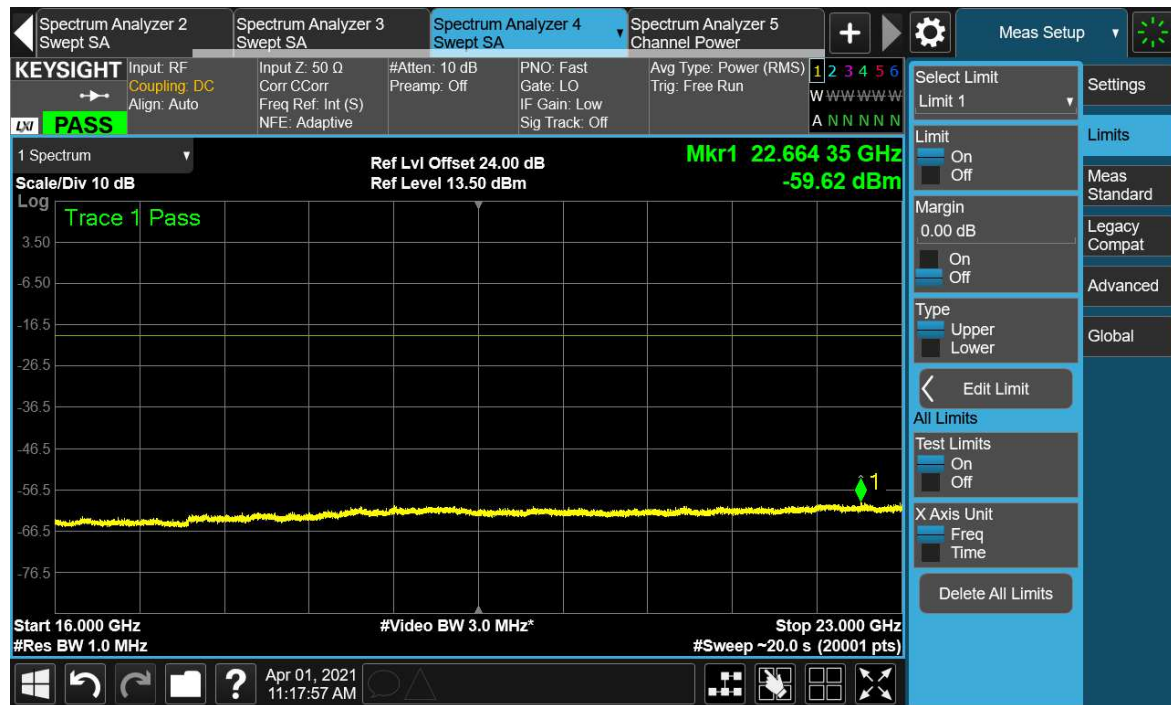


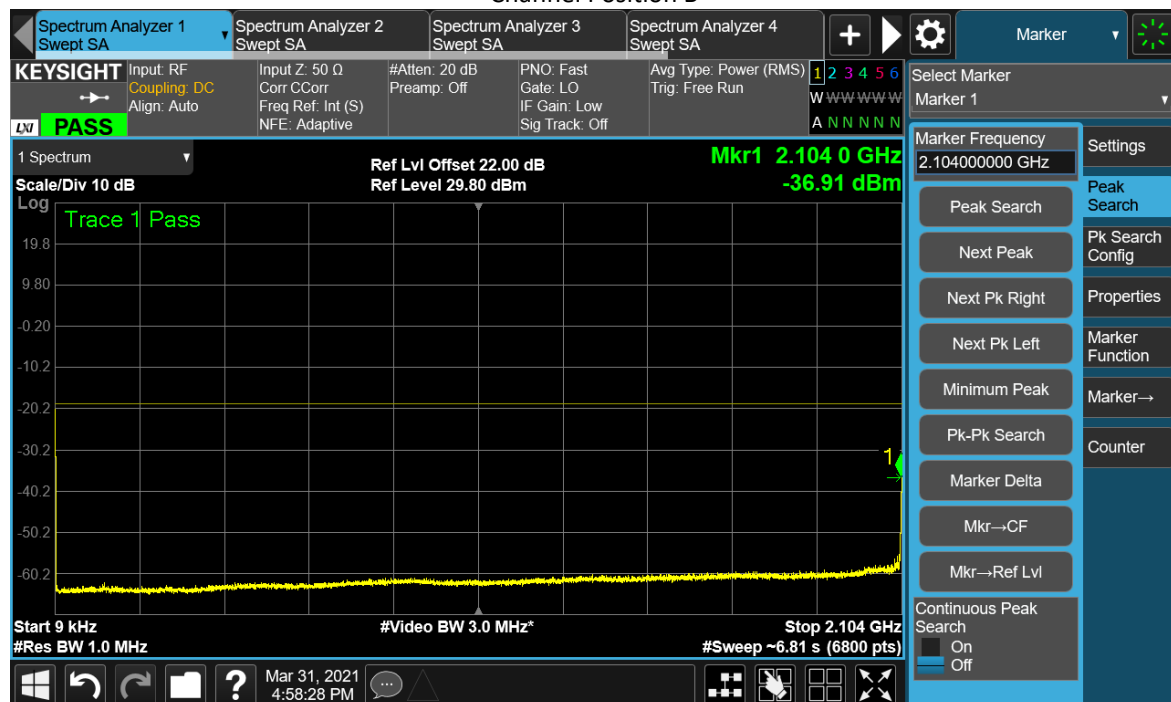
TEST REPORT



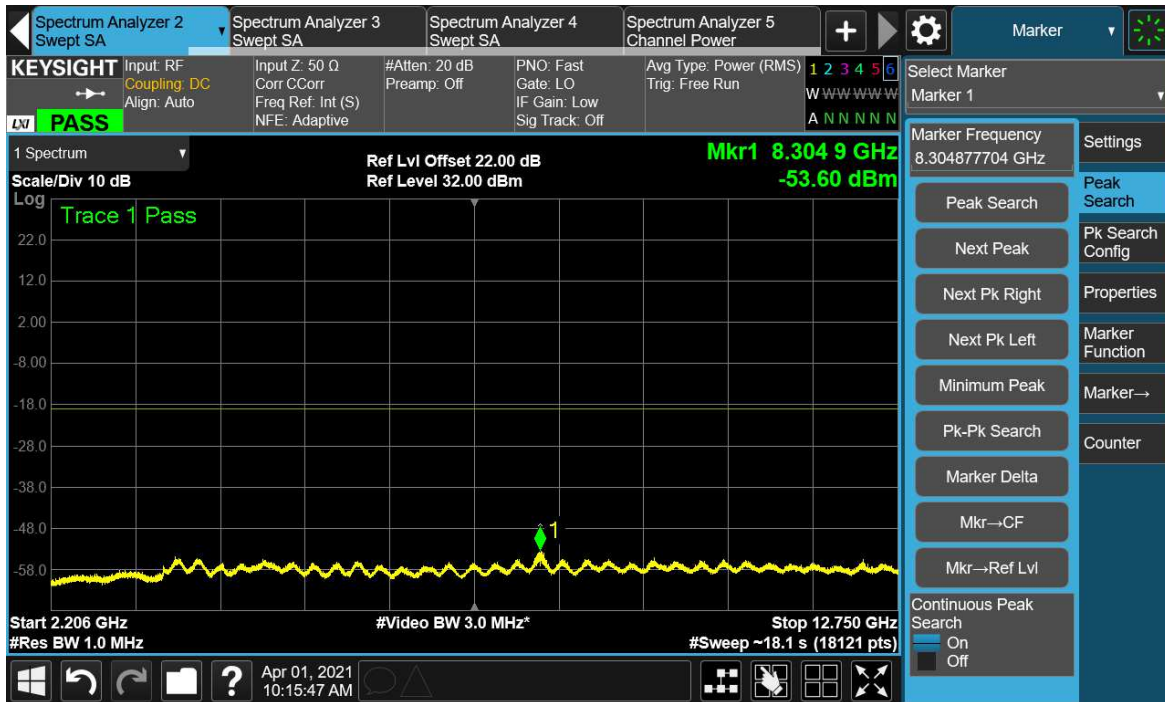
WCDMA-MIMO-2C

Antenna Port	Channel Position	WCDMA Modulation	WCDMA Channel Bandwidth (MHz)	RBW (kHz)	Limit (dBm)
B	B	16QAM	5	1000	-19.02
B	T	16QAM	5	1000	-19.02

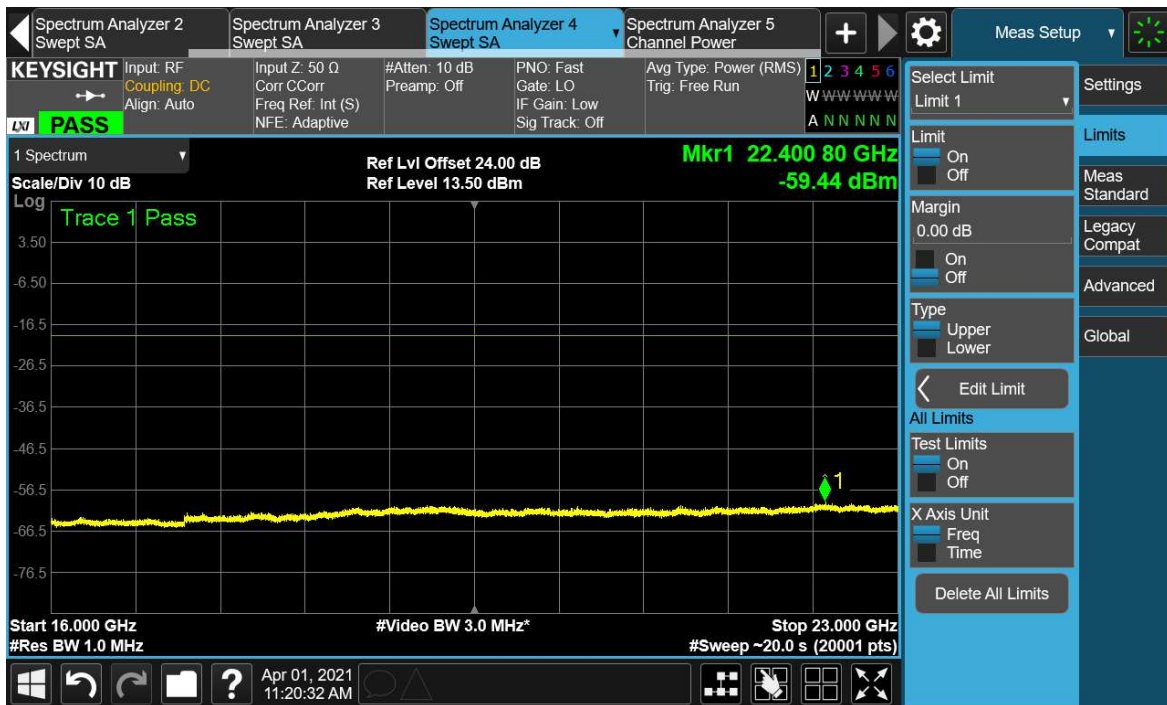
Channel Position B



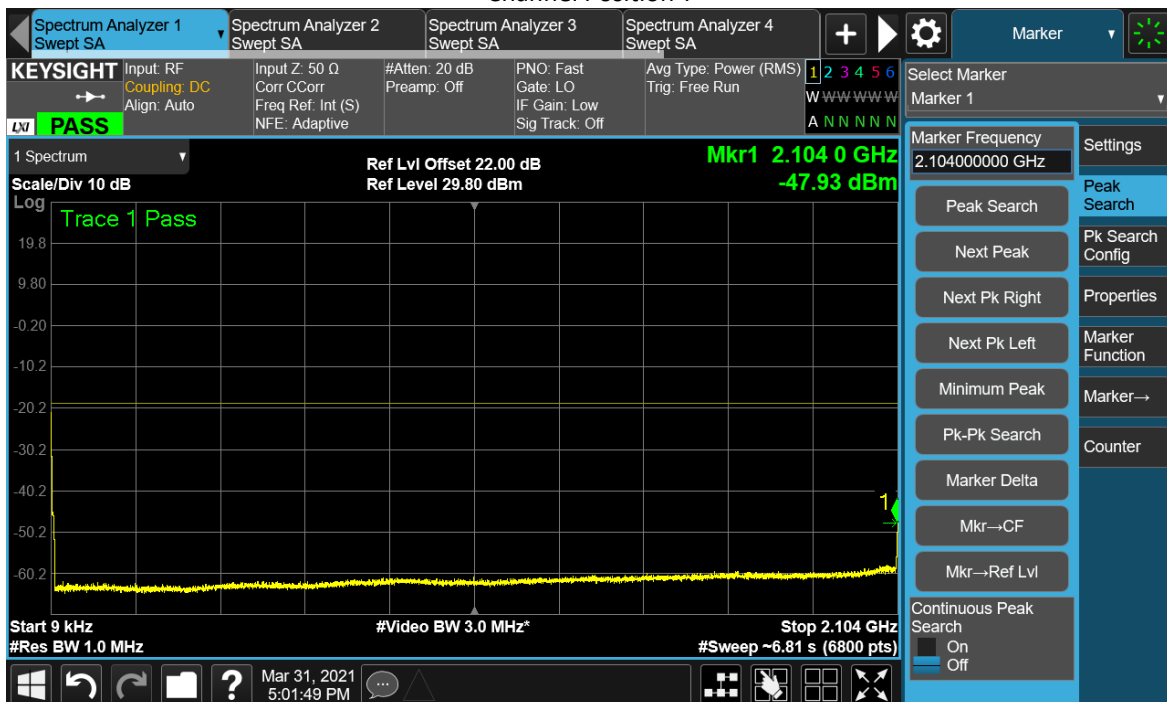
TEST REPORT



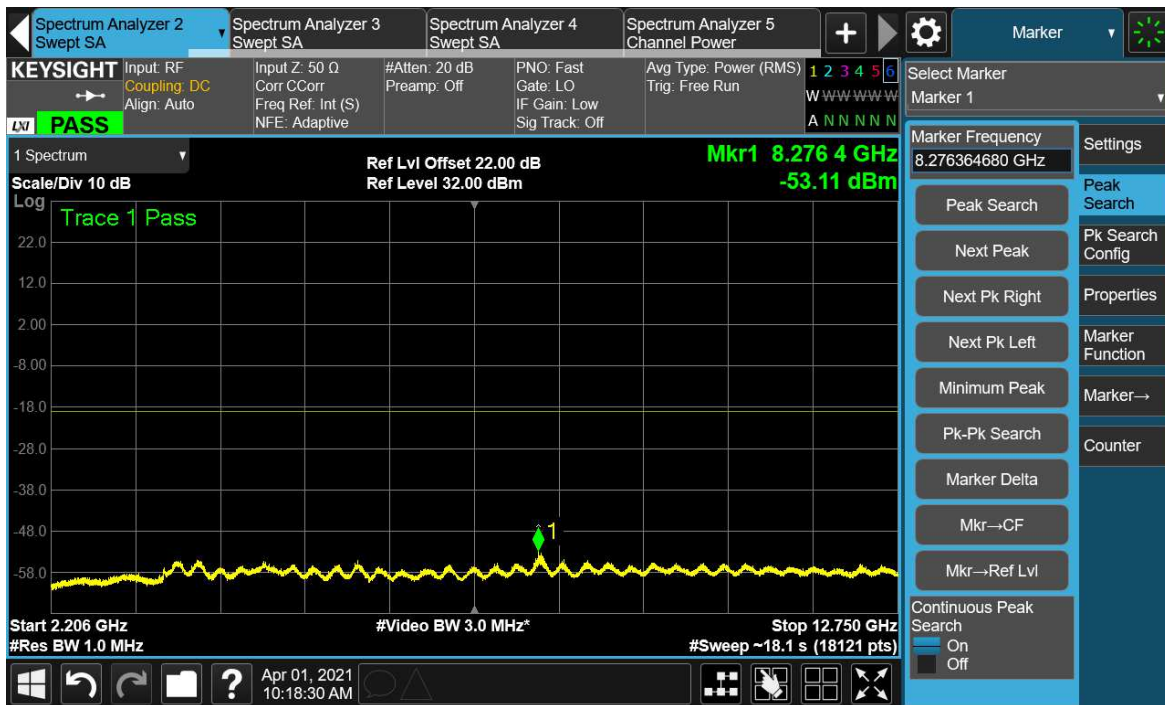
TEST REPORT



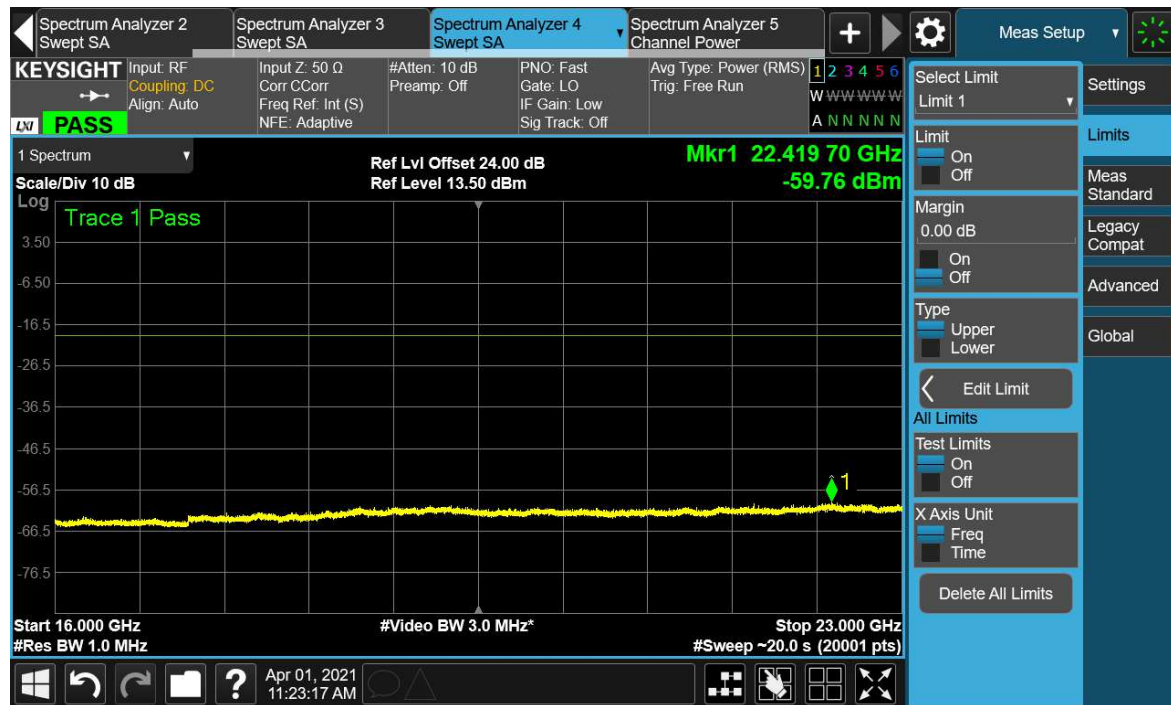
Channel Position T



TEST REPORT



TEST REPORT

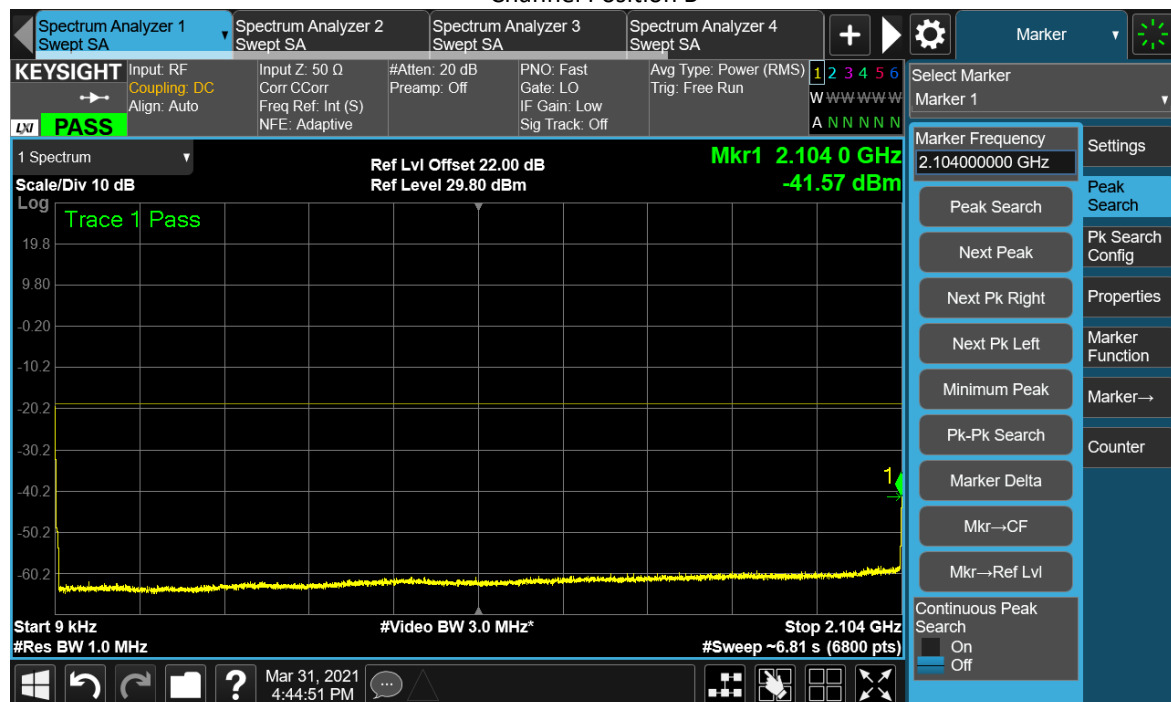


mix mode:

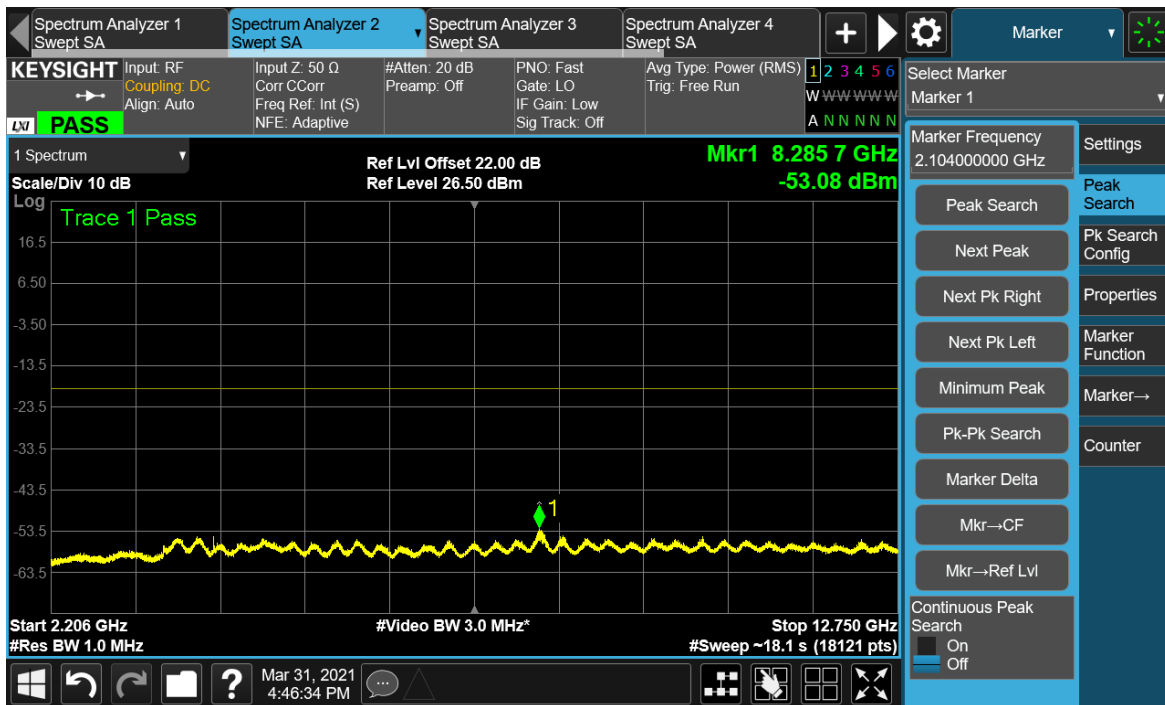
W+L+NR-MIMO-MC-1-UE

Antenna Port	Channel Position	NR & LTE Modulation	NR Carrier Bandwidth (MHz)	LTE Carrier Bandwidth (MHz)	RBW (kHz)	Limit (dBm)
B	B	16QAM	5	5	1000	-19.02
B	T	16QAM	5	5	1000	-19.02

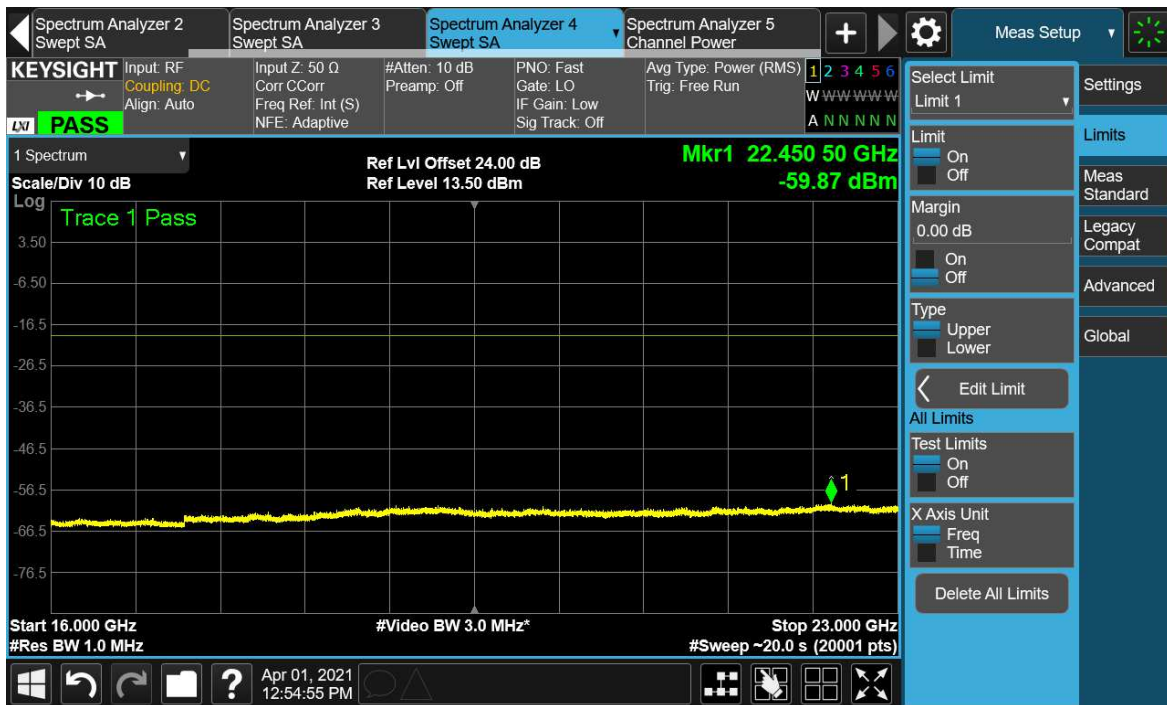
Channel Position B



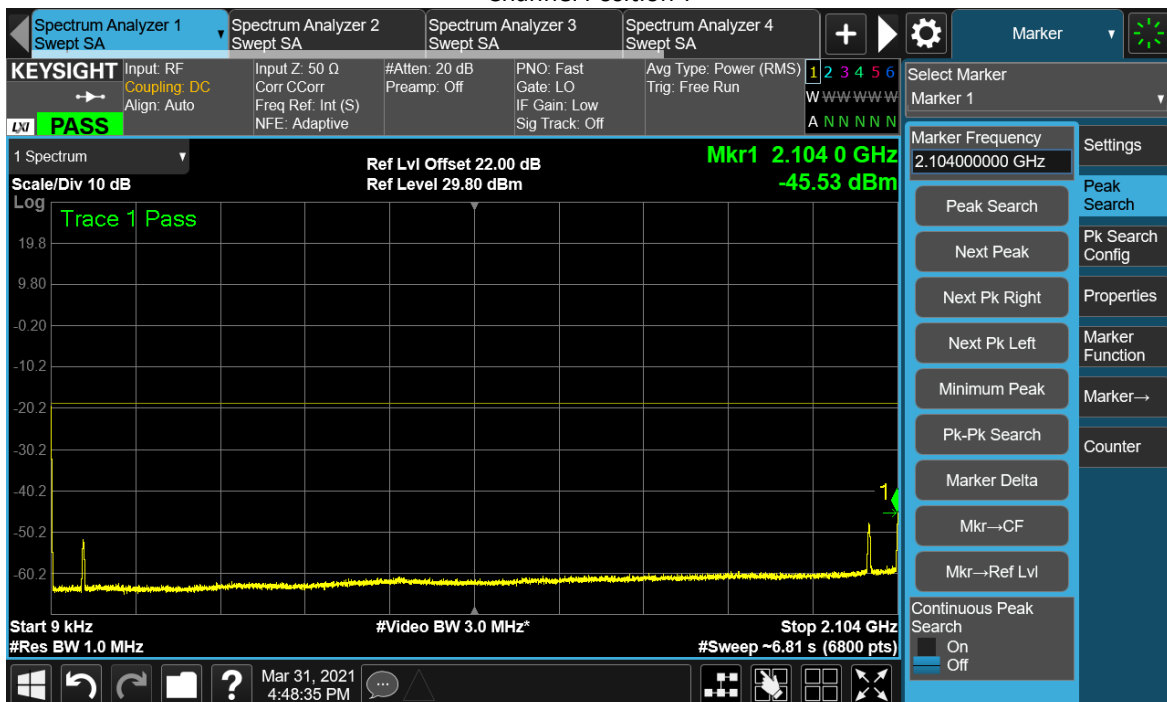
TEST REPORT



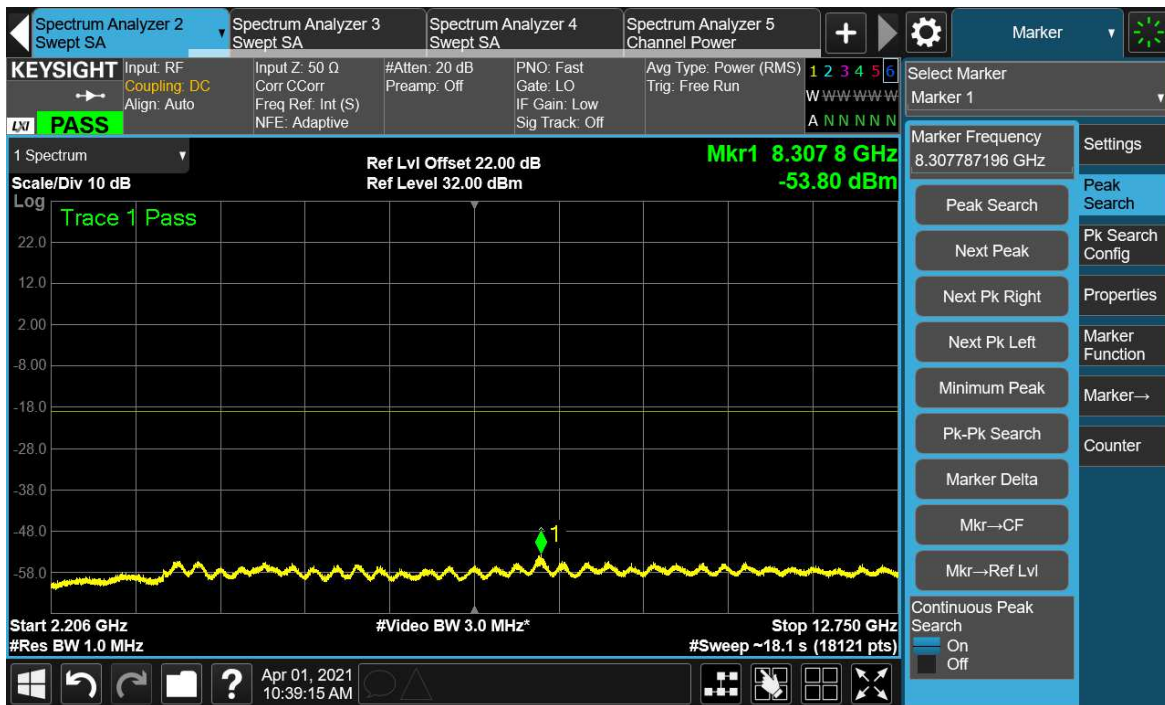
TEST REPORT



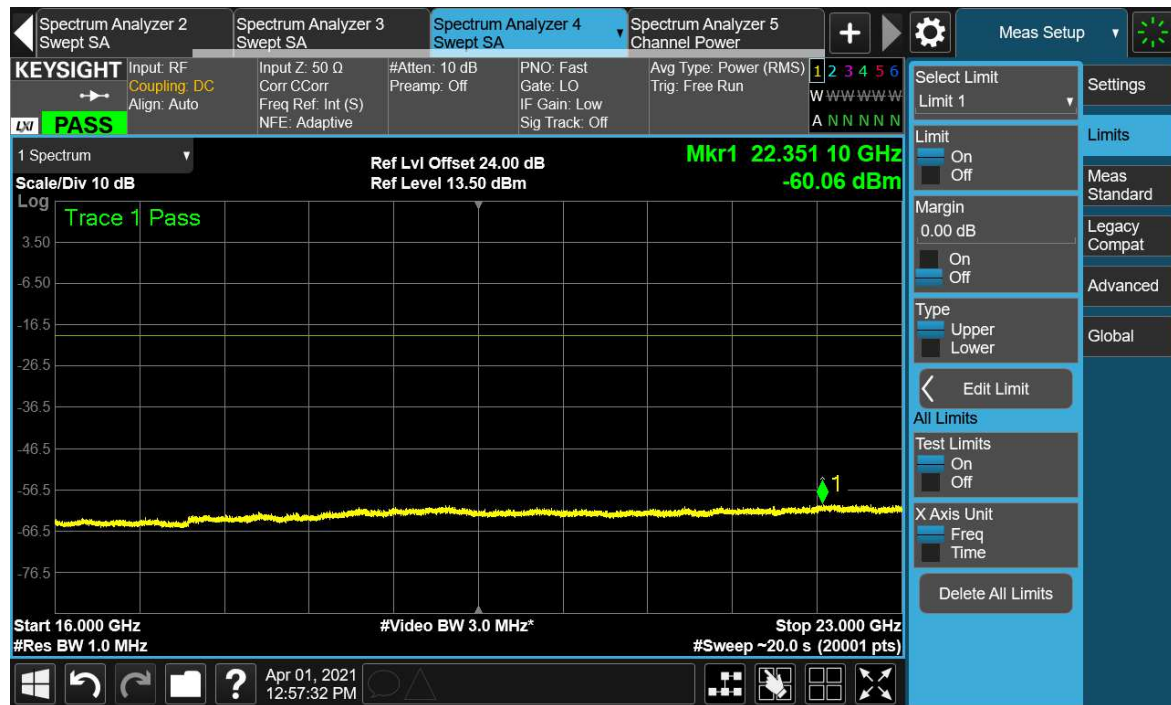
Channel Position T



TEST REPORT



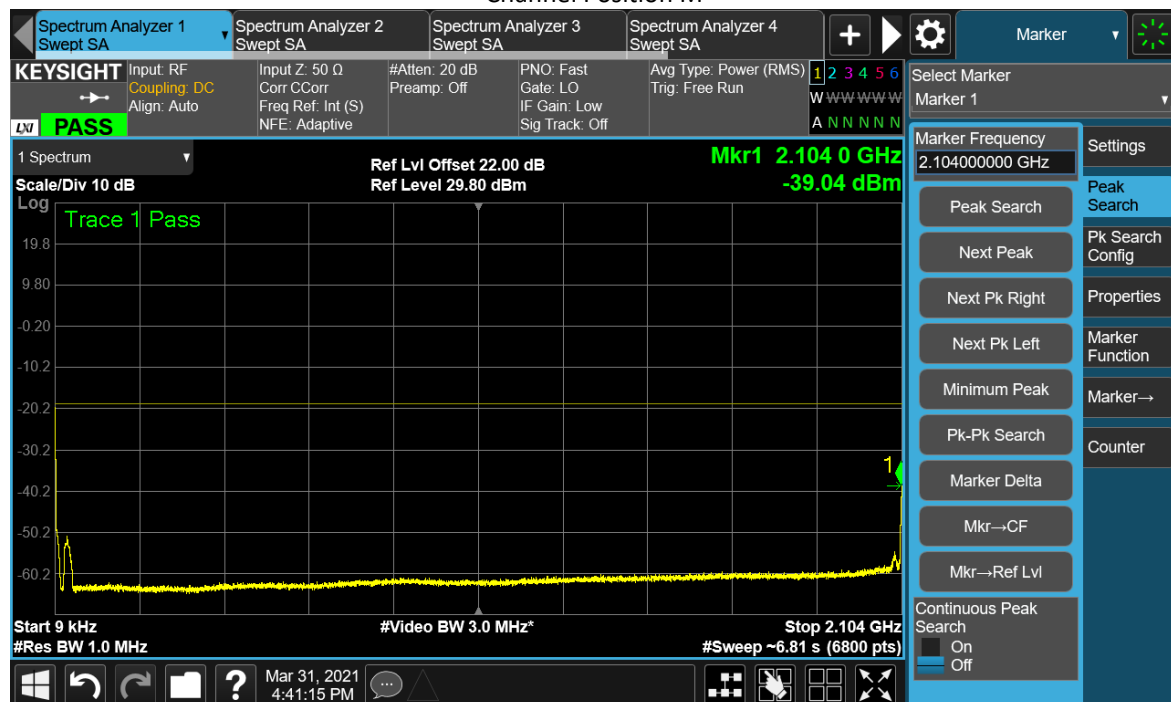
TEST REPORT



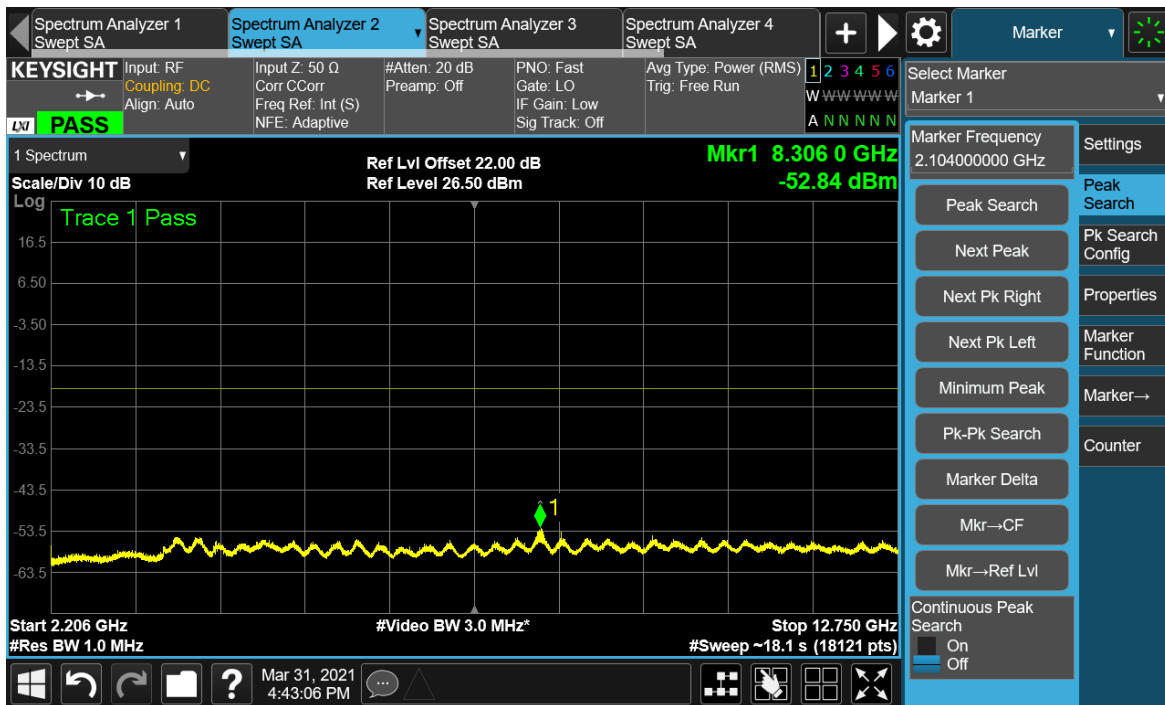
NR+W+GB-MIMO-MC-1-UE

Antenna Port	Channel Position	NR Modulation	NR Carrier Bandwidth (MHz)	GB Carrier Bandwidth (MHz)	RBW (kHz)	Limit (dBm)
B	M	16QAM	5	10	1000	-19.02

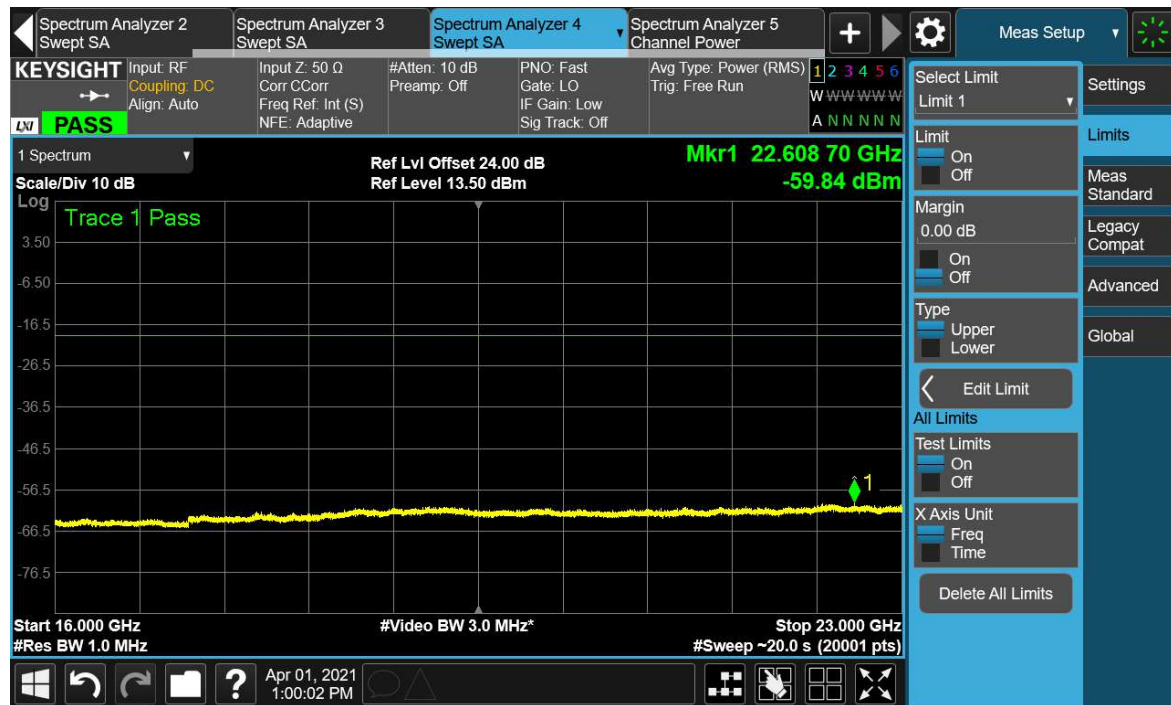
Channel Position M



TEST REPORT



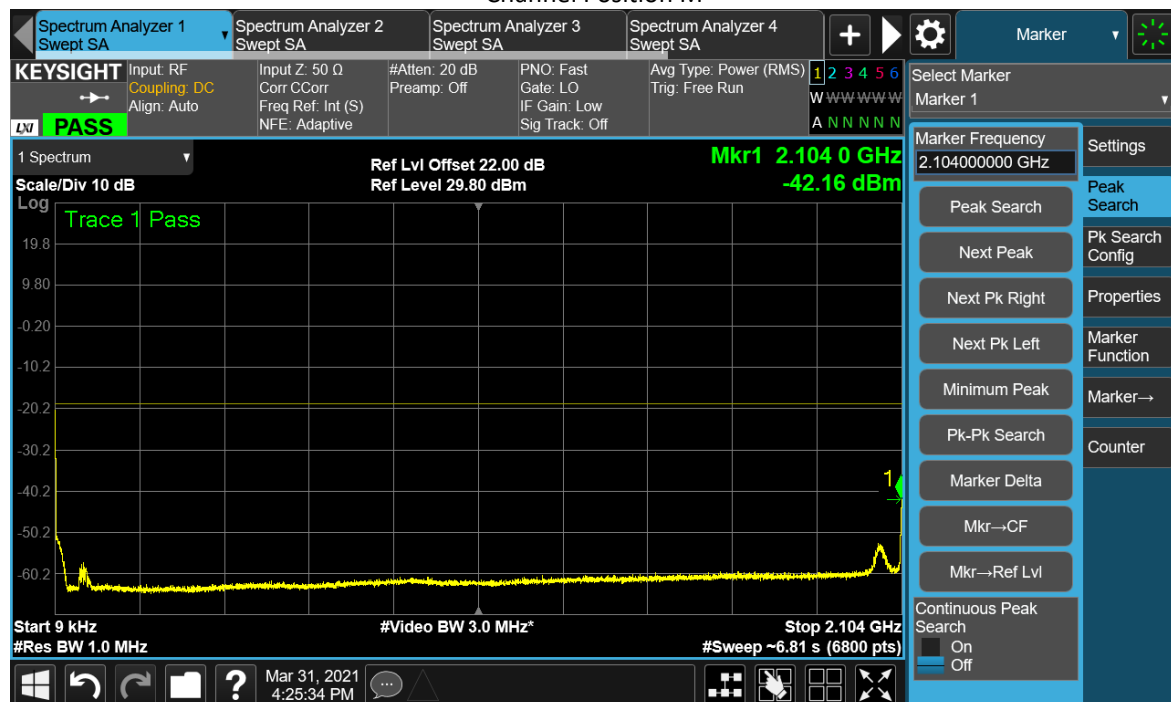
TEST REPORT



GB+NR+L+SA-MIMO-MC-1-UE

Antenna Port	Channel Position	NR & LTE Modulation	GB Carrier Bandwidth (MHz)	SA Carrier Bandwidth (MHz)	RBW (kHz)	Limit (dBm)
B	M	16QAM	10	0.2	1000	-19.02

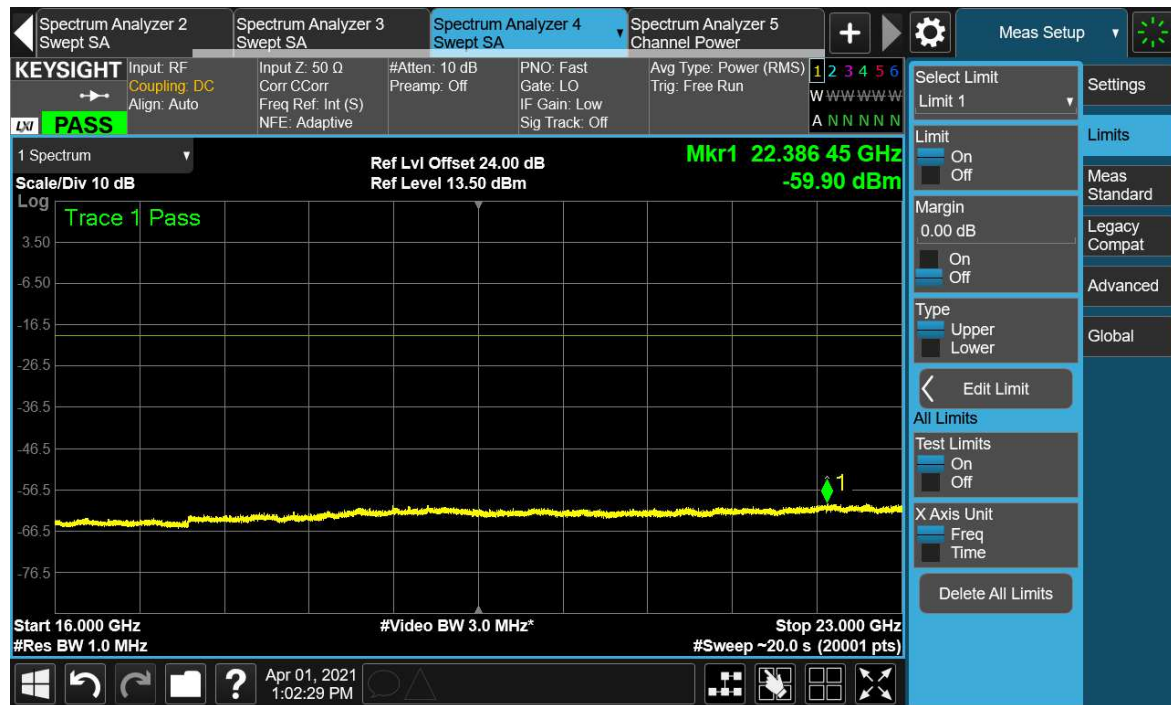
Channel Position M



TEST REPORT



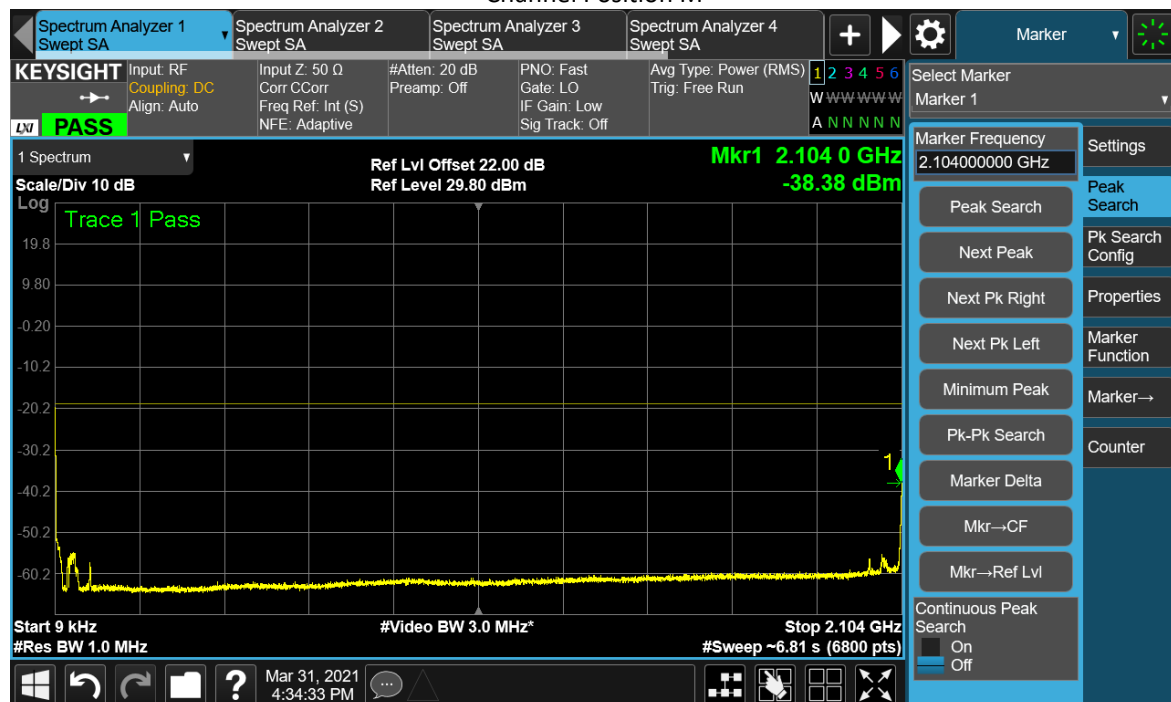
TEST REPORT



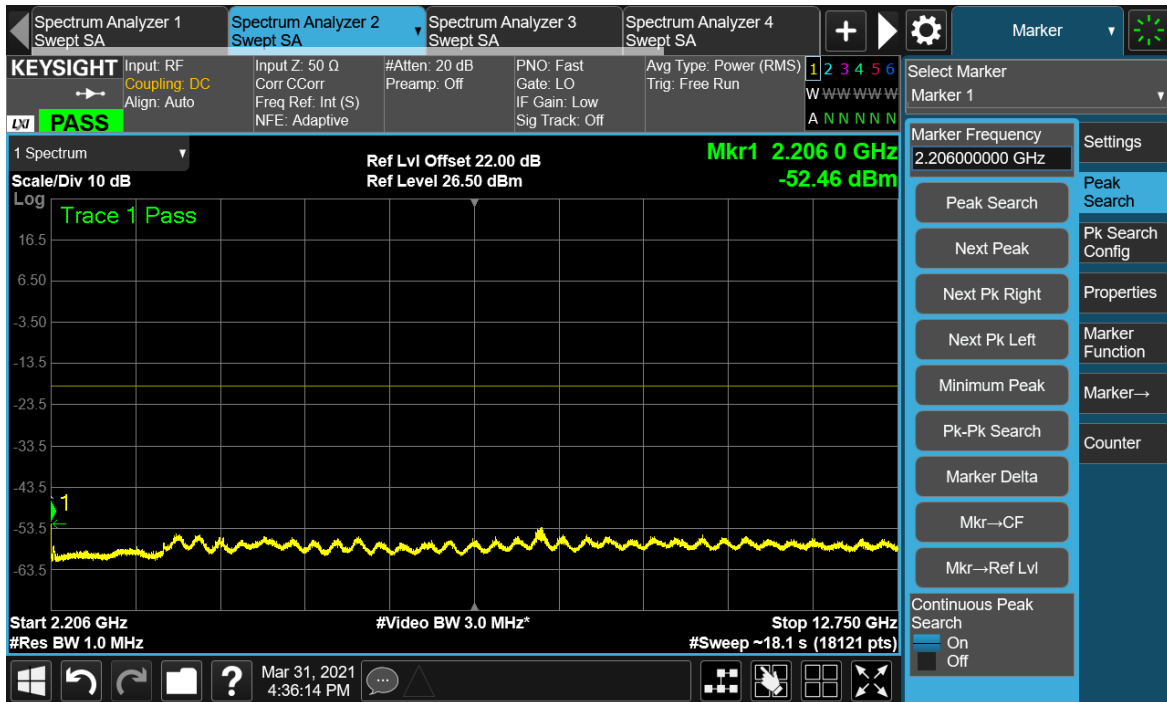
SA+W+L-MIMO-MC-1-UE

Antenna Port	Channel Position	LTE Modulation	SA Channel Bandwidth (MHz)	LTE Channel Bandwidth (MHz)	RBW (kHz)	Limit (dBm)
B	M	16QAM	0.2	5	1000	-19.02

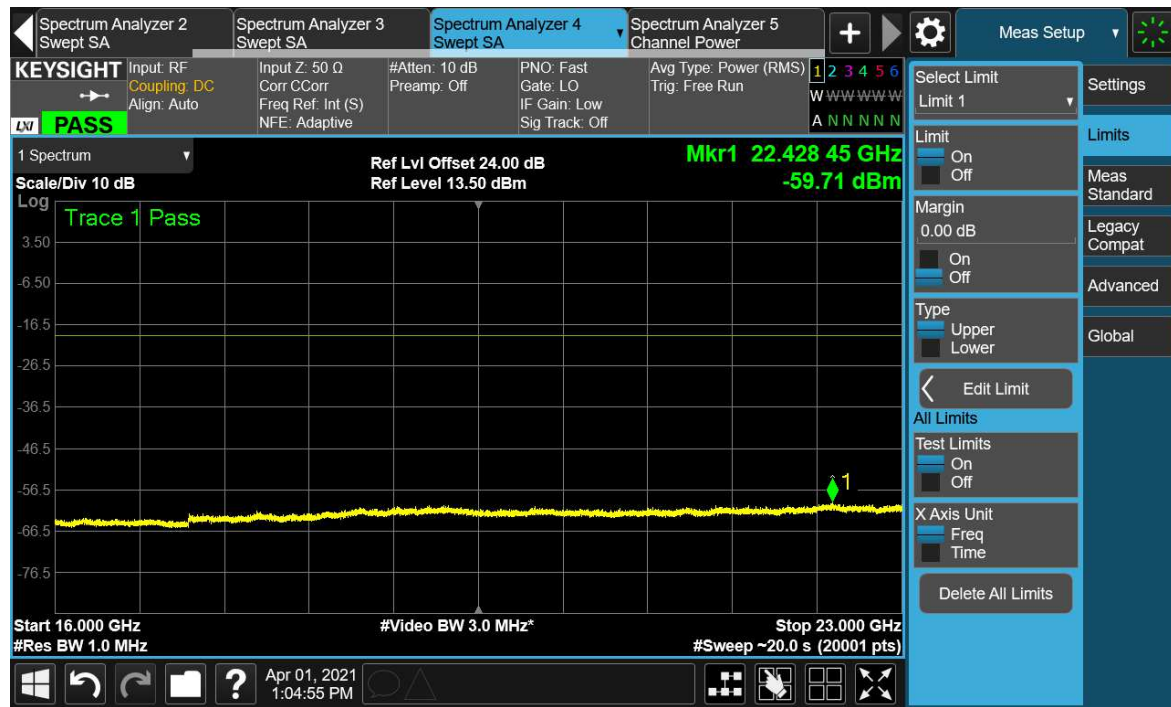
Channel Position M



TEST REPORT



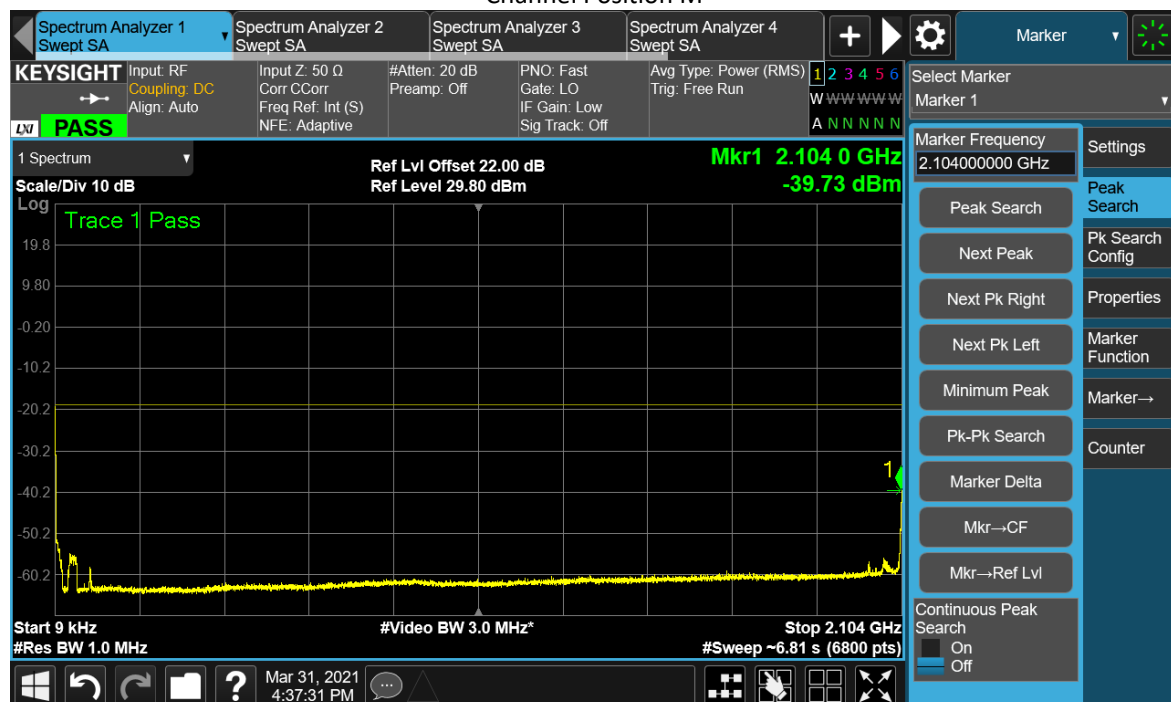
TEST REPORT



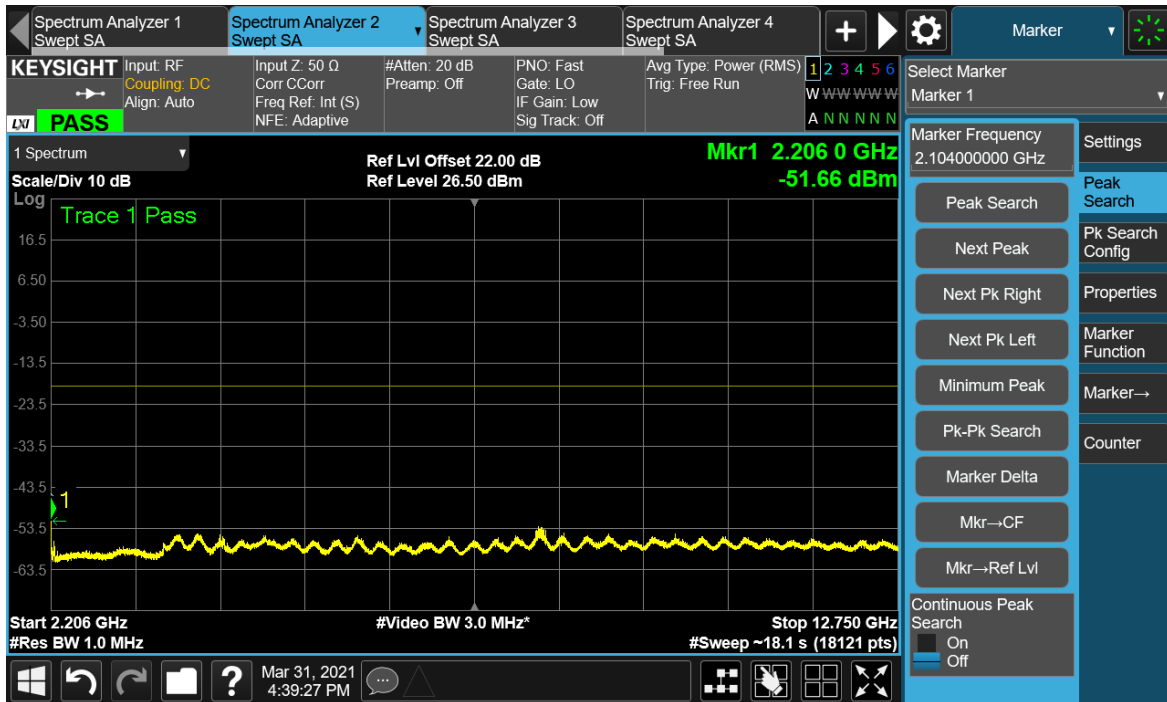
SA+L-MIMO-MC-1-UE

Antenna Port	Channel Position	LTE Modulation	SA Channel Bandwidth (MHz)	LTE Channel Bandwidth (MHz)	RBW (kHz)	Limit (dBm)
B	B	16QAM	0.2	5	1000	-19.02

Channel Position M



TEST REPORT



TEST REPORT



TEST REPORT

7 Radiated Unwanted Emission

Test result: Pass

7.1 Limit

The field strength of the carrier has been calculated assuming that the power is to be fed to a half-wave tuned dipoles as per 2.1053 (a).

$$E(V/m) = (30 \times G_i \times P_o)^{0.5} / d$$

Where

G_i is the antenna gain of ideal half-wave dipoles,

P_o is the power out of the transceiver in W,

d is the measurement distance in meter.

As per FCC Part 27, the power of any emission outside of the authorized operating frequency ranges must be attenuated below the transmitting power (P) by a factor of at least $43 + 10\log(P)$ dB.

Therefore, the limit at 3m measurement distance is:

$$E(V/m) = 84.4 \text{ dB}\mu\text{V/m}$$

These limits have been used to determine Pass or Fail for the harmonics measured and detailed in the following results.

7.2 Measurement Procedure

This measurement is carried out in semi-anechoic chamber.

A preliminary profile of the Spurious Radiated Emissions was obtained by operating the EUT on a remotely controlled turntable within the chamber. Measurements of emissions from the EUT were obtained with the measurement antenna in both horizontal and vertical polarizations.

Emissions identified within the range 30MHz to 40GHz were then formally measured using a peak detector as the worst case.

The limits for outside a licensee's frequency band(s) of operation the power of the spurious emissions have been calculated, as shown below using the following formula:

$$\text{Field Strength of Carrier} - (43 + 10\log(P)) \text{ dB}$$

Where:

Field Strength is measured in dB μ V/m

P is measured Transmitter Power in Watts

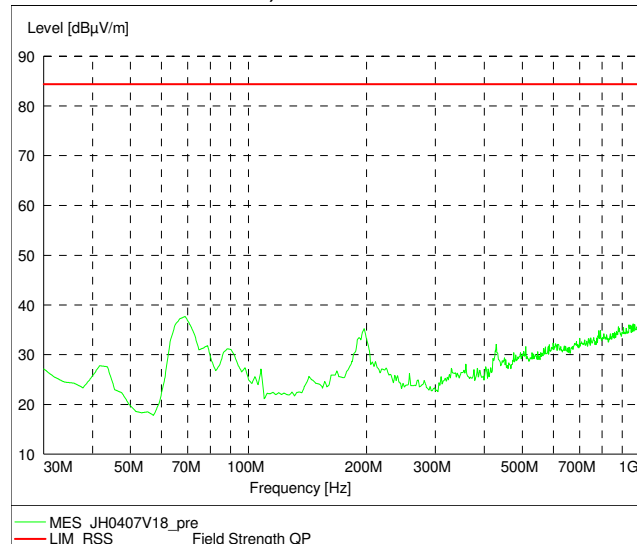
The EUT was measured with the antenna height varied between 1 and 4 m with the turntable rotated between 0 and 360 degrees. The emission of any outside a licensee's frequencies within 20dB of the limit were measured with the substitution method used according to the standard.

The measurements were performed at a 3m distance unless otherwise stated.

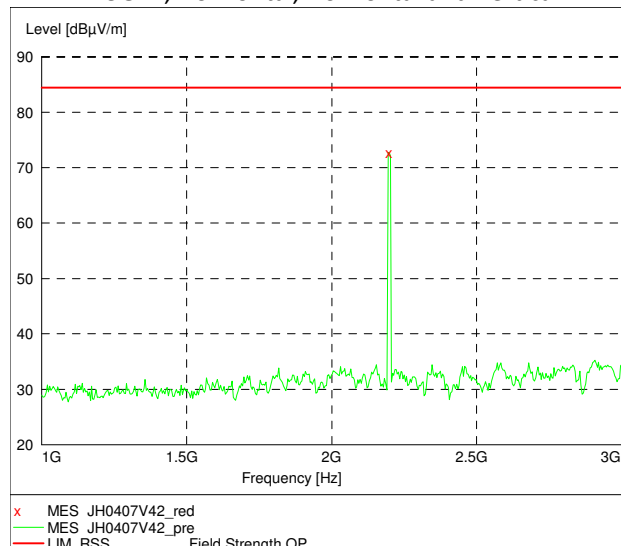
7.3 Measurement result

Configuration	Channel Position	Carrier	Carrier Bandwidth	Modulation
NR-MIMO-1C-UE	B	1 Carrier	5MHz	16QAM
NR-MIMO-1C-UE	T	1 Carrier	5MHz	16QAM

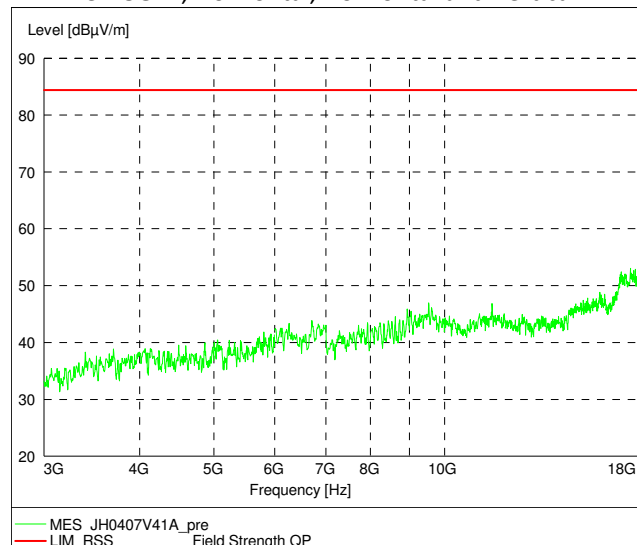
30-1000MHz, Horizontal and Vertical



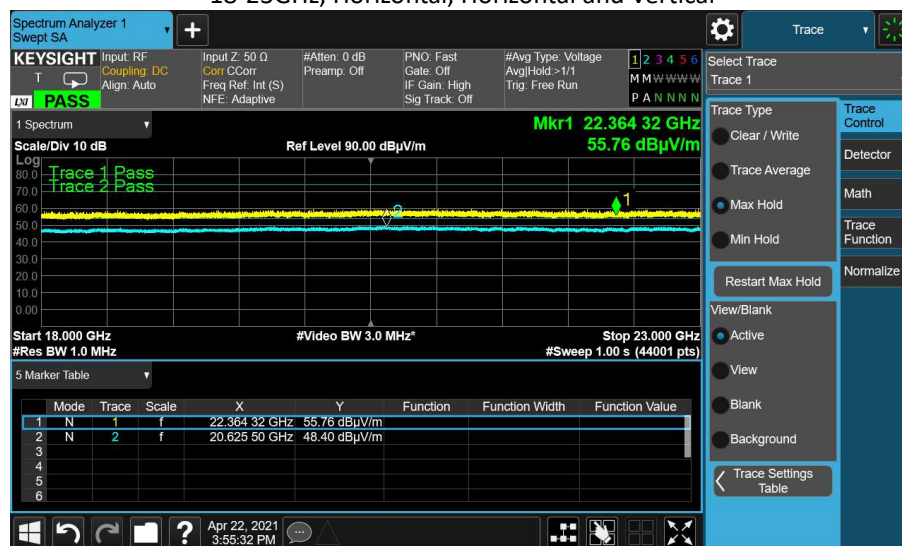
1-3GHz, Horizontal, Horizontal and Vertical



3-18GHz, Horizontal, Horizontal and Vertical

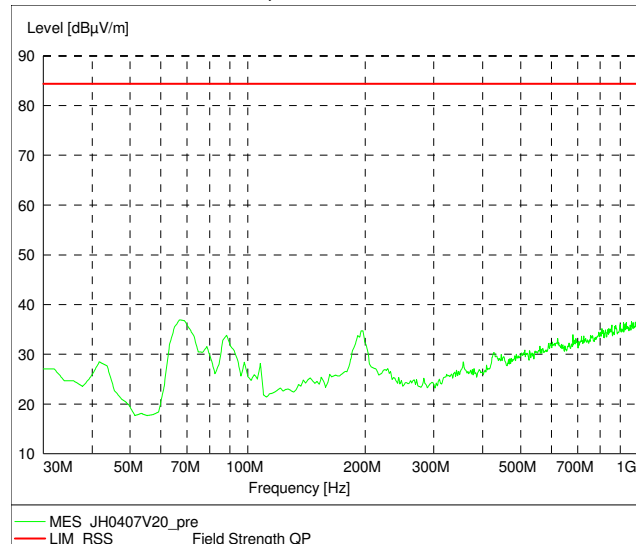


18-23GHz, Horizontal, Horizontal and Vertical

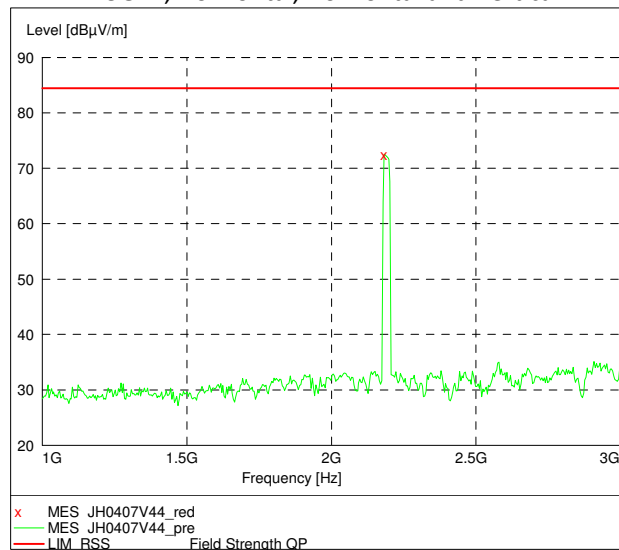


Configuration	Channel Position	Carrier	Carrier Bandwidth	Modulation
NR-MIMO-1C-UE	B	1 Carrier	20MHz	16QAM
NR-MIMO-1C-UE	T	1 Carrier	20MHz	16QAM

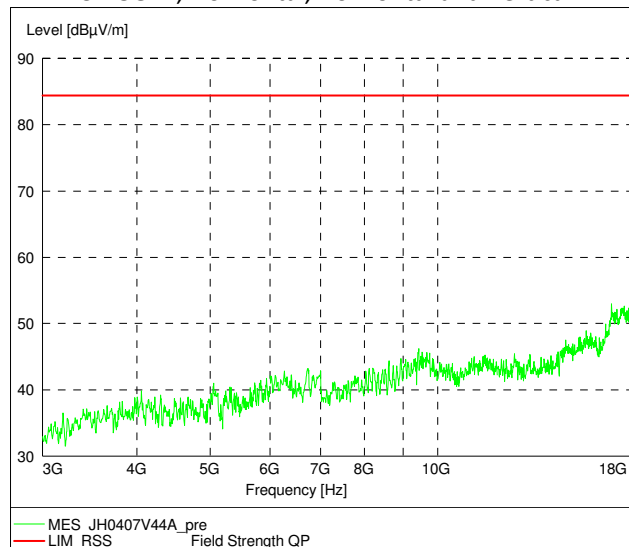
30-1000MHz, Horizontal and Vertical



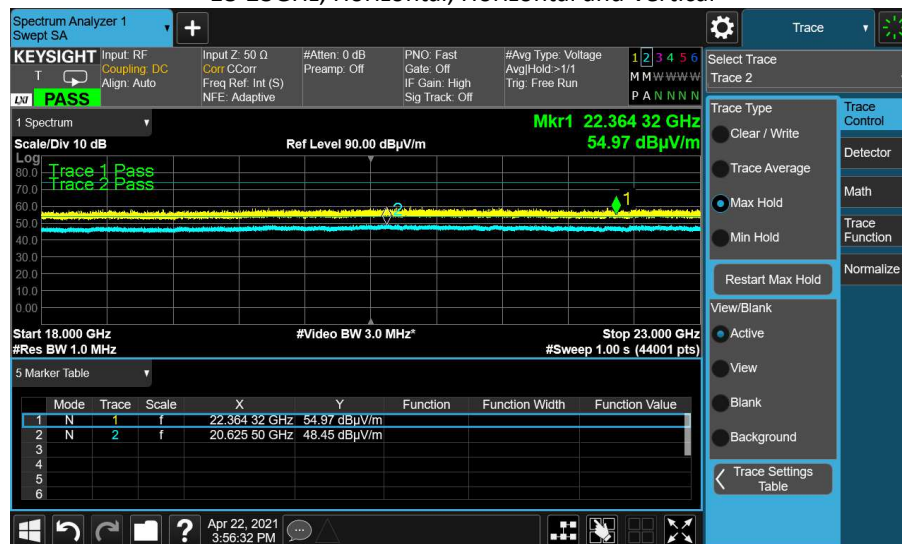
1-3GHz, Horizontal, Horizontal and Vertical



3-18GHz, Horizontal, Horizontal and Vertical

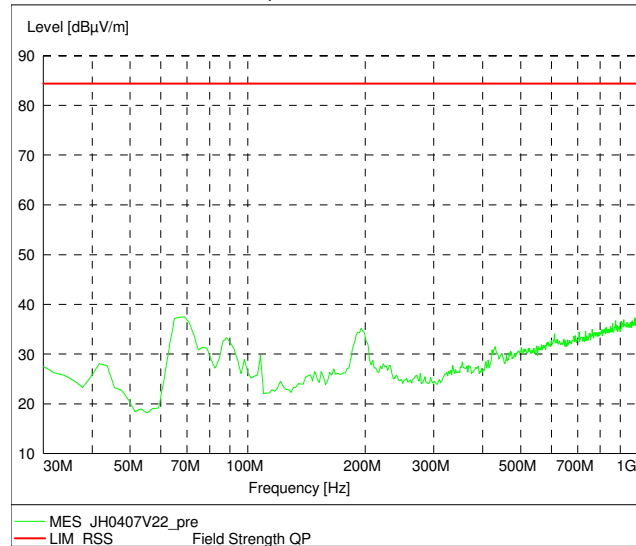


18-23GHz, Horizontal, Horizontal and Vertical

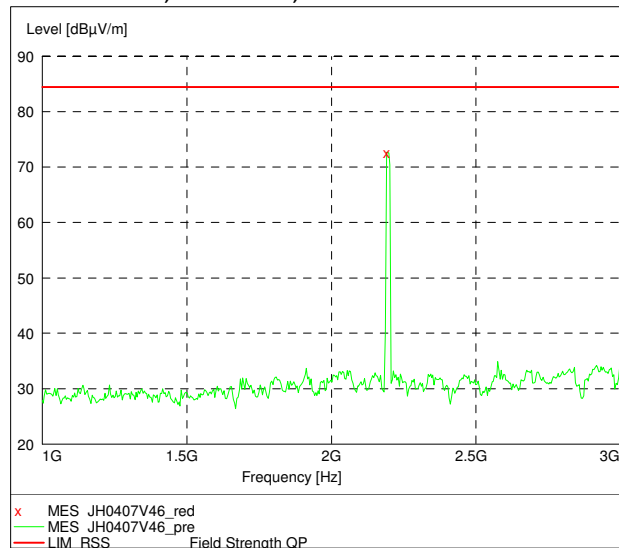


Configuration	Channel Position	Carrier	Carrier Bandwidth	Modulation
NR-MIMO-2C-UE	B	1 Carrier	5MHz	16QAM
NR-MIMO-2C-UE	T	1 Carrier	5MHz	16QAM

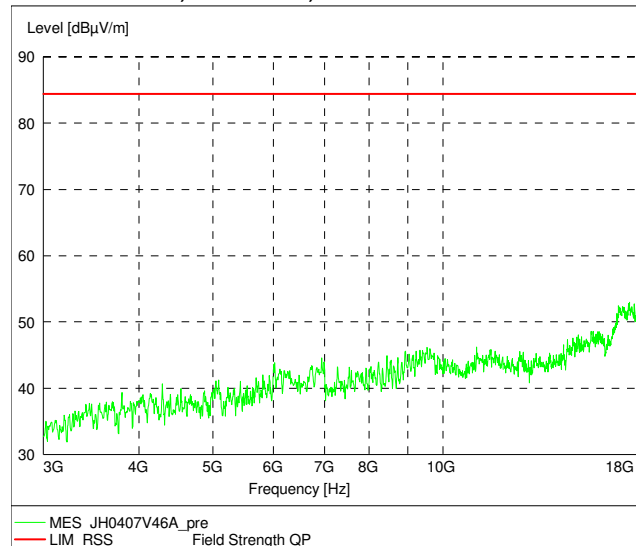
30-1000MHz, Horizontal and Vertical



1-3GHz, Horizontal, Horizontal and Vertical



3-18GHz, Horizontal, Horizontal and Vertical



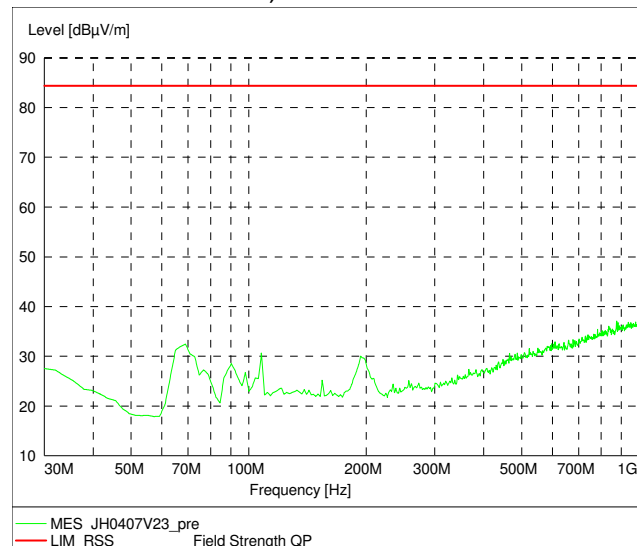
18-23GHz, Horizontal, Horizontal and Vertical



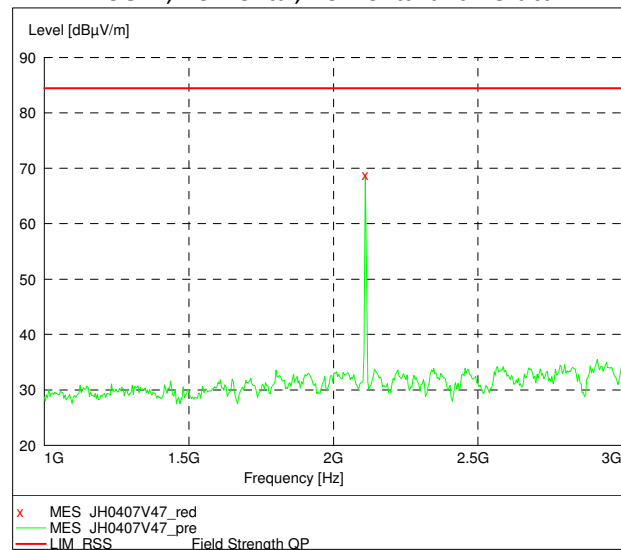
TEST REPORT

Configuration	Channel Position	Carrier	Carrier Bandwidth	Modulation
NB-SA-1C-UE	B	1 Carrier	0.2MHz	QPSK
NB-SA-1C-UE	T	1 Carrier	0.2MHz	QPSK

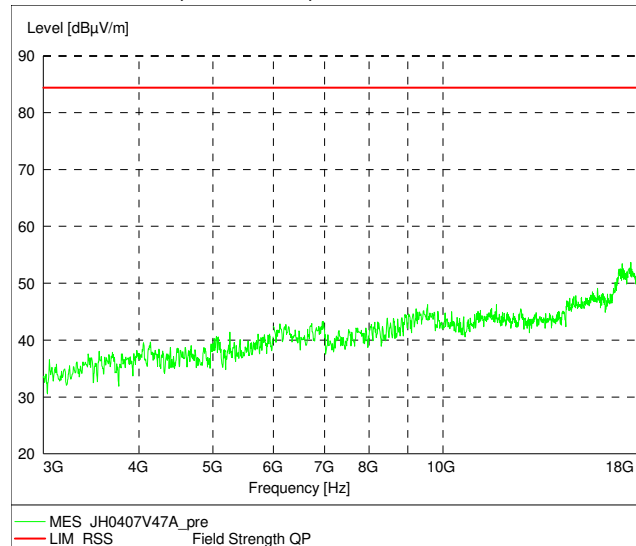
30-1000MHz, Horizontal and Vertical



1-3GHz, Horizontal, Horizontal and Vertical



3-18GHz, Horizontal, Horizontal and Vertical



18-23GHz, Horizontal, Horizontal and Vertical

