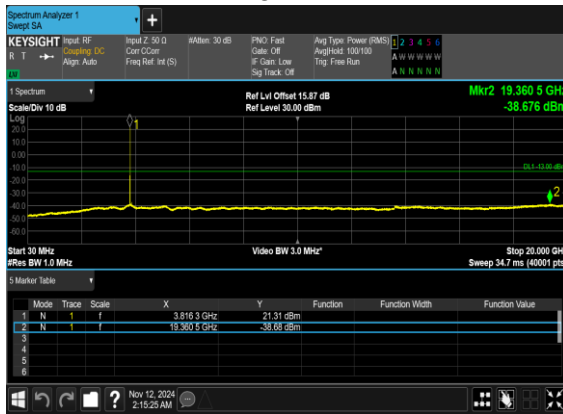
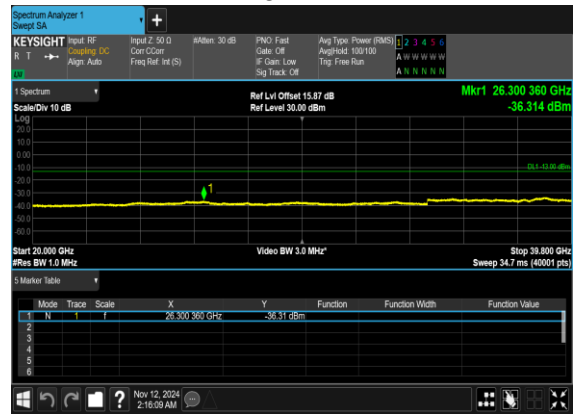




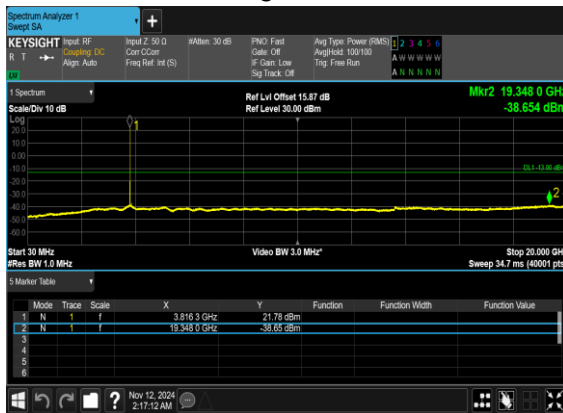
B5_N77(50M)_DFT-s-OFDM_BPSK_Edge_1RB_Left_Mid_CH



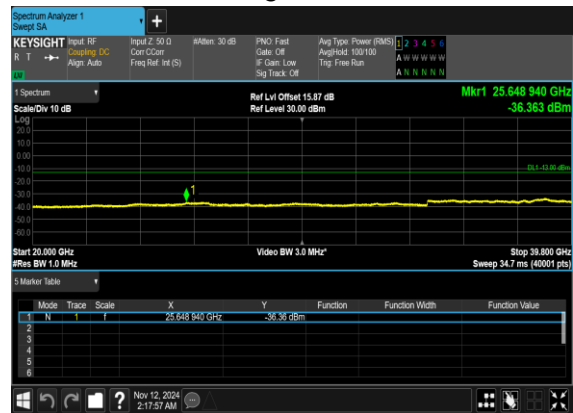
B5_N77(50M)_DFT-s-OFDM_BPSK_Edge_1RB_Left_Mid_CH



B5_N77(50M)_DFT-s-OFDM_QPSK_Edge_1RB_Left_Mid_CH

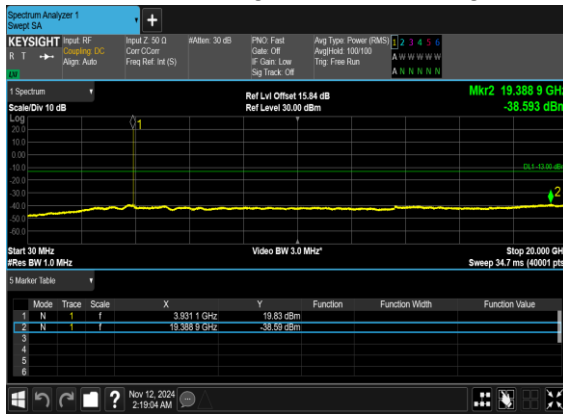


B5_N77(50M)_DFT-s-OFDM_QPSK_Edge_1RB_Left_Mid_CH

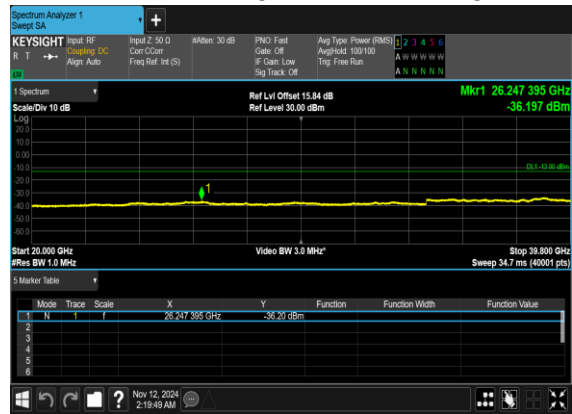




B5_N77(50M)_DFT-s-OFDM_BPSK_Edge_1RB_Left_High_CH



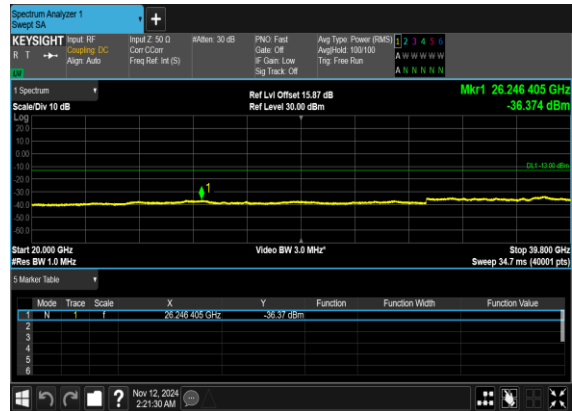
B5_N77(50M)_DFT-s-OFDM_BPSK_Edge_1RB_Left_High_CH



B5_N77(50M)_DFT-s-OFDM_QPSK_Edge_1RB_Left_High_CH

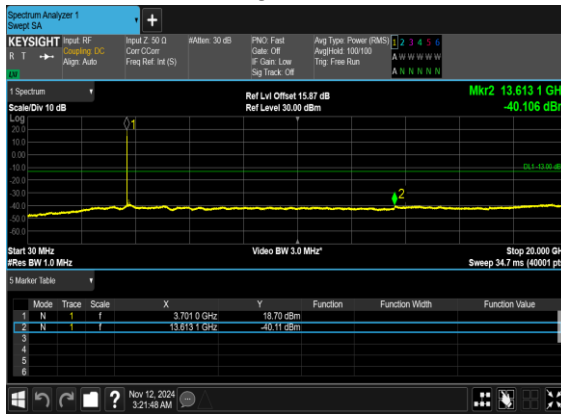


B5_N77(50M)_DFT-s-OFDM_QPSK_Edge_1RB_Left_High_CH

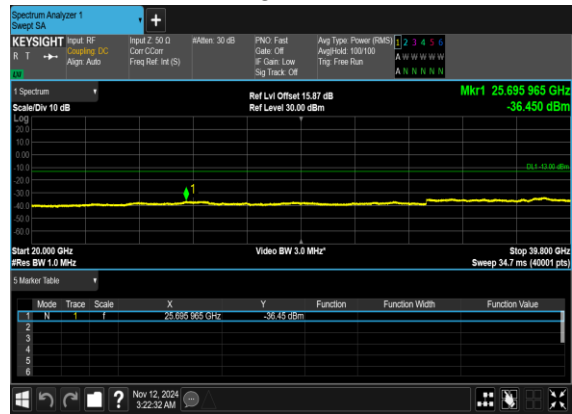




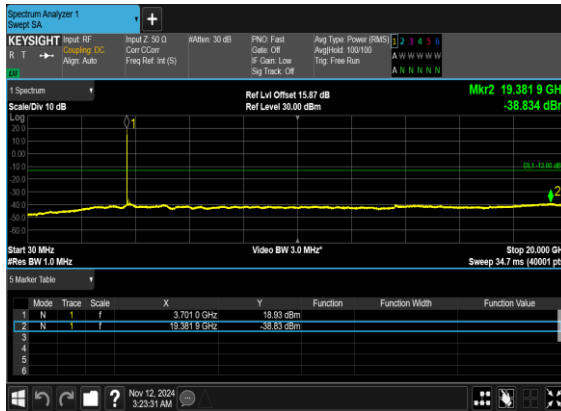
B5_N77(100M)_DFT-s-OFDM_BPSK_Edge_1RB_Left_Low_CH



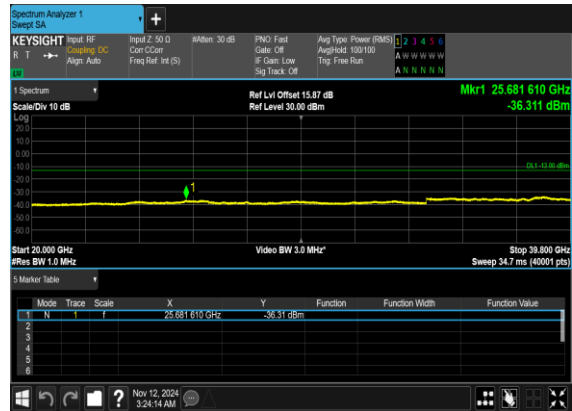
B5_N77(100M)_DFT-s-OFDM_BPSK_Edge_1RB_Left_Low_CH



B5_N77(100M)_DFT-s-OFDM_QPSK_Edge_1RB_Left_Low_CH

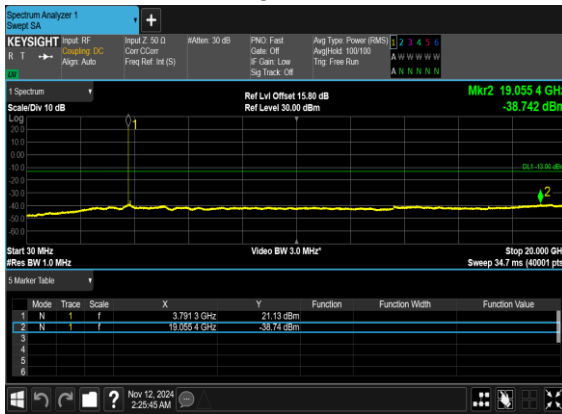


B5_N77(100M)_DFT-s-OFDM_QPSK_Edge_1RB_Left_Low_CH

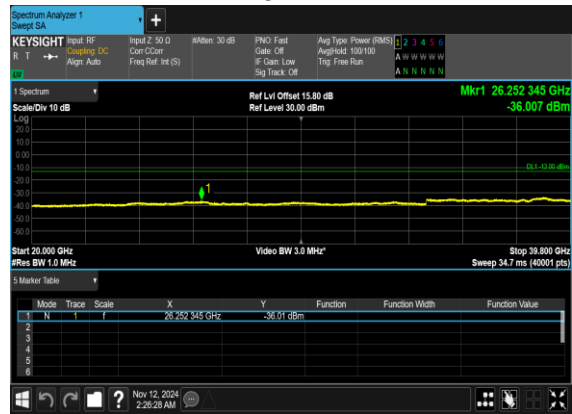




B5_N77(100M)_DFT-s-OFDM_BPSK_Edge_1RB_Left_Mid_CH



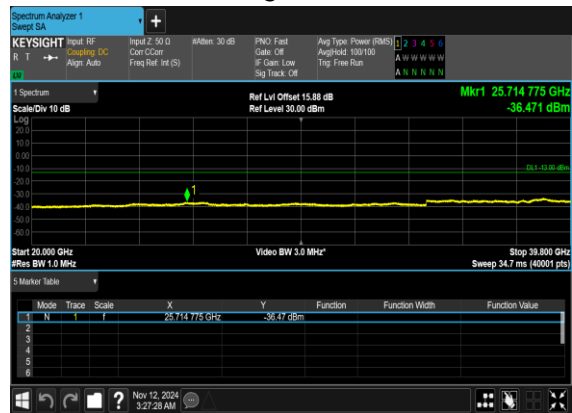
B5_N77(100M)_DFT-s-OFDM_BPSK_Edge_1RB_Left_Mid_CH



B5_N77(100M)_DFT-s-OFDM_QPSK_Edge_1RB_Left_Mid_CH

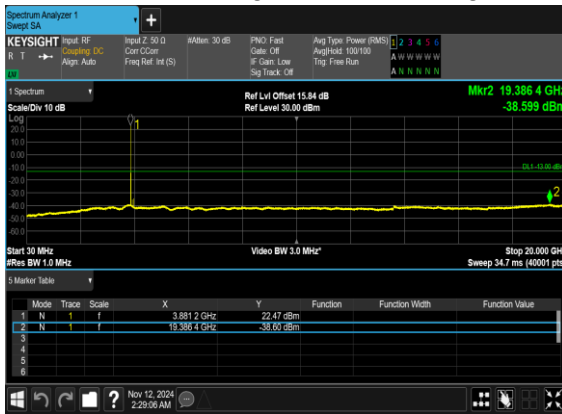


B5_N77(100M)_DFT-s-OFDM_QPSK_Edge_1RB_Left_Mid_CH

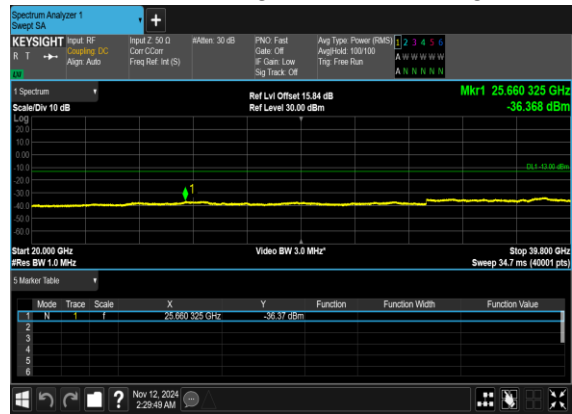




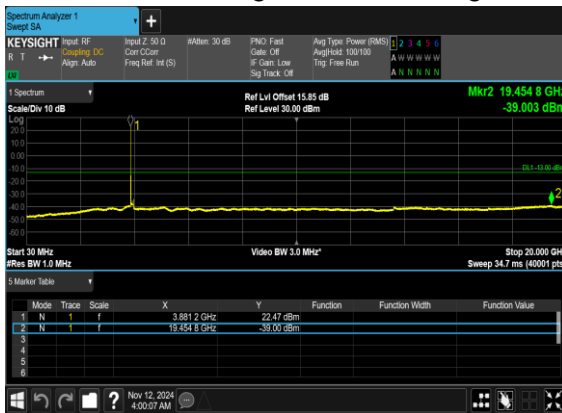
B5_N77(100M)_DFT-s-OFDM_BPSK_Edge_1RB_Left_High_CH



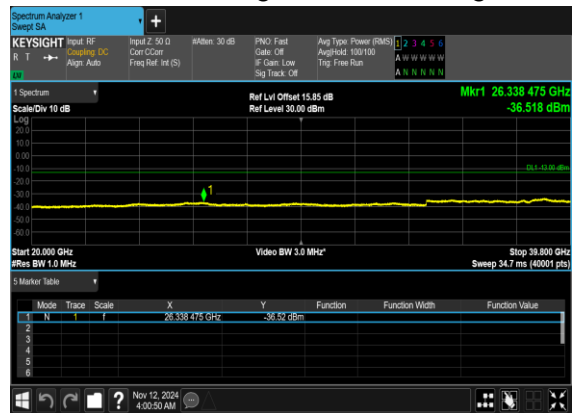
B5_N77(100M)_DFT-s-OFDM_BPSK_Edge_1RB_Left_High_CH



B5_N77(100M)_DFT-s-OFDM_QPSK_Edge_1RB_Left_High_CH



B5_N77(100M)_DFT-s-OFDM_QPSK_Edge_1RB_Left_High_CH





Conducted Band Edge

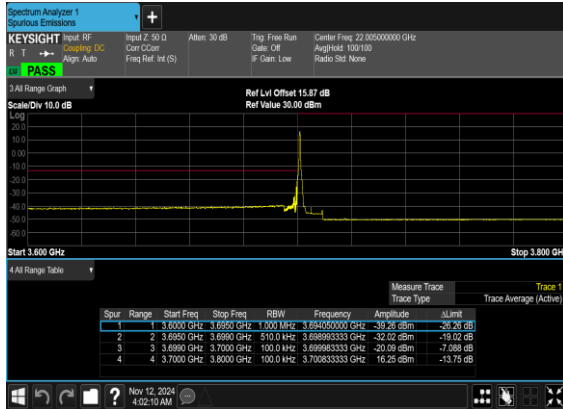
NR Band	SCS (kHz)	Bandwidth (MHz)	Arfcn	Freq (MHz)	Modulation	RB	Result	Verdict
77	30	10	647000	3705.0	DFT-s-OFDM BPSK	1@0	see graph	PASS
77	30	10	647000	3705.0	DFT-s-OFDM QPSK	1@0	see graph	PASS
77	30	10	647000	3705.0	DFT-s-OFDM BPSK	24@0	see graph	PASS
77	30	10	647000	3705.0	DFT-s-OFDM QPSK	24@0	see graph	PASS
77	30	10	665000	3975.0	DFT-s-OFDM BPSK	1@23	see graph	PASS
77	30	10	665000	3975.0	DFT-s-OFDM QPSK	1@23	see graph	PASS
77	30	10	665000	3975.0	DFT-s-OFDM BPSK	24@0	see graph	PASS
77	30	10	665000	3975.0	DFT-s-OFDM QPSK	24@0	see graph	PASS
77	30	50	648334	3725.01	DFT-s-OFDM BPSK	1@0	see graph	PASS
77	30	50	648334	3725.01	DFT-s-OFDM QPSK	1@0	see graph	PASS
77	30	50	648334	3725.01	DFT-s-OFDM BPSK	128@0	see graph	PASS
77	30	50	648334	3725.01	DFT-s-OFDM QPSK	128@0	see graph	PASS
77	30	50	663666	3954.99	DFT-s-OFDM BPSK	1@132	see graph	PASS
77	30	50	663666	3954.99	DFT-s-OFDM QPSK	1@132	see graph	PASS
77	30	50	663666	3954.99	DFT-s-OFDM BPSK	128@0	see graph	PASS
77	30	50	663666	3954.99	DFT-s-OFDM QPSK	128@0	see graph	PASS
77	30	100	650000	3750.0	DFT-s-OFDM BPSK	1@0	see graph	PASS
77	30	100	650000	3750.0	DFT-s-OFDM QPSK	1@0	see graph	PASS
77	30	100	650000	3750.0	DFT-s-OFDM BPSK	270@0	see graph	PASS



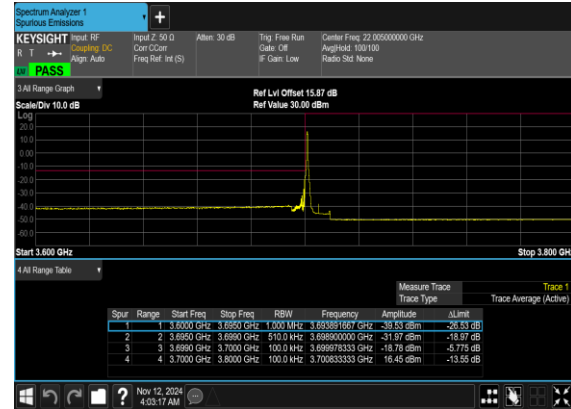
77	30	100	650000	3750.0	DFT-s-OFDM QPSK	270@0	see graph	PASS
77	30	100	662000	3930.0	DFT-s-OFDM BPSK	1@272	see graph	PASS
77	30	100	662000	3930.0	DFT-s-OFDM QPSK	1@272	see graph	PASS
77	30	100	662000	3930.0	DFT-s-OFDM BPSK	270@0	see graph	PASS
77	30	100	662000	3930.0	DFT-s-OFDM QPSK	270@0	see graph	PASS



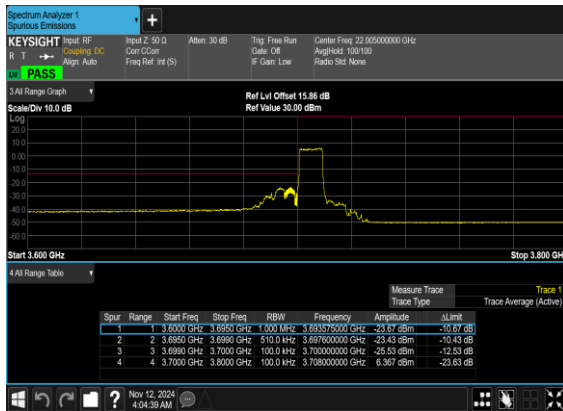
B5_N77(10M)_DFT-s-OFDM_BPSK_Edge_1RB_Left_Low_CH



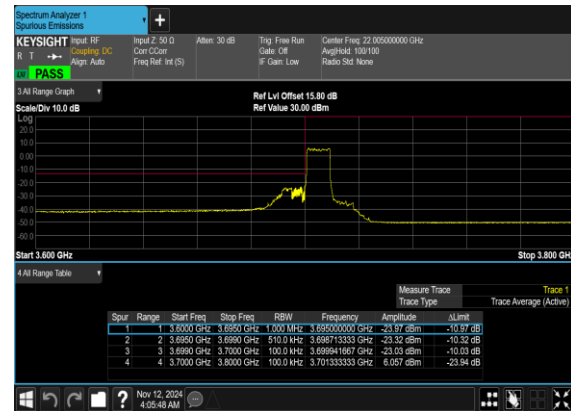
B5_N77(10M)_DFT-s-OFDM_QPSK_Edge_1RB_Left_Low_CH



B5_N77(10M)_DFT-s-OFDM_BPSK_Outer_Full_Low_CH

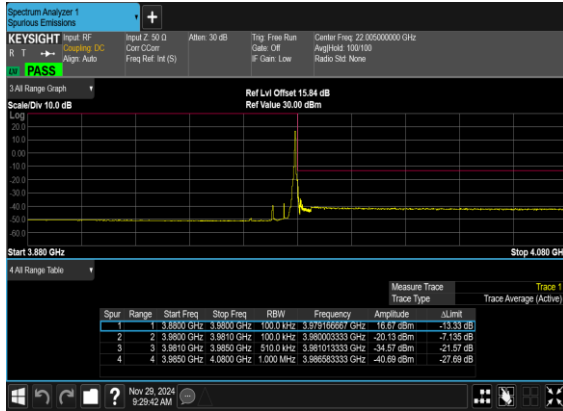


B5_N77(10M)_DFT-s-OFDM_QPSK_Outer_Full_Low_CH





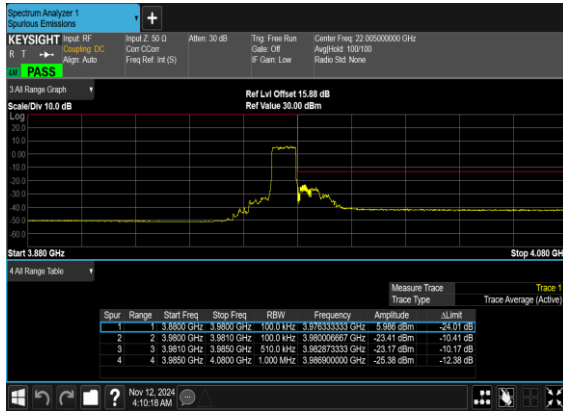
B5_N77(10M)_DFT-s-OFDM_BPSK_Edge_1RB_Right_High_CH



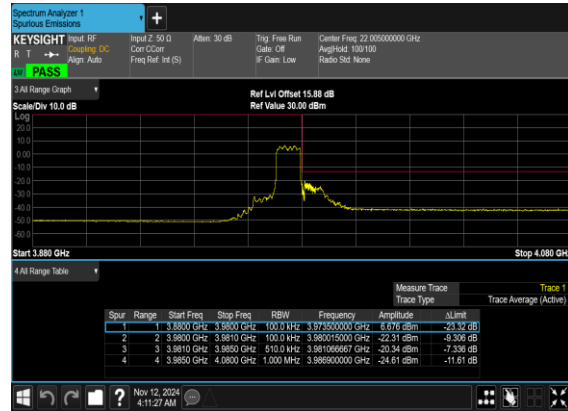
B5_N77(10M)_DFT-s-OFDM_QPSK_Edge_1RB_Right_High_CH



B5_N77(10M)_DFT-s-OFDM_BPSK_Outer_Full_High_CH

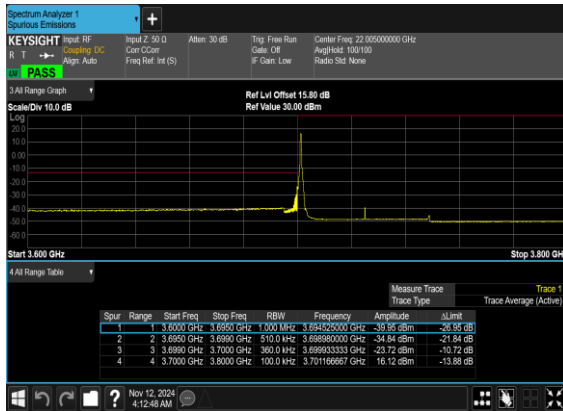


B5_N77(10M)_DFT-s-OFDM_QPSK_Outer_Full_High_CH

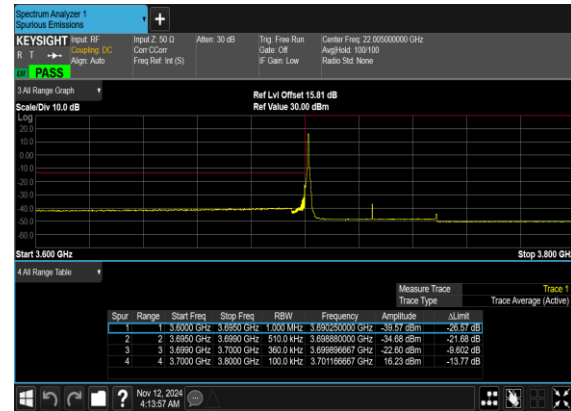




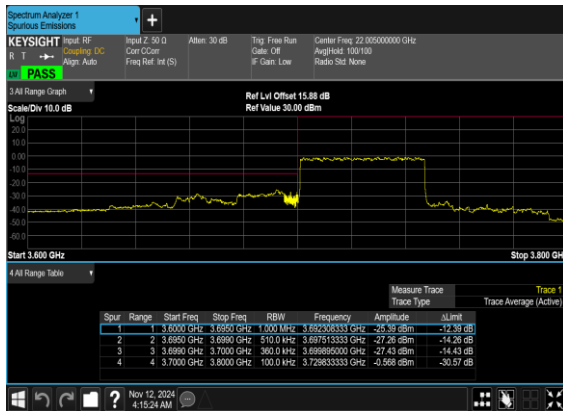
B5_N77(50M)_DFT-s-OFDM_BPSK_Edge_1RB_Left_Low_CH



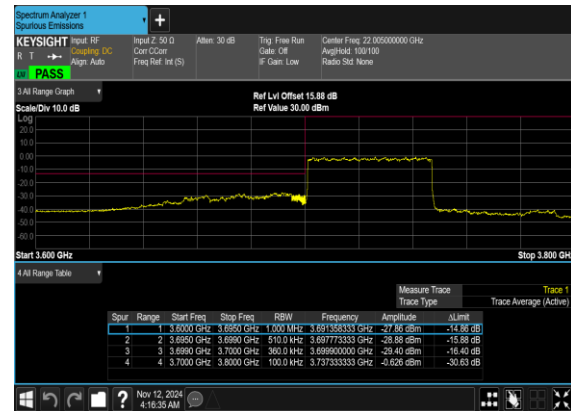
B5_N77(50M)_DFT-s-OFDM_QPSK_Edge_1RB_Left_Low_CH



B5_N77(50M)_DFT-s-OFDM_BPSK_Outer_Full_Low_CH

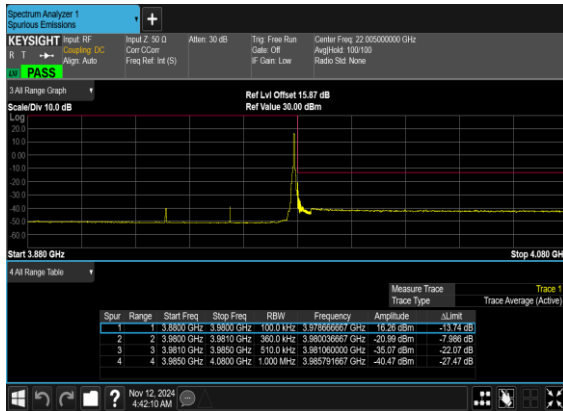


B5_N77(50M)_DFT-s-OFDM_QPSK_Outer_Full_Low_CH

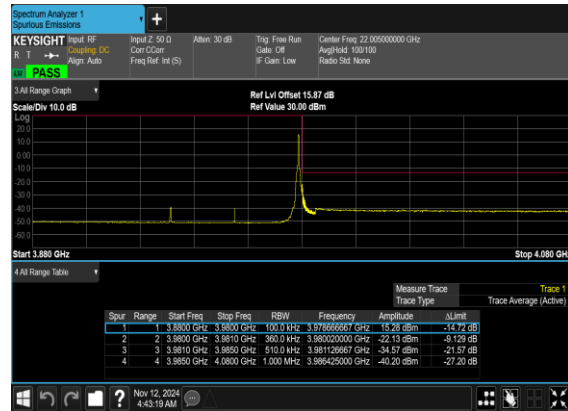




B5_N77(50M)_DFT-s-OFDM_BPSK_Edge_1RB_Right_High_CH



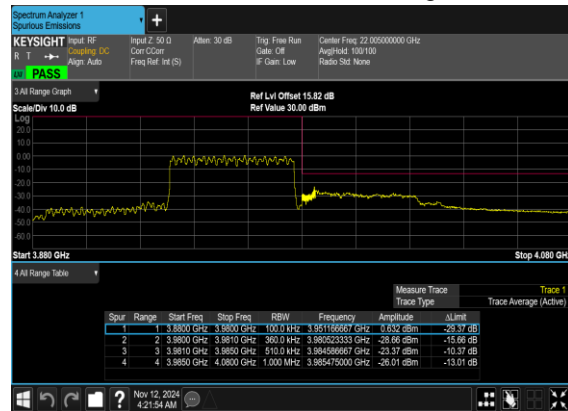
B5_N77(50M)_DFT-s-OFDM_QPSK_Edge_1RB_Right_High_CH



B5_N77(50M)_DFT-s-OFDM_BPSK_Outer_Full_High_CH

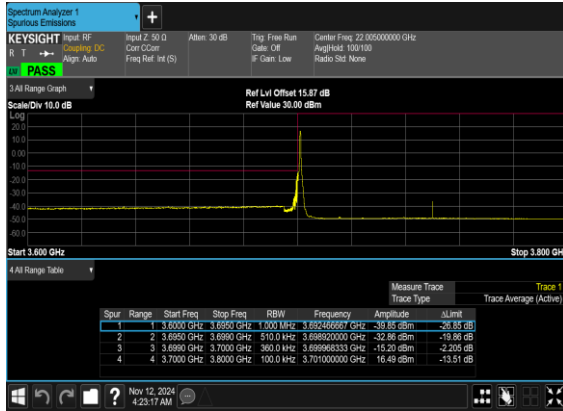


B5_N77(50M)_DFT-s-OFDM_QPSK_Outer_Full_High_CH

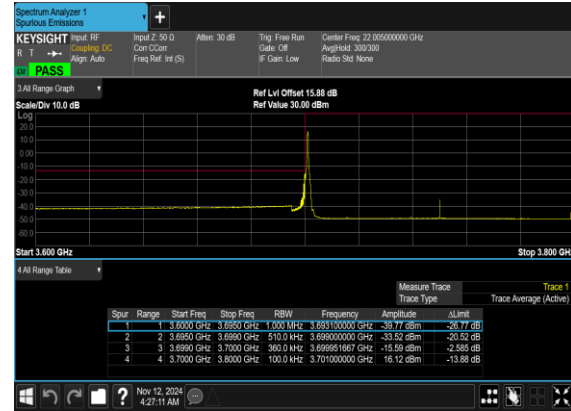




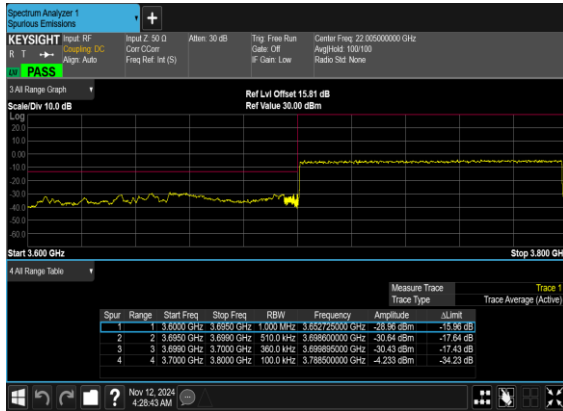
B5_N77(100M)_DFT-s-OFDM_BPSK_Edge_1RB_Left_Low_CH



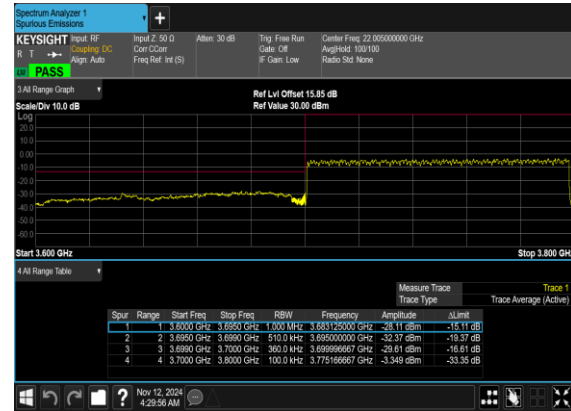
B5_N77(100M)_DFT-s-OFDM_QPSK_Edge_1RB_Left_Low_CH



B5_N77(100M)_DFT-s-OFDM_BPSK_Outer_Full_Low_CH

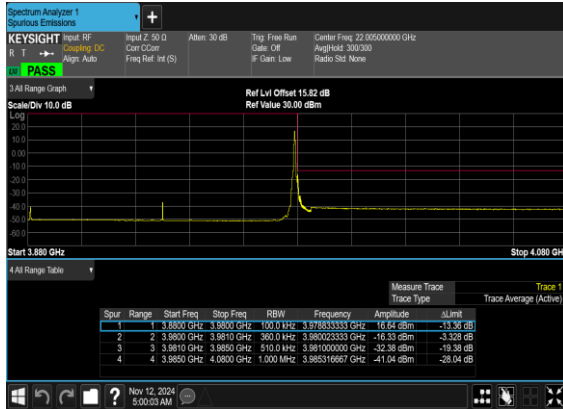


B5_N77(100M)_DFT-s-OFDM_QPSK_Outer_Full_Low_CH





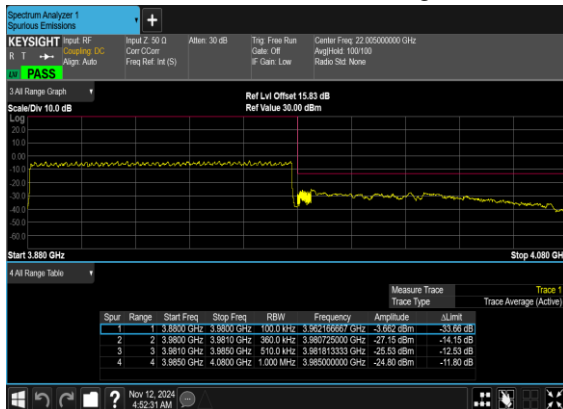
B5_N77(100M)_DFT-s-OFDM_BPSK_Edge_1RB_Right_High_CH



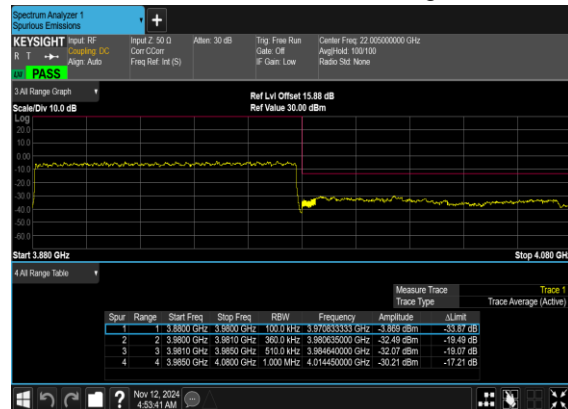
B5_N77(100M)_DFT-s-OFDM_QPSK_Edge_1RB_Right_High_CH



B5_N77(100M)_DFT-s-OFDM_BPSK_Outer_Full_High_CH



B5_N77(100M)_DFT-s-OFDM_QPSK_Outer_Full_High_CH





Software Version: 23.06.1602

FR1 N78 (Ant.4) – Other PA

LTE Band: 5(Ant.0), LTE BW: 10M, LTE ARFCN: Mid

Transmitter Conducted Output Power and EIRP, (G_T - L_c)= -0.5dB

NR Band	SCS	Band Width	Arfcn	Freq (MHz)	Modulation	RB	Conducted Power(dBm)	EIRP (dBm)	EIRP (W)
78	30	10	647000	3705	DFT-s-OFDM QPSK	1@1	25.82	25.32	0.3404
78	30	10	647000	3705	DFT-s-OFDM 16 QAM	1@1	24.9	24.4	0.2754
78	30	10	650000	3750	DFT-s-OFDM QPSK	1@1	25.93	25.43	0.3491
78	30	10	650000	3750	DFT-s-OFDM 16 QAM	1@1	25.04	24.54	0.2844
78	30	10	653000	3795	DFT-s-OFDM QPSK	1@1	25.89	25.39	0.3459
78	30	10	653000	3795	DFT-s-OFDM 16 QAM	1@1	24.99	24.49	0.2812
78	30	15	647168	3707.52	DFT-s-OFDM QPSK	1@1	25.85	25.35	0.3428
78	30	15	647168	3707.52	DFT-s-OFDM 16 QAM	1@1	24.99	24.49	0.2812
78	30	15	650000	3750	DFT-s-OFDM QPSK	1@1	25.98	25.48	0.3532
78	30	15	650000	3750	DFT-s-OFDM 16 QAM	1@1	25.18	24.68	0.2938
78	30	15	652832	3792.48	DFT-s-OFDM QPSK	1@1	26	25.5	0.3548
78	30	15	652832	3792.48	DFT-s-OFDM 16 QAM	1@1	25.21	24.71	0.2958
78	30	20	647334	3710.01	DFT-s-OFDM QPSK	1@1	25.8	25.3	0.3388
78	30	20	647334	3710.01	DFT-s-OFDM 16 QAM	1@1	25.01	24.51	0.2825
78	30	20	650000	3750	DFT-s-OFDM QPSK	1@1	26.03	25.53	0.3573
78	30	20	650000	3750	DFT-s-OFDM 16 QAM	1@1	25.23	24.73	0.2972
78	30	20	652666	3789.99	DFT-s-OFDM QPSK	1@1	25.93	25.43	0.3491
78	30	20	652666	3789.99	DFT-s-OFDM 16 QAM	1@1	25.09	24.59	0.2877
78	30	25	647500	3712.5	DFT-s-OFDM QPSK	1@1	25.91	25.41	0.3475
78	30	25	647500	3712.5	DFT-s-OFDM 16 QAM	1@1	25.06	24.56	0.2858
78	30	25	650000	3750	DFT-s-OFDM QPSK	1@1	25.97	25.47	0.3524
78	30	25	650000	3750	DFT-s-OFDM 16 QAM	1@1	25.12	24.62	0.2897
78	30	25	652500	3787.5	DFT-s-OFDM QPSK	1@1	25.93	25.43	0.3491
78	30	25	652500	3787.5	DFT-s-OFDM 16 QAM	1@1	25.16	24.66	0.2924
78	30	30	647668	3715.02	DFT-s-OFDM QPSK	1@1	25.43	24.93	0.3112
78	30	30	647668	3715.02	DFT-s-OFDM 16 QAM	1@1	24.85	24.35	0.2723
78	30	30	650000	3750	DFT-s-OFDM QPSK	1@1	25.74	25.24	0.3342
78	30	30	650000	3750	DFT-s-OFDM 16 QAM	1@1	24.96	24.46	0.2793
78	30	30	652332	3784.98	DFT-s-OFDM QPSK	1@1	26	25.5	0.3548
78	30	30	652332	3784.98	DFT-s-OFDM 16 QAM	1@1	25.18	24.68	0.2938
78	30	40	648000	3720	DFT-s-OFDM QPSK	1@1	25.57	25.07	0.3214
78	30	40	648000	3720	DFT-s-OFDM 16 QAM	1@1	24.87	24.37	0.2735
78	30	40	650000	3750	DFT-s-OFDM QPSK	1@1	25.65	25.15	0.3273



78	30	40	650000	3750	DFT-s-OFDM 16 QAM	1@1	24.93	24.43	0.2773
78	30	40	652000	3780	DFT-s-OFDM QPSK	1@1	25.68	25.18	0.3296
78	30	40	652000	3780	DFT-s-OFDM 16 QAM	1@1	25.06	24.56	0.2858
78	30	50	648334	3725.01	DFT-s-OFDM QPSK	1@1	25.76	25.26	0.3357
78	30	50	648334	3725.01	DFT-s-OFDM 16 QAM	1@1	25.02	24.52	0.2831
78	30	50	650000	3750	DFT-s-OFDM QPSK	1@1	25.94	25.44	0.3499
78	30	50	650000	3750	DFT-s-OFDM 16 QAM	1@1	25.1	24.6	0.2884
78	30	50	651666	3774.99	DFT-s-OFDM QPSK	1@1	25.67	25.17	0.3289
78	30	50	651666	3774.99	DFT-s-OFDM 16 QAM	1@1	24.93	24.43	0.2773
78	30	60	648668	3730.02	DFT-s-OFDM QPSK	1@1	25.75	25.25	0.3350
78	30	60	648668	3730.02	DFT-s-OFDM 16 QAM	1@1	24.85	24.35	0.2723
78	30	60	650000	3750	DFT-s-OFDM QPSK	1@1	25.82	25.32	0.3404
78	30	60	650000	3750	DFT-s-OFDM 16 QAM	1@1	24.97	24.47	0.2799
78	30	60	651332	3769.98	DFT-s-OFDM QPSK	1@1	25.62	25.12	0.3251
78	30	60	651332	3769.98	DFT-s-OFDM 16 QAM	1@1	24.9	24.4	0.2754
78	30	70	649000	3735	DFT-s-OFDM QPSK	1@1	25.81	25.31	0.3396
78	30	70	649000	3735	DFT-s-OFDM 16 QAM	1@1	25.02	24.52	0.2831
78	30	70	650000	3750	DFT-s-OFDM QPSK	1@1	25.67	25.17	0.3289
78	30	70	650000	3750	DFT-s-OFDM 16 QAM	1@1	24.89	24.39	0.2748
78	30	70	651000	3765	DFT-s-OFDM QPSK	1@1	25.89	25.39	0.3459
78	30	70	651000	3765	DFT-s-OFDM 16 QAM	1@1	25.02	24.52	0.2831
78	30	80	649334	3740.01	DFT-s-OFDM QPSK	1@1	25.74	25.24	0.3342
78	30	80	649334	3740.01	DFT-s-OFDM 16 QAM	1@1	25.02	24.52	0.2831
78	30	80	650000	3750	DFT-s-OFDM QPSK	1@1	25.71	25.21	0.3319
78	30	80	650000	3750	DFT-s-OFDM 16 QAM	1@1	24.85	24.35	0.2723
78	30	80	650666	3759.99	DFT-s-OFDM QPSK	1@1	25.78	25.28	0.3373
78	30	80	650666	3759.99	DFT-s-OFDM 16 QAM	1@1	24.9	24.4	0.2754
78	30	90	649668	3745.02	DFT-s-OFDM QPSK	1@1	25.86	25.36	0.3436
78	30	90	649668	3745.02	DFT-s-OFDM 16 QAM	1@1	24.94	24.44	0.2780
78	30	90	650000	3750	DFT-s-OFDM QPSK	1@1	25.78	25.28	0.3373
78	30	90	650000	3750	DFT-s-OFDM 16 QAM	1@1	24.86	24.36	0.2729
78	30	90	650332	3754.98	DFT-s-OFDM QPSK	1@1	25.63	25.13	0.3258
78	30	90	650332	3754.98	DFT-s-OFDM 16 QAM	1@1	25	24.5	0.2818
78	30	100	650000	3750	DFT-s-OFDM PI/2 BPSK 135@67	1@1	25.96	25.46	0.3516
78	30	100	650000	3750	DFT-s-OFDM PI/2 BPSK	1@1	25.68	25.18	0.3296
78	30	100	650000	3750	DFT-s-OFDM PI/2 BPSK	1@271	25.8	25.3	0.3388
78	30	100	650000	3750	DFT-s-OFDM QPSK	135@67	25.7	25.2	0.3311
78	30	100	650000	3750	DFT-s-OFDM QPSK	1@1	26.11	25.61	0.3639
78	30	100	650000	3750	DFT-s-OFDM QPSK	1@271	25.78	25.28	0.3373
78	30	100	650000	3750	DFT-s-OFDM 16 QAM	135@67	24.86	24.36	0.2729
78	30	100	650000	3750	DFT-s-OFDM 16 QAM	1@1	24.77	24.27	0.2673



78	30	100	650000	3750	DFT-s-OFDM 16 QAM	1@271	25.06	24.56	0.2858
78	30	100	650000	3750	DFT-s-OFDM 64 QAM	135@67	23.4	22.9	0.1950
78	30	100	650000	3750	DFT-s-OFDM 64 QAM	1@1	23.3	22.8	0.1905
78	30	100	650000	3750	DFT-s-OFDM 64 QAM	1@271	23.76	23.26	0.2118
78	30	100	650000	3750	DFT-s-OFDM 256 QAM	135@67	21.6	21.1	0.1288
78	30	100	650000	3750	DFT-s-OFDM 256 QAM	1@1	21.23	20.73	0.1183
78	30	100	650000	3750	DFT-s-OFDM 256 QAM	1@271	21.61	21.11	0.1291
78	30	100	650000	3750	CP-OFDM QPSK	137@68	24.5	24	0.2512
78	30	100	650000	3750	CP-OFDM QPSK	1@1	24.35	23.85	0.2427
78	30	100	650000	3750	CP-OFDM QPSK	1@271	24.66	24.16	0.2606



Software Version: 23.06.1602

ULMIMO P270 N77 ANT7+ANT4

Transmitter Conducted Output Power and EIRP, (G_T - L_c)= -0.5dB

NR Band	SCS	Band Width	Arfcn	Freq (MHz)	Modulation	RB	ANT7 Power (dBm)	ANT4 Power (dBm)	Conducted Power(dBm)	EIRP (dBm)	EIRP (W)
77	30	10	647000	3705	CP-OFDM QPSK	1@1	24.12	24.14	27.14	26.64	0.4613
77	30	10	647000	3705	CP-OFDM 16 QAM	1@1	24	23.61	26.82	26.32	0.4285
77	30	10	656000	3840	CP-OFDM QPSK	1@1	24.7	24.71	27.72	27.22	0.5272
77	30	10	656000	3840	CP-OFDM 16 QAM	1@1	24.68	24.71	27.71	27.21	0.5260
77	30	10	665000	3975	CP-OFDM QPSK	1@1	24.38	24.66	27.53	27.03	0.5047
77	30	10	665000	3975	CP-OFDM 16 QAM	1@1	24.21	24.06	27.15	26.65	0.4624
77	30	15	647168	3707.52	CP-OFDM QPSK	1@1	24.27	24.17	27.23	26.73	0.4710
77	30	15	647168	3707.52	CP-OFDM 16 QAM	1@1	23.97	23.72	26.86	26.36	0.4325
77	30	15	656000	3840	CP-OFDM QPSK	1@1	24.86	24.83	27.86	27.36	0.5445
77	30	15	656000	3840	CP-OFDM 16 QAM	1@1	24.6	24.28	27.45	26.95	0.4955
77	30	15	664832	3972.48	CP-OFDM QPSK	1@1	24.62	24.71	27.68	27.18	0.5224
77	30	15	664832	3972.48	CP-OFDM 16 QAM	1@1	24.47	24.4	27.45	26.95	0.4955
77	30	20	647334	3710.01	CP-OFDM QPSK	1@1	24.29	24.17	27.24	26.74	0.4721
77	30	20	647334	3710.01	CP-OFDM 16 QAM	1@1	24.29	23.76	27.04	26.54	0.4508
77	30	20	656000	3840	CP-OFDM QPSK	1@1	24.81	24.94	27.89	27.39	0.5483
77	30	20	656000	3840	CP-OFDM 16 QAM	1@1	24.53	24.34	27.45	26.95	0.4955
77	30	20	664666	3969.99	CP-OFDM QPSK	1@1	24.63	24.67	27.66	27.16	0.5200
77	30	20	664666	3969.99	CP-OFDM 16 QAM	1@1	24.27	24.24	27.27	26.77	0.4753
77	30	25	647500	3712.5	CP-OFDM QPSK	1@1	24.24	24.15	27.21	26.71	0.4688
77	30	25	647500	3712.5	CP-OFDM 16 QAM	1@1	24.24	23.8	27.04	26.54	0.4508
77	30	25	656000	3840	CP-OFDM QPSK	1@1	24.84	24.95	27.91	27.41	0.5508
77	30	25	656000	3840	CP-OFDM 16 QAM	1@1	24.65	24.34	27.51	27.01	0.5023
77	30	25	664500	3967.5	CP-OFDM QPSK	1@1	24.64	24.74	27.70	27.2	0.5248
77	30	25	664500	3967.5	CP-OFDM 16 QAM	1@1	24.44	24.61	27.54	27.04	0.5058
77	30	30	647668	3715.02	CP-OFDM QPSK	1@1	24.37	24.27	27.33	26.83	0.4819
77	30	30	647668	3715.02	CP-OFDM 16 QAM	1@1	24.1	23.78	26.95	26.45	0.4416
77	30	30	656000	3840	CP-OFDM QPSK	1@1	24.92	24.99	27.97	27.47	0.5585
77	30	30	656000	3840	CP-OFDM 16 QAM	1@1	24.61	24.43	27.53	27.03	0.5047
77	30	30	664332	3964.98	CP-OFDM QPSK	1@1	24.59	24.72	27.67	27.17	0.5212
77	30	30	664332	3964.98	CP-OFDM 16 QAM	1@1	24.41	24.41	27.42	26.92	0.4920
77	30	40	648000	3720	CP-OFDM QPSK	1@1	24.6	24.39	27.51	27.01	0.5023
77	30	40	648000	3720	CP-OFDM 16 QAM	1@1	24.26	23.95	27.12	26.62	0.4592
77	30	40	656000	3840	CP-OFDM QPSK	1@1	25	25.05	28.04	27.54	0.5675
77	30	40	656000	3840	CP-OFDM 16 QAM	1@1	24.65	24.54	27.61	27.11	0.5140
77	30	40	664000	3960	CP-OFDM QPSK	1@1	24.55	24.77	27.67	27.17	0.5212



77	30	40	664000	3960	CP-OFDM 16 QAM	1@1	24.4	24.22	27.32	26.82	0.4808
77	30	50	648334	3725.01	CP-OFDM QPSK	1@1	24.17	24.15	27.17	26.67	0.4645
77	30	50	648334	3725.01	CP-OFDM 16 QAM	1@1	24.07	23.78	26.94	26.44	0.4406
77	30	50	656000	3840	CP-OFDM QPSK	1@1	24.59	24.72	27.67	27.17	0.5212
77	30	50	656000	3840	CP-OFDM 16 QAM	1@1	24.35	24.29	27.33	26.83	0.4819
77	30	50	663666	3954.99	CP-OFDM QPSK	1@1	24.28	24.35	27.33	26.83	0.4819
77	30	50	663666	3954.99	CP-OFDM 16 QAM	1@1	23.85	23.9	26.89	26.39	0.4355
77	30	60	648668	3730.02	CP-OFDM QPSK	1@1	24.11	24.09	27.11	26.61	0.4581
77	30	60	648668	3730.02	CP-OFDM 16 QAM	1@1	24.1	23.74	26.93	26.43	0.4395
77	30	60	656000	3840	CP-OFDM QPSK	1@1	24.68	24.71	27.71	27.21	0.5260
77	30	60	656000	3840	CP-OFDM 16 QAM	1@1	24.38	24.21	27.31	26.81	0.4797
77	30	60	663332	3949.98	CP-OFDM QPSK	1@1	24.28	24.26	27.28	26.78	0.4764
77	30	60	663332	3949.98	CP-OFDM 16 QAM	1@1	24.05	23.71	26.89	26.39	0.4355
77	30	70	649000	3735	CP-OFDM QPSK	1@1	24.16	23.95	27.07	26.57	0.4539
77	30	70	649000	3735	CP-OFDM 16 QAM	1@1	24.1	23.56	26.85	26.35	0.4315
77	30	70	656000	3840	CP-OFDM QPSK	1@1	24.64	24.68	27.67	27.17	0.5212
77	30	70	656000	3840	CP-OFDM 16 QAM	1@1	24.45	24.18	27.33	26.83	0.4819
77	30	70	663000	3945	CP-OFDM QPSK	1@1	24.55	24.31	27.44	26.94	0.4943
77	30	70	663000	3945	CP-OFDM 16 QAM	1@1	24.27	23.72	27.01	26.51	0.4477
77	30	80	649334	3740.01	CP-OFDM QPSK	1@1	24.1	24.02	27.07	26.57	0.4539
77	30	80	649334	3740.01	CP-OFDM 16 QAM	1@1	24.01	23.65	26.84	26.34	0.4305
77	30	80	656000	3840	CP-OFDM QPSK	1@1	24.53	24.65	27.60	27.1	0.5129
77	30	80	656000	3840	CP-OFDM 16 QAM	1@1	24.41	24.13	27.28	26.78	0.4764
77	30	80	662666	3939.99	CP-OFDM QPSK	1@1	24.5	24.26	27.39	26.89	0.4887
77	30	80	662666	3939.99	CP-OFDM 16 QAM	1@1	24.23	23.7	26.98	26.48	0.4446
77	30	90	649668	3745.02	CP-OFDM QPSK	1@1	24.17	23.97	27.08	26.58	0.4550
77	30	90	649668	3745.02	CP-OFDM 16 QAM	1@1	24.05	23.71	26.89	26.39	0.4355
77	30	90	656000	3840	CP-OFDM QPSK	1@1	24.74	24.65	27.71	27.21	0.5260
77	30	90	656000	3840	CP-OFDM 16 QAM	1@1	24.27	24.17	27.23	26.73	0.4710
77	30	90	662332	3934.98	CP-OFDM QPSK	1@1	24.48	24.31	27.41	26.91	0.4909
77	30	90	662332	3934.98	CP-OFDM 16 QAM	1@1	24.31	23.74	27.04	26.54	0.4508
77	30	100	650000	3750	CP-OFDM QPSK	137@68	24.13	24.07	27.11	26.61	0.4581
77	30	100	650000	3750	CP-OFDM QPSK	1@1	24.18	24.01	27.11	26.61	0.4581
77	30	100	650000	3750	CP-OFDM QPSK	1@271	24.3	24.22	27.27	26.77	0.4753
77	30	100	650000	3750	CP-OFDM 16 QAM	137@68	23.62	23.57	26.61	26.11	0.4083
77	30	100	650000	3750	CP-OFDM 16 QAM	1@1	24.05	23.52	26.80	26.3	0.4266
77	30	100	650000	3750	CP-OFDM 16 QAM	1@271	24.19	23.88	27.05	26.55	0.4519
77	30	100	650000	3750	CP-OFDM 64 QAM	137@68	21.83	21.69	24.77	24.27	0.2673
77	30	100	650000	3750	CP-OFDM 64 QAM	1@1	21.84	21.46	24.66	24.16	0.2606
77	30	100	650000	3750	CP-OFDM 64 QAM	1@271	21.94	21.75	24.86	24.36	0.2729
77	30	100	650000	3750	CP-OFDM 256 QAM	137@68	17.68	17.65	20.68	20.18	0.1042



77	30	100	650000	3750	CP-OFDM 256 QAM	1@1	17.82	17.54	20.69	20.19	0.1045
77	30	100	650000	3750	CP-OFDM 256 QAM	1@271	17.93	18.01	20.98	20.48	0.1117
77	30	100	656000	3840	CP-OFDM QPSK	137@68	25.03	25.08	28.07	27.57	0.5715
77	30	100	656000	3840	CP-OFDM QPSK	1@1	24.4	24.68	27.55	27.05	0.5070
77	30	100	656000	3840	CP-OFDM QPSK	1@271	24.35	24.26	27.32	26.82	0.4808
77	30	100	656000	3840	CP-OFDM 16 QAM	137@68	23.99	23.98	27.00	26.5	0.4467
77	30	100	656000	3840	CP-OFDM 16 QAM	1@1	24.27	24.21	27.25	26.75	0.4732
77	30	100	656000	3840	CP-OFDM 16 QAM	1@271	24.16	23.59	26.89	26.39	0.4355
77	30	100	656000	3840	CP-OFDM 64 QAM	137@68	22.11	22.12	25.13	24.63	0.2904
77	30	100	656000	3840	CP-OFDM 64 QAM	1@1	22.11	22.06	25.10	24.6	0.2884
77	30	100	656000	3840	CP-OFDM 64 QAM	1@271	21.98	21.56	24.79	24.29	0.2685
77	30	100	656000	3840	CP-OFDM 256 QAM	137@68	18.1	18.15	21.14	20.64	0.1159
77	30	100	656000	3840	CP-OFDM 256 QAM	1@1	18.06	18.44	21.26	20.76	0.1191
77	30	100	656000	3840	CP-OFDM 256 QAM	1@271	17.98	17.92	20.96	20.46	0.1112
77	30	100	662000	3930	CP-OFDM QPSK	137@68	24.29	24.2	27.26	26.76	0.4742
77	30	100	662000	3930	CP-OFDM QPSK	1@1	24.6	24.3	27.46	26.96	0.4966
77	30	100	662000	3930	CP-OFDM QPSK	1@271	24.48	24.23	27.37	26.87	0.4864
77	30	100	662000	3930	CP-OFDM 16 QAM	137@68	23.77	23.66	26.73	26.23	0.4198
77	30	100	662000	3930	CP-OFDM 16 QAM	1@1	24.38	23.8	27.11	26.61	0.4581
77	30	100	662000	3930	CP-OFDM 16 QAM	1@271	24.4	23.92	27.18	26.68	0.4656
77	30	100	662000	3930	CP-OFDM 64 QAM	137@68	21.92	21.8	24.87	24.37	0.2735
77	30	100	662000	3930	CP-OFDM 64 QAM	1@1	22.44	21.88	25.18	24.68	0.2938
77	30	100	662000	3930	CP-OFDM 64 QAM	1@271	22.08	21.78	24.94	24.44	0.2780
77	30	100	662000	3930	CP-OFDM 256 QAM	137@68	17.97	17.86	20.93	20.43	0.1104
77	30	100	662000	3930	CP-OFDM 256 QAM	1@1	18.22	18.11	21.18	20.68	0.1169
77	30	100	662000	3930	CP-OFDM 256 QAM	1@271	18.06	18.15	21.12	20.62	0.1153



FR1 N77 MIMO-ANT4

Frequency Stability

NR Band	SCS (kHz)	Bandwidth (MHz)	Arfcn	Freq (MHz)	Modulation	RB	Deviation (Hz)	Verdict	Environment
77	30	20	656000	3840.0	CP-OFDM QPSK	51@0	18.5	PASS	NV
77	30	20	656000	3840.0	CP-OFDM QPSK	51@0	11.1	PASS	LV
77	30	20	656000	3840.0	CP-OFDM QPSK	51@0	17.5	PASS	HV
77	30	20	656000	3840.0	CP-OFDM QPSK	51@0	14.9	PASS	-30°C
77	30	20	656000	3840.0	CP-OFDM QPSK	51@0	13.4	PASS	-20°C
77	30	20	656000	3840.0	CP-OFDM QPSK	51@0	15.8	PASS	-10°C
77	30	20	656000	3840.0	CP-OFDM QPSK	51@0	11.9	PASS	0°C
77	30	20	656000	3840.0	CP-OFDM QPSK	51@0	12.5	PASS	10°C
77	30	20	656000	3840.0	CP-OFDM QPSK	51@0	13.7	PASS	20°C
77	30	20	656000	3840.0	CP-OFDM QPSK	51@0	14.6	PASS	30°C
77	30	20	656000	3840.0	CP-OFDM QPSK	51@0	11.1	PASS	40°C
77	30	20	656000	3840.0	CP-OFDM QPSK	51@0	18.7	PASS	50°C

$|\text{MAX}(\Delta f)| = 18.7 \text{ Hz}$

Frequency Stability	Frequency (MHz)	Limit Line	Result
fL - $ \text{MAX}(\Delta f) $	3700.998182	$\geq 3700 \text{ MHz}$	PASS
fH + $ \text{MAX}(\Delta f) $	3978.771317	$\leq 3980 \text{ MHz}$	



Peak to Average Ratio

NR Band	SCS (kHz)	Bandwidth (MHz)	Arfcn	Freq (MHz)	Modulation	RB	Result (dB)	Limit (dB)	Verdict
77	30	20	656000	3840.0	CP-OFDM QPSK	51@0	7.08	13	PASS

N77(20M)_CP-OFDM_QPSK_Outer_Full_Mid_CH





Occupied Bandwidth

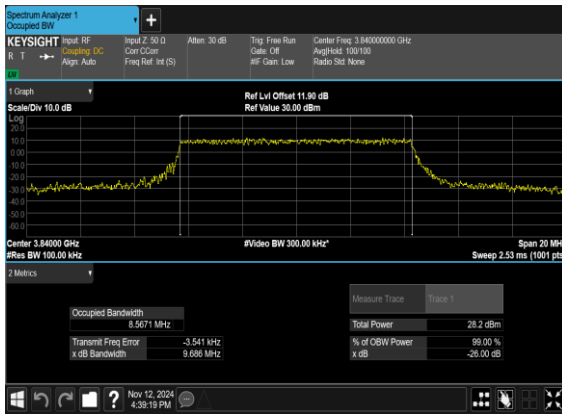
NR Band	SCS (kHz)	Bandwidth (MHz)	Arfcn	Freq (MHz)	Modulation	RB	OBW (MHz)	26dB BW (MHz)
77	30	10	656000	3840.0	CP-OFDM QPSK	24@0	8.5671	9.686
77	30	10	656000	3840.0	CP-OFDM 16 QAM	24@0	8.5773	9.741
77	30	10	656000	3840.0	CP-OFDM 64 QAM	24@0	8.6014	9.589
77	30	10	656000	3840.0	CP-OFDM 256 QAM	24@0	8.5836	9.927
77	30	15	656000	3840.0	CP-OFDM QPSK	38@0	13.546	14.69
77	30	15	656000	3840.0	CP-OFDM 16 QAM	38@0	13.552	14.86
77	30	15	656000	3840.0	CP-OFDM 64 QAM	38@0	13.625	14.71
77	30	15	656000	3840.0	CP-OFDM 256 QAM	38@0	13.585	14.35
77	30	20	656000	3840.0	CP-OFDM QPSK	51@0	18.215	19.5
77	30	20	656000	3840.0	CP-OFDM 16 QAM	51@0	18.191	19.68
77	30	20	656000	3840.0	CP-OFDM 64 QAM	51@0	18.161	19.5
77	30	20	656000	3840.0	CP-OFDM 256 QAM	51@0	18.238	19.92
77	30	25	656000	3840.0	CP-OFDM QPSK	65@0	23.135	24.76
77	30	25	656000	3840.0	CP-OFDM 16 QAM	65@0	23.182	24.79
77	30	25	656000	3840.0	CP-OFDM 64 QAM	65@0	23.143	24.47
77	30	25	656000	3840.0	CP-OFDM 256 QAM	65@0	23.279	24.29
77	30	30	656000	3840.0	CP-OFDM QPSK	78@0	27.794	29.47
77	30	30	656000	3840.0	CP-OFDM 16 QAM	78@0	27.827	28.79
77	30	30	656000	3840.0	CP-OFDM 64 QAM	78@0	27.8	29.58
77	30	30	656000	3840.0	CP-OFDM 256 QAM	78@0	27.802	29.12
77	30	40	656000	3840.0	CP-OFDM QPSK	106@0	37.734	39.41
77	30	40	656000	3840.0	CP-OFDM 16 QAM	106@0	37.82	39.12
77	30	40	656000	3840.0	CP-OFDM 64 QAM	106@0	37.888	39.91



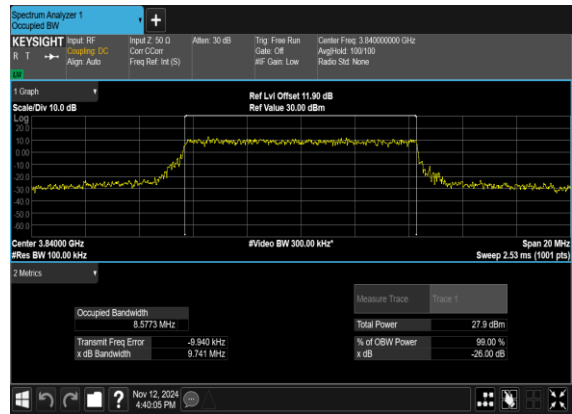
77	30	40	656000	3840.0	CP-OFDM 256 QAM	106@0	37.924	39.3
77	30	50	656000	3840.0	CP-OFDM QPSK	133@0	47.473	49.08
77	30	50	656000	3840.0	CP-OFDM 16 QAM	133@0	47.495	49.59
77	30	50	656000	3840.0	CP-OFDM 64 QAM	133@0	47.507	49.3
77	30	50	656000	3840.0	CP-OFDM 256 QAM	133@0	47.57	49.26
77	30	60	656000	3840.0	CP-OFDM QPSK	162@0	57.731	60.06
77	30	60	656000	3840.0	CP-OFDM 16 QAM	162@0	57.754	59.76
77	30	60	656000	3840.0	CP-OFDM 64 QAM	162@0	57.754	59.97
77	30	60	656000	3840.0	CP-OFDM 256 QAM	162@0	58.085	59.66
77	30	70	656000	3840.0	CP-OFDM QPSK	189@0	67.492	69.85
77	30	70	656000	3840.0	CP-OFDM 16 QAM	189@0	67.766	70.0
77	30	70	656000	3840.0	CP-OFDM 64 QAM	189@0	67.75	69.66
77	30	70	656000	3840.0	CP-OFDM 256 QAM	189@0	67.636	69.98
77	30	80	656000	3840.0	CP-OFDM QPSK	217@0	77.387	80.05
77	30	80	656000	3840.0	CP-OFDM 16 QAM	217@0	77.546	79.94
77	30	80	656000	3840.0	CP-OFDM 64 QAM	217@0	77.585	80.06
77	30	80	656000	3840.0	CP-OFDM 256 QAM	217@0	77.71	80.21
77	30	90	656000	3840.0	CP-OFDM QPSK	245@0	87.482	90.21
77	30	90	656000	3840.0	CP-OFDM 16 QAM	245@0	87.606	90.22
77	30	90	656000	3840.0	CP-OFDM 64 QAM	245@0	87.64	90.45
77	30	90	656000	3840.0	CP-OFDM 256 QAM	245@0	87.511	90.17
77	30	100	656000	3840.0	CP-OFDM QPSK	273@0	97.524	100.5
77	30	100	656000	3840.0	CP-OFDM 16 QAM	273@0	97.718	100.7
77	30	100	656000	3840.0	CP-OFDM 64 QAM	273@0	97.591	100.6
77	30	100	656000	3840.0	CP-OFDM 256 QAM	273@0	97.338	100.5



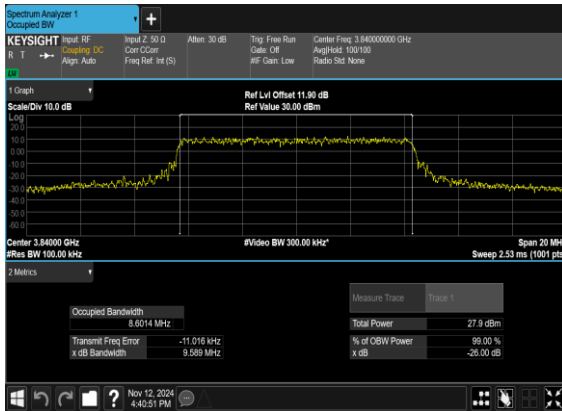
N77(10M)_CP-OFDM_QPSK_Outer_Full_Mid_CH



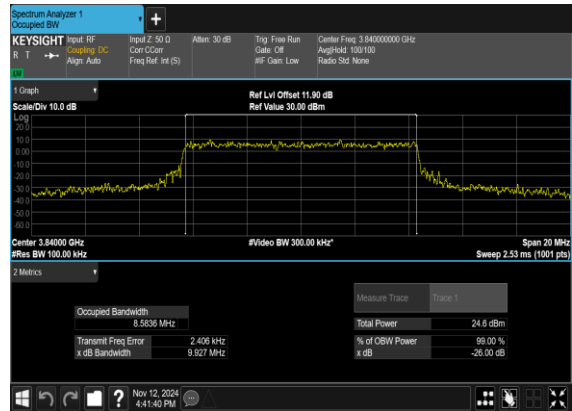
N77(10M)_CP-OFDM_16 QAM_Outer_Full_Mid_CH



N77(10M)_CP-OFDM_64 QAM_Outer_Full_Mid_CH

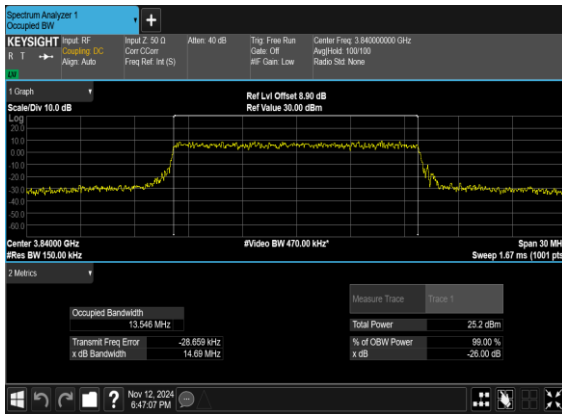


N77(10M)_CP-OFDM_256 QAM_Outer_Full_Mid_CH





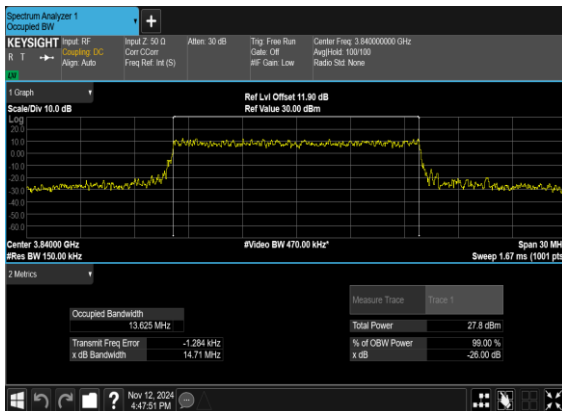
N77(15M)_CP-OFDM_QPSK_Outer_Full_Mid_CH



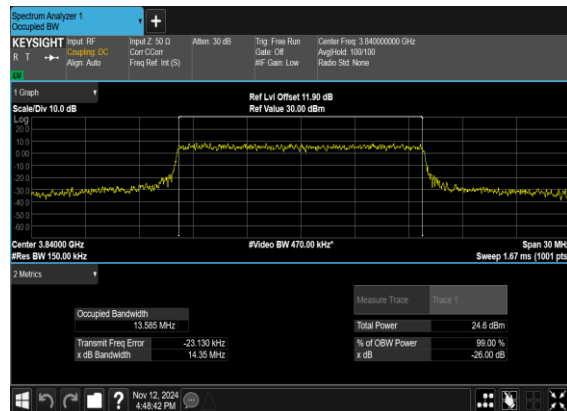
N77(15M)_CP-OFDM_16QAM_Outer_Full_Mid_CH



N77(15M)_CP-OFDM_64QAM_Outer_Full_Mid_CH

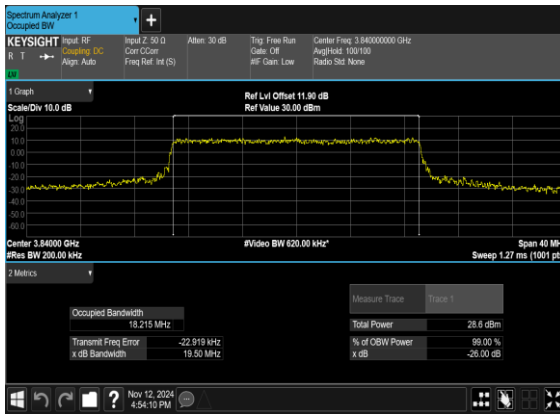


N77(15M)_CP-OFDM_256QAM_Outer_Full_Mid_CH





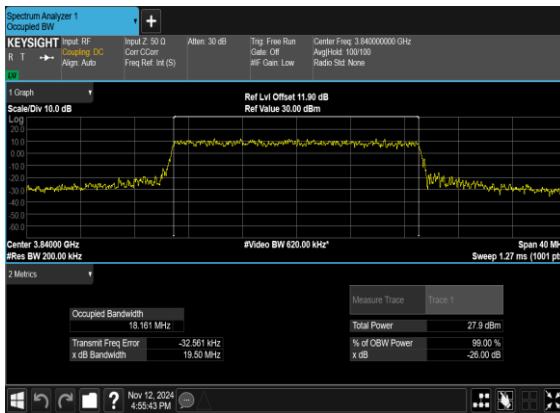
N77(20M)_CP-OFDM_QPSK_Outer_Full_Mid_CH



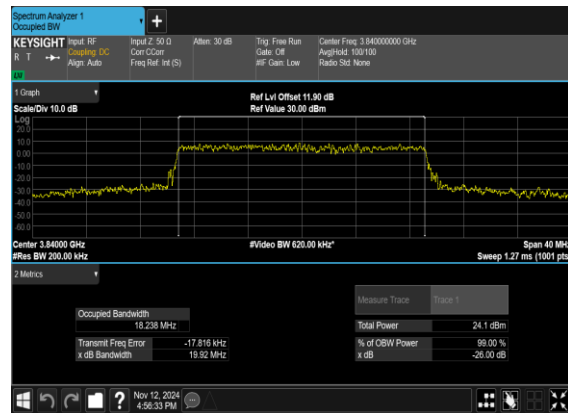
N77(20M)_CP-OFDM_16QAM_Outer_Full_Mid_CH



N77(20M)_CP-OFDM_64QAM_Outer_Full_Mid_CH

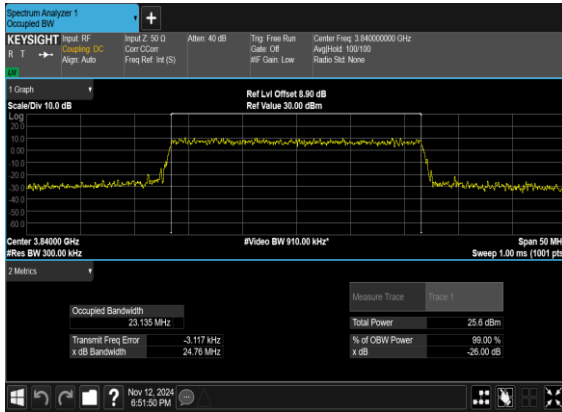


N77(20M)_CP-OFDM_256QAM_Outer_Full_Mid_CH

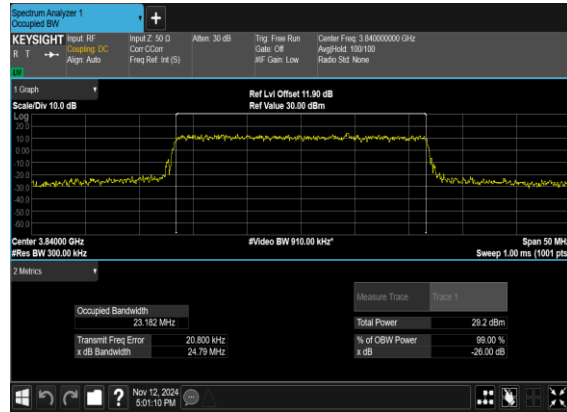




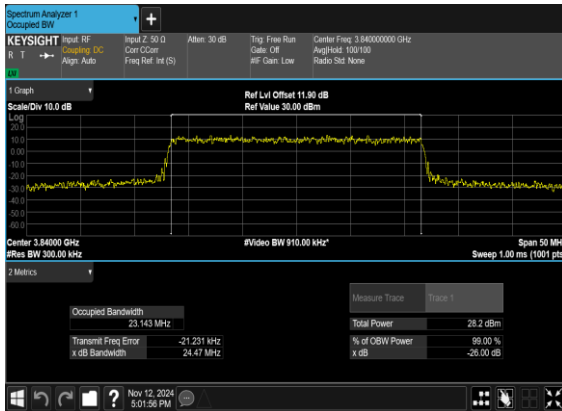
N77(25M)_CP-OFDM_QPSK_Outer_Full_Mid_CH



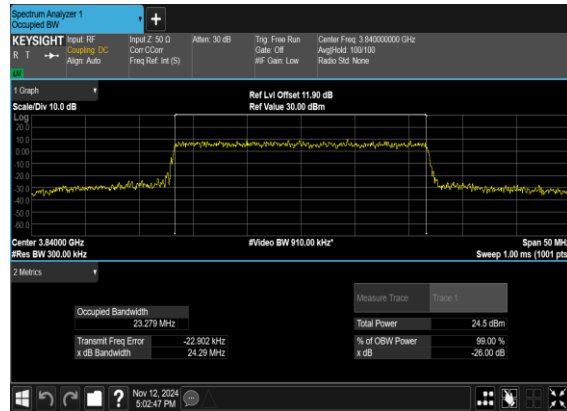
N77(25M)_CP-OFDM_16QAM_Outer_Full_Mid_CH



N77(25M)_CP-OFDM_64QAM_Outer_Full_Mid_CH

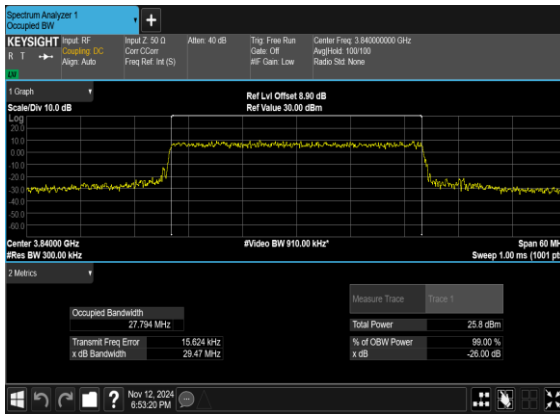


N77(25M)_CP-OFDM_256QAM_Outer_Full_Mid_CH

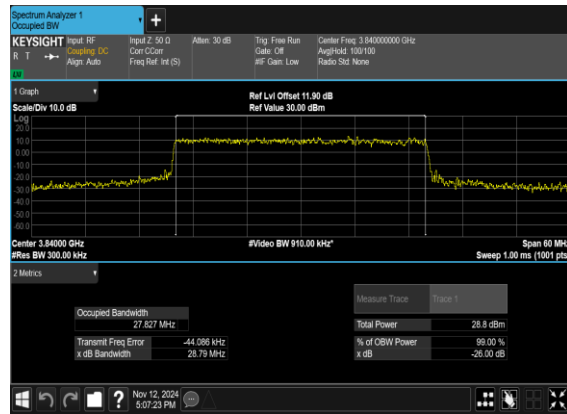




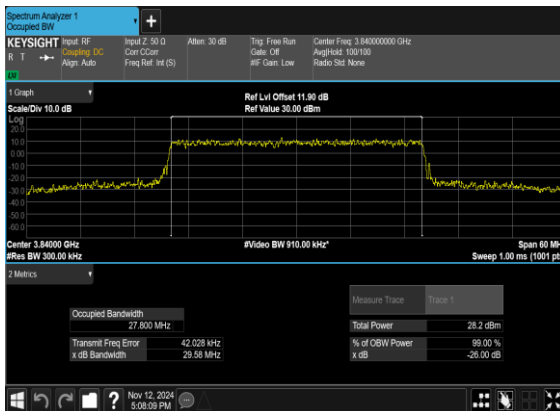
N77(30M)_CP-OFDM_QPSK_Outer_Full_Mid_CH



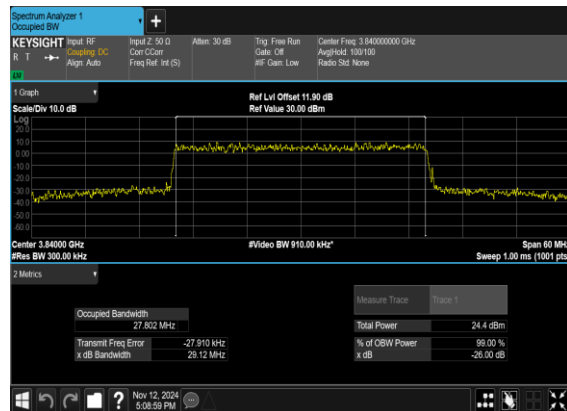
N77(30M)_CP-OFDM_16QAM_Outer_Full_Mid_CH



N77(30M)_CP-OFDM_64QAM_Outer_Full_Mid_CH

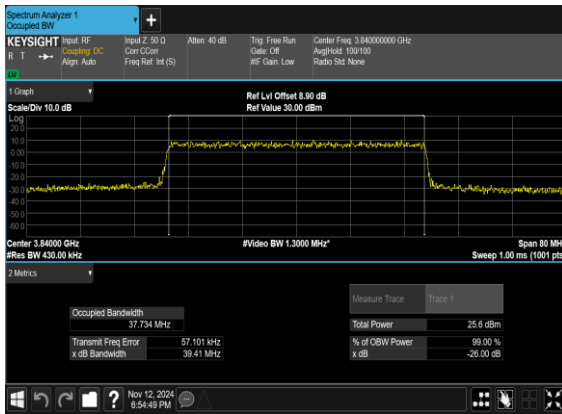


N77(30M)_CP-OFDM_256QAM_Outer_Full_Mid_CH

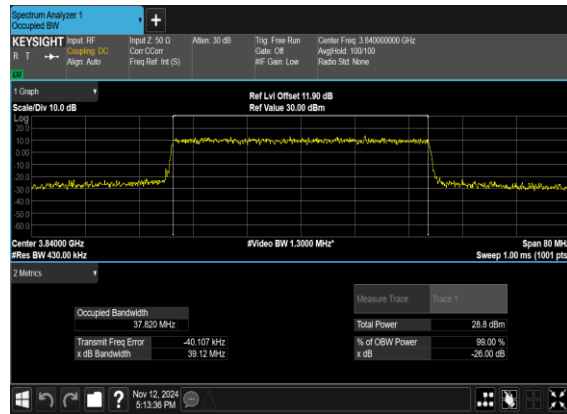




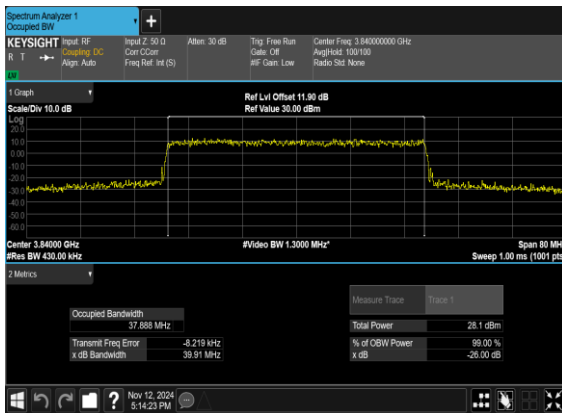
N77(40M)_CP-OFDM_QPSK_Outer_Full_Mid_CH



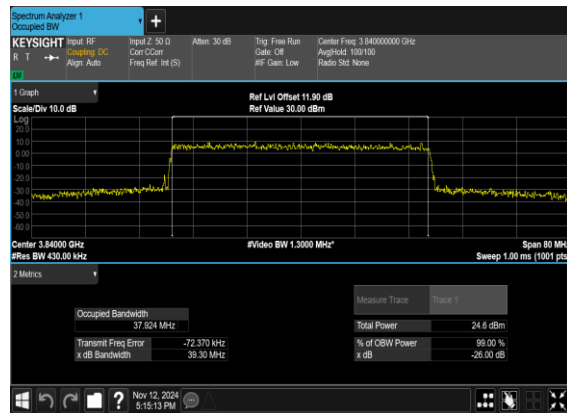
N77(40M)_CP-OFDM_16 QAM_Outer_Full_Mid_CH



N77(40M)_CP-OFDM_64 QAM_Outer_Full_Mid_CH

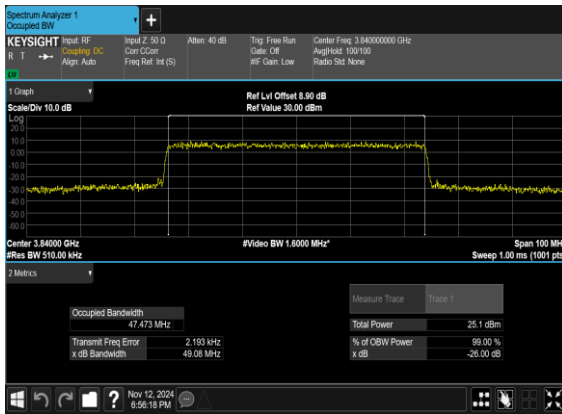


N77(40M)_CP-OFDM_256 QAM_Outer_Full_Mid_CH

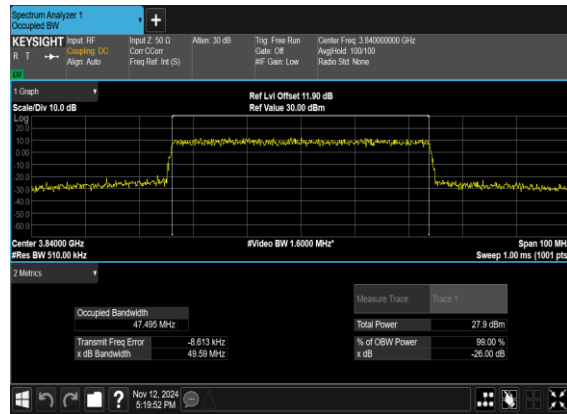




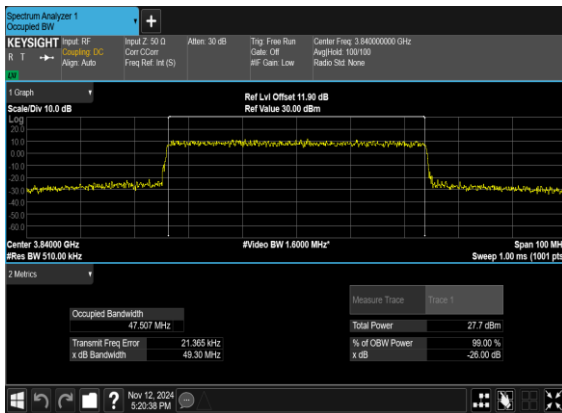
N77(50M)_CP-OFDM_QPSK_Outer_Full_Mid_CH



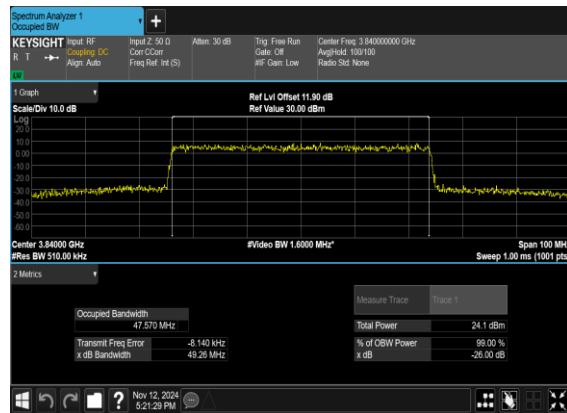
N77(50M)_CP-OFDM_16 QAM_Outer_Full_Mid_CH



N77(50M)_CP-OFDM_64 QAM_Outer_Full_Mid_CH

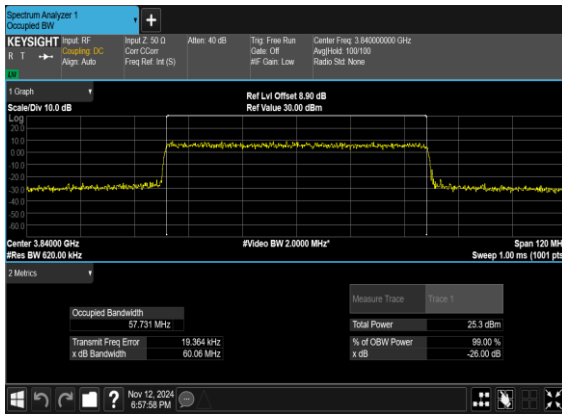


N77(50M)_CP-OFDM_256 QAM_Outer_Full_Mid_CH

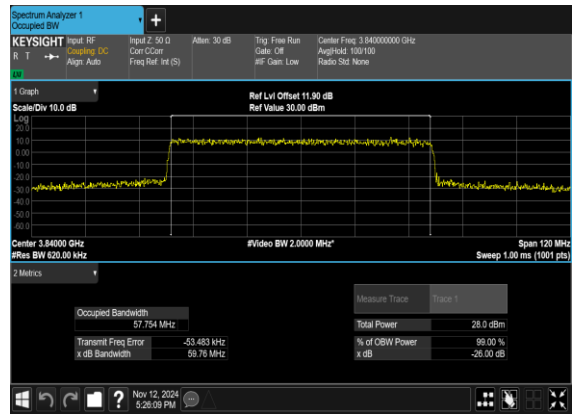




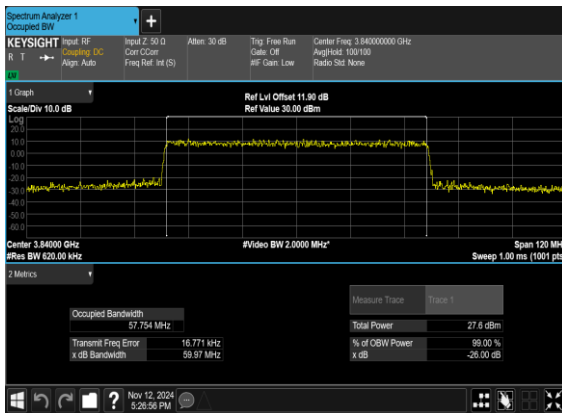
N77(60M)_CP-OFDM_QPSK_Outer_Full_Mid_CH



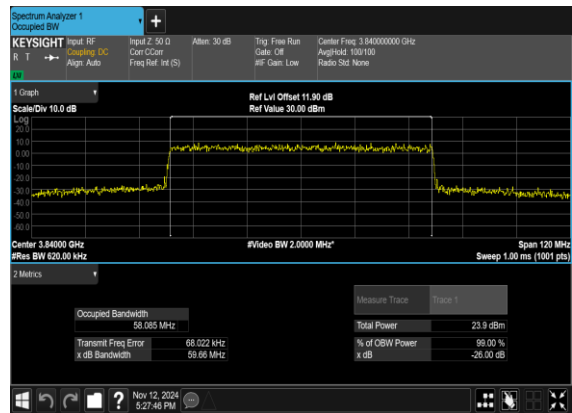
N77(60M)_CP-OFDM_16 QAM_Outer_Full_Mid_CH



N77(60M)_CP-OFDM_64 QAM_Outer_Full_Mid_CH



N77(60M)_CP-OFDM_256 QAM_Outer_Full_Mid_CH

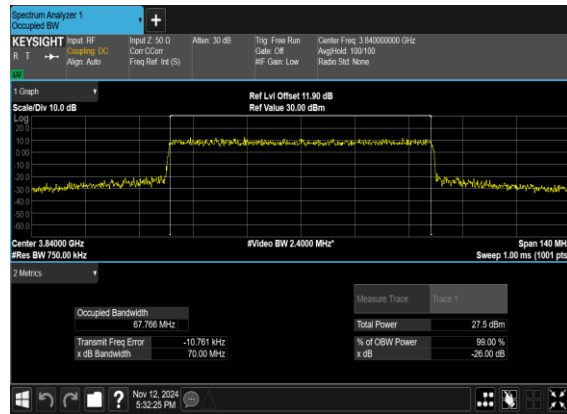




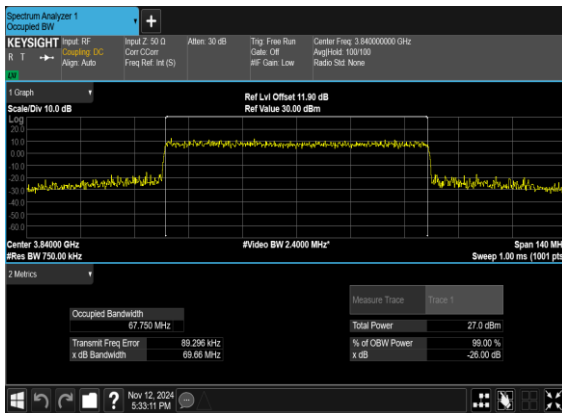
N77(70M)_CP-OFDM_QPSK_Outer_Full_Mid_CH



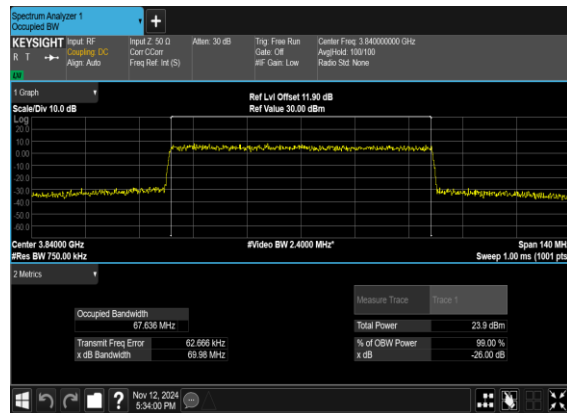
N77(70M)_CP-OFDM_16 QAM_Outer_Full_Mid_CH



N77(70M)_CP-OFDM_64 QAM_Outer_Full_Mid_CH

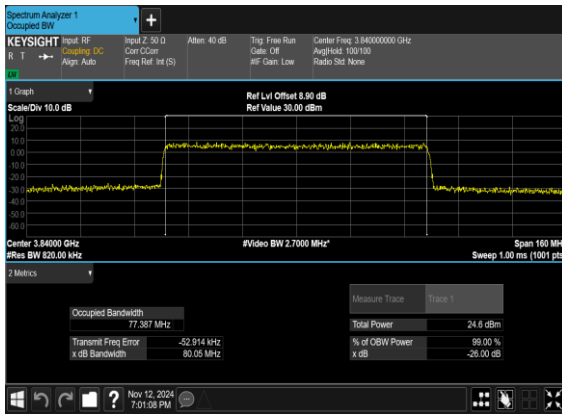


N77(70M)_CP-OFDM_256 QAM_Outer_Full_Mid_CH

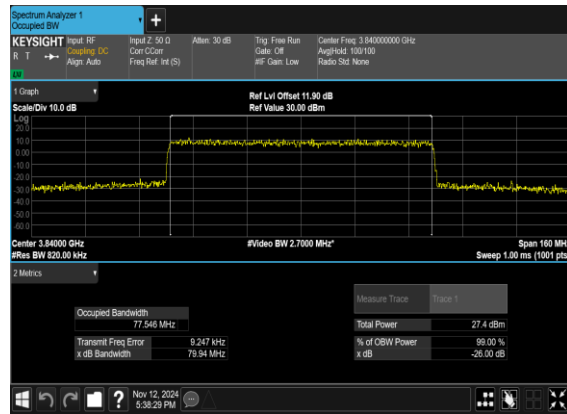




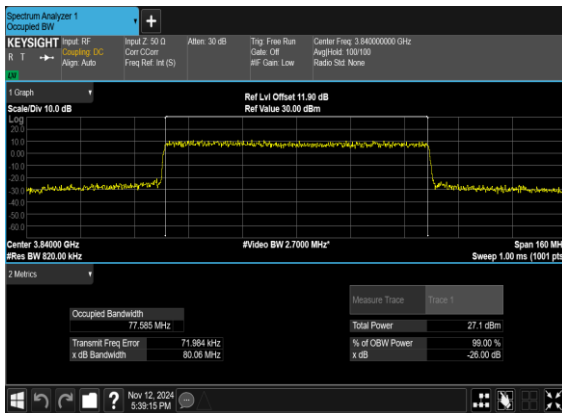
N77(80M)_CP-OFDM_QPSK_Outer_Full_Mid_CH



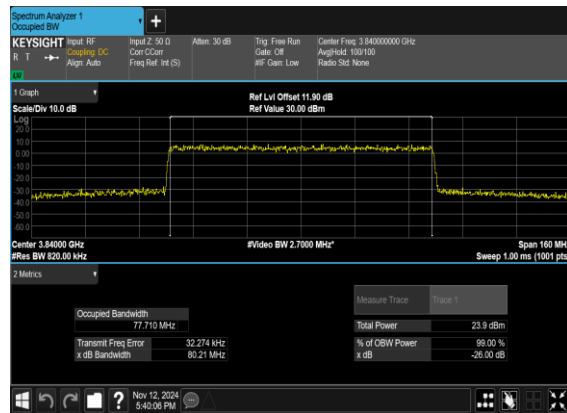
N77(80M)_CP-OFDM_16QAM_Outer_Full_Mid_CH



N77(80M)_CP-OFDM_64QAM_Outer_Full_Mid_CH

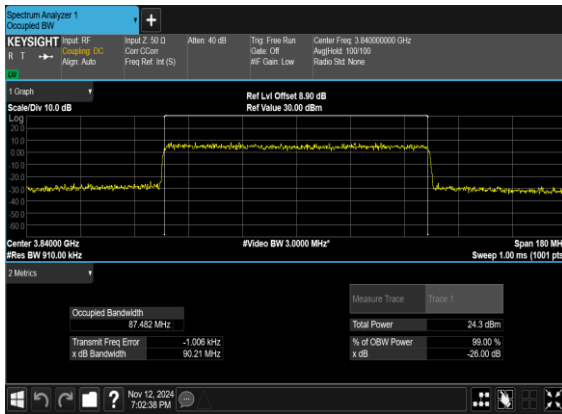


N77(80M)_CP-OFDM_256QAM_Outer_Full_Mid_CH

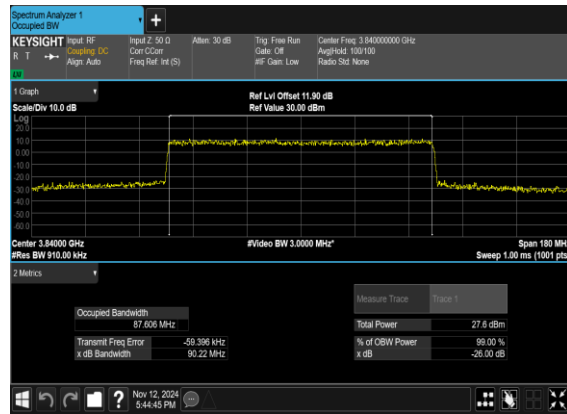




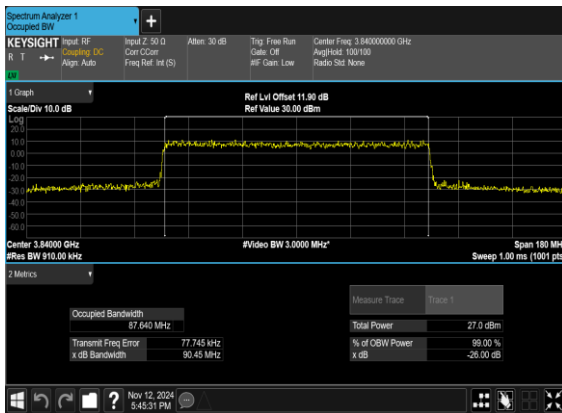
N77(90M)_CP-OFDM_QPSK_Outer_Full_Mid_CH



N77(90M)_CP-OFDM_16QAM_Outer_Full_Mid_CH



N77(90M)_CP-OFDM_64QAM_Outer_Full_Mid_CH



N77(90M)_CP-OFDM_256QAM_Outer_Full_Mid_CH

