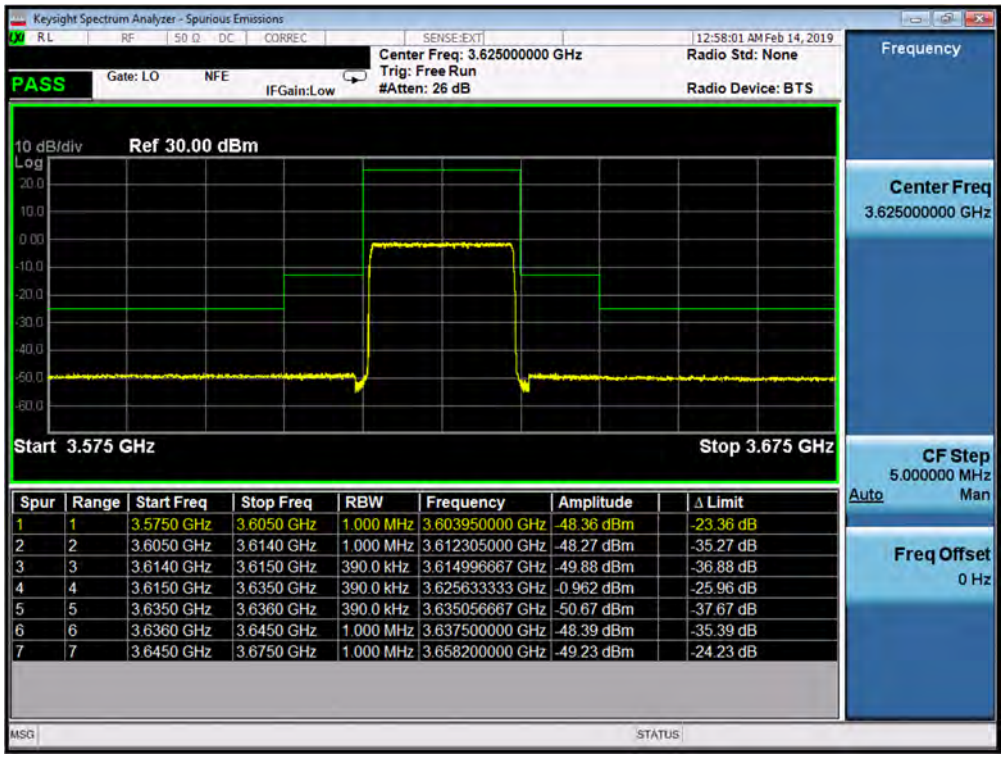
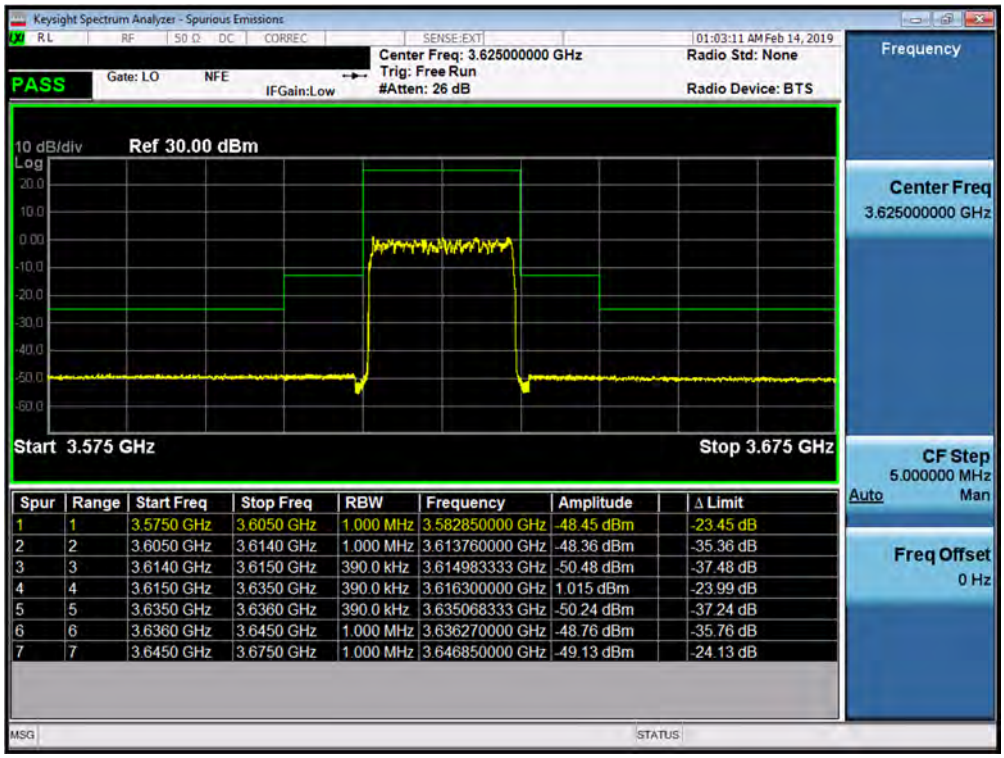


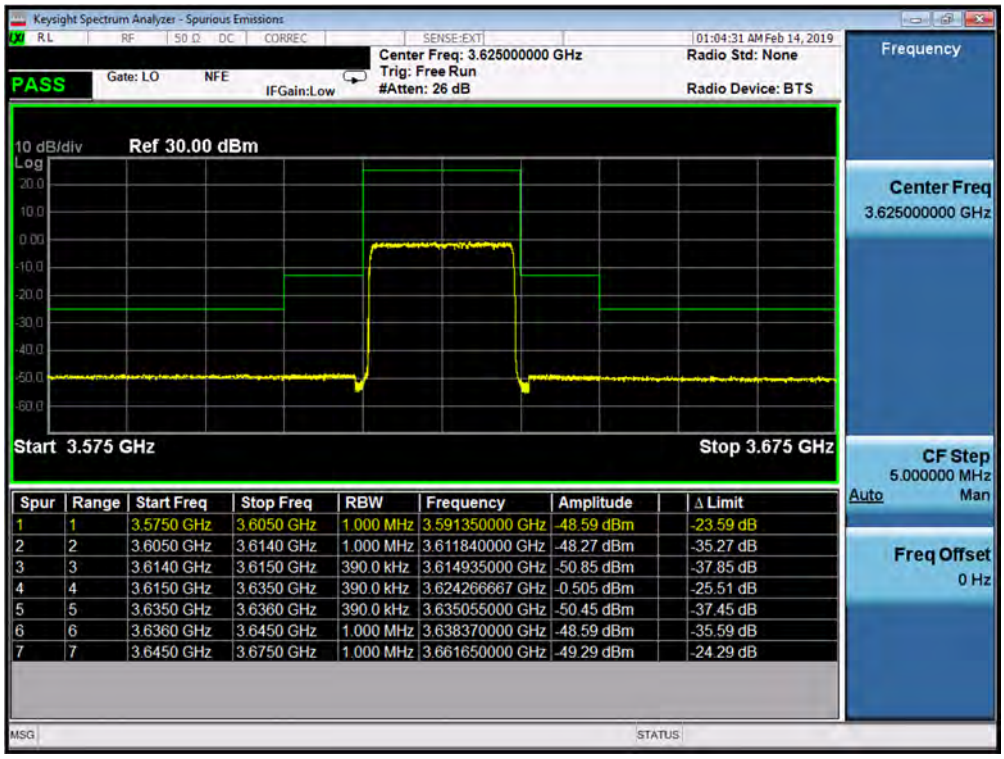
Spur	Range	Start Freq	Stop Freq	RBW	Frequency	Amplitude	Δ Limit
1	1	3.5750 GHz	3.6050 GHz	1.000 MHz	3.603950000 GHz	-48.36 dBm	-23.36 dB
2	2	3.6050 GHz	3.6140 GHz	1.000 MHz	3.612305000 GHz	-48.27 dBm	-35.27 dB
3	3	3.6140 GHz	3.6150 GHz	390.0 kHz	3.614996667 GHz	-49.88 dBm	-36.88 dB
4	4	3.6150 GHz	3.6350 GHz	390.0 kHz	3.625633333 GHz	-0.962 dBm	-25.96 dB
5	5	3.6350 GHz	3.6360 GHz	390.0 kHz	3.635056667 GHz	-50.67 dBm	-37.67 dB
6	6	3.6360 GHz	3.6450 GHz	1.000 MHz	3.637500000 GHz	-48.39 dBm	-35.39 dB
7	7	3.6450 GHz	3.6750 GHz	1.000 MHz	3.658200000 GHz	-49.23 dBm	-24.23 dB

Plot 7-455. Channel Edge Plot (20.0MHz QPSK Mid Channel - SISO)



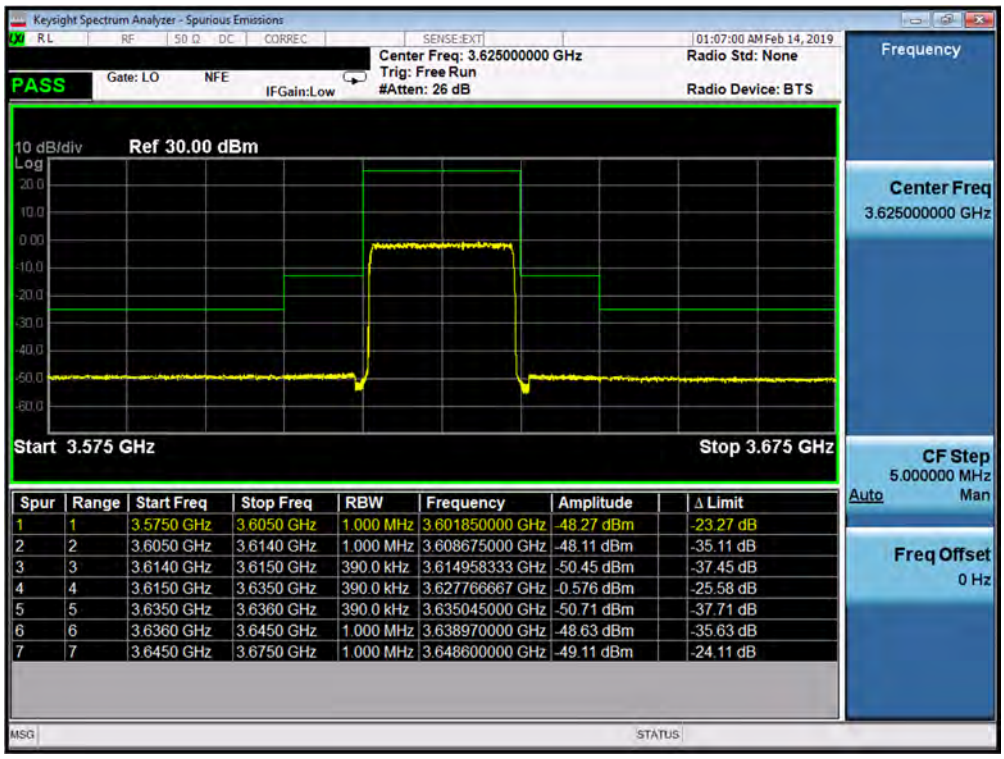
Spur	Range	Start Freq	Stop Freq	RBW	Frequency	Amplitude	Δ Limit
1	1	3.5750 GHz	3.6050 GHz	1.000 MHz	3.582850000 GHz	-48.45 dBm	-23.45 dB
2	2	3.6050 GHz	3.6140 GHz	1.000 MHz	3.613760000 GHz	-48.36 dBm	-35.36 dB
3	3	3.6140 GHz	3.6150 GHz	390.0 kHz	3.614983333 GHz	-50.48 dBm	-37.48 dB
4	4	3.6150 GHz	3.6350 GHz	390.0 kHz	3.616300000 GHz	1.015 dBm	-23.99 dB
5	5	3.6350 GHz	3.6360 GHz	390.0 kHz	3.635068333 GHz	-50.24 dBm	-37.24 dB
6	6	3.6360 GHz	3.6450 GHz	1.000 MHz	3.636270000 GHz	-48.76 dBm	-35.76 dB
7	7	3.6450 GHz	3.6750 GHz	1.000 MHz	3.646850000 GHz	-49.13 dBm	-24.13 dB

Plot 7-456. Channel Edge Plot (20.0MHz 16QAM Mid Channel - SISO)



Spur	Range	Start Freq	Stop Freq	RBW	Frequency	Amplitude	Δ Limit
1	1	3.5750 GHz	3.6050 GHz	1.000 MHz	3.591350000 GHz	-48.59 dBm	-23.59 dB
2	2	3.6050 GHz	3.6140 GHz	1.000 MHz	3.611840000 GHz	-48.27 dBm	-35.27 dB
3	3	3.6140 GHz	3.6150 GHz	390.0 kHz	3.614935000 GHz	-50.85 dBm	-37.85 dB
4	4	3.6150 GHz	3.6350 GHz	390.0 kHz	3.624266667 GHz	-0.505 dBm	-25.51 dB
5	5	3.6350 GHz	3.6360 GHz	390.0 kHz	3.635055000 GHz	-50.45 dBm	-37.45 dB
6	6	3.6360 GHz	3.6450 GHz	1.000 MHz	3.638370000 GHz	-48.59 dBm	-35.59 dB
7	7	3.6450 GHz	3.6750 GHz	1.000 MHz	3.661650000 GHz	-49.29 dBm	-24.29 dB

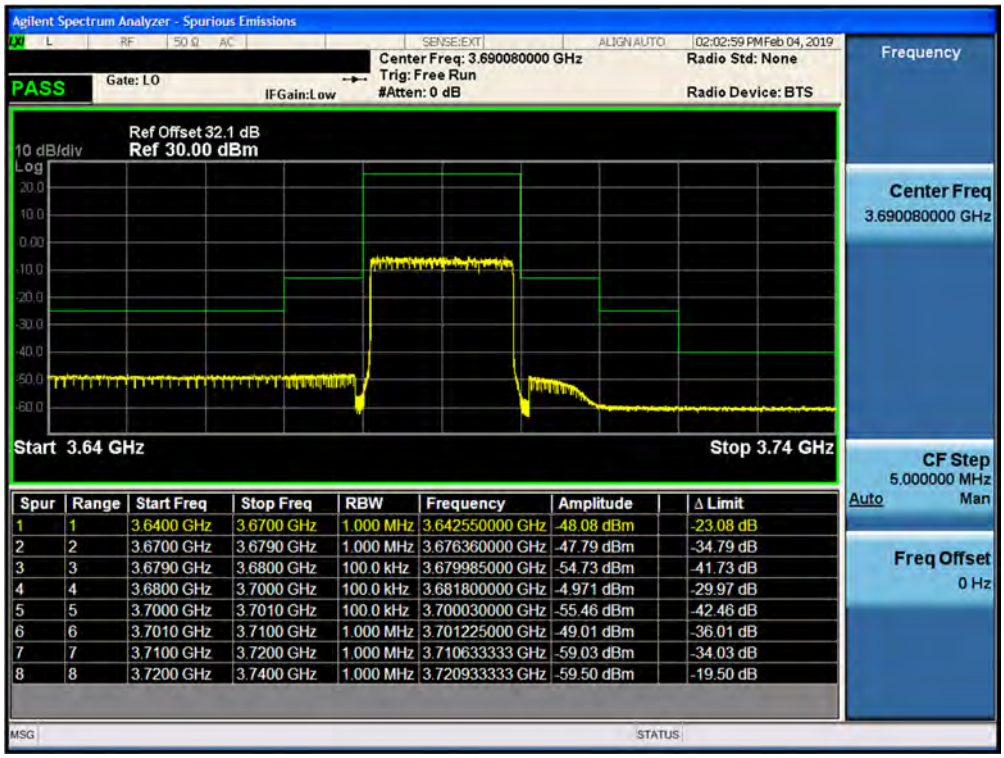
Plot 7-457. Channel Edge Plot (20.0MHz 64QAM Mid Channel - SISO)



Spur	Range	Start Freq	Stop Freq	RBW	Frequency	Amplitude	Δ Limit
1	1	3.5750 GHz	3.6050 GHz	1.000 MHz	3.601850000 GHz	-48.27 dBm	-23.27 dB
2	2	3.6050 GHz	3.6140 GHz	1.000 MHz	3.608675000 GHz	-48.11 dBm	-35.11 dB
3	3	3.6140 GHz	3.6150 GHz	390.0 kHz	3.614958333 GHz	-50.45 dBm	-37.45 dB
4	4	3.6150 GHz	3.6350 GHz	390.0 kHz	3.627766667 GHz	-0.576 dBm	-25.58 dB
5	5	3.6350 GHz	3.6360 GHz	390.0 kHz	3.635045000 GHz	-50.71 dBm	-37.71 dB
6	6	3.6360 GHz	3.6450 GHz	1.000 MHz	3.638970000 GHz	-48.63 dBm	-35.63 dB
7	7	3.6450 GHz	3.6750 GHz	1.000 MHz	3.648600000 GHz	-49.11 dBm	-24.11 dB

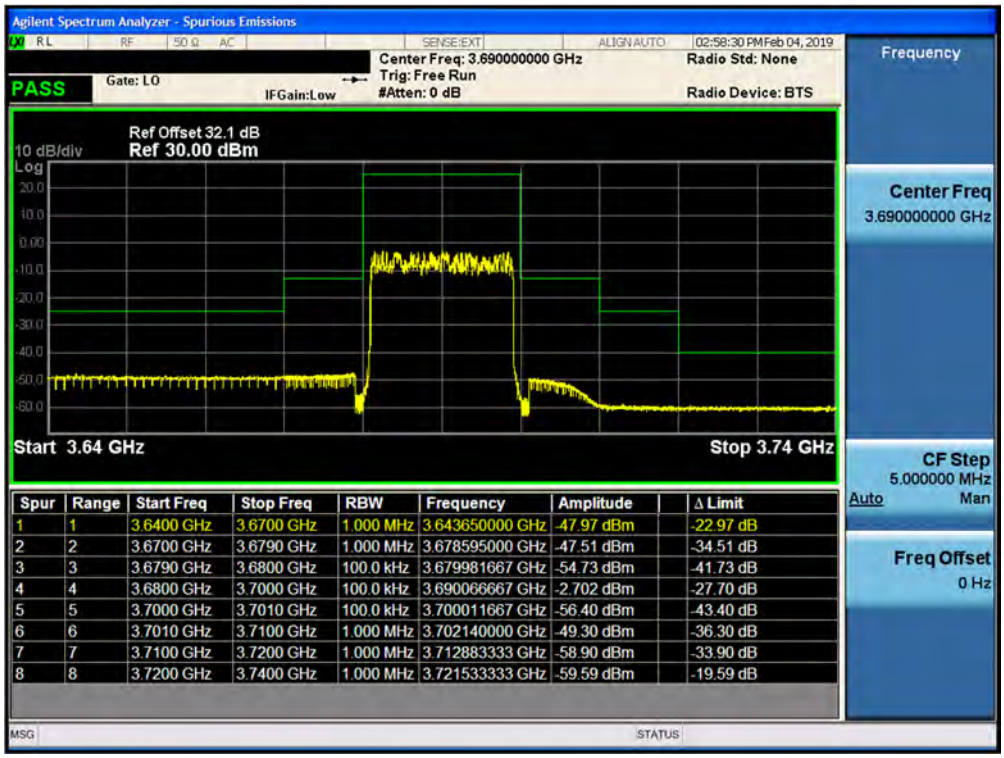
Plot 7-458. Channel Edge Plot (20.0MHz 256QAM Mid Channel - SISO)

1CC High Channel SISO



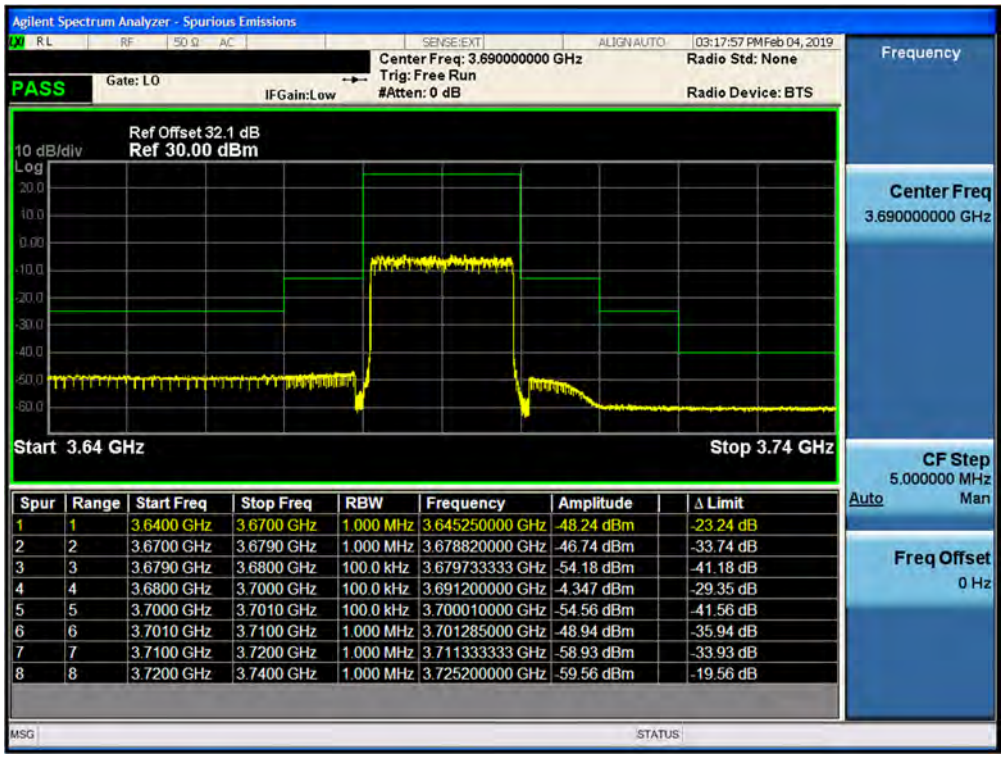
Spur	Range	Start Freq	Stop Freq	RBW	Frequency	Amplitude	Δ Limit
1	1	3.6400 GHz	3.6700 GHz	1.000 MHz	3.642550000 GHz	-48.08 dBm	-23.08 dB
2	2	3.6700 GHz	3.6790 GHz	1.000 MHz	3.676360000 GHz	-47.79 dBm	-34.79 dB
3	3	3.6790 GHz	3.6800 GHz	100.0 kHz	3.679985000 GHz	-54.73 dBm	-41.73 dB
4	4	3.6800 GHz	3.7000 GHz	100.0 kHz	3.681800000 GHz	-4.971 dBm	-29.97 dB
5	5	3.7000 GHz	3.7010 GHz	100.0 kHz	3.700030000 GHz	-55.46 dBm	-42.46 dB
6	6	3.7010 GHz	3.7100 GHz	1.000 MHz	3.701225000 GHz	-49.01 dBm	-36.01 dB
7	7	3.7100 GHz	3.7200 GHz	1.000 MHz	3.710633333 GHz	-59.03 dBm	-34.03 dB
8	8	3.7200 GHz	3.7400 GHz	1.000 MHz	3.720933333 GHz	-59.50 dBm	-19.50 dB

Plot 7-459. Upper Channel Edge Plot (20.0MHz QPSK High Channel– SISO)



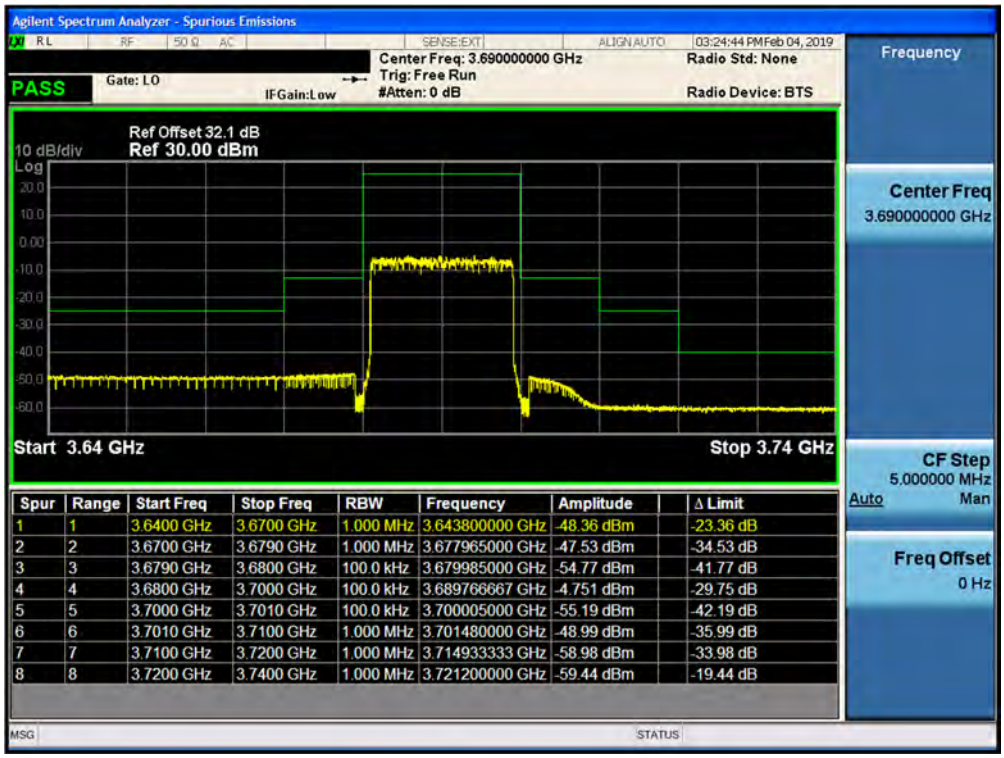
Spur	Range	Start Freq	Stop Freq	RBW	Frequency	Amplitude	Δ Limit
1	1	3.6400 GHz	3.6700 GHz	1.000 MHz	3.643650000 GHz	-47.97 dBm	-22.97 dB
2	2	3.6700 GHz	3.6790 GHz	1.000 MHz	3.678595000 GHz	-47.51 dBm	-34.51 dB
3	3	3.6790 GHz	3.6800 GHz	100.0 kHz	3.679981667 GHz	-54.73 dBm	-41.73 dB
4	4	3.6800 GHz	3.7000 GHz	100.0 kHz	3.690066667 GHz	-2.702 dBm	-27.70 dB
5	5	3.7000 GHz	3.7010 GHz	100.0 kHz	3.700011667 GHz	-56.40 dBm	-43.40 dB
6	6	3.7010 GHz	3.7100 GHz	1.000 MHz	3.702140000 GHz	-49.30 dBm	-36.30 dB
7	7	3.7100 GHz	3.7200 GHz	1.000 MHz	3.712883333 GHz	-58.90 dBm	-33.90 dB
8	8	3.7200 GHz	3.7400 GHz	1.000 MHz	3.721533333 GHz	-59.59 dBm	-19.59 dB

Plot 7-460. Upper Channel Edge Plot (20.0MHz 16QAM High Channel– SISO)



Spur	Range	Start Freq	Stop Freq	RBW	Frequency	Amplitude	Δ Limit
1	1	3.6400 GHz	3.6700 GHz	1.000 MHz	3.645250000 GHz	-48.24 dBm	-23.24 dB
2	2	3.6700 GHz	3.6790 GHz	1.000 MHz	3.678820000 GHz	-46.74 dBm	-33.74 dB
3	3	3.6790 GHz	3.6800 GHz	100.0 kHz	3.679733333 GHz	-54.18 dBm	-41.18 dB
4	4	3.6800 GHz	3.7000 GHz	100.0 kHz	3.691200000 GHz	-4.347 dBm	-29.35 dB
5	5	3.7000 GHz	3.7010 GHz	100.0 kHz	3.700010000 GHz	-54.56 dBm	-41.56 dB
6	6	3.7010 GHz	3.7100 GHz	1.000 MHz	3.701285000 GHz	-48.94 dBm	-35.94 dB
7	7	3.7100 GHz	3.7200 GHz	1.000 MHz	3.711333333 GHz	-58.93 dBm	-33.93 dB
8	8	3.7200 GHz	3.7400 GHz	1.000 MHz	3.725200000 GHz	-59.56 dBm	-19.56 dB

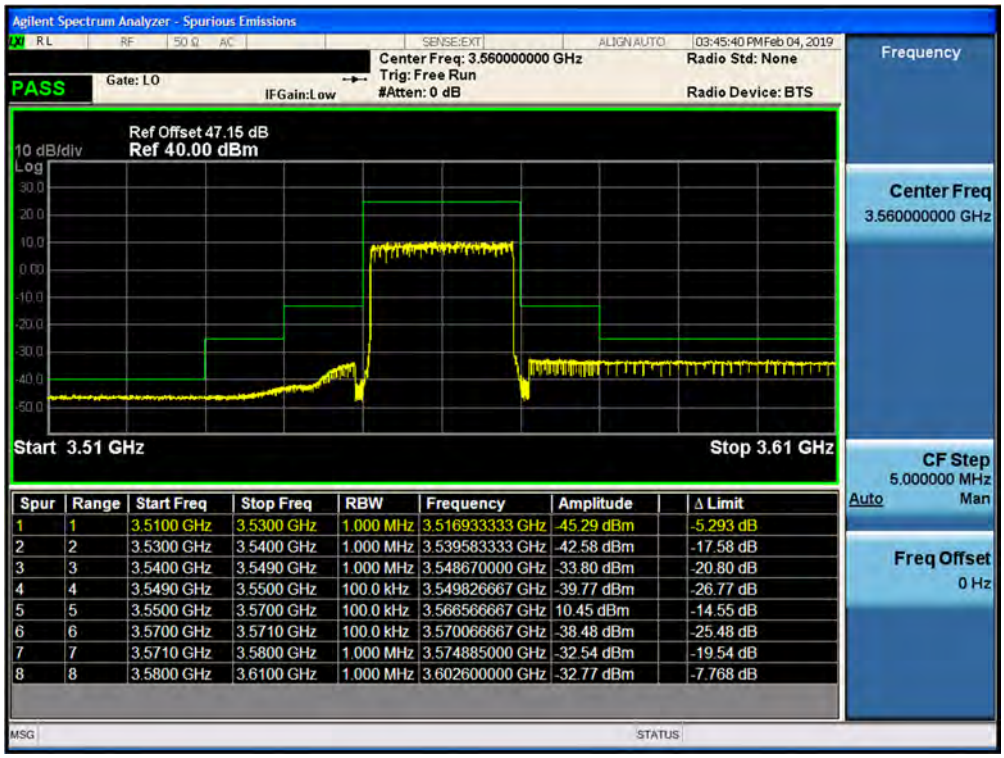
Plot 7-461. Upper Channel Edge Plot (20.0MHz 64QAM High Channel– SISO)



Spur	Range	Start Freq	Stop Freq	RBW	Frequency	Amplitude	Δ Limit
1	1	3.6400 GHz	3.6700 GHz	1.000 MHz	3.643800000 GHz	-48.36 dBm	-23.36 dB
2	2	3.6700 GHz	3.6790 GHz	1.000 MHz	3.677965000 GHz	-47.53 dBm	-34.53 dB
3	3	3.6790 GHz	3.6800 GHz	100.0 kHz	3.679985000 GHz	-54.77 dBm	-41.77 dB
4	4	3.6800 GHz	3.7000 GHz	100.0 kHz	3.689766667 GHz	-4.751 dBm	-29.75 dB
5	5	3.7000 GHz	3.7010 GHz	100.0 kHz	3.700005000 GHz	-55.19 dBm	-42.19 dB
6	6	3.7010 GHz	3.7100 GHz	1.000 MHz	3.701480000 GHz	-48.99 dBm	-35.99 dB
7	7	3.7100 GHz	3.7200 GHz	1.000 MHz	3.714933333 GHz	-58.98 dBm	-33.98 dB
8	8	3.7200 GHz	3.7400 GHz	1.000 MHz	3.721200000 GHz	-59.44 dBm	-19.44 dB

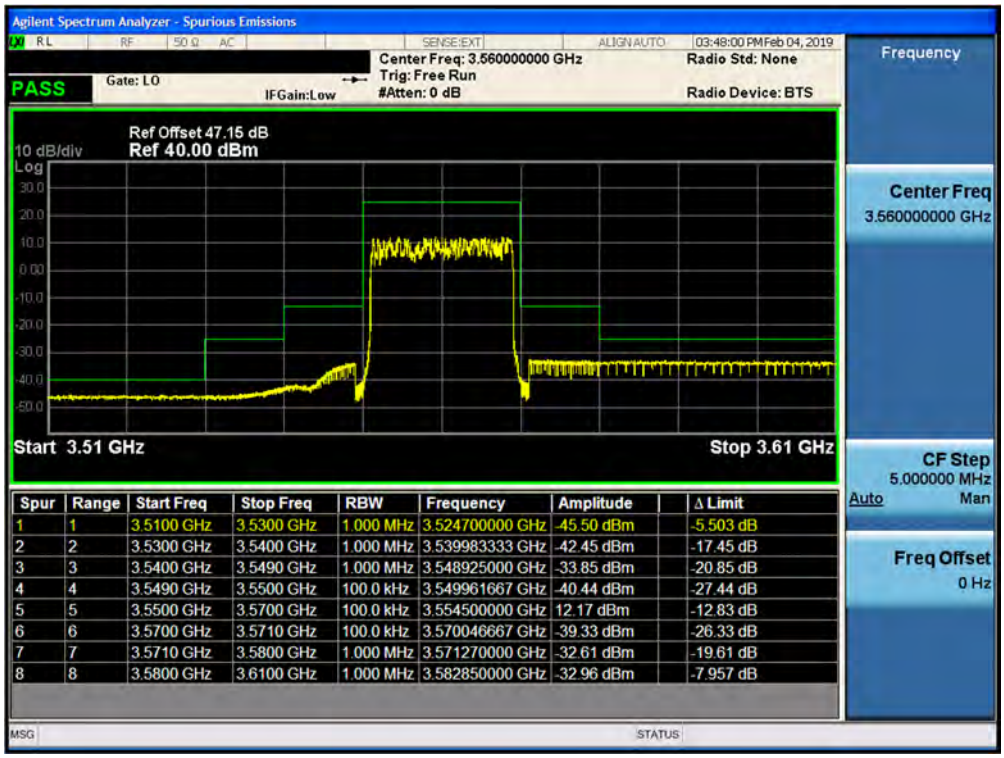
Plot 7-462. Upper Channel Edge Plot (20.0MHz 256QAM High Channel– SISO)

1CC Low Channel MIMO



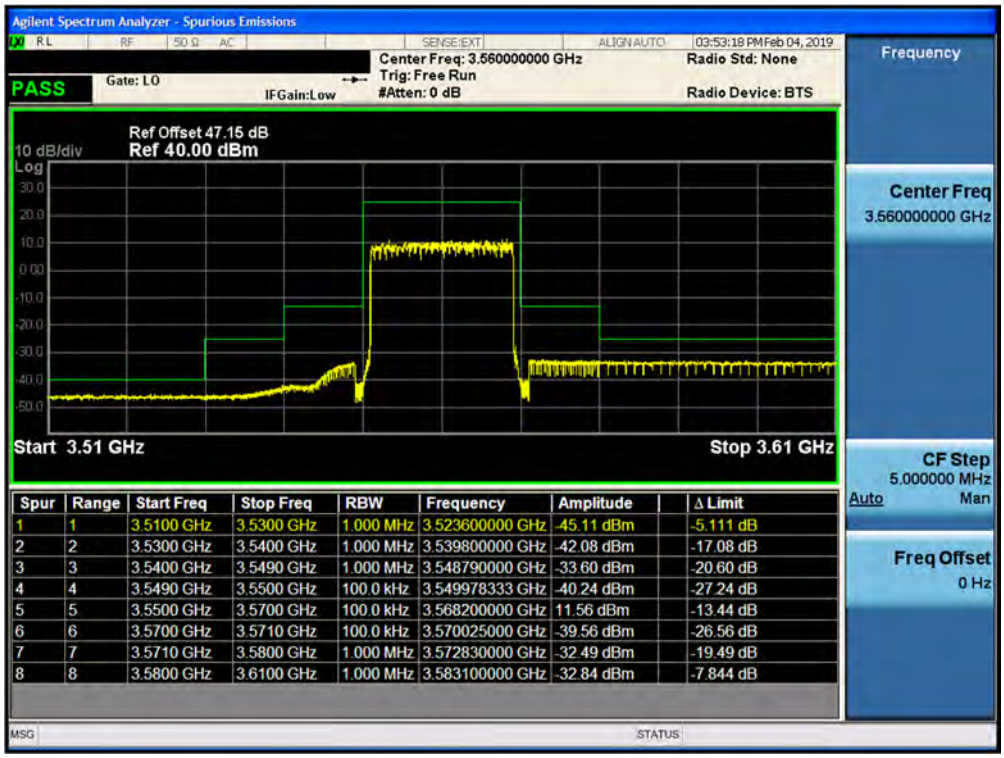
Spur	Range	Start Freq	Stop Freq	RBW	Frequency	Amplitude	Δ Limit
1	1	3.5100 GHz	3.5300 GHz	1.000 MHz	3.516933333 GHz	-45.29 dBm	-5.293 dB
2	2	3.5300 GHz	3.5400 GHz	1.000 MHz	3.539583333 GHz	-42.58 dBm	-17.58 dB
3	3	3.5400 GHz	3.5490 GHz	1.000 MHz	3.548670000 GHz	-33.80 dBm	-20.80 dB
4	4	3.5490 GHz	3.5500 GHz	100.0 kHz	3.549826667 GHz	-39.77 dBm	-26.77 dB
5	5	3.5500 GHz	3.5700 GHz	100.0 kHz	3.566566667 GHz	10.45 dBm	-14.55 dB
6	6	3.5700 GHz	3.5710 GHz	100.0 kHz	3.570066667 GHz	-38.48 dBm	-25.48 dB
7	7	3.5710 GHz	3.5800 GHz	1.000 MHz	3.574885000 GHz	-32.54 dBm	-19.54 dB
8	8	3.5800 GHz	3.6100 GHz	1.000 MHz	3.602600000 GHz	-32.77 dBm	-7.768 dB

Plot 7-463. Lower Channel Edge Plot (20.0MHz QPSK Low Channel– MIMO)



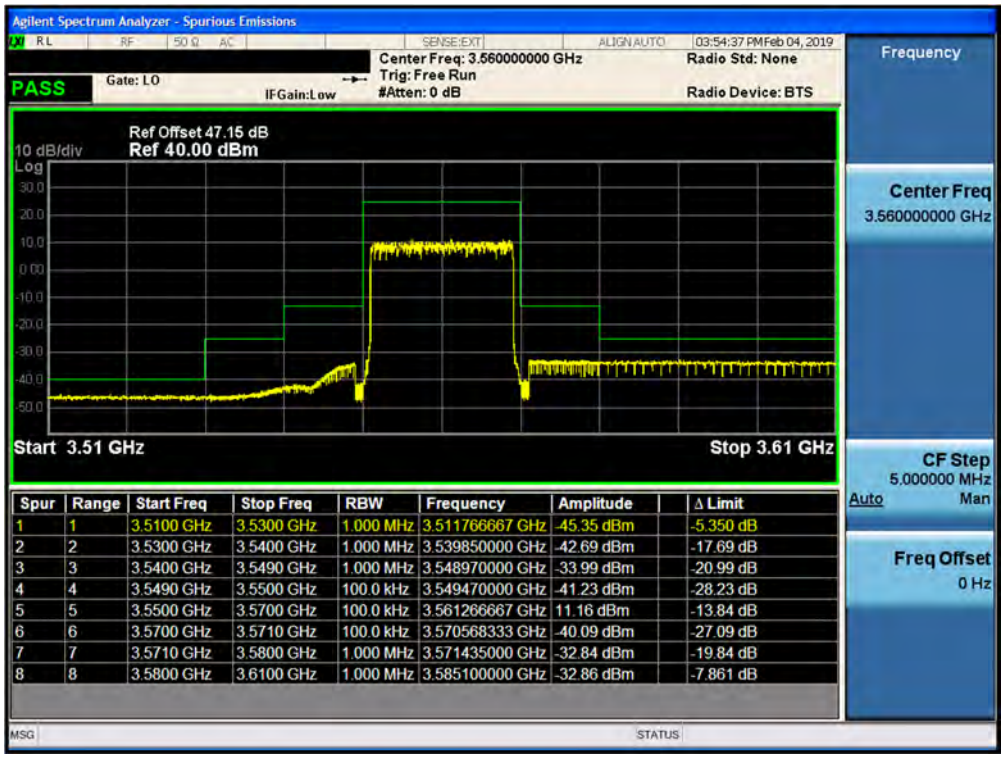
Spur	Range	Start Freq	Stop Freq	RBW	Frequency	Amplitude	Δ Limit
1	1	3.5100 GHz	3.5300 GHz	1.000 MHz	3.524700000 GHz	-45.50 dBm	-5.503 dB
2	2	3.5300 GHz	3.5400 GHz	1.000 MHz	3.539983333 GHz	-42.45 dBm	-17.45 dB
3	3	3.5400 GHz	3.5490 GHz	1.000 MHz	3.548925000 GHz	-33.85 dBm	-20.85 dB
4	4	3.5490 GHz	3.5500 GHz	100.0 kHz	3.549961667 GHz	-40.44 dBm	-27.44 dB
5	5	3.5500 GHz	3.5700 GHz	100.0 kHz	3.554500000 GHz	12.17 dBm	-12.83 dB
6	6	3.5700 GHz	3.5710 GHz	100.0 kHz	3.570046667 GHz	-39.33 dBm	-26.33 dB
7	7	3.5710 GHz	3.5800 GHz	1.000 MHz	3.571270000 GHz	-32.61 dBm	-19.61 dB
8	8	3.5800 GHz	3.6100 GHz	1.000 MHz	3.582850000 GHz	-32.96 dBm	-7.957 dB

Plot 7-464. Lower Channel Edge Plot (20.0MHz 16QAM Low Channel– MIMO)



Spur	Range	Start Freq	Stop Freq	RBW	Frequency	Amplitude	Δ Limit
1	1	3.5100 GHz	3.5300 GHz	1.000 MHz	3.523600000 GHz	-45.11 dBm	-5.111 dB
2	2	3.5300 GHz	3.5400 GHz	1.000 MHz	3.539800000 GHz	-42.08 dBm	-17.08 dB
3	3	3.5400 GHz	3.5490 GHz	1.000 MHz	3.548790000 GHz	-33.60 dBm	-20.60 dB
4	4	3.5490 GHz	3.5500 GHz	100.0 kHz	3.549978333 GHz	-40.24 dBm	-27.24 dB
5	5	3.5500 GHz	3.5700 GHz	100.0 kHz	3.568200000 GHz	11.56 dBm	-13.44 dB
6	6	3.5700 GHz	3.5710 GHz	100.0 kHz	3.570025000 GHz	-39.56 dBm	-26.56 dB
7	7	3.5710 GHz	3.5800 GHz	1.000 MHz	3.572830000 GHz	-32.49 dBm	-19.49 dB
8	8	3.5800 GHz	3.6100 GHz	1.000 MHz	3.583100000 GHz	-32.84 dBm	-7.844 dB

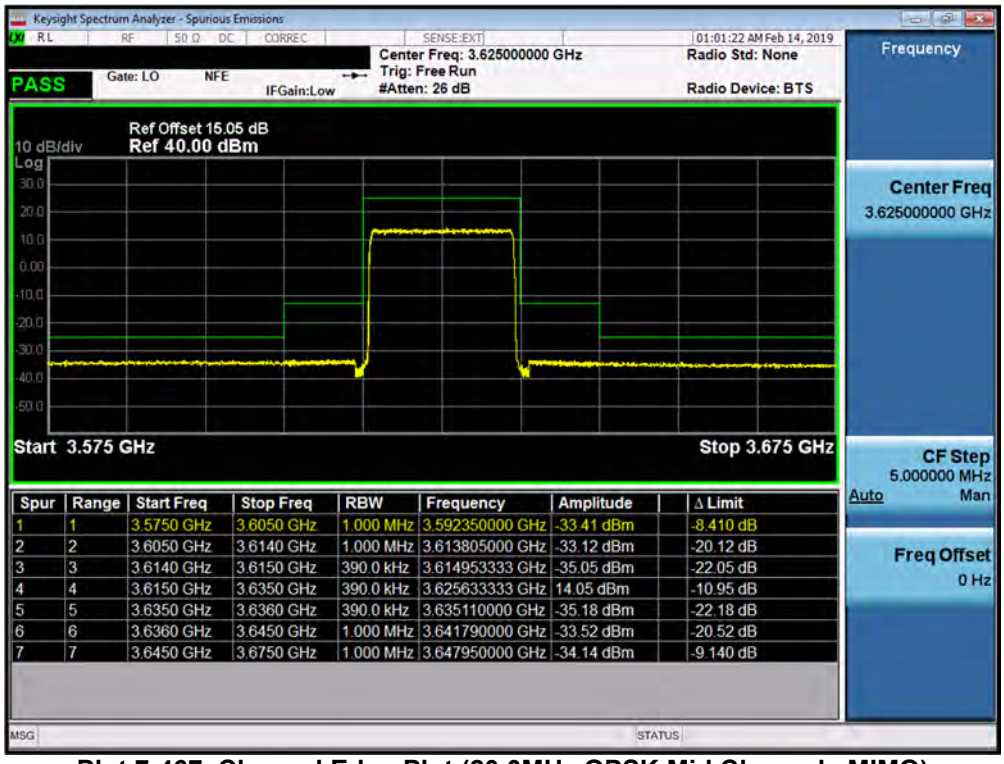
Plot 7-465. Lower Channel Edge Plot (20.0MHz 64QAM Low Channel– MIMO)



Spur	Range	Start Freq	Stop Freq	RBW	Frequency	Amplitude	Δ Limit
1	1	3.5100 GHz	3.5300 GHz	1.000 MHz	3.511766667 GHz	-45.35 dBm	-5.350 dB
2	2	3.5300 GHz	3.5400 GHz	1.000 MHz	3.539850000 GHz	-42.69 dBm	-17.69 dB
3	3	3.5400 GHz	3.5490 GHz	1.000 MHz	3.548970000 GHz	-33.99 dBm	-20.99 dB
4	4	3.5490 GHz	3.5500 GHz	100.0 kHz	3.549470000 GHz	-41.23 dBm	-28.23 dB
5	5	3.5500 GHz	3.5700 GHz	100.0 kHz	3.561266667 GHz	11.16 dBm	-13.84 dB
6	6	3.5700 GHz	3.5710 GHz	100.0 kHz	3.570568333 GHz	-40.09 dBm	-27.09 dB
7	7	3.5710 GHz	3.5800 GHz	1.000 MHz	3.571435000 GHz	-32.84 dBm	-19.84 dB
8	8	3.5800 GHz	3.6100 GHz	1.000 MHz	3.585100000 GHz	-32.86 dBm	-7.861 dB

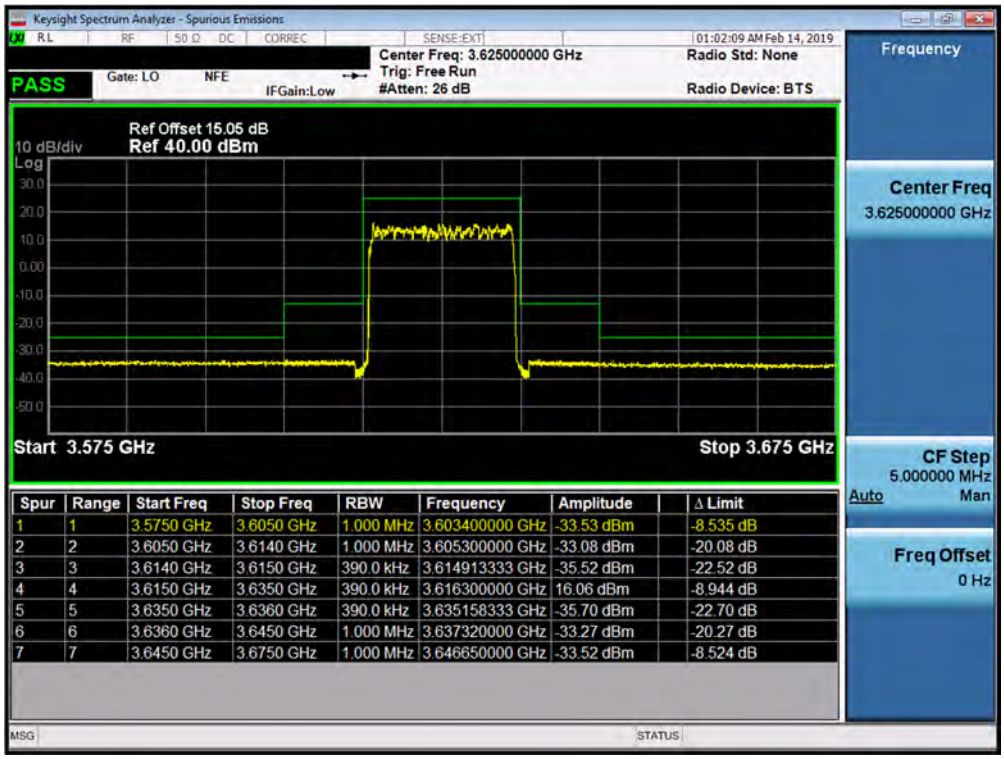
Plot 7-466. Lower Channel Edge Plot (20.0MHz 256QAM Low Channel– MIMO)

1CC Mid Channel MIMO



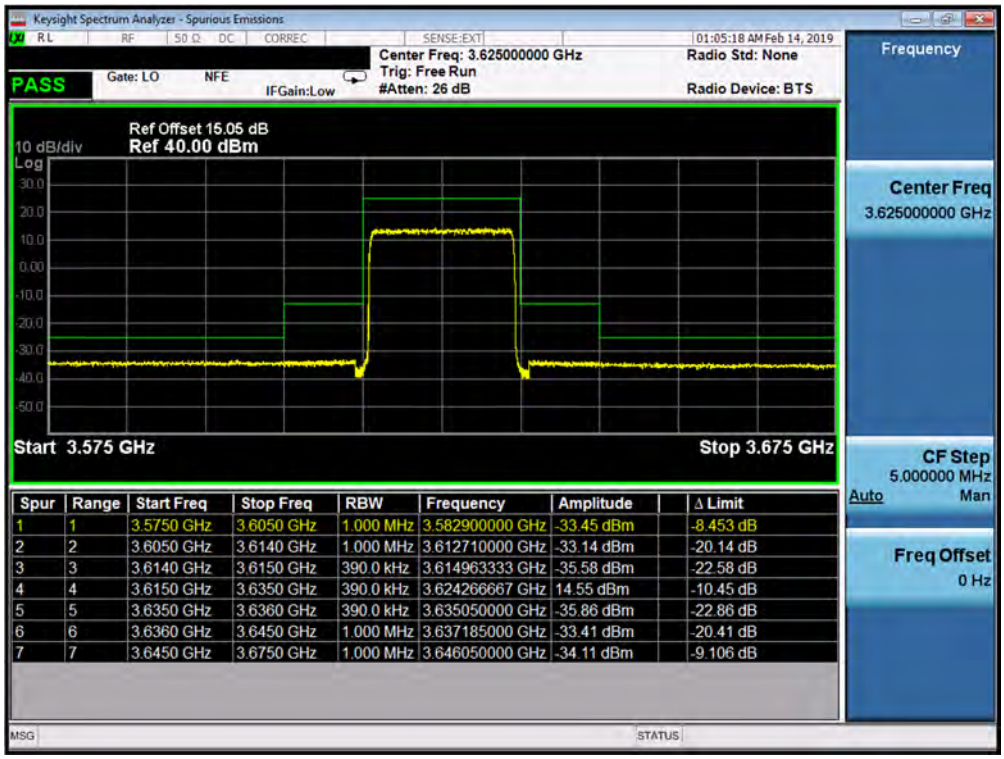
Spur	Range	Start Freq	Stop Freq	RBW	Frequency	Amplitude	Δ Limit
1	1	3.5750 GHz	3.6050 GHz	1.000 MHz	3.592350000 GHz	-33.41 dBm	-8.410 dB
2	2	3.6050 GHz	3.6140 GHz	1.000 MHz	3.613805000 GHz	-33.12 dBm	-20.12 dB
3	3	3.6140 GHz	3.6150 GHz	390.0 kHz	3.614953333 GHz	-35.05 dBm	-22.05 dB
4	4	3.6150 GHz	3.6350 GHz	390.0 kHz	3.625633333 GHz	14.05 dBm	-10.95 dB
5	5	3.6350 GHz	3.6360 GHz	390.0 kHz	3.635110000 GHz	-35.18 dBm	-22.18 dB
6	6	3.6360 GHz	3.6450 GHz	1.000 MHz	3.641790000 GHz	-33.52 dBm	-20.52 dB
7	7	3.6450 GHz	3.6750 GHz	1.000 MHz	3.647950000 GHz	-34.14 dBm	-9.140 dB

Plot 7-467. Channel Edge Plot (20.0MHz QPSK Mid Channel– MIMO)



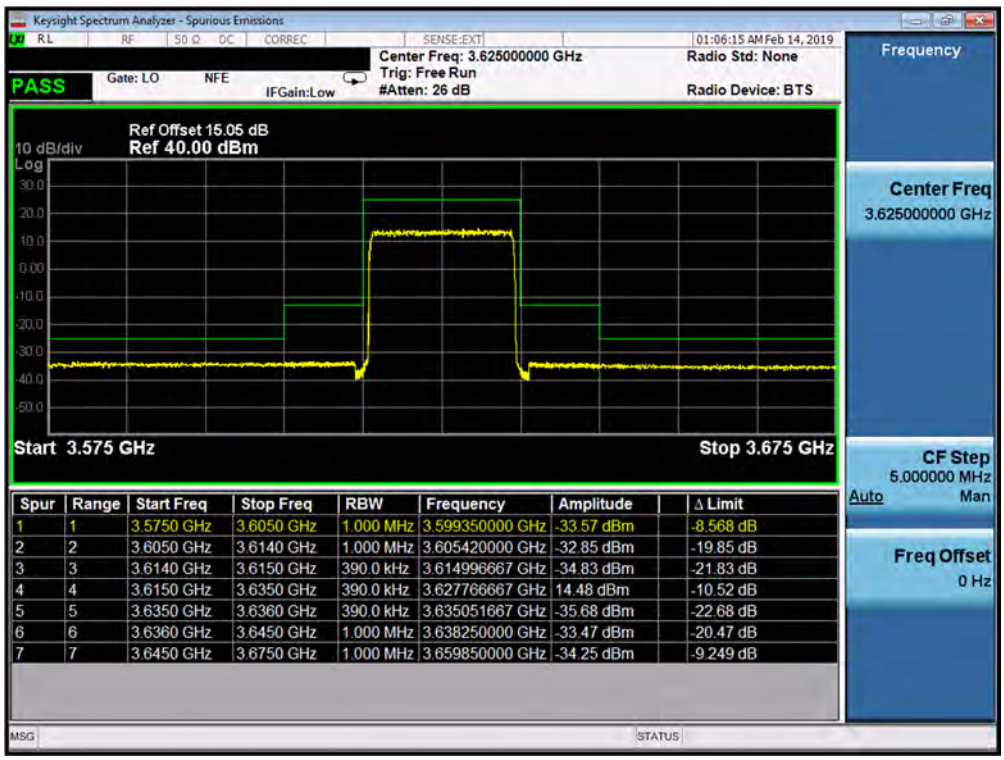
Spur	Range	Start Freq	Stop Freq	RBW	Frequency	Amplitude	Δ Limit
1	1	3.5750 GHz	3.6050 GHz	1.000 MHz	3.603400000 GHz	-33.53 dBm	-8.535 dB
2	2	3.6050 GHz	3.6140 GHz	1.000 MHz	3.605300000 GHz	-33.08 dBm	-20.08 dB
3	3	3.6140 GHz	3.6150 GHz	390.0 kHz	3.614913333 GHz	-35.52 dBm	-22.52 dB
4	4	3.6150 GHz	3.6350 GHz	390.0 kHz	3.616300000 GHz	16.06 dBm	-8.944 dB
5	5	3.6350 GHz	3.6360 GHz	390.0 kHz	3.635158333 GHz	-35.70 dBm	-22.70 dB
6	6	3.6360 GHz	3.6450 GHz	1.000 MHz	3.637320000 GHz	-33.27 dBm	-20.27 dB
7	7	3.6450 GHz	3.6750 GHz	1.000 MHz	3.646650000 GHz	-33.52 dBm	-8.524 dB

Plot 7-468. Channel Edge Plot (20.0MHz 16QAM Mid Channel– MIMO)



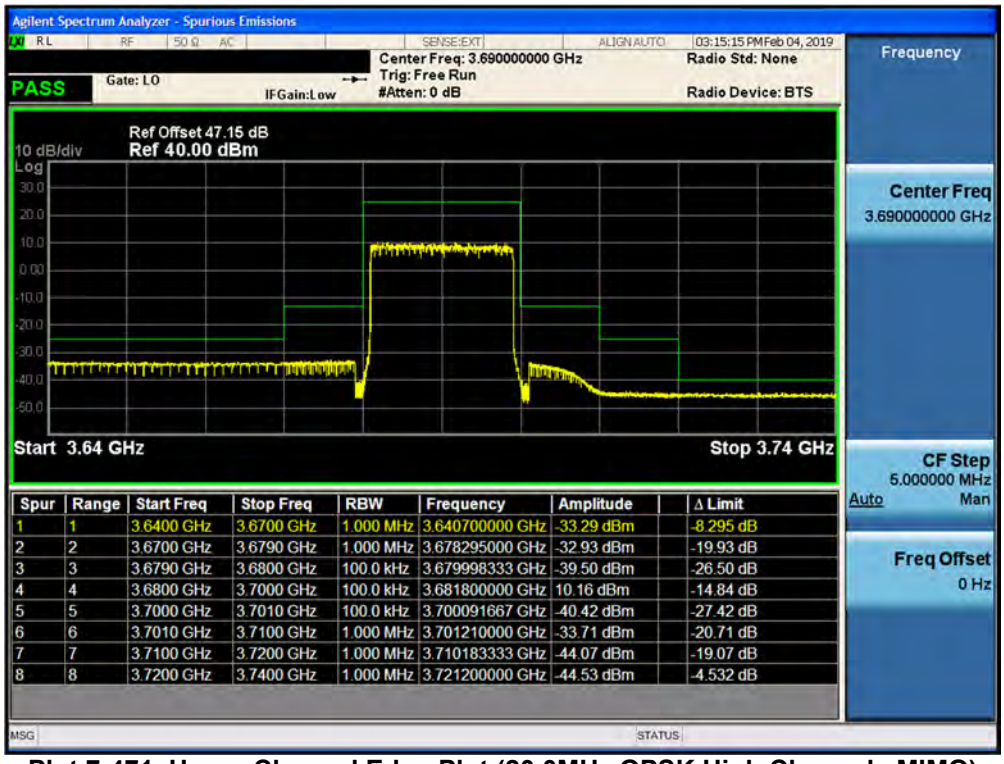
Spur	Range	Start Freq	Stop Freq	RBW	Frequency	Amplitude	Δ Limit
1	1	3.5750 GHz	3.6050 GHz	1.000 MHz	3.582900000 GHz	-33.45 dBm	-8.453 dB
2	2	3.6050 GHz	3.6140 GHz	1.000 MHz	3.612710000 GHz	-33.14 dBm	-20.14 dB
3	3	3.6140 GHz	3.6150 GHz	390.0 kHz	3.614963333 GHz	-35.58 dBm	-22.58 dB
4	4	3.6150 GHz	3.6350 GHz	390.0 kHz	3.624266667 GHz	14.55 dBm	-10.45 dB
5	5	3.6350 GHz	3.6360 GHz	390.0 kHz	3.635050000 GHz	-35.86 dBm	-22.86 dB
6	6	3.6360 GHz	3.6450 GHz	1.000 MHz	3.637185000 GHz	-33.41 dBm	-20.41 dB
7	7	3.6450 GHz	3.6750 GHz	1.000 MHz	3.646050000 GHz	-34.11 dBm	-9.106 dB

Plot 7-469. Channel Edge Plot (20.0MHz 64QAM Mid Channel– MIMO)



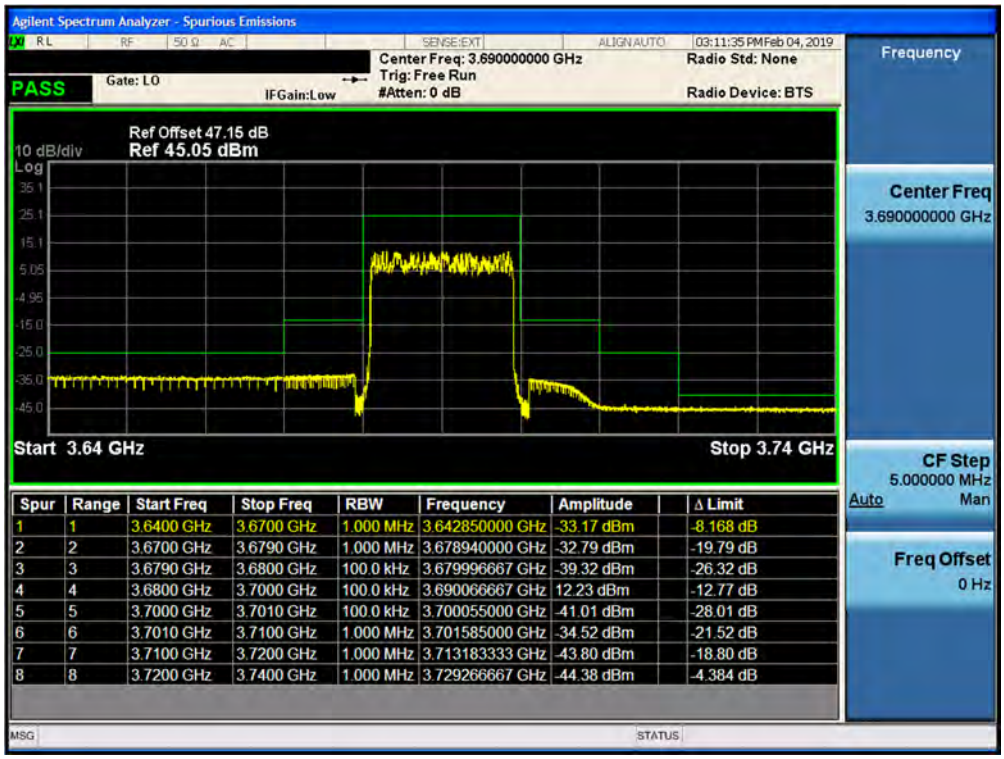
Spur	Range	Start Freq	Stop Freq	RBW	Frequency	Amplitude	Δ Limit
1	1	3.5750 GHz	3.6050 GHz	1.000 MHz	3.599350000 GHz	-33.57 dBm	-8.568 dB
2	2	3.6050 GHz	3.6140 GHz	1.000 MHz	3.605420000 GHz	-32.85 dBm	-19.85 dB
3	3	3.6140 GHz	3.6150 GHz	390.0 kHz	3.614996667 GHz	-34.83 dBm	-21.83 dB
4	4	3.6150 GHz	3.6350 GHz	390.0 kHz	3.627766667 GHz	14.48 dBm	-10.52 dB
5	5	3.6350 GHz	3.6360 GHz	390.0 kHz	3.635051667 GHz	-35.68 dBm	-22.68 dB
6	6	3.6360 GHz	3.6450 GHz	1.000 MHz	3.638250000 GHz	-33.47 dBm	-20.47 dB
7	7	3.6450 GHz	3.6750 GHz	1.000 MHz	3.659850000 GHz	-34.25 dBm	-9.249 dB

Plot 7-470. Channel Edge Plot (20.0MHz 256QAM Mid Channel– MIMO)



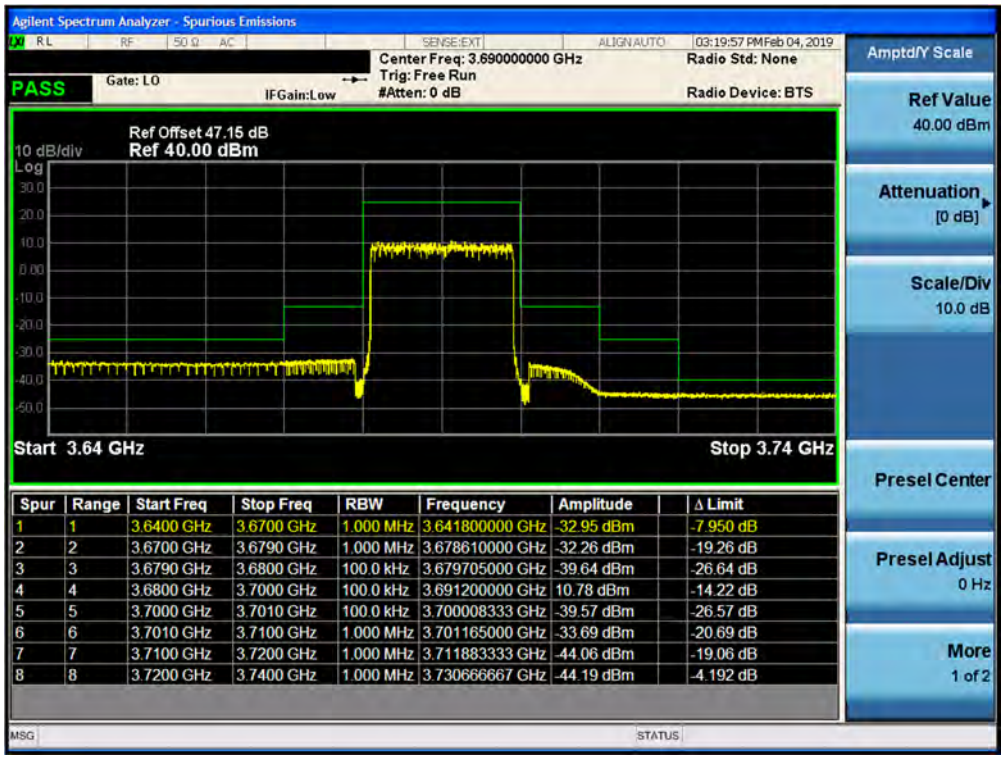
Spur	Range	Start Freq	Stop Freq	RBW	Frequency	Amplitude	Δ Limit
1	1	3.6400 GHz	3.6700 GHz	1.000 MHz	3.640700000 GHz	-33.29 dBm	-8.295 dB
2	2	3.6700 GHz	3.6790 GHz	1.000 MHz	3.678295000 GHz	-32.93 dBm	-19.93 dB
3	3	3.6790 GHz	3.6800 GHz	100.0 kHz	3.679998333 GHz	-39.50 dBm	-26.50 dB
4	4	3.6800 GHz	3.7000 GHz	100.0 kHz	3.681800000 GHz	10.16 dBm	-14.84 dB
5	5	3.7000 GHz	3.7010 GHz	100.0 kHz	3.700091667 GHz	-40.42 dBm	-27.42 dB
6	6	3.7010 GHz	3.7100 GHz	1.000 MHz	3.701210000 GHz	-33.71 dBm	-20.71 dB
7	7	3.7100 GHz	3.7200 GHz	1.000 MHz	3.710183333 GHz	-44.07 dBm	-19.07 dB
8	8	3.7200 GHz	3.7400 GHz	1.000 MHz	3.721200000 GHz	-44.53 dBm	-4.532 dB

Plot 7-471. Upper Channel Edge Plot (20.0MHz QPSK High Channel– MIMO)



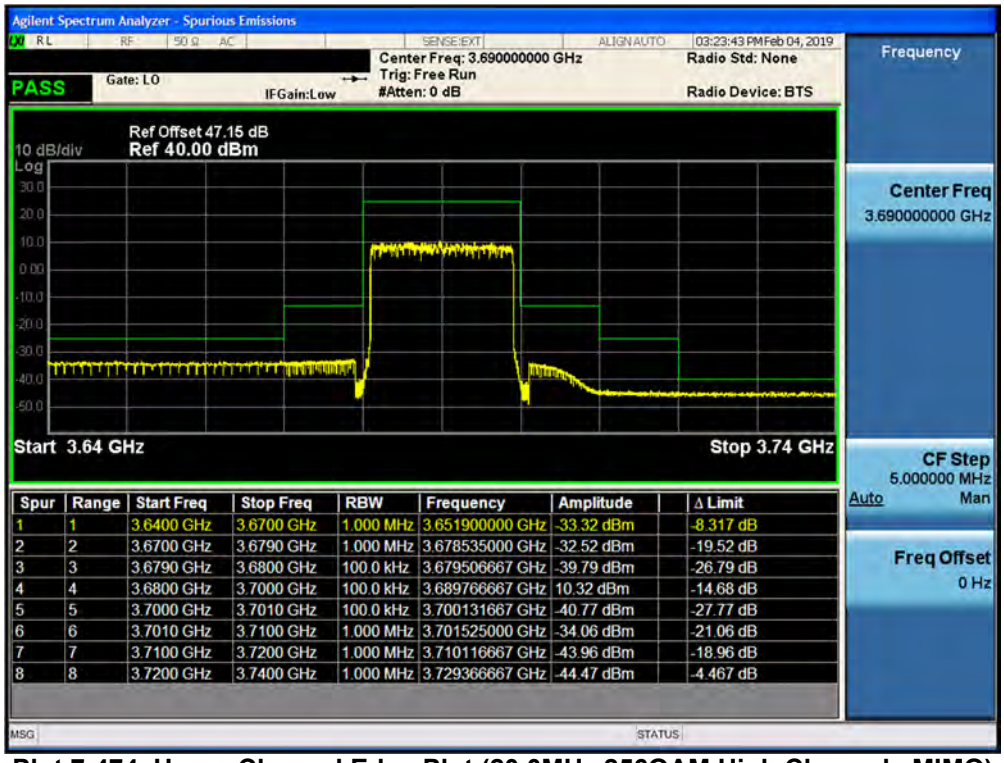
Spur	Range	Start Freq	Stop Freq	RBW	Frequency	Amplitude	Δ Limit
1	1	3.6400 GHz	3.6700 GHz	1.000 MHz	3.642850000 GHz	-33.17 dBm	-8.168 dB
2	2	3.6700 GHz	3.6790 GHz	1.000 MHz	3.678940000 GHz	-32.79 dBm	-19.79 dB
3	3	3.6790 GHz	3.6800 GHz	100.0 kHz	3.679996667 GHz	-39.32 dBm	-26.32 dB
4	4	3.6800 GHz	3.7000 GHz	100.0 kHz	3.690066667 GHz	12.23 dBm	-12.77 dB
5	5	3.7000 GHz	3.7010 GHz	100.0 kHz	3.700055000 GHz	-41.01 dBm	-28.01 dB
6	6	3.7010 GHz	3.7100 GHz	1.000 MHz	3.701585000 GHz	-34.52 dBm	-21.52 dB
7	7	3.7100 GHz	3.7200 GHz	1.000 MHz	3.713183333 GHz	-43.80 dBm	-18.80 dB
8	8	3.7200 GHz	3.7400 GHz	1.000 MHz	3.729266667 GHz	-44.38 dBm	-4.384 dB

Plot 7-472. Upper Channel Edge Plot (20.0MHz 16QAM High Channel– MIMO)



Spur	Range	Start Freq	Stop Freq	RBW	Frequency	Amplitude	Δ Limit
1	1	3.6400 GHz	3.6700 GHz	1.000 MHz	3.641800000 GHz	-32.95 dBm	-7.950 dB
2	2	3.6700 GHz	3.6790 GHz	1.000 MHz	3.678610000 GHz	-32.26 dBm	-19.26 dB
3	3	3.6790 GHz	3.6800 GHz	100.0 kHz	3.679705000 GHz	-39.64 dBm	-26.64 dB
4	4	3.6800 GHz	3.7000 GHz	100.0 kHz	3.691200000 GHz	10.78 dBm	-14.22 dB
5	5	3.7000 GHz	3.7010 GHz	100.0 kHz	3.700008333 GHz	-39.57 dBm	-26.57 dB
6	6	3.7010 GHz	3.7100 GHz	1.000 MHz	3.701165000 GHz	-33.69 dBm	-20.69 dB
7	7	3.7100 GHz	3.7200 GHz	1.000 MHz	3.711883333 GHz	-44.06 dBm	-19.06 dB
8	8	3.7200 GHz	3.7400 GHz	1.000 MHz	3.730666667 GHz	-44.19 dBm	-4.192 dB

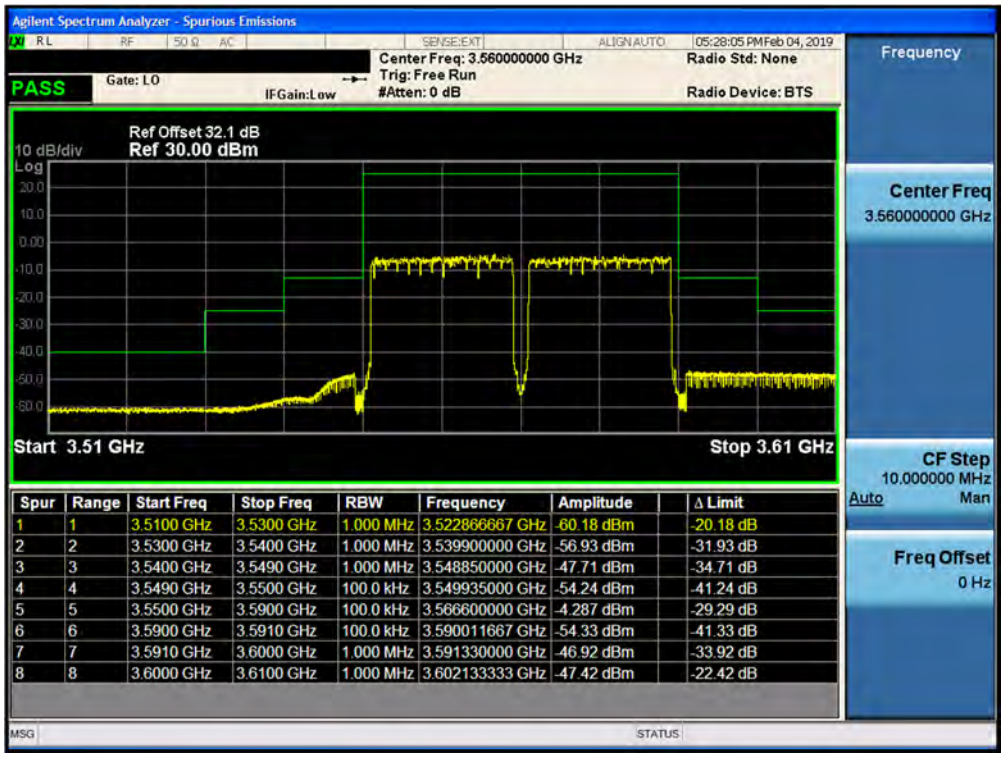
Plot 7-473. Upper Channel Edge Plot (20.0MHz 64QAM High Channel– MIMO)



Spur	Range	Start Freq	Stop Freq	RBW	Frequency	Amplitude	Δ Limit
1	1	3.6400 GHz	3.6700 GHz	1.000 MHz	3.651900000 GHz	-33.32 dBm	-8.317 dB
2	2	3.6700 GHz	3.6790 GHz	1.000 MHz	3.678535000 GHz	-32.52 dBm	-19.52 dB
3	3	3.6790 GHz	3.6800 GHz	100.0 kHz	3.679506667 GHz	-39.79 dBm	-26.79 dB
4	4	3.6800 GHz	3.7000 GHz	100.0 kHz	3.689766667 GHz	10.32 dBm	-14.68 dB
5	5	3.7000 GHz	3.7010 GHz	100.0 kHz	3.700131667 GHz	-40.77 dBm	-27.77 dB
6	6	3.7010 GHz	3.7100 GHz	1.000 MHz	3.701525000 GHz	-34.06 dBm	-21.06 dB
7	7	3.7100 GHz	3.7200 GHz	1.000 MHz	3.710116667 GHz	-43.96 dBm	-18.96 dB
8	8	3.7200 GHz	3.7400 GHz	1.000 MHz	3.729366667 GHz	-44.47 dBm	-4.467 dB

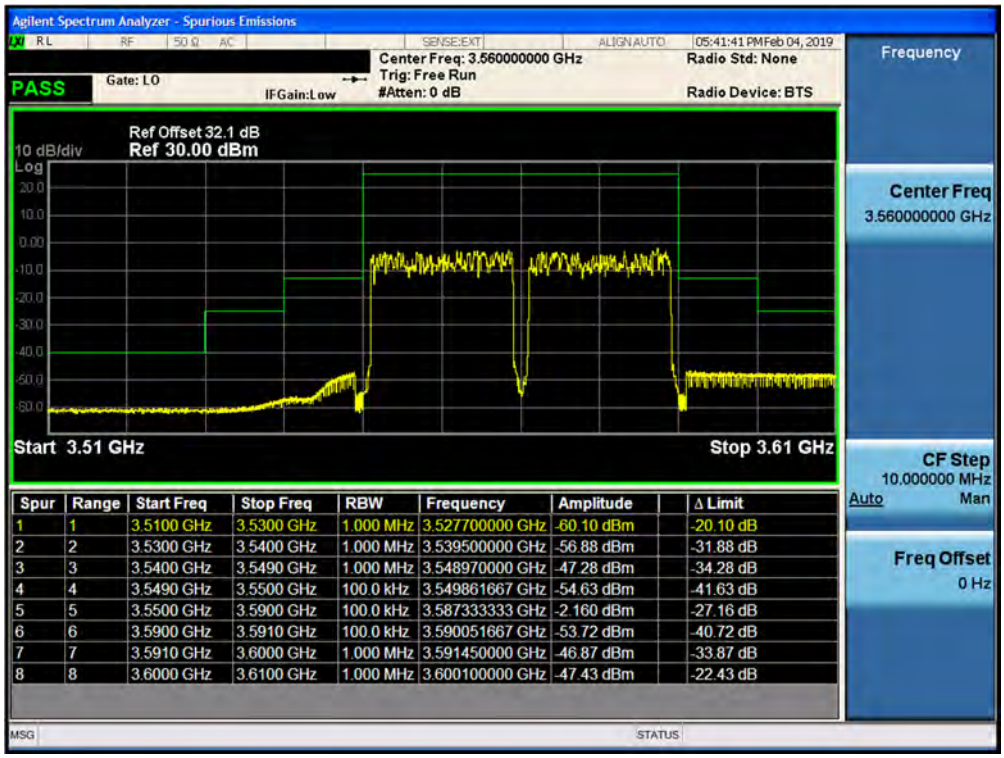
Plot 7-474. Upper Channel Edge Plot (20.0MHz 256QAM High Channel– MIMO)

2CC Contiguous Low Channel SISO



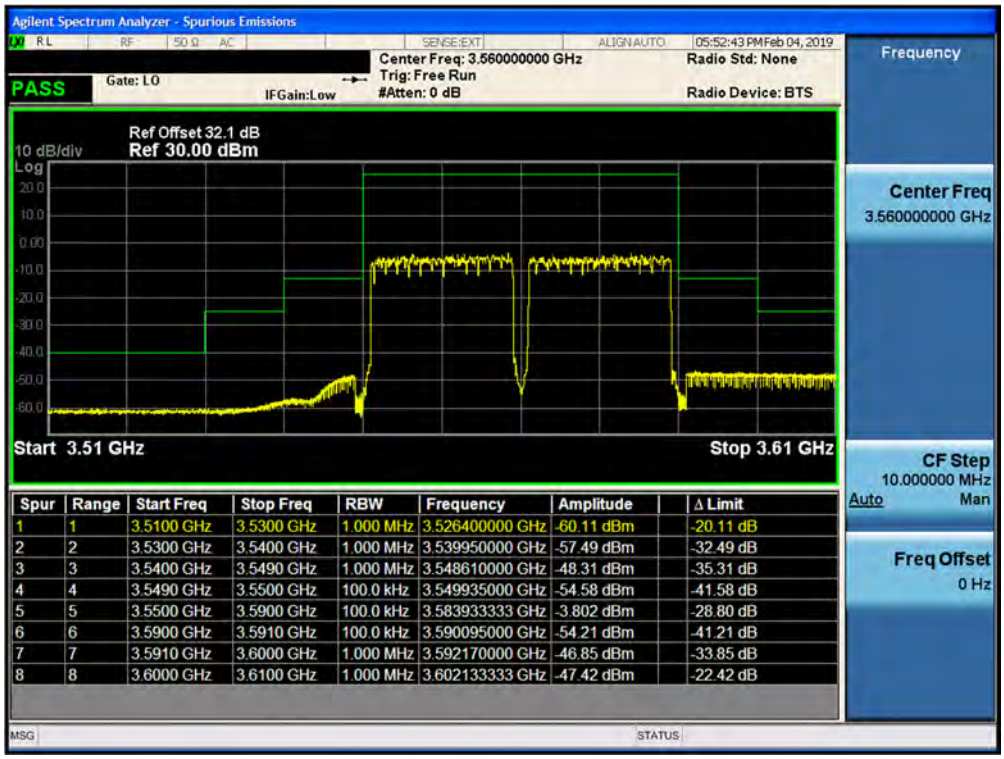
Spur	Range	Start Freq	Stop Freq	RBW	Frequency	Amplitude	Δ Limit
1	1	3.5100 GHz	3.5300 GHz	1.000 MHz	3.522866667 GHz	-60.18 dBm	-20.18 dB
2	2	3.5300 GHz	3.5400 GHz	1.000 MHz	3.539900000 GHz	-56.93 dBm	-31.93 dB
3	3	3.5400 GHz	3.5490 GHz	1.000 MHz	3.548850000 GHz	-47.71 dBm	-34.71 dB
4	4	3.5490 GHz	3.5500 GHz	100.0 kHz	3.549935000 GHz	-54.24 dBm	-41.24 dB
5	5	3.5500 GHz	3.5900 GHz	100.0 kHz	3.566600000 GHz	-4.287 dBm	-29.29 dB
6	6	3.5900 GHz	3.5910 GHz	100.0 kHz	3.590011667 GHz	-54.33 dBm	-41.33 dB
7	7	3.5910 GHz	3.6000 GHz	1.000 MHz	3.591330000 GHz	-46.92 dBm	-33.92 dB
8	8	3.6000 GHz	3.6100 GHz	1.000 MHz	3.602133333 GHz	-47.42 dBm	-22.42 dB

Plot 7-475. Lower Channel Edge Plot (40.0MHz QPSK Low Channel– SISO)



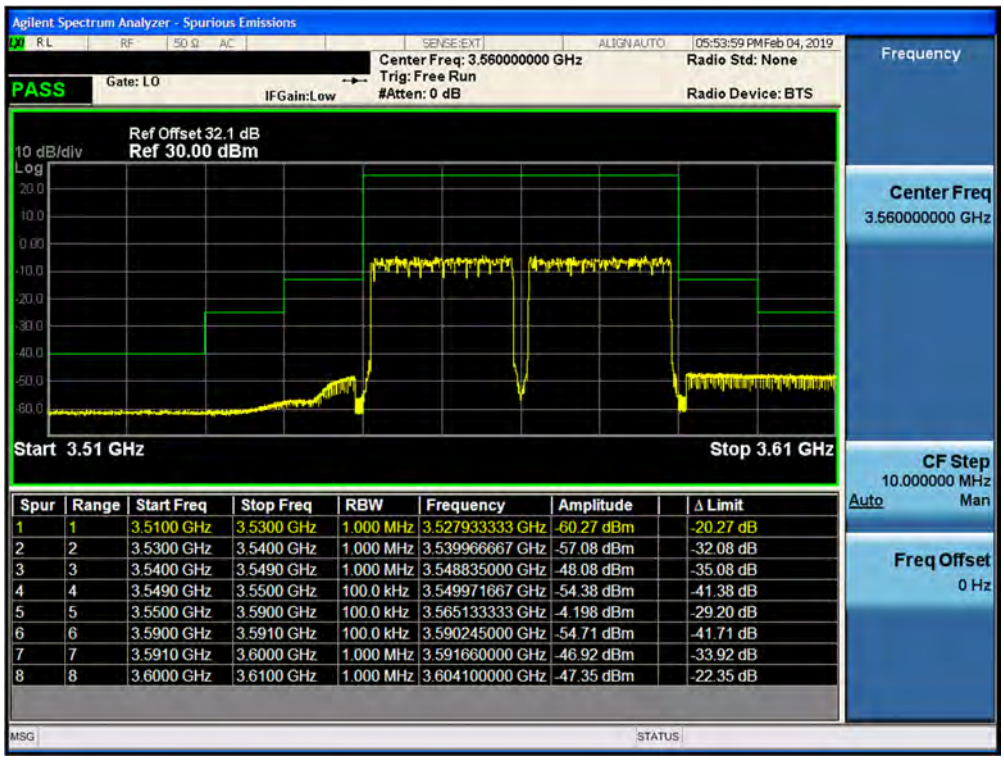
Spur	Range	Start Freq	Stop Freq	RBW	Frequency	Amplitude	Δ Limit
1	1	3.5100 GHz	3.5300 GHz	1.000 MHz	3.527700000 GHz	-60.10 dBm	-20.10 dB
2	2	3.5300 GHz	3.5400 GHz	1.000 MHz	3.539500000 GHz	-56.88 dBm	-31.88 dB
3	3	3.5400 GHz	3.5490 GHz	1.000 MHz	3.548970000 GHz	-47.28 dBm	-34.28 dB
4	4	3.5490 GHz	3.5500 GHz	100.0 kHz	3.549861667 GHz	-54.63 dBm	-41.63 dB
5	5	3.5500 GHz	3.5900 GHz	100.0 kHz	3.587333333 GHz	-2.160 dBm	-27.16 dB
6	6	3.5900 GHz	3.5910 GHz	100.0 kHz	3.590051667 GHz	-53.72 dBm	-40.72 dB
7	7	3.5910 GHz	3.6000 GHz	1.000 MHz	3.591450000 GHz	-46.87 dBm	-33.87 dB
8	8	3.6000 GHz	3.6100 GHz	1.000 MHz	3.600100000 GHz	-47.43 dBm	-22.43 dB

Plot 7-476. Lower Channel Edge Plot (40.0MHz 16QAM Low Channel– SISO)



Spur	Range	Start Freq	Stop Freq	RBW	Frequency	Amplitude	Δ Limit
1	1	3.5100 GHz	3.5300 GHz	1.000 MHz	3.526400000 GHz	-60.11 dBm	-20.11 dB
2	2	3.5300 GHz	3.5400 GHz	1.000 MHz	3.539950000 GHz	-57.49 dBm	-32.49 dB
3	3	3.5400 GHz	3.5490 GHz	1.000 MHz	3.548610000 GHz	-48.31 dBm	-35.31 dB
4	4	3.5490 GHz	3.5500 GHz	100.0 kHz	3.549935000 GHz	-54.58 dBm	-41.58 dB
5	5	3.5500 GHz	3.5900 GHz	100.0 kHz	3.583933333 GHz	-3.802 dBm	-28.80 dB
6	6	3.5900 GHz	3.5910 GHz	100.0 kHz	3.590095000 GHz	-54.21 dBm	-41.21 dB
7	7	3.5910 GHz	3.6000 GHz	1.000 MHz	3.592170000 GHz	-46.85 dBm	-33.85 dB
8	8	3.6000 GHz	3.6100 GHz	1.000 MHz	3.602133333 GHz	-47.42 dBm	-22.42 dB

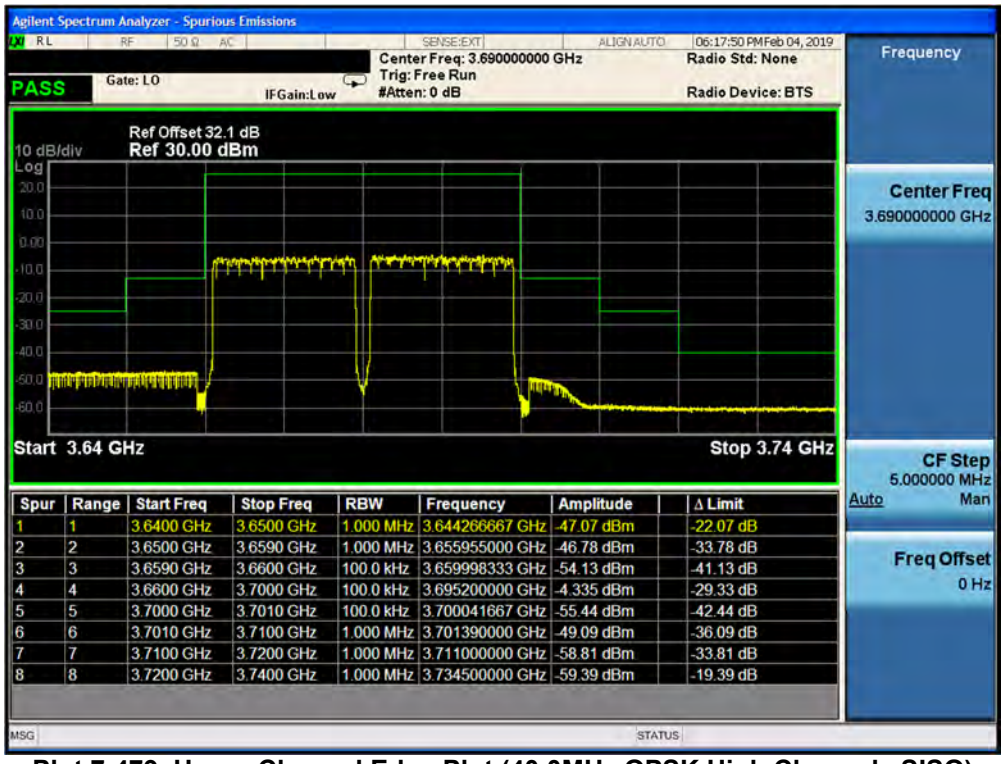
Plot 7-477. Lower Channel Edge Plot (40.0MHz 64QAM Low Channel– SISO)



Spur	Range	Start Freq	Stop Freq	RBW	Frequency	Amplitude	Δ Limit
1	1	3.5100 GHz	3.5300 GHz	1.000 MHz	3.527933333 GHz	-60.27 dBm	-20.27 dB
2	2	3.5300 GHz	3.5400 GHz	1.000 MHz	3.539966667 GHz	-57.08 dBm	-32.08 dB
3	3	3.5400 GHz	3.5490 GHz	1.000 MHz	3.548835000 GHz	-48.08 dBm	-35.08 dB
4	4	3.5490 GHz	3.5500 GHz	100.0 kHz	3.549971667 GHz	-54.38 dBm	-41.38 dB
5	5	3.5500 GHz	3.5900 GHz	100.0 kHz	3.565133333 GHz	-4.198 dBm	-29.20 dB
6	6	3.5900 GHz	3.5910 GHz	100.0 kHz	3.590245000 GHz	-54.71 dBm	-41.71 dB
7	7	3.5910 GHz	3.6000 GHz	1.000 MHz	3.591660000 GHz	-46.92 dBm	-33.92 dB
8	8	3.6000 GHz	3.6100 GHz	1.000 MHz	3.604100000 GHz	-47.35 dBm	-22.35 dB

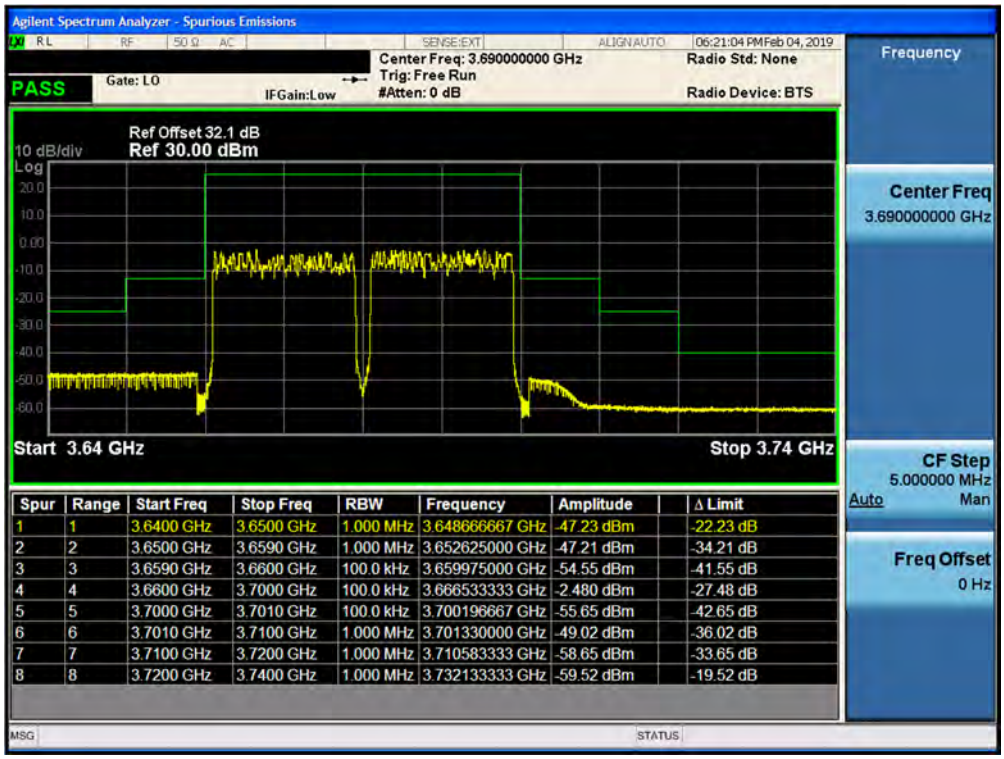
Plot 7-478. Lower Channel Edge Plot (40.0MHz 256QAM Low Channel– SISO)

2CC Contiguous High Channel SISO



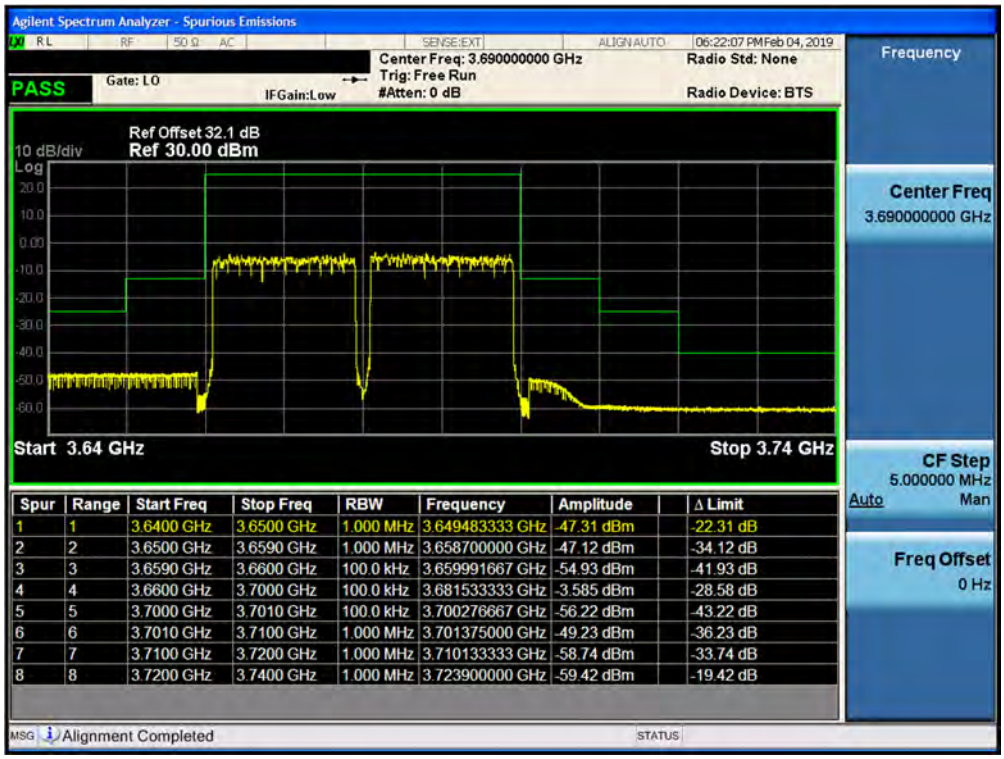
Spur	Range	Start Freq	Stop Freq	RBW	Frequency	Amplitude	Δ Limit
1	1	3.6400 GHz	3.6500 GHz	1.000 MHz	3.644266667 GHz	-47.07 dBm	-22.07 dB
2	2	3.6500 GHz	3.6590 GHz	1.000 MHz	3.655955000 GHz	-46.78 dBm	-33.78 dB
3	3	3.6590 GHz	3.6600 GHz	100.0 kHz	3.659998333 GHz	-54.13 dBm	-41.13 dB
4	4	3.6600 GHz	3.7000 GHz	100.0 kHz	3.695200000 GHz	-4.335 dBm	-29.33 dB
5	5	3.7000 GHz	3.7010 GHz	100.0 kHz	3.700041667 GHz	-55.44 dBm	-42.44 dB
6	6	3.7010 GHz	3.7100 GHz	1.000 MHz	3.701390000 GHz	-49.09 dBm	-36.09 dB
7	7	3.7100 GHz	3.7200 GHz	1.000 MHz	3.711000000 GHz	-58.81 dBm	-33.81 dB
8	8	3.7200 GHz	3.7400 GHz	1.000 MHz	3.734500000 GHz	-59.39 dBm	-19.39 dB

Plot 7-479. Upper Channel Edge Plot (40.0MHz QPSK High Channel– SISO)



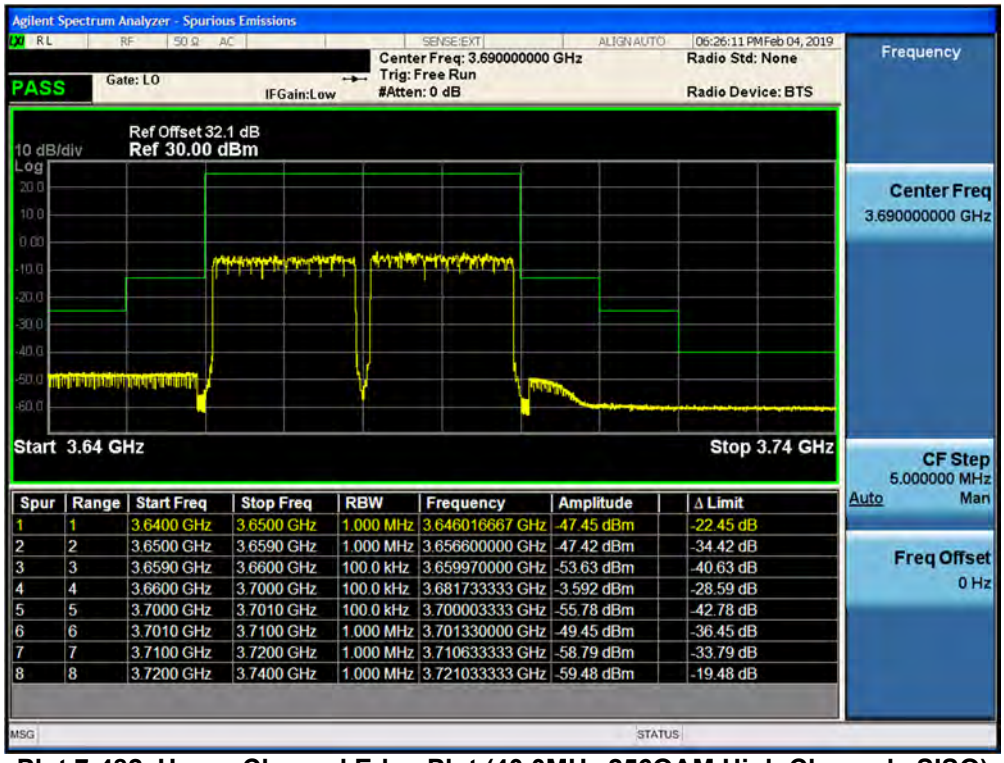
Spur	Range	Start Freq	Stop Freq	RBW	Frequency	Amplitude	Δ Limit
1	1	3.6400 GHz	3.6500 GHz	1.000 MHz	3.648666667 GHz	-47.23 dBm	-22.23 dB
2	2	3.6500 GHz	3.6590 GHz	1.000 MHz	3.652625000 GHz	-47.21 dBm	-34.21 dB
3	3	3.6590 GHz	3.6600 GHz	100.0 kHz	3.659975000 GHz	-54.55 dBm	-41.55 dB
4	4	3.6600 GHz	3.7000 GHz	100.0 kHz	3.666533333 GHz	-2.480 dBm	-27.48 dB
5	5	3.7000 GHz	3.7010 GHz	100.0 kHz	3.700196667 GHz	-55.65 dBm	-42.65 dB
6	6	3.7010 GHz	3.7100 GHz	1.000 MHz	3.701330000 GHz	-49.02 dBm	-36.02 dB
7	7	3.7100 GHz	3.7200 GHz	1.000 MHz	3.710583333 GHz	-58.65 dBm	-33.65 dB
8	8	3.7200 GHz	3.7400 GHz	1.000 MHz	3.732133333 GHz	-59.52 dBm	-19.52 dB

Plot 7-480. Upper Channel Edge Plot (40.0MHz 16QAM High Channel– SISO)



Spur	Range	Start Freq	Stop Freq	RBW	Frequency	Amplitude	Δ Limit
1	1	3.6400 GHz	3.6500 GHz	1.000 MHz	3.649483333 GHz	-47.31 dBm	-22.31 dB
2	2	3.6500 GHz	3.6590 GHz	1.000 MHz	3.658700000 GHz	-47.12 dBm	-34.12 dB
3	3	3.6590 GHz	3.6600 GHz	100.0 kHz	3.659991667 GHz	-54.93 dBm	-41.93 dB
4	4	3.6600 GHz	3.7000 GHz	100.0 kHz	3.681533333 GHz	-3.585 dBm	-28.58 dB
5	5	3.7000 GHz	3.7010 GHz	100.0 kHz	3.700276667 GHz	-56.22 dBm	-43.22 dB
6	6	3.7010 GHz	3.7100 GHz	1.000 MHz	3.701375000 GHz	-49.23 dBm	-36.23 dB
7	7	3.7100 GHz	3.7200 GHz	1.000 MHz	3.710133333 GHz	-58.74 dBm	-33.74 dB
8	8	3.7200 GHz	3.7400 GHz	1.000 MHz	3.723900000 GHz	-59.42 dBm	-19.42 dB

Plot 7-481. Upper Channel Edge Plot (40.0MHz 64QAM High Channel– SISO)



Spur	Range	Start Freq	Stop Freq	RBW	Frequency	Amplitude	Δ Limit
1	1	3.6400 GHz	3.6500 GHz	1.000 MHz	3.646016667 GHz	-47.45 dBm	-22.45 dB
2	2	3.6500 GHz	3.6590 GHz	1.000 MHz	3.656600000 GHz	-47.42 dBm	-34.42 dB
3	3	3.6590 GHz	3.6600 GHz	100.0 kHz	3.659970000 GHz	-53.63 dBm	-40.63 dB
4	4	3.6600 GHz	3.7000 GHz	100.0 kHz	3.681733333 GHz	-3.592 dBm	-28.59 dB
5	5	3.7000 GHz	3.7010 GHz	100.0 kHz	3.700003333 GHz	-55.78 dBm	-42.78 dB
6	6	3.7010 GHz	3.7100 GHz	1.000 MHz	3.701330000 GHz	-49.45 dBm	-36.45 dB
7	7	3.7100 GHz	3.7200 GHz	1.000 MHz	3.710633333 GHz	-58.79 dBm	-33.79 dB
8	8	3.7200 GHz	3.7400 GHz	1.000 MHz	3.721033333 GHz	-59.48 dBm	-19.48 dB

Plot 7-482. Upper Channel Edge Plot (40.0MHz 256QAM High Channel– SISO)

7.8 Frequency Stability / Temperature Variation

§2.1055

Test Overview and Limit

Frequency stability testing is performed in accordance with the guidelines of ANSI/TIA-603-E-2016. The frequency stability of the transmitter is measured by:

a.) **Temperature:** The temperature is varied from -30°C to +50°C in 10°C increments using an environmental chamber.

b.) **Primary Supply Voltage:** The primary supply voltage is varied from 85% to 115% of the nominal value for non hand-carried battery and AC powered equipment. For hand-carried, battery-powered equipment, primary supply voltage is reduced to the battery operating end point which shall be specified by the manufacturer.

Test Procedure Used

ANSI/TIA-603-E-2016

Test Settings

1. The carrier frequency of the transmitter is measured at room temperature (20°C to provide a reference).
2. The equipment is turned on in a "standby" condition for fifteen minutes before applying power to the transmitter. Measurement of the carrier frequency of the transmitter is made within one minute after applying power to the transmitter.
3. Frequency measurements are made at 10°C intervals ranging from -30°C to +50°C. A period of at least one half-hour is provided to allow stabilization of the equipment at each temperature level.

Test Setup

The EUT was connected via an RF cable to a spectrum analyzer with the EUT placed inside an environmental chamber.

Test Notes

A spectrum analyzer was used for this test with settings as follows:

1. Trace = Average RMS
2. Detector = Peak
3. RBW = 100kHz
4. VBW = 500 kHz

Corrections for the cable, connectors and attenuators was accounted for as an offset before measurement.

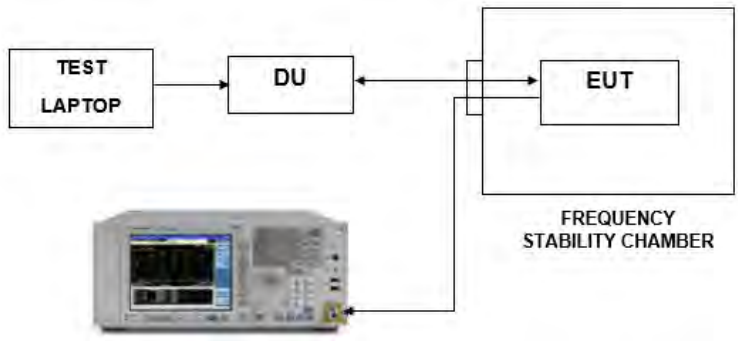


Figure 7-7. Test Instrument & Measurement Setup

Band 48 Frequency Stability Measurements

OPERATING FREQUENCY: 3,625,000,000 Hz

REFERENCE VOLTAGE: 48.00 VDC

VOLTAGE (%)	POWER (VDC)	TEMP (°C)	FREQUENCY (Hz)	Freq. Dev. (Hz)	Deviation (%)
100 %	48.00	+ 20 (Ref)	3,624,968,739	0	0.0000000
100 %	48.00	- 30	3,624,781,444	-187,295	-0.0051668
100 %		- 20	3,624,766,229	-202,510	-0.0055865
100 %		- 10	3,625,009,563	40,824	0.0011262
100 %		0	3,624,868,000	-100,739	-0.0027790
100 %		+ 10	3,624,922,125	-46,614	-0.0012859
100 %		+ 30	3,625,113,118	144,378	0.0039829
100 %		+ 40	3,625,150,467	181,728	0.0050132
100 %		+ 50	3,625,220,875	252,136	0.0069555
85 %	40.80	+ 20	3,624,982,612	13,873	0.0003827
115 %	55.20	+20	3,625,171,416	202,677	0.0055911

Table 7-44. Frequency Stability Data (Band 48)

Note:

Based on the results of the frequency stability test at the center channel the frequency deviation results measured are very small. As such it is determined that the channels at the band edge would remain in-band when the maximum measured frequency deviation noted during the frequency stability tests is applied. Therefore the device is determined to remain operating in band over the temperature and voltage range as tested.

Band 48 Frequency Stability Measurements

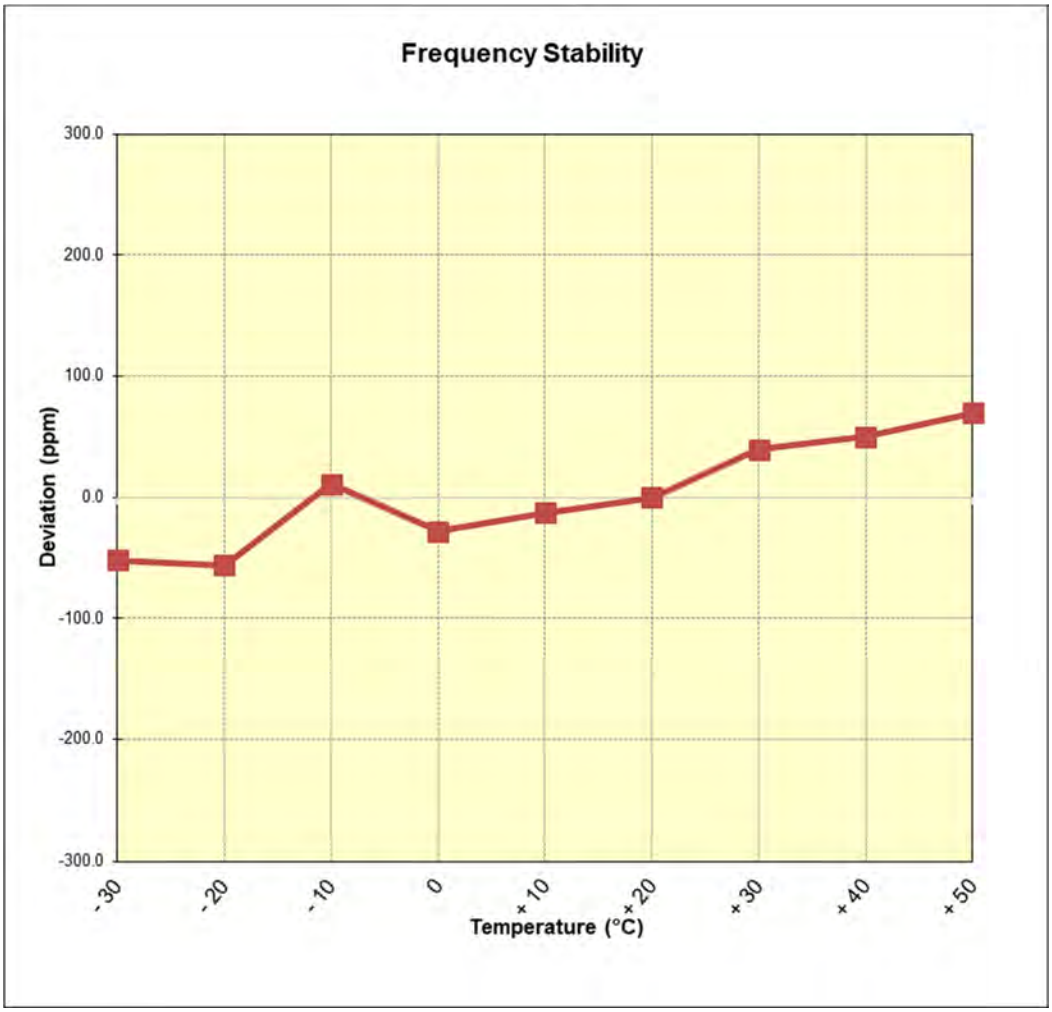


Figure 7-8. Frequency Stability Graph (Band 48)

8.0 CONCLUSION

The data collected relate only to the item(s) tested and show that the **Samsung Massive MIMO CBSD FCC ID: A3LMT3204-48A** complies with all of the Category B CBSD requirements of Part 96 of the FCC Rules.