	21.22	21.22	21.38	21.27		



Band 48									
Ant 2									
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Low Middle Ch. / Freq.	Power High Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)	
Channel				3550	3590	3631	3675		
Frequency (MHz)				21.54	21.64	21.61	21.45		
20	QPSK	1	0	21.54	21.64	21.61	21.45	22.6	
20	QPSK	1	49	21.40	21.44	21.41	21.19		
20	QPSK	1	99	21.39	21.42	21.33	21.07		
20	QPSK	50	0	20.63	20.65	20.64	20.47		
20	QPSK	50	24	20.60	20.60	20.56	20.36	21.6	
20	QPSK	50	50	20.52	20.54	20.49	20.26		
20	QPSK	100	0	20.55	20.61	20.54	20.35		
20	16QAM	1	0	20.68	20.76	20.73	20.59	21.6	
20	16QAM	1	49	20.51	20.52	20.51	20.28		
20	16QAM	1	99	20.52	20.50	20.42	20.18		
20	16QAM	50	0	19.65	19.70	19.58	19.49	20.6	
20	16QAM	50	24	19.61	19.66	19.62	19.43		
20	16QAM	50	50	19.57	19.59	19.53	19.29		
20	16QAM	100	0	19.59	19.65	19.58	19.40		
20	64QAM	1	0	19.44	19.48	19.45	19.32	20.6	
20	64QAM	1	49	19.26	19.28	19.23	19.02		
20	64QAM	1	99	19.21	19.24	19.15	18.93		
20	64QAM	50	0	18.64	18.70	18.67	18.51	19.6	
20	64QAM	50	24	18.63	18.67	18.64	18.42		
20	64QAM	50	50	18.57	18.58	18.54	18.31		
20	64QAM	100	0	18.61	18.64	18.60	18.41		
Channel				3571.5	3610	3650	3695	Tune-up limit (dBm)	
Frequency (MHz)				3577.5	3598	3642	3692.5		
15	QPSK	1	0	21.50	21.56	21.53	21.34	22.6	
15	QPSK	1	37	21.39	21.41	21.40	21.14		
15	QPSK	1	74	21.43	21.39	21.32	21.09		
15	QPSK	36	0	20.61	20.64	20.62	20.43	21.6	
15	QPSK	36	20	20.57	20.58	20.57	20.32		
15	QPSK	36	39	20.55	20.57	20.51	20.27		
15	QPSK	75	0	20.57	20.63	20.54	20.34		
15	16QAM	1	0	20.63	20.68	20.66	20.51	21.6	
15	16QAM	1	37	20.45	20.49	20.39	20.21		
15	16QAM	1	74	20.59	20.59	20.51	20.26		
15	16QAM	36	0	19.58	19.60	19.56	19.39	20.6	
15	16QAM	36	20	19.53	19.56	19.51	19.31		
15	16QAM	36	39	19.51	19.53	19.49	19.22		
15	16QAM	75	0	19.60	19.61	19.58	19.37		
15	64QAM	1	0	19.37	19.44	19.39	19.24	20.6	
15	64QAM	1	37	19.29	19.29	19.25	19.03		
15	64QAM	1	74	19.32	19.34	19.19	18.99		
15	64QAM	36	0	18.62	18.66	18.64	18.44	19.6	
15	64QAM	36	20	18.59	18.62	18.56	18.34		
15	64QAM	36	39	18.55	18.59	18.51	18.26		
15	64QAM	75	0	18.59	18.63	18.50	18.37		
Channel				3590	3630.5	3670.5	3715	Tune-up limit (dBm)	
Frequency (MHz)				3595	3607.5	3642.5	3695		
10	QPSK	1	0	21.50	21.56	21.52	21.31	22.6	
10	QPSK	1	25	21.30	21.31	21.31	21.14		
10	QPSK	1	49	21.34	21.37	21.24	21.01		
10	QPSK	25	0	20.57	20.60	20.51	20.43	21.6	
10	QPSK	25	12	20.49	20.53	20.57	20.25		
10	QPSK	25	25	20.53	20.64	20.44	20.26		
10	QPSK	50	0	20.53	20.60	20.53	20.30		
10	16QAM	1	0	20.61	20.64	20.58	20.45	21.6	
10	16QAM	1	25	20.38	20.45	20.38	20.11		
10	16QAM	1	49	20.59	20.59	20.44	20.23		
10	16QAM	25	0	19.55	19.53	19.49	19.34	20.6	
10	16QAM	25	12	19.50	19.48	19.44	19.31		
10	16QAM	25	25	19.42	19.50	19.43	19.14		
10	16QAM	50	0	19.53	19.56	19.57	19.31		
10	64QAM	1	0	19.29	19.40	19.39	19.17	20.6	
10	64QAM	1	25	19.29	19.19	19.22	18.97		
10	64QAM	1	49	19.24	19.32	19.14	18.90		
10	64QAM	25	0	18.56	18.59	18.59	18.41	19.6	
10	64QAM	25	12	18.59	18.62	18.51	18.31		
10	64QAM	25	25	18.54	18.50	18.47	18.26		
10	64QAM	50	0	18.49	18.55	18.53	18.37		
Channel				3620.5	3660	3700	3745	Tune-up limit (dBm)	
Frequency (MHz)				3625.5	3667	3703	3755		
5	QPSK	1	0	21.46	21.52	21.47	21.27	22.6	
5	QPSK	1	12	21.41	21.47	21.41	21.18		
5	QPSK	1	24	21.40	21.40	21.37	21.11		
5	QPSK	12	0	20.54	20.64	20.63	20.38	21.6	
5	QPSK	12	7	20.62	20.66	20.60	20.34		
5	QPSK	12	13	20.54	20.66	20.54	20.28		
5	QPSK	25	0	20.58	20.58	20.57	20.30		
5	16QAM	1	0	20.55	20.62	20.58	20.36	21.6	
5	16QAM	1	12	20.64	20.67	20.64	20.36		
5	16QAM	1	24	20.56	20.63	20.55	20.30		
5	16QAM	12	0	19.55	19.59	19.62	19.31	20.6	
5	16QAM	12	7	19.55	19.62	19.58	19.33		
5	16QAM	12	13	19.55	19.60	19.54	19.31		
5	16QAM	25	0	19.59	19.63	19.60	19.36		
5	64QAM	1	0	19.36	19.41	19.36	19.10	20.6	
5	64QAM	1	12	19.38	19.40	19.33	19.08		
5	64QAM	1	24	19.33	19.37	19.32	19.04		
5	64QAM	12	0	18.62	18.66	18.61	18.40	19.6	
5	64QAM	12	7	18.65	18.69	18.64	18.42		
5	64QAM	12	13	18.64	18.62	18.62	18.31		
5	64QAM	25	0	18.66	18.70	18.63	18.40		



Band 38 HPUE								
Art 2								
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)	
Channel				37850	38000	38150		
Frequency (MHz)				2553	2565	2510		
20	QPSK	1	0	25.30	25.30	25.23	26.4	
20	QPSK	1	49	25.32	25.27	25.26		
20	QPSK	1	99	25.33	25.28	25.24		
20	QPSK	50	0	25.32	25.30	25.27		
20	QPSK	50	24	25.40	25.30	25.26		
20	QPSK	50	50	25.39	25.36	25.32		
20	QPSK	100	0	25.40	25.31	25.27	26.4	
20	16QAM	1	0	25.47	25.45	25.36		
20	16QAM	1	49	25.79	25.42	25.34		
20	16QAM	1	99	25.45	25.43	25.37		
20	16QAM	50	0	24.45	24.47	24.39		
20	16QAM	50	24	24.53	24.48	24.37		
20	16QAM	50	50	24.52	24.54	24.45	25.4	
20	16QAM	100	0	24.57	24.46	24.38		
20	64QAM	1	0	24.42	24.38	24.27		
20	64QAM	1	49	24.45	24.37	24.32		
20	64QAM	1	99	24.43	24.40	24.33		
20	64QAM	50	0	23.47	23.48	23.39		
20	64QAM	50	24	23.54	23.47	23.38	24.4	
20	64QAM	50	50	23.52	23.53	23.45		
20	64QAM	100	0	23.51	23.46	23.38		
Channel				37855	38000	38175		
Frequency (MHz)				2577.5	2595	2612.5		
15	QPSK	1	0	25.25	25.24	25.20		26.4
15	QPSK	1	37	25.32	25.27	25.23		
15	QPSK	1	74	25.29	25.23	25.25		
15	QPSK	36	0	25.51	25.41	25.39		
15	QPSK	36	20	25.45	25.38	25.44		
15	QPSK	36	39	25.48	25.43	25.38		
15	QPSK	75	0	25.49	25.37	25.33	26.4	
15	16QAM	1	0	25.56	25.59	25.48		
15	16QAM	1	37	25.56	25.54	25.47		
15	16QAM	1	74	25.61	25.54	25.50		
15	16QAM	36	0	24.57	24.53	24.44		
15	16QAM	36	20	24.55	24.49	24.50		
15	16QAM	36	39	24.55	24.55	24.46	25.4	
15	16QAM	75	0	24.62	24.52	24.44		
15	64QAM	1	0	24.49	24.43	24.38		
15	64QAM	1	37	24.55	24.62	24.43		
15	64QAM	1	74	24.56	24.50	24.41		
15	64QAM	36	0	23.62	23.67	23.48		
15	64QAM	36	20	23.62	23.63	23.52	24.4	
15	64QAM	36	39	23.58	23.61	23.53		
15	64QAM	75	0	23.62	23.64	23.48		
Channel				37800	38000	38200		
Frequency (MHz)				2575	2595	2615		
10	QPSK	1	0	25.43	25.31	25.24		26.4
10	QPSK	1	25	25.37	25.34	25.22		
10	QPSK	1	49	25.41	25.35	25.28		
10	QPSK	25	0	25.50	25.45	25.38		
10	QPSK	25	12	25.58	25.48	25.40		
10	QPSK	25	25	25.50	25.56	25.44		
10	QPSK	50	0	25.45	25.43	25.36	26.4	
10	16QAM	1	0	26.70	25.55	25.55		
10	16QAM	1	25	25.70	25.65	25.54		
10	16QAM	1	49	25.69	25.73	25.59		
10	16QAM	25	0	24.72	24.65	24.53		
10	16QAM	25	12	24.63	24.71	24.61		
10	16QAM	25	25	24.70	24.63	24.55	25.4	
10	16QAM	50	0	24.67	24.54	24.61		
10	64QAM	1	0	24.63	24.54	24.58		
10	64QAM	1	25	24.64	24.64	24.61		
10	64QAM	1	49	24.65	24.74	24.57		
10	64QAM	25	0	23.74	23.64	23.61		
10	64QAM	25	12	23.75	23.72	23.54	24.4	
10	64QAM	25	25	23.69	23.62	23.60		
10	64QAM	50	0	23.76	23.60	23.61		
Channel				37775	38000	38225		
Frequency (MHz)				2572.5	2595	2617.5		
5	QPSK	1	0	25.45	25.36	25.29		26.4
5	QPSK	1	12	25.39	25.38	25.26		
5	QPSK	1	24	25.43	25.39	25.29		
5	QPSK	12	0	25.59	25.49	25.46		
5	QPSK	12	7	25.64	25.57	25.49		
5	QPSK	12	13	25.58	25.58	25.45		
5	QPSK	25	0	25.55	25.46	25.44	26.4	
5	16QAM	1	0	25.74	25.62	25.63		
5	16QAM	1	12	25.71	25.69	25.50		
5	16QAM	1	24	25.76	25.73	25.66		
5	16QAM	12	0	24.74	24.65	24.60		
5	16QAM	12	7	24.72	24.74	24.64		
5	16QAM	12	13	24.71	24.69	24.61	25.4	
5	16QAM	25	0	24.71	24.63	24.52		
5	64QAM	1	0	24.73	24.64	24.62		
5	64QAM	1	12	24.72	24.69	24.61		
5	64QAM	1	24	24.74	24.74	24.67		
5	64QAM	12	0	23.74	23.67	23.63		
5	64QAM	12	7	23.76	23.75	23.62	24.4	
5	64QAM	12	13	23.74	23.70	23.61		
5	64QAM	25	0	23.77	23.66	23.66		



Band 38							
Ant 2							
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)
Channel				37850	38000	38150	
Frequency (MHz)				2580	2595	2610	
20	QPSK	1	0	23.48	23.45	23.40	24.6
20	QPSK	1	49	23.49	23.46	23.40	
20	QPSK	1	99	23.51	23.46	23.40	
20	QPSK	50	0	23.58	23.54	23.48	24.6
20	QPSK	50	24	23.72	23.56	23.47	
20	QPSK	50	50	23.83	23.61	23.53	
20	QPSK	100	0	23.85	23.55	23.47	24.6
20	16QAM	1	0	23.59	23.58	23.49	
20	16QAM	1	49	23.55	23.53	23.45	
20	16QAM	1	99	23.56	23.55	23.47	23.6
20	16QAM	50	0	22.51	22.58	22.48	
20	16QAM	50	24	22.68	22.58	22.50	
20	16QAM	50	50	22.67	22.64	22.56	23.6
20	16QAM	100	0	22.67	22.56	22.48	
20	64QAM	1	0	22.32	22.25	22.15	
20	64QAM	1	49	22.28	22.28	22.18	23.6
20	64QAM	1	99	22.32	22.28	22.16	
20	64QAM	50	0	21.82	21.59	21.51	
20	64QAM	50	24	21.69	21.59	21.50	22.6
20	64QAM	50	50	21.88	21.64	21.57	
20	64QAM	100	0	21.88	21.57	21.50	
Channel				37925	38000	38175	Tune-up limit (dBm)
Frequency (MHz)				2577.5	2595	2615.5	
15	QPSK	1	0	23.51	23.45	23.48	24.6
15	QPSK	1	37	23.47	23.45	23.47	
15	QPSK	1	74	23.48	23.46	23.40	
15	QPSK	36	0	23.66	23.57	23.49	24.6
15	QPSK	36	20	23.68	23.55	23.54	
15	QPSK	36	39	23.65	23.61	23.53	
15	QPSK	75	0	23.67	23.55	23.46	24.6
15	16QAM	1	0	23.62	23.61	23.49	
15	16QAM	1	37	23.51	23.49	23.41	
15	16QAM	1	74	23.65	23.60	23.50	23.6
15	16QAM	36	0	22.66	22.56	22.45	
15	16QAM	36	20	22.63	22.51	22.54	
15	16QAM	36	39	22.62	22.60	22.50	23.6
15	16QAM	75	0	22.69	22.58	22.50	
15	64QAM	1	0	22.30	22.27	22.17	
15	64QAM	1	37	22.37	22.30	22.21	23.6
15	64QAM	1	74	22.33	22.31	22.18	
15	64QAM	36	0	21.71	21.59	21.51	
15	64QAM	36	20	21.88	21.58	21.58	22.6
15	64QAM	36	39	21.69	21.66	21.57	
15	64QAM	75	0	21.72	21.57	21.52	
Channel				37800	38000	38200	Tune-up limit (dBm)
Frequency (MHz)				2575	2595	2615	
10	QPSK	1	0	23.47	23.48	23.42	24.6
10	QPSK	1	25	23.49	23.49	23.49	
10	QPSK	1	49	23.45	23.42	23.43	
10	QPSK	25	0	23.57	23.53	23.49	24.6
10	QPSK	25	12	23.61	23.69	23.49	
10	QPSK	25	25	23.58	23.58	23.49	
10	QPSK	50	0	23.62	23.58	23.55	24.6
10	16QAM	1	0	23.70	23.53	23.47	
10	16QAM	1	25	23.61	23.63	23.51	
10	16QAM	1	49	23.65	23.62	23.51	23.6
10	16QAM	25	0	22.64	22.50	22.51	
10	16QAM	25	12	22.67	22.63	22.51	
10	16QAM	25	25	22.58	22.54	22.47	23.6
10	16QAM	50	0	22.60	22.55	22.46	
10	64QAM	1	0	22.46	22.28	22.24	
10	64QAM	1	25	22.36	22.40	22.19	23.6
10	64QAM	1	49	22.37	22.38	22.29	
10	64QAM	25	0	21.71	21.56	21.49	
10	64QAM	25	12	21.69	21.64	21.57	22.6
10	64QAM	25	25	21.69	21.62	21.52	
10	64QAM	50	0	21.76	21.60	21.53	
Channel				37775	38000	38225	Tune-up limit (dBm)
Frequency (MHz)				2572.5	2595	2617.5	
5	QPSK	1	0	23.55	23.51	23.46	24.6
5	QPSK	1	12	23.53	23.50	23.40	
5	QPSK	1	24	23.51	23.44	23.40	
5	QPSK	12	0	23.65	23.60	23.56	24.6
5	QPSK	12	7	23.69	23.69	23.58	
5	QPSK	12	13	23.66	23.68	23.57	
5	QPSK	25	0	23.65	23.60	23.55	24.6
5	16QAM	1	0	23.66	23.59	23.55	
5	16QAM	1	12	23.60	23.66	23.58	
5	16QAM	1	24	23.66	23.66	23.57	23.6
5	16QAM	12	0	22.66	22.59	22.55	
5	16QAM	12	7	22.69	22.68	22.56	
5	16QAM	12	13	22.64	22.60	22.55	23.6
5	16QAM	25	0	22.70	22.62	22.56	
5	64QAM	1	0	22.47	22.35	22.29	
5	64QAM	1	12	22.46	22.42	22.29	23.6
5	64QAM	1	24	22.46	22.42	22.30	
5	64QAM	12	0	21.73	21.66	21.57	
5	64QAM	12	7	21.73	21.71	21.65	22.6
5	64QAM	12	13	21.73	21.69	21.62	
5	64QAM	25	0	21.76	21.64	21.62	



Band 41										
Ant 2										
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Low Middle Ch. / Freq.	Power Middle Ch. / Freq.	Power High Middle Ch. / Freq.	Power High Ch. / Freq.		Tune-up limit (dBm)
Channel				39760	40185	40620	41055	41490		
Frequency (MHz)				2503.5	2546.5	2593	2636.5	2690		
20	QPSK	1	0	23.29	23.45	23.52	23.23	23.01		24.6
20	QPSK	1	49	23.36	23.51	23.46	23.52	23.38		
20	QPSK	1	99	23.34	23.50	23.50	23.06	23.25		
20	QPSK	50	0	23.39	23.53	23.55	23.46	23.37		
20	QPSK	50	24	23.50	23.75	23.62	23.59	23.50		24.6
20	QPSK	50	50	23.49	23.63	23.60	23.43	23.46		
20	QPSK	100	0	23.50	23.65	23.62	23.50	23.41		
20	16QAM	1	0	23.42	23.55	23.65	23.35	23.12		
20	16QAM	1	49	23.39	23.58	23.53	23.63	23.51		24.6
20	16QAM	1	99	23.42	23.63	23.60	23.16	23.34		
20	16QAM	50	0	22.45	22.59	22.57	22.68	22.99		
20	16QAM	50	24	22.54	22.69	22.63	22.84	22.50		23.6
20	16QAM	50	50	22.54	22.67	22.64	22.69	22.68		
20	16QAM	100	0	22.63	22.67	22.64	22.72	22.63		
20	84QAM	1	0	22.13	22.17	22.26	22.18	21.99		
20	84QAM	1	49	22.10	22.30	22.25	22.61	22.48		23.6
20	84QAM	1	99	22.16	22.37	22.28	22.15	22.23		
20	84QAM	50	0	21.45	21.58	21.58	21.70	21.58		
20	84QAM	50	24	21.63	21.68	21.66	21.84	21.74		22.6
20	84QAM	50	50	21.63	21.68	21.64	21.66	21.69		
20	84QAM	100	0	21.53	21.67	21.65	21.74	21.63		
Channel				39720	40170	40620	41080	41510		Tune-up limit (dBm)
Frequency (MHz)				2503.5	2546.5	2593	2637.5	2692.5		
15	QPSK	1	0	23.40	23.50	23.49	23.47	23.40		24.6
15	QPSK	1	37	23.43	23.47	23.47	23.50	23.47		
15	QPSK	1	74	23.48	23.58	23.60	23.49	23.43		
15	QPSK	36	0	23.47	23.55	23.57	23.50	23.39		24.6
15	QPSK	36	20	23.50	23.66	23.64	23.53	23.50		
15	QPSK	36	39	23.47	23.64	23.62	23.51	23.44		
15	QPSK	75	0	23.51	23.64	23.65	23.46	23.42		
15	16QAM	1	0	23.43	23.58	23.60	23.51	23.27		24.6
15	16QAM	1	37	23.34	23.54	23.54	23.61	23.50		
15	16QAM	1	74	23.47	23.74	23.70	23.44	23.42		23.6
15	16QAM	36	0	22.45	22.53	22.65	22.70	22.55		
15	16QAM	36	20	22.47	22.61	22.59	22.69	22.65		23.6
15	16QAM	36	39	22.46	22.63	22.59	22.69	22.62		
15	16QAM	75	0	22.54	22.68	22.65	22.70	22.66		
15	84QAM	1	0	22.12	22.25	22.25	22.43	22.16		
15	84QAM	1	37	22.14	22.33	22.30	22.61	22.42		23.6
15	84QAM	1	74	22.13	22.46	22.38	22.40	22.32		
15	84QAM	36	0	21.49	21.59	21.59	21.71	21.59		
15	84QAM	36	20	21.62	21.84	21.66	21.74	21.71		22.6
15	84QAM	36	39	21.51	21.68	21.65	21.70	21.68		
15	84QAM	75	0	21.65	21.68	21.66	21.70	21.66		
Channel				39700	40160	40620	41080	41540		Tune-up limit (dBm)
Frequency (MHz)				2501	2547	2593	2639	2685		
10	QPSK	1	0	23.51	23.49	23.52	23.61	23.43		24.6
10	QPSK	1	25	23.43	23.62	23.59	23.57	23.41		
10	QPSK	1	49	23.46	23.65	23.51	23.61	23.40		
10	QPSK	25	0	23.60	23.66	23.60	23.66	23.50		24.6
10	QPSK	25	12	23.56	23.64	23.63	23.66	23.45		
10	QPSK	25	25	23.45	23.66	23.66	23.54	23.43		
10	QPSK	50	0	23.45	23.67	23.61	23.58	23.45		
10	16QAM	1	0	23.47	23.55	23.57	23.63	23.49		24.6
10	16QAM	1	25	23.47	23.69	23.72	23.70	23.62		
10	16QAM	1	49	23.56	23.66	23.70	23.57	23.41		
10	16QAM	25	0	22.47	22.63	22.58	22.79	22.64		23.6
10	16QAM	25	12	22.50	22.63	22.63	22.80	22.62		
10	16QAM	25	25	22.41	22.55	22.62	22.76	22.59		
10	16QAM	50	0	22.62	22.72	22.68	22.67	22.67		
10	84QAM	1	0	22.27	22.35	22.32	22.55	22.35		23.6
10	84QAM	1	25	22.29	22.47	22.35	22.64	22.40		
10	84QAM	1	49	22.24	22.48	22.34	22.60	22.35		
10	84QAM	25	0	21.46	21.65	21.65	21.89	21.65		
10	84QAM	25	12	21.53	21.69	21.62	21.83	21.73		22.6
10	84QAM	25	25	21.46	21.64	21.65	21.86	21.60		
10	84QAM	50	0	21.50	21.70	21.70	21.89	21.66		
Channel				39675	40148	40620	41083	41665		Tune-up limit (dBm)
Frequency (MHz)				2496.5	2545.8	2593	2640.30	2687.5		
5	QPSK	1	0	23.44	23.47	23.47	23.55	23.40		24.6
5	QPSK	1	12	23.40	23.53	23.58	23.55	23.40		
5	QPSK	1	24	23.40	23.57	23.51	23.51	23.40		
5	QPSK	12	0	23.51	23.67	23.68	23.63	23.49		24.6
5	QPSK	12	7	23.56	23.71	23.71	23.66	23.53		
5	QPSK	12	13	23.61	23.69	23.68	23.64	23.47		
5	QPSK	25	0	23.50	23.69	23.66	23.65	23.49		
5	16QAM	1	0	23.62	23.62	23.62	23.67	23.53		24.6
5	16QAM	1	12	23.67	23.71	23.70	23.71	23.63		
5	16QAM	1	24	23.57	23.71	23.72	23.67	23.51		
5	16QAM	12	0	22.47	22.65	22.66	22.85	22.67		23.6
5	16QAM	12	7	22.54	22.70	22.66	22.85	22.71		
5	16QAM	12	13	22.50	22.64	22.65	22.80	22.67		
5	16QAM	25	0	22.55	22.72	22.71	22.90	22.72		
5	84QAM	1	0	22.30	22.37	22.36	22.65	22.42		23.6
5	84QAM	1	12	22.29	22.47	22.45	22.67	22.45		
5	84QAM	1	24	22.31	22.49	22.44	22.63	22.35		
5	84QAM	12	0	21.65	21.74	21.71	21.90	21.73		22.6
5	84QAM	12	7	21.67	21.76	21.71	21.80	21.76		
5	84QAM	12	13	21.62	21.73	21.74	21.87	21.70		
5	84QAM	25	0	21.59	21.77	21.75	21.90	21.74		



Band 48									
Ant 7									
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Low Middle Ch. / Freq.	Power High Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)	
Channel				55340	55830	56150	56640		
Frequency (MHz)				3559	3569	3541	3595		
20	QPSK	1	0	22.70	22.79	22.84	22.93	23.8	
20	QPSK	1	49	22.55	22.57	22.64	22.71		
20	QPSK	1	99	22.54	22.57	22.59	22.67		
20	QPSK	50	0	22.05	22.11	22.14	22.23		
20	QPSK	50	24	22.02	22.03	22.08	22.19	23.2	
20	QPSK	50	50	21.94	21.99	22.04	22.08		
20	QPSK	100	0	21.97	22.05	22.08	22.16		
20	16QAM	1	0	22.13	22.21	22.26	22.34	23.2	
20	16QAM	1	49	21.92	21.97	22.00	22.09		
20	16QAM	1	99	21.95	21.99	21.97	22.09		
20	16QAM	50	0	21.07	21.15	21.19	21.27		
20	16QAM	50	24	21.03	21.10	21.13	21.20	22.2	
20	16QAM	50	50	20.96	21.03	21.05	21.14		
20	16QAM	100	0	20.99	21.08	21.13	21.19		
20	64QAM	1	0	20.88	20.96	20.96	21.09	22.2	
20	64QAM	1	49	20.65	20.71	20.74	20.83		
20	64QAM	1	99	20.72	20.74	20.67	20.82		
20	64QAM	50	0	20.08	20.12	20.16	20.27		
20	64QAM	50	24	20.04	20.06	20.11	20.19	21.2	
20	64QAM	50	50	19.96	20.01	20.07	20.13		
20	64QAM	100	0	20.02	20.06	20.12	20.20		
Channel				55375	55820	56160	56695		
Frequency (MHz)				3537.5	3568	3542	3592.5		
15	QPSK	1	0	22.60	22.69	22.73	22.84	23.8	
15	QPSK	1	37	22.48	22.56	22.58	22.68		
15	QPSK	1	74	22.52	22.58	22.59	22.69		
15	QPSK	36	0	22.01	22.09	22.13	22.25		
15	QPSK	36	20	21.96	22.02	22.07	22.16	23.2	
15	QPSK	36	39	21.92	22.01	22.04	22.11		
15	QPSK	75	0	21.95	22.07	22.09	22.19		
15	16QAM	1	0	22.06	22.15	22.21	22.28	23.2	
15	16QAM	1	37	21.84	21.93	21.95	22.03		
15	16QAM	1	74	21.96	22.05	22.04	22.16		
15	16QAM	36	0	20.95	21.05	21.09	21.21		
15	16QAM	36	20	20.91	21.00	21.03	21.13	22.2	
15	16QAM	36	39	20.90	20.97	21.01	21.10		
15	16QAM	75	0	20.97	21.07	21.11	21.20		
15	64QAM	1	0	20.79	20.90	20.96	21.00	22.2	
15	64QAM	1	37	20.66	20.74	20.75	20.86		
15	64QAM	1	74	20.73	20.81	20.73	20.92		
15	64QAM	36	0	20.01	20.13	20.14	20.24		
15	64QAM	36	20	19.96	20.06	20.08	20.18	21.2	
15	64QAM	36	39	19.95	20.02	20.03	20.13		
15	64QAM	75	0	20.00	20.07	20.09	20.20		
Channel				55200	55615	56165	56890		
Frequency (MHz)				3555	3607.5	3542.5	3595		
10	QPSK	1	0	22.60	22.66	22.69	22.74	23.8	
10	QPSK	1	25	22.38	22.53	22.51	22.64		
10	QPSK	1	49	22.51	22.57	22.58	22.64		
10	QPSK	25	0	21.95	22.09	22.11	22.21		
10	QPSK	25	12	21.88	22.01	22.07	22.11	23.2	
10	QPSK	25	25	21.83	21.97	22.00	22.06		
10	QPSK	50	0	21.85	22.07	22.04	22.11		
10	16QAM	1	0	22.05	22.13	22.12	22.18	23.2	
10	16QAM	1	25	21.81	21.84	21.88	21.93		
10	16QAM	1	49	21.97	22.01	22.02	22.11		
10	16QAM	25	0	20.93	21.05	21.02	21.16		
10	16QAM	25	12	20.87	20.98	20.98	21.06	22.2	
10	16QAM	25	25	20.80	20.89	20.96	21.08		
10	16QAM	50	0	20.87	21.01	21.04	21.20		
10	64QAM	1	0	20.79	20.91	20.93	20.94	22.2	
10	64QAM	1	25	20.65	20.68	20.69	20.83		
10	64QAM	1	49	20.69	20.77	20.70	20.83		
10	64QAM	25	0	19.95	20.13	20.10	20.23		
10	64QAM	25	12	19.94	20.06	20.05	20.11	21.2	
10	64QAM	25	25	19.90	19.92	20.00	20.13		
10	64QAM	50	0	19.96	20.05	20.05	20.10		
Channel				55265	55810	56170	56715		
Frequency (MHz)				3525.5	3567	3543	3597.5		
5	QPSK	1	0	22.81	22.84	22.74	22.84	23.8	
5	QPSK	1	12	22.57	22.61	22.68	22.77		
5	QPSK	1	24	22.49	22.62	22.61	22.71		
5	QPSK	12	0	21.97	22.10	22.12	22.20		
5	QPSK	12	7	21.99	22.09	22.15	22.22	23.2	
5	QPSK	12	13	21.97	22.02	22.08	22.21		
5	QPSK	25	0	21.96	22.02	22.10	22.21		
5	16QAM	1	0	21.96	22.07	22.15	22.22	23.2	
5	16QAM	1	12	22.04	22.15	22.17	22.26		
5	16QAM	1	24	22.02	22.08	22.12	22.17		
5	16QAM	12	0	20.98	21.07	21.13	21.21		
5	16QAM	12	7	20.95	21.10	21.09	21.21	22.2	
5	16QAM	12	13	20.95	21.00	21.07	21.15		
5	16QAM	25	0	21.00	21.08	21.13	21.21		
5	64QAM	1	0	20.78	20.83	20.88	20.97	22.2	
5	64QAM	1	12	20.77	20.83	20.85	20.97		
5	64QAM	1	24	20.75	20.79	20.88	20.96		
5	64QAM	12	0	20.01	20.07	20.18	20.27		
5	64QAM	12	7	20.01	20.09	20.18	20.27	21.2	
5	64QAM	12	13	20.01	20.09	20.10	20.19		
5	64QAM	25	0	20.03	20.11	20.16	20.25		



Band 38 HPUE							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)
Channel				37850	38000	38150	
Frequency (MHz)				2575	2595	2610	
20	QPSK	1	0	23.86	23.83	23.78	25
20	QPSK	1	49	23.78	23.78	23.74	
20	QPSK	1	99	23.82	23.77	23.69	
20	QPSK	50	0	24.04	24.06	23.97	
20	QPSK	50	24	24.13	23.99	23.93	25
20	QPSK	50	50	24.08	24.05	23.99	
20	QPSK	100	0	24.10	24.00	23.95	
20	16QAM	1	0	24.20	24.22	24.18	
20	16QAM	1	49	24.15	24.19	24.11	25
20	16QAM	1	99	24.14	24.15	24.09	
20	16QAM	50	0	24.09	24.10	24.03	
20	16QAM	50	24	24.15	24.06	24.01	25
20	16QAM	50	50	24.15	24.10	24.06	
20	16QAM	100	0	24.15	24.04	23.99	
20	64QAM	1	0	24.02	23.99	23.92	
20	64QAM	1	49	23.96	23.96	23.93	25
20	64QAM	1	99	24.00	23.98	23.92	
20	64QAM	50	0	23.45	23.39	23.45	
20	64QAM	50	24	23.43	23.45	23.47	24.5
20	64QAM	50	50	23.40	23.38	23.45	
20	64QAM	100	0	23.33	23.26	23.24	
Channel				37855	38000	38175	
Frequency (MHz)				2577.5	2595	2612.5	
15	QPSK	1	0	23.78	23.78	23.70	25
15	QPSK	1	37	23.78	23.80	23.73	
15	QPSK	1	74	23.79	23.78	23.67	
15	QPSK	36	0	24.02	23.93	23.85	25
15	QPSK	36	20	23.97	23.89	23.88	
15	QPSK	36	39	23.95	23.93	23.86	
15	QPSK	75	0	23.99	23.88	23.83	
15	16QAM	1	0	24.12	24.07	24.02	
15	16QAM	1	37	24.04	24.05	23.99	25
15	16QAM	1	74	24.09	24.08	23.96	
15	16QAM	36	0	24.02	23.93	23.84	25
15	16QAM	36	20	23.96	23.88	23.88	
15	16QAM	36	39	23.96	23.84	23.85	
15	16QAM	75	0	24.01	23.92	23.85	
15	64QAM	1	0	23.88	23.84	23.77	25
15	64QAM	1	37	23.90	23.88	23.80	
15	64QAM	1	74	23.87	23.89	23.76	
15	64QAM	36	0	23.36	23.28	23.28	24.5
15	64QAM	36	20	23.35	23.28	23.37	
15	64QAM	36	39	23.30	23.25	23.25	
15	64QAM	75	0	23.37	23.29	23.26	
Channel				37860	38000	38200	
Frequency (MHz)				2575	2595	2615	
10	QPSK	1	0	23.83	23.73	23.64	25
10	QPSK	1	25	23.70	23.70	23.65	
10	QPSK	1	49	23.83	23.81	23.72	
10	QPSK	25	0	23.96	23.87	23.83	25
10	QPSK	25	12	23.97	23.89	23.83	
10	QPSK	25	25	23.94	23.95	23.91	
10	QPSK	50	0	23.94	23.87	23.81	
10	16QAM	1	0	24.17	24.11	24.05	25
10	16QAM	1	25	24.11	24.11	24.05	
10	16QAM	1	49	24.16	24.13	24.02	
10	16QAM	25	0	24.01	23.89	23.85	25
10	16QAM	25	12	24.02	23.93	23.84	
10	16QAM	25	25	23.96	23.94	23.85	
10	16QAM	50	0	23.99	23.92	23.85	
10	64QAM	1	0	24.00	24.03	23.95	25
10	64QAM	1	25	24.02	24.10	24.00	
10	64QAM	1	49	24.05	24.05	23.94	
10	64QAM	25	0	23.44	23.34	23.37	24.5
10	64QAM	25	12	23.45	23.38	23.36	
10	64QAM	25	25	23.40	23.29	23.29	
10	64QAM	50	0	23.33	23.24	23.17	
Channel				37775	38000	38225	
Frequency (MHz)				2572.5	2595	2617.5	
5	QPSK	1	0	23.77	23.73	23.68	25
5	QPSK	1	12	23.69	23.72	23.64	
5	QPSK	1	24	23.74	23.77	23.65	
5	QPSK	12	0	23.93	23.86	23.83	25
5	QPSK	12	7	23.95	23.94	23.88	
5	QPSK	12	13	23.91	23.92	23.86	
5	QPSK	25	0	23.93	23.87	23.83	
5	16QAM	1	0	24.13	24.07	24.03	25
5	16QAM	1	12	24.10	24.10	24.01	
5	16QAM	1	24	24.10	24.15	24.04	
5	16QAM	12	0	23.96	23.93	23.90	25
5	16QAM	12	7	23.98	23.97	23.94	
5	16QAM	12	13	23.98	23.98	23.88	
5	16QAM	25	0	23.99	23.92	23.89	
5	64QAM	1	0	23.99	23.95	23.93	25
5	64QAM	1	12	23.98	23.98	23.87	
5	64QAM	1	24	24.01	24.04	23.91	
5	64QAM	12	0	23.33	23.31	23.32	24.5
5	64QAM	12	7	23.34	23.31	23.36	
5	64QAM	12	13	23.28	23.27	23.37	
5	64QAM	25	0	23.31	23.27	23.28	



Band 38							
Ant 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)
Channel				37850	38000	38150	
Frequency (MHz)				2593	2595	2510	
20	QPSK	1	0	22.19	22.22	22.17	23.2
20	QPSK	1	49	22.21	22.21	22.15	
20	QPSK	1	99	22.19	22.17	22.10	
20	QPSK	50	0	22.30	22.33	22.26	23.2
20	QPSK	50	24	22.35	22.29	22.24	
20	QPSK	50	50	22.35	22.34	22.29	
20	QPSK	100	0	22.37	22.29	22.21	23.2
20	16QAM	1	0	22.39	22.43	22.32	
20	16QAM	1	49	22.31	22.30	22.25	
20	16QAM	1	99	22.32	22.33	22.24	23.2
20	16QAM	50	0	22.35	22.33	22.28	
20	16QAM	50	24	22.39	22.33	22.25	
20	16QAM	50	50	22.38	22.38	22.30	23.2
20	16QAM	100	0	22.39	22.29	22.25	
20	64QAM	1	0	22.04	22.06	21.95	
20	64QAM	1	49	21.98	21.99	21.95	23.2
20	64QAM	1	99	21.99	22.01	21.92	
20	64QAM	50	0	21.76	21.75	21.71	
20	64QAM	50	24	21.81	21.72	21.67	22.7
20	64QAM	50	50	21.78	21.77	21.69	
20	64QAM	100	0	21.80	21.71	21.66	
Channel				37825	38000	38175	
Frequency (MHz)				2577.5	2595	2615.5	Upper limit (dBm)
15	QPSK	1	0	22.23	22.19	22.13	23.2
15	QPSK	1	37	22.15	22.14	22.08	
15	QPSK	1	74	22.18	22.16	22.10	
15	QPSK	36	0	22.38	22.29	22.24	23.2
15	QPSK	36	20	22.36	22.25	22.29	
15	QPSK	36	39	22.33	22.31	22.24	
15	QPSK	75	0	22.36	22.28	22.21	23.2
15	16QAM	1	0	22.36	22.35	22.27	
15	16QAM	1	37	22.26	22.27	22.22	
15	16QAM	1	74	22.34	22.34	22.25	23.2
15	16QAM	36	0	22.35	22.25	22.22	
15	16QAM	36	20	22.33	22.24	22.26	
15	16QAM	36	39	22.31	22.28	22.22	23.2
15	16QAM	75	0	22.39	22.29	22.23	
15	64QAM	1	0	22.01	22.00	21.93	
15	64QAM	1	37	22.05	22.02	21.94	23.2
15	64QAM	1	74	22.00	22.02	21.92	
15	64QAM	36	0	21.80	21.74	21.64	
15	64QAM	36	20	21.78	21.70	21.72	22.7
15	64QAM	36	39	21.76	21.75	21.68	
15	64QAM	75	0	21.78	21.69	21.61	
Channel				37800	38000	38200	
Frequency (MHz)				2575	2595	2615	Upper limit (dBm)
10	QPSK	1	0	22.23	22.10	22.07	23.2
10	QPSK	1	25	22.15	22.05	21.98	
10	QPSK	1	49	22.13	22.09	22.00	
10	QPSK	25	0	22.32	22.21	22.20	23.2
10	QPSK	25	12	22.27	22.22	22.26	
10	QPSK	25	25	22.31	22.30	22.23	
10	QPSK	50	0	22.33	22.23	22.19	23.2
10	16QAM	1	0	22.28	22.35	22.17	
10	16QAM	1	25	22.22	22.16	22.20	
10	16QAM	1	49	22.28	22.32	22.24	23.2
10	16QAM	25	0	22.27	22.25	22.21	
10	16QAM	25	12	22.32	22.19	22.23	
10	16QAM	25	25	22.26	22.24	22.18	23.2
10	16QAM	50	0	22.39	22.24	22.23	
10	64QAM	1	0	21.92	21.95	21.83	
10	64QAM	1	25	21.97	22.01	21.85	23.2
10	64QAM	1	49	21.97	21.96	21.91	
10	64QAM	25	0	21.73	21.70	21.62	
10	64QAM	25	12	21.74	21.69	21.70	22.7
10	64QAM	25	25	21.76	21.65	21.65	
10	64QAM	50	0	21.69	21.69	21.54	
Channel				37775	38000	38225	
Frequency (MHz)				2572.5	2595	2617.5	Upper limit (dBm)
5	QPSK	1	0	22.30	22.20	22.18	23.2
5	QPSK	1	12	22.24	22.17	22.14	
5	QPSK	1	24	22.23	22.21	22.11	
5	QPSK	12	0	22.38	22.31	22.26	23.2
5	QPSK	12	7	22.38	22.36	22.26	
5	QPSK	12	13	22.35	22.32	22.24	
5	QPSK	25	0	22.32	22.30	22.27	23.2
5	16QAM	1	0	22.42	22.32	22.30	
5	16QAM	1	12	22.42	22.37	22.30	
5	16QAM	1	24	22.42	22.39	22.29	23.2
5	16QAM	12	0	22.34	22.28	22.24	
5	16QAM	12	7	22.38	22.33	22.24	
5	16QAM	12	13	22.33	22.29	22.20	23.2
5	16QAM	25	0	22.40	22.32	22.29	
5	64QAM	1	0	22.13	22.05	21.99	
5	64QAM	1	12	22.13	22.09	22.00	23.2
5	64QAM	1	24	22.13	22.10	22.00	
5	64QAM	12	0	21.78	21.73	21.72	
5	64QAM	12	7	21.81	21.81	21.69	22.7
5	64QAM	12	13	21.80	21.77	21.67	
5	64QAM	25	0	21.82	21.76	21.68	



Band 41										
Ant 0										
BW (MHz)	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Low Middle Ch. / Freq.	Power Middle Ch. / Freq.	Power High Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)	
Channel				39760	40185	40620	41055	41490		
Frequency (MHz)				2593	2593.5	2593	2633.5	2630		
20	QPSK	1	0	21.89	21.80	21.65	21.44	21.20	23.2	
20	QPSK	1	49	21.66	21.71	21.63	21.79	21.52		
20	QPSK	1	99	21.62	21.65	21.65	21.22	21.35		
20	QPSK	50	0	21.75	21.72	21.73	21.61	21.45		
20	QPSK	50	24	21.80	21.90	21.78	21.89	21.57	23.2	
20	QPSK	50	50	21.76	21.78	21.75	21.65	21.55		
20	QPSK	100	0	21.81	21.83	21.78	21.65	21.49		
20	16QAM	1	0	21.87	21.76	21.92	21.47	21.20		
20	16QAM	1	49	21.70	21.76	21.67	21.73	21.58	23.2	
20	16QAM	1	99	21.71	21.79	21.73	21.24	21.43		
20	16QAM	50	0	21.76	21.79	21.76	21.63	21.48		
20	16QAM	50	24	21.85	21.88	21.82	21.75	21.60	23.2	
20	16QAM	50	50	21.79	21.86	21.80	21.56	21.57		
20	16QAM	100	0	21.79	21.84	21.79	21.66	21.51		
20	64QAM	1	0	21.55	21.44	21.45	21.22	21.21		
20	64QAM	1	49	21.43	21.48	21.47	21.55	21.35	23.2	
20	64QAM	1	99	21.46	21.53	21.44	21.20	21.22		
20	64QAM	50	0	21.20	21.16	21.15	21.25	21.09		
20	64QAM	50	24	21.28	21.27	21.21	21.36	21.20	22.7	
20	64QAM	50	50	21.22	21.24	21.19	21.21	21.18		
20	64QAM	100	0	21.27	21.25	21.19	21.27	21.12	Tune-up limit (dBm)	
Channel				39720	40173	40620	41058	41519		
Frequency (MHz)				2593.5	2593.3	2593	2633.3	2633.9		
15	QPSK	1	0	21.75	21.73	21.72	21.63	21.34	23.2	
15	QPSK	1	37	21.74	21.70	21.68	21.69	21.53		
15	QPSK	1	74	21.70	21.79	21.80	21.45	21.49		
15	QPSK	36	0	21.90	21.80	21.78	21.73	21.56	23.2	
15	QPSK	36	20	21.89	21.88	21.84	21.72	21.68		
15	QPSK	36	39	21.84	21.86	21.82	21.70	21.65		
15	QPSK	75	0	21.90	21.81	21.84	21.66	21.61		
15	16QAM	1	0	21.82	21.85	21.88	21.71	21.45	23.2	
15	16QAM	1	37	21.74	21.80	21.76	21.75	21.63		
15	16QAM	1	74	21.76	21.87	21.85	21.53	21.65		
15	16QAM	36	0	21.85	21.80	21.80	21.68	21.58	23.2	
15	16QAM	36	20	21.84	21.87	21.82	21.66	21.64		
15	16QAM	36	39	21.81	21.87	21.80	21.67	21.60		
15	16QAM	75	0	21.90	21.83	21.90	21.69	21.63		
15	64QAM	1	0	21.58	21.51	21.48	21.47	21.20	23.2	
15	64QAM	1	37	21.65	21.57	21.53	21.59	21.44		
15	64QAM	1	74	21.63	21.67	21.62	21.28	21.42		
15	64QAM	36	0	21.35	21.25	21.20	21.33	21.23	22.7	
15	64QAM	36	20	21.34	21.31	21.25	21.37	21.31		
15	64QAM	36	39	21.28	21.29	21.25	21.32	21.26		
15	64QAM	75	0	21.35	21.32	21.27	21.31	21.25	Tune-up limit (dBm)	
Channel				39700	40160	40620	41060	41540		
Frequency (MHz)				2591	2547	2593	2639	2685		
10	QPSK	1	0	21.65	21.63	21.62	21.53	21.25	23.2	
10	QPSK	1	25	21.68	21.70	21.65	21.63	21.46		
10	QPSK	1	49	21.61	21.77	21.70	21.38	21.40		
10	QPSK	25	0	21.63	21.72	21.75	21.69	21.55	23.2	
10	QPSK	25	12	21.85	21.78	21.75	21.62	21.67		
10	QPSK	25	25	21.76	21.76	21.72	21.65	21.60		
10	QPSK	50	0	21.84	21.85	21.79	21.64	21.53	23.2	
10	16QAM	1	0	21.82	21.84	21.83	21.70	21.36		
10	16QAM	1	25	21.68	21.70	21.67	21.70	21.57		
10	16QAM	1	49	21.72	21.66	21.66	21.51	21.60	23.2	
10	16QAM	25	0	21.78	21.73	21.71	21.66	21.50		
10	16QAM	25	12	21.82	21.79	21.81	21.66	21.61		
10	16QAM	25	25	21.77	21.85	21.76	21.59	21.50	23.2	
10	16QAM	50	0	21.85	21.83	21.88	21.66	21.58		
10	64QAM	1	0	21.48	21.44	21.44	21.48	21.22	23.2	
10	64QAM	1	25	21.53	21.51	21.53	21.52	21.42		
10	64QAM	1	49	21.51	21.63	21.60	21.28	21.35		
10	64QAM	25	0	21.25	21.18	21.20	21.31	21.13	22.7	
10	64QAM	25	12	21.26	21.24	21.22	21.34	21.21		
10	64QAM	25	25	21.16	21.26	21.21	21.32	21.26		
10	64QAM	50	0	21.28	21.25	21.24	21.21	21.20	Tune-up limit (dBm)	
Channel				39675	40148	40620	41083	41665		
Frequency (MHz)				2496.5	2545.6	2593	2640.30	2687.5		
5	QPSK	1	0	21.77	21.60	21.55	21.60	21.45	23.2	
5	QPSK	1	12	21.71	21.63	21.67	21.58	21.48		
5	QPSK	1	24	21.71	21.63	21.59	21.55	21.36		
5	QPSK	12	0	21.84	21.77	21.76	21.74	21.58	23.2	
5	QPSK	12	7	21.87	21.82	21.79	21.76	21.57		
5	QPSK	12	13	21.82	21.76	21.77	21.68	21.55		
5	QPSK	25	0	21.82	21.77	21.76	21.71	21.55	23.2	
5	16QAM	1	0	21.86	21.80	21.73	21.82	21.69		
5	16QAM	1	12	21.89	21.82	21.84	21.79	21.69	23.2	
5	16QAM	1	24	21.86	21.89	21.86	21.76	21.56		
5	16QAM	12	0	21.83	21.77	21.78	21.72	21.58		
5	16QAM	12	7	21.85	21.79	21.78	21.73	21.60	23.2	
5	16QAM	12	13	21.81	21.75	21.74	21.66	21.51		
5	16QAM	25	0	21.85	21.83	21.83	21.75	21.61		
5	64QAM	1	0	21.66	21.46	21.42	21.50	21.35	23.2	
5	64QAM	1	12	21.81	21.54	21.53	21.52	21.34		
5	64QAM	1	24	21.63	21.56	21.52	21.48	21.32		
5	64QAM	12	0	21.27	21.22	21.20	21.38	21.22	22.7	
5	64QAM	12	7	21.31	21.25	21.23	21.40	21.23		
5	64QAM	12	13	21.26	21.24	21.22	21.32	21.22		
5	64QAM	25	0	21.28	21.24	21.22	21.39	21.25		



Band 48									
Ant 2									
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq.	Power Low Middle Ch. / Freq.	Power High Middle Ch. / Freq.	Power High Ch. / Freq.	Tune-up limit (dBm)	
Channel				55340	55830	56150	56640		
Frequency (MHz)				3559	3608	3641	3690		
20	QPSK	1	0	21.16	21.17	21.13	21.00	21.4	
20	QPSK	1	49	20.83	20.96	20.92	20.72		
20	QPSK	1	99	20.85	20.84	20.87	20.60		
20	QPSK	50	0	20.83	20.86	20.85	20.68		
20	QPSK	50	24	20.82	20.82	20.81	20.60	21.4	
20	QPSK	50	50	20.76	20.77	20.71	20.47		
20	QPSK	100	0	20.80	20.81	20.76	20.58		
20	16QAM	1	0	20.90	20.96	20.95	20.81		
20	16QAM	1	49	20.71	20.74	20.70	20.48	21.4	
20	16QAM	1	99	20.75	20.72	20.64	20.42		
20	16QAM	50	0	19.87	19.91	19.86	19.71		
20	16QAM	50	24	19.84	19.85	19.83	19.62	20.6	
20	16QAM	50	50	19.78	19.79	19.76	19.50		
20	16QAM	100	0	19.80	19.83	19.83	19.61		
20	64QAM	1	0	19.88	19.74	19.69	19.54		
20	64QAM	1	49	19.46	19.48	19.45	19.24	20.6	
20	64QAM	1	99	19.52	19.47	19.35	19.16		
20	64QAM	50	0	19.85	19.92	18.86	18.72		
20	64QAM	50	24	18.84	18.89	18.81	18.65	19.6	
20	64QAM	50	50	18.78	18.82	18.74	18.51		
20	64QAM	100	0	18.83	18.85	18.81	18.62		
Channel				55375	55820	56160	56605		
Frequency (MHz)				3537.5	3606	3642	3692.5		
15	QPSK	1	0	20.57	20.66	20.84	20.69	21.4	
15	QPSK	1	37	20.50	20.72	20.69	20.48		
15	QPSK	1	74	20.54	20.75	20.65	20.41		
15	QPSK	36	0	20.62	20.64	20.60	20.45		
15	QPSK	36	20	20.57	20.59	20.55	20.35	21.4	
15	QPSK	36	39	20.54	20.57	20.52	20.25		
15	QPSK	75	0	20.57	20.64	20.57	20.38		
15	16QAM	1	0	20.65	20.69	20.67	20.53		
15	16QAM	1	37	20.44	20.50	20.43	20.21	21.4	
15	16QAM	1	74	20.56	20.56	20.52	20.27		
15	16QAM	36	0	19.57	19.62	19.56	19.40		
15	16QAM	36	20	19.53	19.56	19.52	19.31	20.6	
15	16QAM	36	39	19.51	19.54	19.46	19.24		
15	16QAM	75	0	19.61	19.63	19.60	19.38		
15	64QAM	1	0	19.38	19.44	19.43	19.27	20.6	
15	64QAM	1	37	19.26	19.29	19.24	19.03		
15	64QAM	1	74	19.34	19.34	19.22	19.00		
15	64QAM	36	0	18.63	18.67	18.64	18.45		
15	64QAM	36	20	18.58	18.64	18.57	18.35	19.6	
15	64QAM	36	39	18.56	18.56	18.52	18.26		
15	64QAM	75	0	18.61	18.64	18.60	18.37		
Channel				55200	55615	56165	56610		
Frequency (MHz)				3555	3607.5	3642.5	3695		
10	QPSK	1	0	20.59	20.77	20.71	20.57	21.4	
10	QPSK	1	25	20.53	20.73	20.73	20.49		
10	QPSK	1	49	20.50	20.68	20.65	20.38		
10	QPSK	25	0	20.57	20.61	20.55	20.34		
10	QPSK	25	12	20.55	20.62	20.59	20.35	21.4	
10	QPSK	25	25	20.58	20.52	20.52	20.26		
10	QPSK	50	0	20.56	20.52	20.49	20.24		
10	16QAM	1	0	20.56	20.58	20.57	20.28	21.4	
10	16QAM	1	25	20.60	20.64	20.63	20.41		
10	16QAM	1	49	20.53	20.59	20.51	20.26		
10	16QAM	25	0	19.57	19.56	19.54	19.33		
10	16QAM	25	12	19.62	19.57	19.54	19.25	20.6	
10	16QAM	25	25	19.53	19.55	19.51	19.27		
10	16QAM	50	0	19.49	19.57	19.61	19.31		
10	64QAM	1	0	19.25	19.33	19.30	19.03		
10	64QAM	1	25	19.31	19.29	19.27	19.08	20.6	
10	64QAM	1	49	19.25	19.28	19.29	18.97		
10	64QAM	25	0	18.54	18.59	18.64	18.34		
10	64QAM	25	12	18.62	18.58	18.62	18.33	19.6	
10	64QAM	25	25	18.61	18.56	18.61	18.31		
10	64QAM	50	0	18.64	18.62	18.54	18.35		
Channel				55265	55810	56170	56715		
Frequency (MHz)				3552.5	3607	3643	3697.5		
5	QPSK	1	0	20.61	20.84	20.80	20.60	21.4	
5	QPSK	1	12	20.56	20.79	20.75	20.51		
5	QPSK	1	24	20.51	20.72	20.73	20.43		
5	QPSK	12	0	20.60	20.61	20.58	20.35		
5	QPSK	12	7	20.63	20.63	20.61	20.36	21.4	
5	QPSK	12	13	20.59	20.62	20.59	20.33		
5	QPSK	25	0	20.59	20.61	20.57	20.32		
5	16QAM	1	0	20.56	20.55	20.63	20.36		
5	16QAM	1	12	20.64	20.70	20.64	20.41	21.4	
5	16QAM	1	24	20.55	20.62	20.56	20.29		
5	16QAM	12	0	19.59	19.63	19.59	19.37		
5	16QAM	12	7	19.62	19.60	19.62	19.34	20.6	
5	16QAM	12	13	19.53	19.59	19.57	19.28		
5	16QAM	25	0	19.59	19.64	19.52	19.37		
5	64QAM	1	0	19.35	19.40	19.37	19.11	20.6	
5	64QAM	1	12	19.35	19.39	19.33	19.08		
5	64QAM	1	24	19.33	19.35	19.34	19.07		
5	64QAM	12	0	18.61	18.69	18.65	18.37		
5	64QAM	12	7	18.64	18.64	18.66	18.37	19.6	
5	64QAM	12	13	18.64	18.64	18.61	18.36		
5	64QAM	25	0	18.65	18.67	18.64	18.38		



n5							
ANT 0							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq. 16900	Power Middle Ch. / Freq. 16700	Power High Ch. / Freq. 16500	Tune-up limit (dBm)
Channel				834	836.5	839	
Frequency (MHz)							
20	PI/2 BPSK	1	1	23.55	23.56	23.48	25.0
20	PI/2 BPSK	1	53	23.48	23.42	23.49	
20	PI/2 BPSK	1	104	23.37	23.35	23.05	
20	PI/2 BPSK	50	0	23.66	22.90	22.98	25.0
20	PI/2 BPSK	50	28	23.54	23.55	23.54	
20	PI/2 BPSK	50	56	22.93	22.90	22.95	
20	PI/2 BPSK	100	0	23.04	22.98	23.12	24.5
20	QPSK	1	1	23.46	23.37	23.41	25.0
20	QPSK	1	53	23.39	23.44	23.51	
20	QPSK	1	104	23.36	23.22	23.00	
20	QPSK	50	0	22.24	22.20	22.32	25.0
20	QPSK	50	28	23.44	23.39	23.41	
20	QPSK	50	56	22.30	22.28	22.22	
20	QPSK	100	0	22.21	22.34	22.39	24.0
20	16QAM	1	1	22.58	22.49	22.52	24.0
20	16QAM	1	53	22.51	22.56	22.60	
20	16QAM	1	104	22.48	22.41	22.18	
20	16QAM	50	0	21.37	21.36	21.45	24.0
20	16QAM	50	28	22.35	22.32	22.31	
20	16QAM	50	56	21.48	21.45	21.39	
20	16QAM	100	0	21.42	21.43	21.58	23.0
20	64QAM	1	1	20.96	20.84	20.87	22.5
20	64QAM	1	53	20.98	20.95	21.00	
20	64QAM	1	104	20.85	20.84	20.78	
20	64QAM	50	0	20.82	20.76	20.80	22.5
20	64QAM	50	28	20.82	20.74	22.34	
20	64QAM	50	56	20.82	20.79	20.75	
20	64QAM	100	0	20.79	20.78	20.95	22.5
20	256QAM	1	1	18.92	18.84	18.83	20.5
20	256QAM	1	53	18.83	18.89	18.93	
20	256QAM	1	104	18.96	18.92	18.92	
20	256QAM	50	0	19.00	19.04	19.08	20.5
20	256QAM	50	28	19.08	19.07	19.04	
20	256QAM	50	56	19.08	19.11	19.09	
20	256QAM	100	0	19.03	19.12	19.10	20.5
Channel				166300	167300	168300	
Frequency (MHz)				831.5	835.5	841.5	
15	PI/2 BPSK	1	1	23.40	23.46	23.48	25.0
Channel				165800	167300	168800	
Frequency (MHz)				829	836.5	844	
10	PI/2 BPSK	1	1	23.33	23.36	23.38	25.0
Channel				165300	167300	168300	
Frequency (MHz)				826.5	836.5	846.5	
5	PI/2 BPSK	1	1	23.36	23.41	23.40	25.0



n5									
ANT 1									
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq. 165800	Power Middle Ch. / Freq. 167300	Power High Ch. / Freq. 167900	Tune-up limit (dBm)		
Channel				834	836.5	839			
Frequency (MHz)									
20	PI/2 BPSK	1	1	23.35	23.41	23.32			
20	PI/2 BPSK	1	53	23.31	23.41	23.35	25.0		
20	PI/2 BPSK	1	104	23.02	23.09	23.00			
20	PI/2 BPSK	50	0	22.79	22.81	22.73			
20	PI/2 BPSK	50	28	23.39	23.46	23.41	25.0		
20	PI/2 BPSK	50	56	22.80	22.88	22.79			
20	PI/2 BPSK	100	0	22.88	22.97	22.90	24.5		
20	QPSK	1	1	23.30	23.38	23.38			
20	QPSK	1	53	23.28	23.35	23.32	25.0		
20	QPSK	1	104	22.95	23.02	22.97			
20	QPSK	50	0	22.08	22.13	22.09			
20	QPSK	50	28	23.29	23.33	23.31	25.0		
20	QPSK	50	56	22.17	22.18	22.16			
20	QPSK	100	0	22.17	22.23	22.20	24.0		
20	16QAM	1	1	22.46	22.47	22.42			
20	16QAM	1	53	22.23	22.33	22.25	24.0		
20	16QAM	1	104	22.15	22.17	22.09			
20	16QAM	50	0	21.22	21.30	21.28			
20	16QAM	50	28	22.07	22.12	22.08	24.0		
20	16QAM	50	56	21.27	21.30	21.25			
20	16QAM	100	0	21.40	21.41	21.35	23.0		
20	64QAM	1	1	20.98	21.05	20.99			
20	64QAM	1	53	20.92	20.97	20.92	22.5		
20	64QAM	1	104	20.85	20.88	20.81			
20	64QAM	50	0	20.66	20.72	20.67			
20	64QAM	50	28	20.62	20.70	20.67	22.5		
20	64QAM	50	56	20.76	20.79	20.77			
20	64QAM	100	0	20.74	20.76	20.73	22.5		
20	256QAM	1	1	18.99	19.04	19.01			
20	256QAM	1	53	18.98	19.08	19.06	20.5		
20	256QAM	1	104	18.94	19.01	19.01			
20	256QAM	50	0	18.94	19.00	18.90			
20	256QAM	50	28	18.97	19.01	18.96	20.5		
20	256QAM	50	56	19.12	19.18	19.11			
20	256QAM	100	0	19.04	19.05	19.02	20.5		
Channel				165800	167300	168300	Tune-up limit (dBm)		
Frequency (MHz)				831.5	835.5	841.5			
15	PI/2 BPSK	1	1	23.33	23.34	23.34	25.0		
Channel				165800	167300	168800	Tune-up limit (dBm)		
Frequency (MHz)				829	836.5	844			
10	PI/2 BPSK	1	1	23.32	23.31	23.37	25.0		
Channel				165300	167300	168300	Tune-up limit (dBm)		
Frequency (MHz)				826.5	836.5	846.5			
5	PI/2 BPSK	1	1	23.30	23.35	23.31	25.0		



n5							
ANT 1							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq. 165800	Power Middle Ch. / Freq. 167300	Power High Ch. / Freq. 167900	Tune-up limit (dBm)
Channel				834	836.5	839	
Frequency (MHz)							
20	PI/2 BPSK	1	1	23.34	23.24	23.21	24.9
20	PI/2 BPSK	1	53	23.28	23.29	23.20	
20	PI/2 BPSK	1	104	23.16	23.18	23.03	
20	PI/2 BPSK	50	0	23.16	23.12	23.15	24.9
20	PI/2 BPSK	50	28	23.29	23.31	23.30	
20	PI/2 BPSK	50	56	23.15	23.12	23.05	
20	PI/2 BPSK	100	0	23.16	23.30	23.21	24.9
20	QPSK	1	1	23.21	23.22	23.08	24.9
20	QPSK	1	53	23.21	23.26	23.26	
20	QPSK	1	104	23.14	23.05	23.04	
20	QPSK	50	0	22.50	22.40	22.42	24.9
20	QPSK	50	28	23.19	23.18	23.20	
20	QPSK	50	56	22.47	22.44	22.38	
20	QPSK	100	0	22.50	22.46	22.63	23.9
20	16QAM	1	1	22.55	22.50	22.42	23.9
20	16QAM	1	53	22.44	22.49	22.41	
20	16QAM	1	104	22.37	22.33	22.27	
20	16QAM	50	0	21.57	21.49	21.53	23.9
20	16QAM	50	28	22.40	22.34	22.45	
20	16QAM	50	56	21.58	21.53	21.54	
20	16QAM	100	0	21.68	21.63	21.70	22.9
20	64QAM	1	1	21.09	21.08	20.99	22.4
20	64QAM	1	53	21.09	21.16	21.07	
20	64QAM	1	104	20.96	20.93	20.92	
20	64QAM	50	0	21.01	20.97	20.98	22.4
20	64QAM	50	28	21.00	20.97	21.04	
20	64QAM	50	56	21.03	20.97	20.95	
20	64QAM	100	0	21.10	21.07	21.20	22.4
20	256QAM	1	1	19.30	19.29	19.24	20.4
20	256QAM	1	53	19.31	19.22	19.28	
20	256QAM	1	104	19.30	19.19	19.18	
20	256QAM	50	0	19.31	19.21	19.27	20.4
20	256QAM	50	28	19.22	19.24	19.27	
20	256QAM	50	56	19.27	19.36	19.33	
20	256QAM	100	0	19.27	19.35	19.38	20.4
Channel				165800	167300	168300	
Frequency (MHz)				831.5	835.5	841.5	
15	PI/2 BPSK	1	1	23.38	23.30	23.29	24.9
Channel				165800	167300	168800	
Frequency (MHz)				829	836.5	844	
10	PI/2 BPSK	1	1	23.18	23.15	23.16	24.9
Channel				165300	167300	168300	
Frequency (MHz)				826.5	836.5	846.5	
5	PI/2 BPSK	1	1	23.25	23.18	23.26	24.9



n5							
ANT 1							
BW [MHz]	Modulation	RB Size	RB Offset	Power Low Ch. / Freq. 165800	Power Middle Ch. / Freq. 167300	Power High Ch. / Freq. 167900	Tune-up limit (dBm)
Channel				834	836.5	839	
Frequency (MHz)							
20	PI/2 BPSK	1	1	23.34	23.24	23.21	24.1
20	PI/2 BPSK	1	53	23.28	23.29	23.20	
20	PI/2 BPSK	1	104	23.16	23.18	23.03	
20	PI/2 BPSK	50	0	23.16	23.12	23.15	24.1
20	PI/2 BPSK	50	28	23.29	23.31	23.30	
20	PI/2 BPSK	50	56	23.15	23.12	23.05	
20	PI/2 BPSK	100	0	23.16	23.30	23.21	24.1
20	QPSK	1	1	23.21	23.22	23.08	24.1
20	QPSK	1	53	23.21	23.26	23.26	
20	QPSK	1	104	23.14	23.05	23.04	
20	QPSK	50	0	22.50	22.40	22.42	24.1
20	QPSK	50	28	23.19	23.18	23.20	
20	QPSK	50	56	22.47	22.44	22.38	
20	QPSK	100	0	22.50	22.46	22.63	23.1
20	16QAM	1	1	22.55	22.50	22.42	23.1
20	16QAM	1	53	22.44	22.49	22.41	
20	16QAM	1	104	22.37	22.33	22.27	
20	16QAM	50	0	21.57	21.49	21.53	23.1
20	16QAM	50	28	22.40	22.34	22.45	
20	16QAM	50	56	21.58	21.53	21.54	
20	16QAM	100	0	21.68	21.63	21.70	22.1
20	64QAM	1	1	21.09	21.08	20.99	21.6
20	64QAM	1	53	21.09	21.16	21.07	
20	64QAM	1	104	20.96	20.93	20.92	
20	64QAM	50	0	21.01	20.97	20.98	21.6
20	64QAM	50	28	21.00	20.97	21.04	
20	64QAM	50	56	21.03	20.97	20.95	
20	64QAM	100	0	21.10	21.07	21.20	21.6
20	256QAM	1	1	19.30	19.29	19.24	19.6
20	256QAM	1	53	19.31	19.22	19.28	
20	256QAM	1	104	19.30	19.19	19.18	
20	256QAM	50	0	19.31	19.21	19.27	19.6
20	256QAM	50	28	19.22	19.24	19.27	
20	256QAM	50	56	19.27	19.36	19.33	
20	256QAM	100	0	19.27	19.35	19.38	19.6
Channel				165800	167300	168300	
Frequency (MHz)				831.5	835.5	841.5	
15	PI/2 BPSK	1	1	23.38	23.30	23.29	24.1
Channel				165800	167300	168800	
Frequency (MHz)				829	836.5	844	
10	PI/2 BPSK	1	1	23.18	23.15	23.16	24.1
Channel				165300	167300	168300	
Frequency (MHz)				826.5	836.5	846.5	
5	PI/2 BPSK	1	1	23.25	23.18	23.26	24.1



Transmit Antenna				Ant 4			Ant 3			Ant 4+3(4)		Ant 4+3(3)		Ant 4+3		
Mode	Channel	Frequency (MHz)	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Duty Cycle %	
2.4GHz WLAN	802.11b 1Mbps	1	2412	19.30	19.50	98.72	19.10	19.50	98.92	19.40	19.50	19.10	19.50	22.26	22.5	98.92
		6	2437	19.30	19.50		19.40	19.50		19.40	19.50	22.41	22.5			
		11	2462	19.10	19.50		19.40	19.50		19.40	19.50	22.31	22.5			
	802.11g 6Mbps	1	2412	17.10	17.50	97.87	17.10	17.50	98.35	17.20	17.50	17.10	17.50	20.16	20.5	98.35
		6	2437	19.20	19.50		19.20	19.50		19.20	19.50	22.26	22.5			
		11	2462	17.80	18.00		17.90	18.00		17.90	18.00	20.91	21.0			
	802.11n-HT20 MCS0	1	2412	16.40	16.50	97.97	16.40	16.50	97.72	16.50	16.50	16.40	16.50	19.46	19.5	97.72
		6	2437	19.30	19.50		19.40	19.50		19.40	19.50	22.41	22.5			
	802.11ac-VHT20 MCS0	1	2412	16.30	16.50	97.48	16.30	16.50	97.73	16.40	16.50	16.30	16.50	19.36	19.5	97.73
		6	2437	19.20	19.50		19.30	19.50		19.30	19.50	22.31	22.5			
		11	2462	16.30	16.50		16.40	16.50		16.30	16.50	16.40	16.50	19.36	19.5	

Transmit Antenna				Ant 4			Ant 3			Ant 4+3(4)		Ant 4+3(3)		Ant 4+3		
Mode	Channel	Frequency (MHz)	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Duty Cycle %	
5.2GHz WLAN	802.11a 6Mbps	36	5180	17.30	17.50	97.87	16.90	17.50	97.87	17.30	17.50	17.00	17.50	20.16	20.5	97.87
		40	5200	17.20	17.50		17.00	17.50		17.20	17.50	20.16	20.5			
		44	5220	17.20	17.50		17.00	17.50		17.20	17.50	20.16	20.5			
		48	5240	17.30	17.50		16.60	17.50		17.30	17.50	20.02	20.5			
	802.11n-HT20 MCS0	36	5180	17.40	17.50	97.47	17.20	17.50	97.47	17.40	17.50	17.30	17.50	20.36	20.5	97.72
		40	5200	17.40	17.50		17.20	17.50		17.40	17.50	20.36	20.5			
		44	5220	17.40	17.50		17.30	17.50		17.40	17.50	20.41	20.5			
	802.11n-HT40 MCS0	48	5240	17.40	17.50	95.96	16.90	17.50	95.96	17.40	17.50	17.00	17.50	20.21	20.5	95.93
		38	5190	13.50	13.50		13.00	13.50		13.50	13.10	13.50	16.31	16.5		
		46	5230	17.40	17.50		17.00	17.50		17.40	17.50	20.26	20.5			
	802.11ac-VHT20 MCS0	36	5180	17.30	17.50	97.98	17.10	17.50	97.98	17.30	17.50	17.20	17.50	20.26	20.5	97.49
		40	5200	17.30	17.50		17.10	17.50		17.30	17.50	20.26	20.5			
		44	5220	17.30	17.50		17.20	17.50		17.30	17.50	20.31	20.5			
	802.11ac-VHT40 MCS0	48	5240	17.30	17.50	96.00	16.80	17.50	96.00	17.30	17.50	16.90	17.50	20.11	20.5	95.74
		38	5190	13.40	13.50		12.90	13.50		13.40	13.50	13.00	13.50	16.21	16.5	
		46	5230	17.30	17.50		16.90	17.50		17.30	17.50	17.00	17.50	20.16	20.5	
	802.11ac-VHT80 MCS0	42	5210	12.80	13.00	92.00	12.80	13.00	92.00	12.80	13.00	12.90	13.00	15.86	16.0	92.00

Transmit Antenna				Ant 4			Ant 3			Ant 4+3(4)		Ant 4+3(3)		Ant 4+3		
Mode	Channel	Frequency (MHz)	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm) 1+2(1)	Tune-Up Limit 1+2(1)	Average power (dBm) 1+2(2)	Tune-Up Limit 1+2(2)	Average power (dBm) 1+2	Tune-Up Limit 1+2	Duty Cycle %	
5.3GHz WLAN	802.11a 6Mbps	52	5260	17.40	17.50	97.87	16.50	17.50	97.87	17.40	17.50	16.60	17.50	20.03	20.5	97.87
		56	5280	17.30	17.50		16.60	17.50		17.30	17.50	16.70	17.50	20.03	20.5	
		60	5300	17.40	17.50		16.70	17.50		17.40	17.50	16.80	17.50	20.12	20.5	
		64	5320	17.40	17.50		16.80	17.50		17.40	17.50	16.90	17.50	20.17	20.5	
	802.11n-HT20 MCS0	52	5260	17.40	17.50	97.47	16.70	17.50	97.47	17.40	17.50	16.80	17.50	20.12	20.5	97.72
		56	5280	17.40	17.50		16.70	17.50		17.40	17.50	16.80	17.50	20.12	20.5	
		60	5300	17.40	17.50		16.70	17.50		17.40	17.50	16.80	17.50	20.12	20.5	
	802.11n-HT40 MCS0	64	5320	17.40	17.50	95.96	16.80	17.50	95.96	17.40	17.50	16.90	17.50	20.17	20.5	95.93
		54	5270	17.40	17.50		16.90	17.50		17.40	17.50	17.00	17.50	20.21	20.5	
	802.11ac-VHT20 MCS0	62	5310	13.80	14.00	97.98	13.50	14.00	97.98	13.80	14.00	13.60	14.00	16.71	17.0	97.49
		52	5260	17.30	17.50		16.60	17.50		17.30	17.50	16.70	17.50	20.02	20.5	
		56	5280	17.30	17.50		16.60	17.50		17.30	17.50	16.70	17.50	20.02	20.5	
	802.11ac-VHT40 MCS0	60	5300	17.30	17.50	96.00	16.60	17.50	96.00	17.30	17.50	16.80	17.50	20.07	20.5	95.74
		64	5320	17.30	17.50		16.70	17.50		17.30	17.50	16.80	17.50	20.07	20.5	
	802.11ac-VHT80 MCS0	54	5270	17.30	17.50	96.00	16.80	17.50	96.00	17.30	17.50	16.90	17.50	20.11	20.5	95.74
		62	5310	13.70	14.00		13.40	14.00		13.70	14.00	13.50	14.00	16.61	17.0	
		58	5290	12.00	12.00	92.00	11.70	12.00	92.00	12.00	12.00	11.80	12.00	14.91	15.0	92.00



Transmit Antenna				Ant 4			Ant 3			Ant 4+3(4)		Ant 4+3(3)		Ant 4+3		
Mode	Channel	Frequency (MHz)	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Duty Cycle %	
5.5GHz WLAN	802.11a 6Mbps	100	5500	17.40	17.50	97.87	16.90	17.50	97.87	17.40	17.50	17.00	17.50	20.21	20.5	
		116	5580	17.40	17.50		17.30	17.50		17.40	17.50	17.40	17.50	20.41	20.5	
		124	5620	17.30	17.50		17.20	17.50		17.30	17.50	17.30	17.50	20.31	20.5	
		132	5660	17.30	17.50		16.40	17.50		17.30	17.50	16.70	17.50	20.03	20.5	
		140	5700	17.40	17.50		16.50	17.50		17.40	17.50	16.60	17.50	20.03	20.5	
	802.11n-HT20 MCS0	144	5720	17.40	17.50	97.47	16.70	17.50	97.47	17.40	17.50	16.80	17.50	20.12	20.5	
		100	5500	17.30	17.50		17.00	17.50		17.30	17.50	17.10	17.50	20.21	20.5	
		116	5580	17.40	17.50		17.30	17.50		17.40	17.50	17.40	17.50	20.41	20.5	
		124	5620	17.30	17.50		17.30	17.50		17.30	17.50	17.30	17.50	20.31	20.5	
		132	5660	17.90	18.00		16.90	18.00		17.90	18.00	17.00	18.00	20.48	21.0	
	802.11n-HT40 MCS0	140	5700	17.90	18.00	95.96	16.90	18.00	95.96	17.90	18.00	17.10	18.00	20.53	21.0	
		144	5720	17.40	17.50		16.80	17.50		17.40	17.50	16.90	17.50	20.17	20.5	
		102	5510	15.70	16.00		15.40	16.00		15.70	16.00	15.50	16.00	18.61	19.0	
		110	5550	17.40	17.50		16.90	17.50		17.40	17.50	17.00	17.50	20.21	20.5	
		126	5630	17.30	17.50		16.70	17.50		17.30	17.50	16.90	17.50	20.11	20.5	
	802.11ac-VHT20 MCS0	134	5670	17.40	17.50	97.98	16.70	17.50	97.98	17.40	17.50	16.80	17.50	20.12	20.5	
		142	5710	17.40	17.50		16.70	17.50		17.40	17.50	16.80	17.50	20.12	20.5	
		100	5500	17.20	17.50		16.90	17.50		17.20	17.50	17.00	17.50	20.11	20.5	
		116	5580	17.30	17.50		17.20	17.50		17.30	17.50	17.30	17.50	20.31	20.5	
		124	5620	17.20	17.50		17.20	17.50		17.20	17.50	17.20	17.50	20.21	20.5	
802.11ac-VHT40 MCS0	132	5660	17.80	18.00	96.00	16.80	18.00	96.00	17.80	18.00	16.90	18.00	20.38	21.0		
	140	5700	17.80	18.00		16.80	18.00		17.80	18.00	16.90	18.00	20.38	21.0		
	144	5720	17.30	17.50		16.70	17.50		17.30	17.50	16.80	17.50	20.07	20.5		
	102	5510	15.60	16.00		15.30	16.00		15.60	16.00	15.40	16.00	18.51	19.0		
	110	5550	17.30	17.50		16.80	17.50		17.30	17.50	16.90	17.50	20.11	20.5		
802.11ac-VHT80 MCS0	126	5630	17.20	17.50	92.00	16.60	17.50	92.00	17.20	17.50	16.80	17.50	20.01	20.5		
	134	5670	17.30	17.50		16.60	17.50		17.30	17.50	16.70	17.50	20.02	20.5		
	142	5710	17.30	17.50		16.60	17.50		17.30	17.50	16.70	17.50	20.02	20.5		
	106	5530	12.00	12.50		12.10	12.50		12.00	12.50	12.20	12.50	15.11	15.5		
	122	5610	16.90	17.00		16.60	17.00		16.90	17.00	16.70	17.00	19.81	20.0		
	138	5690	16.90	17.00	16.00	17.00	16.90	17.00	16.10	17.00	19.53	20.0				

Transmit Antenna				Ant 4			Ant 3			Ant 4+3(4)		Ant 4+3(3)		Ant 4+3		
Mode	Channel	Frequency (MHz)	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Duty Cycle %	
5.8GHz WLAN	802.11a 6Mbps	149	5745	18.30	18.50	97.87	17.60	18.50	97.87	18.30	18.50	17.70	18.50	21.02	21.5	
		157	5785	18.40	18.50		17.80	18.50		18.40	18.50	17.90	18.50	21.17	21.5	
		165	5825	18.40	18.50		17.50	18.50		18.40	18.50	17.60	18.50	21.03	21.5	
	802.11n-HT20 MCS0	149	5745	18.30	18.50	97.47	17.80	18.50	97.47	18.30	18.50	17.90	18.50	21.11	21.5	
		157	5785	18.40	18.50		17.70	18.50		18.40	18.50	17.80	18.50	21.12	21.5	
		165	5825	18.40	18.50		17.70	18.50		18.40	18.50	17.80	18.50	21.12	21.5	
	802.11n-HT40 MCS0	151	5755	17.40	17.50	95.96	17.00	17.50	95.96	17.40	17.50	17.10	17.50	20.26	20.5	
		159	5795	17.40	17.50		16.70	17.50		17.40	17.50	16.80	17.50	20.12	20.5	
	802.11ac-VHT20 MCS0	149	5745	18.20	18.50	97.98	17.70	18.50	97.98	18.20	18.50	17.80	18.50	21.01	21.5	
		157	5785	18.30	18.50		17.60	18.50		18.30	18.50	17.70	18.50	21.02	21.5	
	802.11ac-VHT40 MCS0	165	5825	18.30	18.50	96.00	17.60	18.50	96.00	18.30	18.50	17.70	18.50	21.02	21.5	
		151	5755	17.30	17.50		16.90	17.50		17.30	17.50	17.00	17.50	20.16	20.5	
	802.11ac-VHT80 MCS0	159	5795	17.30	17.50	92.00	16.60	17.50	92.00	17.30	17.50	16.70	17.50	20.02	20.5	
		155	5775	16.90	17.00		16.10	17.00		16.90	17.00	16.20	17.00	19.57	20.0	



Transmit Antenna				Ant 4			Ant 3			Ant 4+3(4)		Ant 4+3(3)		Ant 4+3		
Mode	Channel	Frequency (MHz)	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Duty Cycle %	
2.4GHz WLAN	802.11b 1Mbps	1	2412	19.30	19.50	98.72	19.10	19.50	98.92	19.40	19.50	19.10	19.50	22.26	22.5	98.92
		6	2437	19.30	19.50		19.40	19.50		19.40	19.50	22.41	22.5			
		11	2462	19.10	19.50		19.40	19.50		19.40	19.50	22.31	22.5			
	802.11g 6Mbps	1	2412	17.10	17.50	97.87	17.10	17.50	98.35	17.20	17.50	17.10	17.50	20.16	20.5	98.35
		6	2437	19.20	19.50		19.20	19.50		19.20	19.50	22.26	22.5			
		11	2462	17.80	18.00		17.90	18.00		17.90	18.00	20.91	21.0			
	802.11n-HT20 MCS0	1	2412	16.40	16.50	97.97	16.40	16.50	97.72	16.50	16.50	16.40	16.50	19.46	19.5	97.72
		6	2437	19.30	19.50		19.40	19.50		19.40	19.50	22.41	22.5			
	802.11ac-VHT20 MCS0	1	2412	16.30	16.50	97.48	16.30	16.50	97.73	16.40	16.50	16.30	16.50	19.36	19.5	97.73
		6	2437	19.20	19.50		19.30	19.50		19.30	19.50	22.31	22.5			
		11	2462	16.30	16.50		16.40	16.50		16.30	16.50	16.40	16.50	19.36	19.5	

Transmit Antenna				Ant 4			Ant 3			Ant 4+3(4)		Ant 4+3(3)		Ant 4+3		
Mode	Channel	Frequency (MHz)	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Duty Cycle %	
5.2GHz WLAN	802.11a 6Mbps	36	5180	17.30	17.50	97.87	16.90	17.50	97.87	17.30	17.50	17.00	17.50	20.16	20.5	97.87
		40	5200	17.20	17.50		17.20	17.50		17.10	17.50	20.16	20.5			
		44	5220	17.20	17.50		17.20	17.50		17.10	17.50	20.16	20.5			
		48	5240	17.30	17.50		16.60	17.50		17.30	17.50	20.02	20.5			
	802.11n-HT20 MCS0	36	5180	17.40	17.50	97.72	17.20	17.50	97.47	17.40	17.50	17.30	17.50	20.36	20.5	97.72
		40	5200	17.40	17.50		17.20	17.50		17.40	17.50	20.36	20.5			
		44	5220	17.40	17.50		17.30	17.50		17.40	17.50	20.41	20.5			
	802.11n-HT40 MCS0	48	5240	17.40	17.50	95.93	16.90	17.50	95.96	17.40	17.50	17.00	17.50	20.21	20.5	95.93
		38	5190	13.50	13.50		13.00	13.50		13.10	13.50	16.31	16.5			
		46	5230	17.40	17.50		17.00	17.50		17.10	17.50	20.26	20.5			
	802.11ac-VHT20 MCS0	36	5180	17.30	17.50	97.49	17.10	17.50	97.98	17.30	17.50	17.20	17.50	20.26	20.5	97.49
		40	5200	17.30	17.50		17.10	17.50		17.30	17.50	20.26	20.5			
		44	5220	17.30	17.50		17.20	17.50		17.30	17.50	20.31	20.5			
	802.11ac-VHT40 MCS0	48	5240	17.30	17.50	95.74	16.80	17.50	96.00	17.30	17.50	16.90	17.50	20.11	20.5	95.74
		38	5190	13.40	13.50		12.90	13.50		13.40	13.50	13.00	13.50	16.21	16.5	
		46	5230	17.30	17.50		16.90	17.50		17.30	17.50	17.00	17.50	20.16	20.5	
	802.11ac-VHT80 MCS0	42	5210	12.80	13.00	92.00	12.80	13.00	92.00	12.80	13.00	12.90	13.00	15.86	16.0	92.00

Transmit Antenna				Ant 4			Ant 3			Ant 4+3(4)		Ant 4+3(3)		Ant 4+3		
Mode	Channel	Frequency (MHz)	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm) 1+2(1)	Tune-Up Limit 1+2(1)	Average power (dBm) 1+2(2)	Tune-Up Limit 1+2(2)	Average power (dBm) 1+2	Tune-Up Limit 1+2	Duty Cycle %	
5.3GHz WLAN	802.11a 6Mbps	52	5260	17.40	17.50	97.87	16.50	17.50	97.87	17.40	17.50	16.60	17.50	20.03	20.5	97.87
		56	5280	17.30	17.50		16.60	17.50		17.30	17.50	16.70	17.50	20.03	20.5	
		60	5300	17.40	17.50		16.70	17.50		17.40	17.50	16.80	17.50	20.12	20.5	
		64	5320	17.40	17.50		16.80	17.50		17.40	17.50	16.90	17.50	20.17	20.5	
	802.11n-HT20 MCS0	52	5260	17.40	17.50	97.72	16.70	17.50	97.47	17.40	17.50	16.80	17.50	20.12	20.5	97.72
		56	5280	17.40	17.50		16.70	17.50		17.40	17.50	16.80	17.50	20.12	20.5	
		60	5300	17.40	17.50		16.70	17.50		17.40	17.50	16.80	17.50	20.12	20.5	
	802.11n-HT40 MCS0	64	5320	17.40	17.50	95.93	16.80	17.50	95.96	17.40	17.50	16.90	17.50	20.17	20.5	95.93
		54	5270	17.40	17.50		16.90	17.50		17.40	17.50	17.00	17.50	20.21	20.5	
		62	5310	13.80	14.00		13.50	14.00		13.80	14.00	13.60	14.00	16.71	17.0	
	802.11ac-VHT20 MCS0	52	5260	17.30	17.50	97.49	16.60	17.50	97.98	17.30	17.50	16.70	17.50	20.02	20.5	97.49
		56	5280	17.30	17.50		16.60	17.50		17.30	17.50	16.70	17.50	20.02	20.5	
		60	5300	17.30	17.50		16.60	17.50		17.30	17.50	16.70	17.50	20.02	20.5	
	802.11ac-VHT40 MCS0	64	5320	17.30	17.50	95.74	16.70	17.50	96.00	17.30	17.50	16.80	17.50	20.07	20.5	95.74
		54	5270	17.30	17.50		16.80	17.50		17.30	17.50	16.90	17.50	20.11	20.5	
		62	5310	13.70	14.00		13.40	14.00		13.70	14.00	13.50	14.00	16.61	17.0	
	802.11ac-VHT80 MCS0	58	5290	12.00	12.00	92.00	11.70	12.00	92.00	12.00	12.00	11.80	12.00	14.91	15.0	92.00



Transmit Antenna				Ant 4			Ant 3			Ant 4+3(4)		Ant 4+3(3)		Ant 4+3		
Mode	Channel	Frequency (MHz)	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Duty Cycle %	
5.5GHz WLAN	802.11a 6Mbps	100	5500	17.10	17.50	97.83	13.40	13.50	97.87	17.10	17.50	15.00	16.00	19.19	19.8	
		116	5580	17.40	17.50		13.30	13.50		17.40	17.50	15.40	16.00	19.52	19.8	
		124	5620	17.30	17.50		13.30	13.50		17.30	17.50	15.30	16.00	19.42	19.8	
		132	5660	16.90	17.50		13.40	13.50		16.90	17.50	15.10	16.00	19.10	19.8	
		140	5700	16.90	17.50		13.40	13.50		16.90	17.50	15.40	16.00	19.22	19.8	
	802.11n-HT20 MCS0	144	5720	17.10	17.50	97.69	13.40	13.50	97.47	17.10	17.50	15.40	16.00	19.34	19.8	
		100	5500	17.40	17.50		13.30	13.50		17.40	17.50	15.30	16.00	19.49	19.8	
		116	5580	17.20	17.50		13.40	13.50		17.20	17.50	15.30	16.00	19.36	19.8	
		124	5620	17.10	17.50		13.40	13.50		17.10	17.50	15.10	16.00	19.22	19.8	
		132	5660	17.30	18.00		13.30	13.50		17.30	18.00	15.40	16.00	19.46	20.1	
	802.11n-HT40 MCS0	140	5700	17.20	18.00	95.34	13.40	13.50	95.96	17.20	18.00	15.20	16.00	19.32	20.1	
		144	5720	17.10	17.50		13.40	13.50		17.10	17.50	15.40	16.00	19.34	19.8	
		102	5510	15.30	16.00		13.30	13.50		15.30	16.00	15.20	16.00	18.26	19.0	
		110	5550	17.20	17.50		13.30	13.50		17.20	17.50	15.30	16.00	19.36	19.8	
		126	5630	17.10	17.50		13.30	13.50		17.10	17.50	15.10	16.00	19.22	19.8	
	802.11ac-VHT20 MCS0	134	5670	17.10	17.50	97.69	13.40	13.50	97.98	17.10	17.50	15.20	16.00	19.26	19.8	
		142	5710	17.40	17.50		13.40	13.50		17.40	17.50	15.20	16.00	19.45	19.8	
		100	5500	17.30	17.50		13.20	13.50		17.30	17.50	15.20	16.00	19.39	19.8	
		116	5580	17.10	17.50		13.30	13.50		17.10	17.50	15.20	16.00	19.26	19.8	
	802.11ac-VHT40 MCS0	124	5620	17.00	17.50	95.41	13.30	13.50	96.00	17.00	17.50	15.00	16.00	19.12	19.8	
132		5660	17.00	18.00	13.20		13.50	17.00		18.00	15.30	16.00	19.24	20.1		
140		5700	17.00	18.00	13.30		13.50	17.00		18.00	15.10	16.00	19.16	20.1		
144		5720	17.00	17.50	13.30		13.50	17.00		17.50	15.30	16.00	19.24	19.8		
802.11ac-VHT80 MCS0	102	5510	15.20	16.00	91.87	13.20	13.50	92.00	15.20	16.00	15.10	16.00	18.16	19.0		
	110	5550	17.10	17.50		13.20	13.50		17.10	17.50	15.20	16.00	19.26	19.8		
	126	5630	17.00	17.50		13.20	13.50		17.00	17.50	15.00	16.00	19.12	19.8		
	134	5670	17.00	17.50		13.30	13.50		17.00	17.50	15.10	16.00	19.16	19.8		
802.11ac-VHT80 MCS0	142	5710	17.30	17.50	91.87	13.30	13.50	92.00	17.30	17.50	15.10	16.00	19.35	19.8		
	106	5530	12.00	12.50		12.40	12.50		12.00	12.50	12.20	12.50	15.11	15.5		
	122	5610	16.80	17.00		13.10	13.50		16.80	17.00	15.20	16.00	19.08	19.5		
	138	5690	16.90	17.00		13.10	13.50		16.90	17.00	15.10	16.00	19.10	19.5		

Transmit Antenna				Ant 4			Ant 3			Ant 4+3(4)		Ant 4+3(3)		Ant 4+3		
Mode	Channel	Frequency (MHz)	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Duty Cycle %	
5.8GHz WLAN	802.11a 6Mbps	149	5745	18.30	18.50	97.83	13.40	13.50	97.87	18.30	18.50	15.60	16.00	20.17	20.4	
		157	5785	18.40	18.50		13.40	13.50		18.40	18.50	15.80	16.00	20.30	20.4	
		165	5825	18.20	18.50		13.20	13.50		18.20	18.50	15.80	16.00	20.17	20.4	
	802.11n-HT20 MCS0	149	5745	18.10	18.50	97.69	13.40	13.50	97.47	18.10	18.50	15.90	16.00	20.15	20.4	
		157	5785	18.20	18.50		13.30	13.50		18.20	18.50	15.60	16.00	20.10	20.4	
		165	5825	18.10	18.50		13.40	13.50		18.10	18.50	15.60	16.00	20.04	20.4	
	802.11n-HT40 MCS0	151	5755	17.40	17.50	95.34	13.30	13.50	95.96	17.40	17.50	15.90	16.00	19.72	19.8	
		159	5795	17.10	17.50		13.40	13.50		17.10	17.50	15.70	16.00	19.47	19.8	
	802.11ac-VHT20 MCS0	149	5745	18.00	18.50	97.69	13.30	13.50	97.98	18.00	18.50	15.80	16.00	20.05	20.4	
		157	5785	18.10	18.50		13.20	13.50		18.10	18.50	15.50	16.00	20.00	20.4	
	802.11ac-VHT40 MCS0	165	5825	18.00	18.50	95.41	13.30	13.50	96.00	18.00	18.50	15.50	16.00	19.94	20.4	
		151	5755	17.30	17.50		13.20	13.50		17.30	17.50	15.80	16.00	19.62	19.8	
	802.11ac-VHT80 MCS0	159	5795	17.00	17.50	91.87	13.30	13.50	92.00	17.00	17.50	15.60	16.00	19.37	19.8	
		155	5775	16.90	17.00		13.30	13.50		16.90	17.00	15.80	16.00	19.40	19.5	



Transmit Antenna				Ant 4			Ant 3			Ant 4+3(4)		Ant 4+3(3)		Ant 4+3		
Mode	Channel	Frequency (MHz)	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Duty Cycle %	
2.4GHz WLAN	802.11b 1Mbps	1	2412	11.90	12.00	98.72	14.90	15.00	98.92	13.70	14.00	14.90	15.00	17.35	17.5	98.92
		6	2437	11.90	12.00		14.70	15.00		13.60	14.00	14.70	15.00	17.20	17.5	
		11	2462	11.80	12.00		14.70	15.00		13.80	14.00	14.70	15.00	17.28	17.5	
	802.11g 6Mbps	1	2412	11.80	12.00	97.87	14.90	15.00	98.35	13.70	14.00	14.90	15.00	17.35	17.5	98.35
		6	2437	11.70	12.00		14.90	15.00		13.80	14.00	14.90	15.00	17.40	17.5	
		11	2462	11.70	12.00		14.90	15.00		13.60	14.00	14.90	15.00	17.31	17.5	
	802.11n-HT20 MCS0	1	2412	11.80	12.00	97.97	14.70	15.00	97.72	13.60	14.00	14.70	15.00	17.20	17.5	97.72
		6	2437	11.90	12.00		14.90	15.00		13.70	14.00	14.90	15.00	17.35	17.5	
		11	2462	11.90	12.00		14.70	15.00		13.90	14.00	14.70	15.00	17.33	17.5	
	802.11ac-VHT20 MCS0	1	2412	11.70	12.00	97.48	14.60	15.00	97.73	13.50	14.00	14.60	15.00	17.10	17.5	97.73
		6	2437	11.80	12.00		14.80	15.00		13.60	14.00	14.80	15.00	17.25	17.5	
		11	2462	11.80	12.00		14.60	15.00		13.80	14.00	14.60	15.00	17.23	17.5	

Transmit Antenna				Ant 4			Ant 3			Ant 4+3(4)		Ant 4+3(3)		Ant 4+3		
Mode	Channel	Frequency (MHz)	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Duty Cycle %	
5.2GHz WLAN	802.11a 6Mbps	36	5180	10.80	11.00	97.87	15.30	15.50	97.87	10.80	11.00	15.30	15.50	16.62	16.8	97.87
		40	5200	10.80	11.00		15.40	15.50		10.80	11.00	15.30	15.50	16.62	16.8	
		44	5220	10.90	11.00		15.40	15.50		10.90	11.00	15.40	15.50	16.72	16.8	
		48	5240	10.90	11.00		15.30	15.50		10.90	11.00	15.40	15.50	16.72	16.8	
	802.11n-HT20 MCS0	36	5180	10.80	11.00	97.72	15.40	15.50	97.47	10.80	11.00	15.20	15.50	16.55	16.8	97.72
		40	5200	10.80	11.00		15.30	15.50		10.80	11.00	15.20	15.50	16.55	16.8	
		44	5220	10.90	11.00		15.40	15.50		10.90	11.00	15.30	15.50	16.65	16.8	
		48	5240	10.80	11.00		15.30	15.50		10.80	11.00	15.30	15.50	16.62	16.8	
	802.11n-HT40 MCS0	38	5190	10.90	11.00	95.93	13.00	13.50	95.96	10.90	11.00	13.40	13.50	15.34	15.4	95.93
		46	5230	10.90	11.00		15.30	15.50		10.90	11.00	15.40	15.50	16.72	16.8	
	802.11ac-VHT20 MCS0	36	5180	10.70	11.00	97.49	15.30	15.50	97.98	10.70	11.00	15.10	15.50	16.45	16.8	97.49
		40	5200	10.70	11.00		15.20	15.50		10.70	11.00	15.10	15.50	16.45	16.8	
		44	5220	10.80	11.00		15.30	15.50		10.80	11.00	15.20	15.50	16.55	16.8	
		48	5240	10.70	11.00		15.20	15.50		10.70	11.00	15.20	15.50	16.52	16.8	
	802.11ac-VHT40 MCS0	38	5190	10.80	11.00	95.74	12.90	13.50	96.00	10.80	11.00	13.50	13.50	15.37	15.4	95.74
		46	5230	10.80	11.00		15.20	15.50		10.80	11.00	15.30	15.50	16.62	16.8	
	802.11ac-VHT80 MCS0	42	5210	10.80	11.00	92.00	12.80	13.00	92.00	10.80	11.00	12.30	13.00	14.62	15.1	92.00

Transmit Antenna				Ant 4			Ant 3			Ant 4+3(4)		Ant 4+3(3)		Ant 4+3		
Mode	Channel	Frequency (MHz)	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm) 1+2(1)	Tune-Up Limit 1+2(1)	Average power (dBm) 1+2(2)	Tune-Up Limit 1+2(2)	Average power (dBm) 1+2	Tune-Up Limit 1+2	Duty Cycle %	
5.3GHz WLAN	802.11a 6Mbps	52	5260	10.80	11.00	97.87	15.40	15.50	97.87	10.80	11.00	15.40	15.50	16.69	16.8	97.87
		56	5280	10.70	11.00		15.30	15.50		10.70	11.00	15.30	15.50	16.55	16.8	
		60	5300	10.80	11.00		15.30	15.50		10.80	11.00	15.20	15.50	16.55	16.8	
		64	5320	10.80	11.00		15.40	15.50		10.80	11.00	15.20	15.50	16.55	16.8	
	802.11n-HT20 MCS0	52	5260	10.70	11.00	97.72	15.40	15.50	97.47	10.70	11.00	15.40	15.50	16.67	16.8	97.72
		56	5280	10.60	11.00		15.30	15.50		10.60	11.00	15.30	15.50	16.57	16.8	
		60	5300	10.70	11.00		15.30	15.50		10.70	11.00	15.40	15.50	16.67	16.8	
		64	5320	10.70	11.00		15.40	15.50		10.70	11.00	15.30	15.50	16.59	16.8	
	802.11n-HT40 MCS0	54	5270	10.80	11.00	95.93	15.40	15.50	95.96	10.80	11.00	15.30	15.50	16.62	16.8	95.93
		62	5310	10.90	11.00		13.50	14.00		10.90	11.00	13.80	14.00	15.60	15.8	
	802.11ac-VHT20 MCS0	52	5260	10.60	11.00	97.49	15.30	15.50	97.98	10.60	11.00	15.30	15.50	16.57	16.8	97.49
		56	5280	10.50	11.00		15.20	15.50		10.50	11.00	15.20	15.50	16.47	16.8	
		60	5300	10.60	11.00		15.20	15.50		10.60	11.00	15.30	15.50	16.57	16.8	
		64	5320	10.60	11.00		15.30	15.50		10.60	11.00	15.20	15.50	16.49	16.8	
	802.11ac-VHT40 MCS0	54	5270	10.70	11.00	95.74	15.30	15.50	96.00	10.70	11.00	15.20	15.50	16.52	16.8	95.74
		62	5310	10.80	11.00		13.40	14.00		10.80	11.00	13.80	14.00	15.56	15.8	
	802.11ac-VHT80 MCS0	58	5290	10.90	11.00	92.00	11.70	12.00	92.00	10.90	11.00	11.90	12.00	14.44	14.5	92.00



Transmit Antenna				Ant 4			Ant 3			Ant 4+3(4)		Ant 4+3(3)		Ant 4+3		
Mode	Channel	Frequency (MHz)	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Duty Cycle %	
5.5GHz WLAN	802.11a 6Mbps	100	5500	12.90	13.00	97.87	11.90	12.00	97.87	12.90	13.00	11.90	12.00	15.44	15.5	97.87
		116	5580	12.80	13.00		11.80	12.00		12.80	13.00	11.90	12.00	15.38	15.5	
		124	5620	12.70	13.00		11.80	12.00		12.70	13.00	11.80	12.00	15.28	15.5	
		132	5660	12.70	13.00		11.70	12.00		12.70	13.00	11.90	12.00	15.33	15.5	
		140	5700	12.70	13.00		11.70	12.00		12.70	13.00	11.90	12.00	15.33	15.5	
	802.11n-HT20 MCS0	144	5720	12.90	13.00	97.72	11.80	12.00	97.47	12.90	13.00	11.90	12.00	15.44	15.5	97.72
		100	5500	12.70	13.00		11.80	12.00		12.70	13.00	11.90	12.00	15.33	15.5	
		116	5580	12.80	13.00		11.80	12.00		12.80	13.00	11.90	12.00	15.38	15.5	
		124	5620	12.80	13.00		11.70	12.00		12.80	13.00	11.90	12.00	15.38	15.5	
		132	5660	12.70	13.00		11.80	12.00		12.70	13.00	11.80	12.00	15.28	15.5	
	802.11n-HT40 MCS0	140	5700	12.80	13.00	95.93	11.90	12.00	95.96	12.80	13.00	11.90	12.00	15.38	15.5	95.93
		102	5510	12.80	13.00		11.80	12.00		12.80	13.00	11.90	12.00	15.38	15.5	
		110	5550	12.80	13.00		11.80	12.00		12.80	13.00	11.90	12.00	15.38	15.5	
		126	5630	12.80	13.00		11.80	12.00		12.80	13.00	11.70	12.00	15.28	15.5	
		134	5670	12.70	13.00		11.80	12.00		12.70	13.00	11.80	12.00	15.28	15.5	
	802.11ac-VHT20 MCS0	142	5710	12.90	13.00	97.49	11.80	12.00	97.98	12.90	13.00	11.80	12.00	15.40	15.5	97.49
		100	5500	12.60	13.00		11.70	12.00		12.60	13.00	11.80	12.00	15.23	15.5	
		116	5580	12.70	13.00		11.70	12.00		12.70	13.00	11.80	12.00	15.28	15.5	
		124	5620	12.70	13.00		11.60	12.00		12.70	13.00	11.80	12.00	15.28	15.5	
		132	5660	12.60	13.00		11.70	12.00		12.60	13.00	11.70	12.00	15.18	15.5	
802.11ac-VHT40 MCS0	140	5700	12.70	13.00	95.74	11.80	12.00	96.00	12.70	13.00	11.80	12.00	15.28	15.5	95.74	
	102	5510	12.70	13.00		11.70	12.00		12.70	13.00	11.80	12.00	15.28	15.5		
	110	5550	12.70	13.00		11.70	12.00		12.70	13.00	11.60	12.00	15.18	15.5		
	126	5630	12.70	13.00		11.70	12.00		12.70	13.00	11.60	12.00	15.18	15.5		
	134	5670	12.60	13.00		11.70	12.00		12.60	13.00	11.70	12.00	15.18	15.5		
802.11ac-VHT80 MCS0	142	5710	12.80	13.00	92.00	11.70	12.00	92.00	12.80	13.00	11.70	12.00	15.30	15.5	92.00	
	106	5530	12.40	12.50		11.60	12.00		12.40	12.50	11.90	12.00	15.17	15.3		
	122	5610	12.80	13.00		11.80	12.00		12.80	13.00	11.80	12.00	15.34	15.5		
	138	5690	12.90	13.00		11.80	12.00		12.90	13.00	11.90	12.00	15.44	15.5		

Transmit Antenna				Ant 4			Ant 3			Ant 4+3(4)		Ant 4+3(3)		Ant 4+3		
Mode	Channel	Frequency (MHz)	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Duty Cycle %	
5.8GHz WLAN	802.11a 6Mbps	149	5745	14.30	14.50	97.87	12.30	12.50	97.87	14.30	14.50	12.40	12.50	16.46	16.6	97.87
		157	5785	14.30	14.50		12.40	12.50		14.30	14.50	12.40	12.50	16.46	16.6	
		165	5825	14.20	14.50		12.30	12.50		14.20	14.50	12.30	12.50	16.36	16.6	
	802.11n-HT20 MCS0	149	5745	14.20	14.50	97.72	12.40	12.50	97.47	14.20	14.50	12.40	12.50	16.40	16.6	97.72
		157	5785	14.20	14.50		12.40	12.50		14.20	14.50	12.40	12.50	16.40	16.6	
		165	5825	14.30	14.50		12.40	12.50		14.30	14.50	12.30	12.50	16.42	16.6	
	802.11n-HT40 MCS0	151	5755	14.40	14.50	95.93	12.40	12.50	95.96	14.40	14.50	12.30	12.50	16.49	16.6	95.93
		159	5795	14.30	14.50		12.40	12.50		14.30	14.50	12.30	12.50	16.42	16.6	
	802.11ac-VHT20 MCS0	149	5745	14.10	14.50	97.49	12.30	12.50	97.98	14.10	14.50	12.30	12.50	16.30	16.6	97.49
		157	5785	14.10	14.50		12.30	12.50		14.10	14.50	12.30	12.50	16.30	16.6	
		165	5825	14.20	14.50		12.30	12.50		14.20	14.50	12.20	12.50	16.32	16.6	
	802.11ac-VHT40 MCS0	151	5755	14.30	14.50	95.74	12.30	12.50	96.00	14.30	14.50	12.20	12.50	16.39	16.6	95.74
		159	5795	14.20	14.50		12.30	12.50		14.20	14.50	12.20	12.50	16.32	16.6	
	802.11ac-VHT80 MCS0	155	5775	14.40	14.50	92.00	12.40	12.50	92.00	14.40	14.50	12.30	12.50	16.49	16.6	92.00



Transmit Antenna				Ant 4			Ant 3			Ant 4+3(4)		Ant 4+3(3)		Ant 4+3		
Mode	Channel	Frequency (MHz)	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Duty Cycle %	
2.4GHz WLAN	802.11b 1Mbps	1	2412	14.40	14.50	98.72	18.70	19.00	98.92	16.70	17.00	18.70	19.00	20.82	21.1	98.92
		6	2437	14.40	14.50		18.80	19.00		16.70	17.00	18.80	19.00	20.89	21.1	
		11	2462	14.30	14.50		18.70	19.00		16.80	17.00	18.70	19.00	20.86	21.1	
	802.11g 6Mbps	1	2412	14.30	14.50	97.87	17.20	17.50	98.35	16.90	17.00	17.20	17.50	20.06	20.3	98.35
		6	2437	14.20	14.50		18.80	19.00		16.70	17.00	18.80	19.00	20.89	21.1	
		11	2462	14.40	14.50		18.70	19.00		16.80	17.00	18.70	19.00	20.86	21.1	
	802.11n-HT20 MCS0	1	2412	14.40	14.50	97.97	16.40	16.50	97.72	16.50	16.50	16.40	16.50	19.46	19.5	97.72
		6	2437	14.40	14.50		18.90	19.00		16.70	17.00	18.90	19.00	20.95	21.1	
		11	2462	14.40	14.50		16.50	16.50		16.40	16.50	16.50	16.50	19.46	19.5	
	802.11ac-VHT20 MCS0	1	2412	14.30	14.50	97.48	16.30	16.50	97.73	16.50	16.50	16.30	16.50	19.41	19.5	97.73
		6	2437	14.30	14.50		18.80	19.00		16.60	17.00	18.80	19.00	20.85	21.1	
		11	2462	14.30	14.50		16.40	16.50		16.30	16.50	16.40	16.50	19.36	19.5	

Transmit Antenna				Ant 4			Ant 3			Ant 4+3(4)		Ant 4+3(3)		Ant 4+3		
Mode	Channel	Frequency (MHz)	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Duty Cycle %	
5.2GHz WLAN	802.11a 6Mbps	36	5180	15.40	16.50	97.83	13.90	14.00	97.87	15.40	16.50	13.60	14.50	17.60	18.6	97.83
		40	5200	15.40	16.50		13.80	14.00		15.40	16.50	13.60	14.50	17.60	18.6	
		44	5220	15.40	16.50		13.80	14.00		15.40	16.50	13.90	14.50	17.72	18.6	
		48	5240	15.40	16.50		13.90	14.00		15.40	16.50	13.70	14.50	17.64	18.6	
	802.11n-HT20 MCS0	36	5180	15.30	16.50	97.69	13.90	14.00	97.47	15.30	16.50	13.60	14.50	17.54	18.6	97.69
		40	5200	15.30	16.50		13.80	14.00		15.30	16.50	13.80	14.50	17.62	18.6	
		44	5220	15.30	16.50		13.90	14.00		15.30	16.50	13.80	14.50	17.62	18.6	
		48	5240	15.40	16.50		13.80	14.00		15.40	16.50	13.90	14.50	17.72	18.6	
	802.11n-HT40 MCS0	38	5190	13.50	13.50	95.34	13.00	13.50	95.96	13.50	13.50	13.10	13.50	16.31	16.5	95.34
		46	5230	15.20	16.50		13.90	14.00		15.20	16.50	13.60	14.50	17.48	18.6	
	802.11ac-VHT20 MCS0	36	5180	15.20	16.50	97.69	13.80	14.00	97.98	15.20	16.50	13.50	14.50	17.44	18.6	97.69
		40	5200	15.20	16.50		13.70	14.00		15.20	16.50	13.70	14.50	17.52	18.6	
		44	5220	15.20	16.50		13.80	14.00		15.20	16.50	13.70	14.50	17.52	18.6	
		48	5240	15.30	16.50		13.70	14.00		15.30	16.50	13.80	14.50	17.62	18.6	
	802.11ac-VHT40 MCS0	38	5190	13.50	13.50	95.41	12.90	13.50	96.00	13.50	13.50	13.00	13.50	16.27	16.5	95.41
		46	5230	15.10	16.50		13.80	14.00		15.10	16.50	13.50	14.50	17.38	18.6	
	802.11ac-VHT80 MCS0	42	5210	12.80	13.00	91.87	12.80	13.00	92.00	12.80	13.00	12.90	13.00	15.86	16.0	91.87

Transmit Antenna				Ant 4			Ant 3			Ant 4+3(4)		Ant 4+3(3)		Ant 4+3		
Mode	Channel	Frequency (MHz)	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm) 1+2(1)	Tune-Up Limit 1+2(1)	Average power (dBm) 1+2(2)	Tune-Up Limit 1+2(2)	Average power (dBm) 1+2	Tune-Up Limit 1+2	Duty Cycle %	
5.3GHz WLAN	802.11a 6Mbps	52	5260	17.10	17.50	97.83	13.80	14.00	97.87	17.10	17.50	14.70	15.00	19.07	19.4	97.83
		56	5280	17.10	17.50		13.80	14.00		17.10	17.50	14.70	15.00	19.07	19.4	
		60	5300	17.40	17.50		13.80	14.00		17.40	17.50	14.60	15.00	19.23	19.4	
		64	5320	17.40	17.50		13.90	14.00		17.40	17.50	14.60	15.00	19.23	19.4	
	802.11n-HT20 MCS0	52	5260	17.30	17.50	97.69	13.90	14.00	97.47	17.30	17.50	14.80	15.00	19.24	19.4	97.69
		56	5280	17.30	17.50		13.80	14.00		17.30	17.50	14.80	15.00	19.24	19.4	
		60	5300	17.40	17.50		13.90	14.00		17.40	17.50	14.90	15.00	19.34	19.4	
		64	5320	17.40	17.50		13.80	14.00		17.40	17.50	14.90	15.00	19.34	19.4	
	802.11n-HT40 MCS0	54	5270	17.20	17.50	95.34	13.90	14.00	95.96	17.20	17.50	14.70	15.00	19.14	19.4	95.34
		62	5310	13.60	14.00		13.50	14.00		13.60	14.00	13.90	14.00	16.76	17.0	
	802.11ac-VHT20 MCS0	52	5260	17.20	17.50	97.69	13.80	14.00	97.98	17.20	17.50	14.70	15.00	19.14	19.4	97.69
		56	5280	17.20	17.50		13.70	14.00		17.20	17.50	14.70	15.00	19.14	19.4	
		60	5300	17.30	17.50		13.80	14.00		17.30	17.50	14.80	15.00	19.24	19.4	
		64	5320	17.30	17.50		13.70	14.00		17.30	17.50	14.80	15.00	19.24	19.4	
	802.11ac-VHT40 MCS0	54	5270	17.10	17.50	95.41	13.80	14.00	96.00	17.10	17.50	14.60	15.00	19.04	19.4	95.41
		62	5310	13.50	14.00		13.40	14.00		13.50	14.00	13.80	14.00	16.66	17.0	
	802.11ac-VHT80 MCS0	58	5290	11.60	12.00	91.87	11.70	12.00	92.00	11.60	12.00	11.80	12.00	14.71	15.0	91.87



Transmit Antenna				Ant 4			Ant 3			Ant 4+3(4)		Ant 4+3(3)		Ant 4+3		
Mode	Channel	Frequency (MHz)	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Duty Cycle %	
5.5GHz WLAN	802.11a 6Mbps	100	5500	17.10	17.50	97.83	9.40	10.50	97.87	17.10	17.50	11.30	11.50	18.11	18.47	
		116	5580	17.40	17.50		9.30	10.50		17.40	17.50	11.20	11.50	18.33	18.47	
		124	5620	17.30	17.50		9.30	10.50		17.30	17.50	11.10	11.50	18.23	18.47	
		132	5660	17.00	17.50		9.30	10.50		17.00	17.50	11.40	11.50	18.06	18.47	
		140	5700	17.00	17.50		9.30	10.50		17.00	17.50	11.10	11.50	17.99	18.47	
		144	5720	17.10	17.50		9.30	10.50		17.10	17.50	11.20	11.50	18.09	18.47	
	802.11n-HT20 MCS0	100	5500	17.40	17.50	97.69	9.30	10.50	97.47	17.40	17.50	11.20	11.50	18.33	18.47	
		116	5580	17.20	17.50		9.30	10.50		17.20	17.50	11.10	11.50	18.15	18.47	
		124	5620	17.10	17.50		9.20	10.50		17.10	17.50	11.10	11.50	18.07	18.47	
		132	5660	17.30	18.00		9.30	10.50		17.30	18.00	11.30	11.50	18.27	18.88	
		140	5700	17.20	18.00		9.40	10.50		17.20	18.00	11.40	11.50	18.21	18.88	
		144	5720	17.10	17.50		9.30	10.50		17.10	17.50	11.50	11.50	18.16	18.47	
	802.11n-HT40 MCS0	102	5510	16.00	16.00	95.34	9.40	10.50	95.96	16.00	16.00	11.10	11.50	17.22	17.32	
		110	5550	17.20	17.50		9.30	10.50		17.20	17.50	11.10	11.50	18.15	18.47	
		126	5630	17.10	17.50		9.30	10.50		17.10	17.50	11.40	11.50	18.14	18.47	
		134	5670	17.10	17.50		9.40	10.50		17.10	17.50	11.10	11.50	18.07	18.47	
		142	5710	17.40	17.50		9.40	10.50		17.40	17.50	11.10	11.50	18.31	18.47	
		100	5500	17.30	17.50		9.20	10.50		17.30	17.50	11.10	11.50	18.23	18.47	
	802.11ac-VHT20 MCS0	116	5580	17.10	17.50	97.69	9.20	10.50	97.98	17.10	17.50	11.50	11.50	18.16	18.47	
		124	5620	17.00	17.50		9.10	10.50		17.00	17.50	11.50	11.50	18.08	18.47	
		132	5660	17.20	18.00		9.20	10.50		17.20	18.00	11.20	11.50	18.17	18.88	
		140	5700	17.10	18.00		9.30	10.50		17.10	18.00	11.20	11.50	18.09	18.88	
		144	5720	17.00	17.50		9.20	10.50		17.00	17.50	11.30	11.50	18.04	18.47	
		102	5510	16.00	16.00		9.30	10.50		16.00	16.00	11.50	11.50	17.32	17.32	
802.11ac-VHT40 MCS0	110	5550	17.10	17.50	95.41	9.20	10.50	96.00	17.10	17.50	11.50	11.50	18.16	18.47		
	126	5630	17.00	17.50		9.20	10.50		17.00	17.50	11.30	11.50	18.04	18.47		
	134	5670	17.00	17.50		9.30	10.50		17.00	17.50	11.50	11.50	18.08	18.47		
	142	5710	17.30	17.50		9.30	10.50		17.30	17.50	11.50	11.50	18.31	18.47		
	106	5530	12.00	12.50		9.30	10.50		12.00	12.50	11.50	11.50	14.77	15.04		
	122	5610	16.80	17.00		9.30	10.50		16.80	17.00	11.40	11.50	17.90	18.08		
802.11ac-VHT80 MCS0	138	5690	16.90	17.00	91.87	9.40	10.50	92.00	16.90	17.00	11.40	11.50	17.98	18.08		

Transmit Antenna				Ant 4			Ant 3			Ant 4+3(4)		Ant 4+3(3)		Ant 4+3		
Mode	Channel	Frequency (MHz)	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Duty Cycle %	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Average power (dBm)	Tune-Up Limit	Duty Cycle %	
5.8GHz WLAN	802.11a 6Mbps	149	5745	18.30	18.50	97.83	9.30	10.00	97.87	18.30	18.50	9.90	10.50	18.89	19.1	
		157	5785	18.40	18.50		9.40	10.00		18.40	18.50	9.70	10.50	18.95	19.1	
		165	5825	18.20	18.50		9.40	10.00		18.20	18.50	9.70	10.50	18.77	19.1	
	802.11n-HT20 MCS0	149	5745	18.10	18.50	97.69	9.40	10.00	97.47	18.10	18.50	9.70	10.50	18.69	19.1	
		157	5785	18.20	18.50		9.40	10.00		18.20	18.50	9.90	10.50	18.80	19.1	
		165	5825	18.10	18.50		9.40	10.00		18.10	18.50	9.90	10.50	18.71	19.1	
	802.11n-HT40 MCS0	151	5755	17.40	17.50	95.34	9.30	10.00	95.96	17.40	17.50	9.80	10.50	18.10	18.3	
		159	5795	17.10	17.50		9.30	10.00		17.10	17.50	9.60	10.50	17.81	18.3	
	802.11ac-VHT20 MCS0	149	5745	18.00	18.50	97.69	9.30	10.00	97.98	18.00	18.50	9.60	10.50	18.59	19.1	
		157	5785	18.10	18.50		9.30	10.00		18.10	18.50	9.80	10.50	18.70	19.1	
		165	5825	18.00	18.50		9.30	10.00		18.00	18.50	9.80	10.50	18.61	19.1	
	802.11ac-VHT40 MCS0	151	5755	17.30	17.50	95.41	9.20	10.00	96.00	17.30	17.50	9.70	10.50	18.00	18.3	
		159	5795	17.00	17.50		9.20	10.00		17.00	17.50	9.50	10.50	17.71	18.3	
	802.11ac-VHT80 MCS0	155	5775	16.90	17.00	91.87	9.30	10.00	92.00	16.90	17.00	9.90	10.50	17.69	17.9	



Bluetooth Default Power Table

Mode	Channel	Frequency (MHz)	Average power (dBm)		
			1Mbps	2Mbps	3Mbps
BR / EDR	CH 00	2402	17.92	17.96	17.99
	CH 39	2441	17.87	17.95	17.97
	CH 78	2480	17.29	17.30	17.33
Tune-up Limit			18	18	18

Mode	Channel	Frequency (MHz)	Average power (dBm)	
			1Mbps	2Mbps
LE	CH 00	2402	12.00	12.00
	CH 19	2440	12.40	12.40
	CH 39	2480	11.60	11.60
Tune-up Limit			12.5	12.5

Bluetooth Power Table 1

Mode	Channel	Frequency (MHz)	Average power (dBm)		
			1Mbps	2Mbps	3Mbps
BR / EDR	CH 00	2402	17.92	17.96	17.99
	CH 39	2441	17.87	17.95	17.97
	CH 78	2480	17.29	17.30	17.33
Tune-up Limit			18	18	18

Mode	Channel	Frequency (MHz)	Average power (dBm)	
			1Mbps	2Mbps
LE	CH 00	2402	12.00	12.00
	CH 19	2440	12.40	12.40
	CH 39	2480	11.60	11.60
Tune-up Limit			12.5	12.5

Bluetooth Power Table 2

Mode	Channel	Frequency (MHz)	Average power (dBm)		
			1Mbps	2Mbps	3Mbps
BR / EDR	CH 00	2402	11.38	11.82	11.80
	CH 39	2441	11.97	10.97	10.97
	CH 78	2480	11.77	11.95	11.88
Tune-up Limit			12	12	12

Mode	Channel	Frequency (MHz)	Average power (dBm)	
			1Mbps	2Mbps
LE	CH 00	2402	11.40	11.40
	CH 19	2440	11.90	11.90
	CH 39	2480	11.90	11.90
Tune-up Limit			12	12

Bluetooth Power Table 3

Mode	Channel	Frequency (MHz)	Average power (dBm)		
			1Mbps	2Mbps	3Mbps
BR / EDR	CH 00	2402	14.05	14.08	14.11
	CH 39	2441	14.50	14.42	14.39
	CH 78	2480	14.50	14.42	14.33
Tune-up Limit			14.5	14.5	14.5

Mode	Channel	Frequency (MHz)	Average power (dBm)	
			1Mbps	2Mbps
LE	CH 00	2402	12.00	12.00
	CH 19	2440	12.40	12.40
	CH 39	2480	11.60	11.60
Tune-up Limit			12.5	12.5

