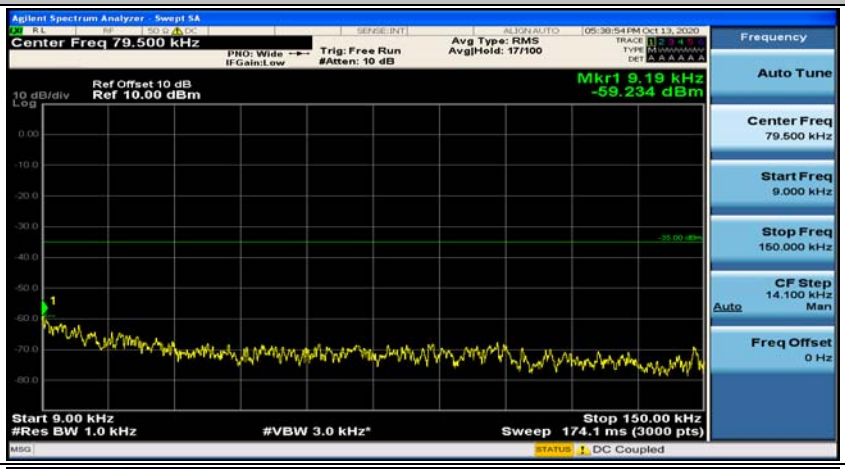
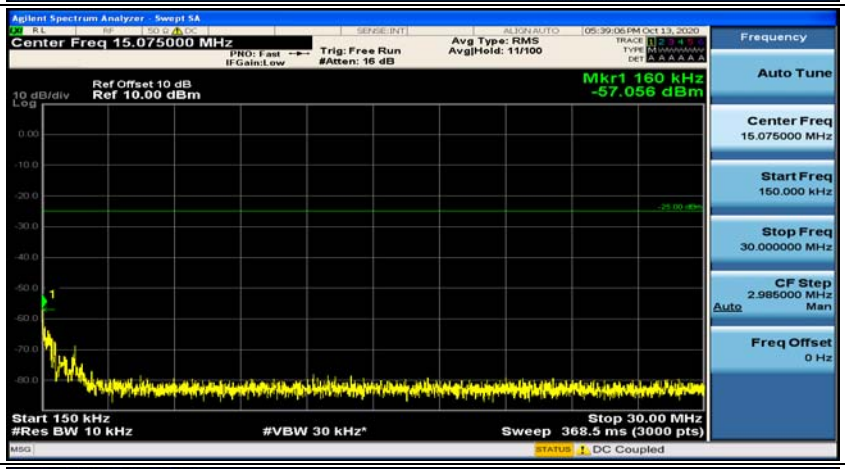
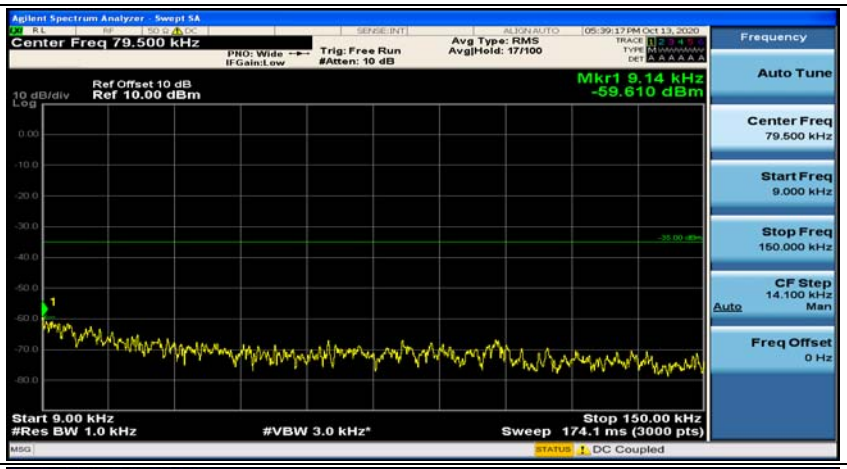
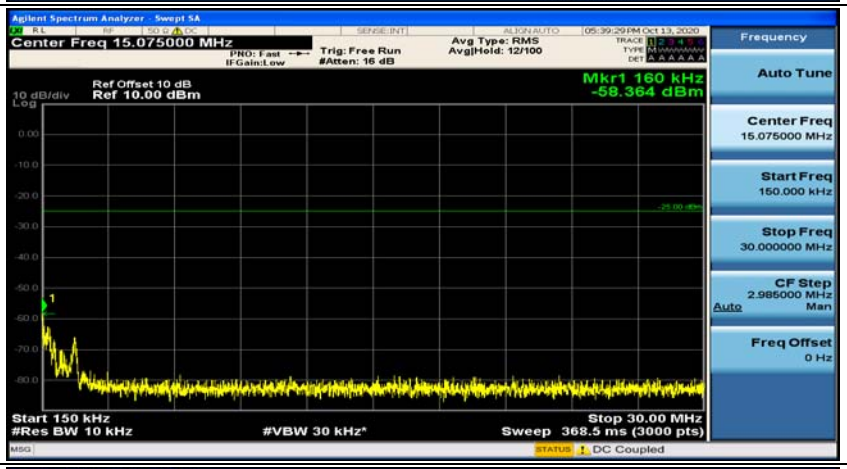
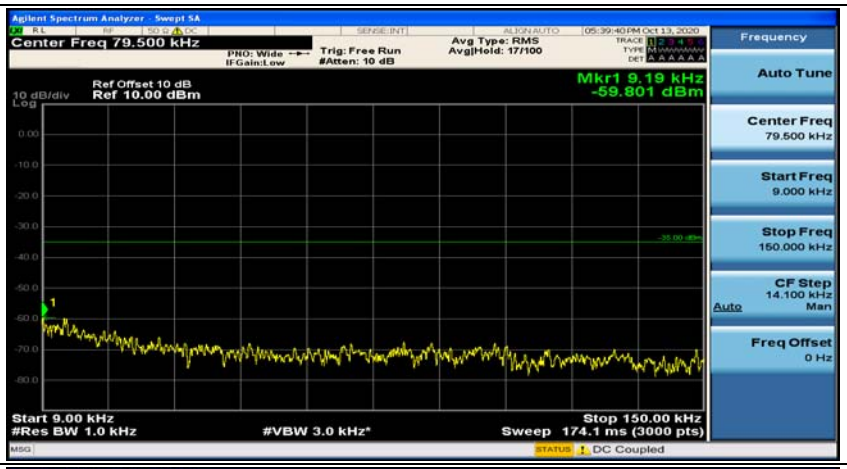
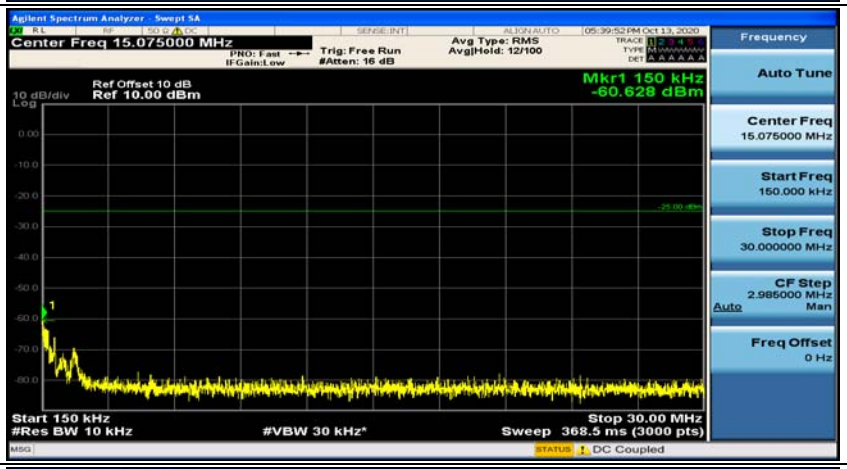
Channel Bandwidth: 10 MHz_MCH_16QAM_1RB#0


Channel Bandwidth: 10 MHz_MCH_16QAM_1RB#24





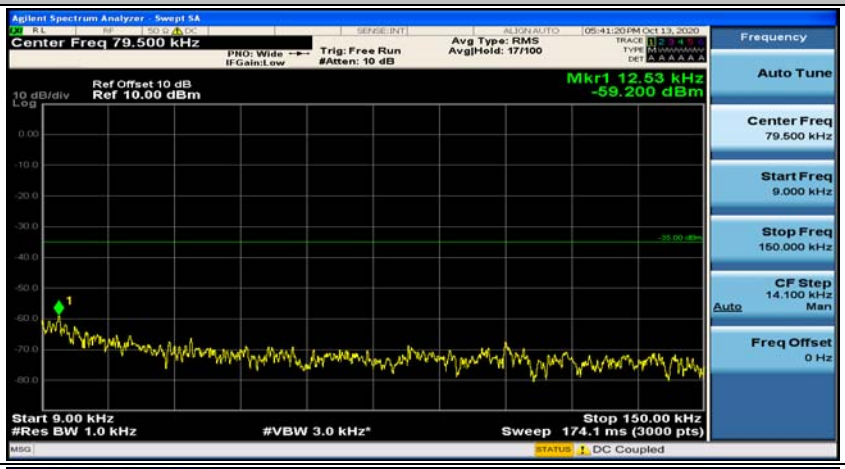
Channel Bandwidth: 10 MHz_MCH_16QAM_1RB#49

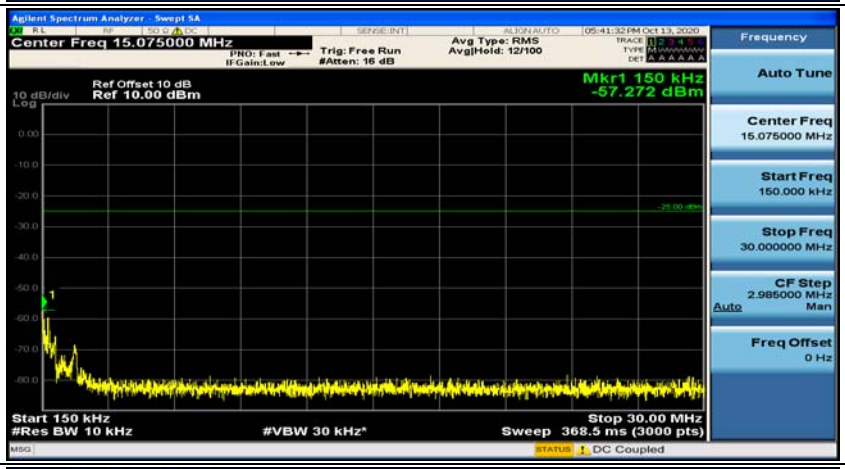

Agilent Spectrum Analyzer - Swept SA
Center Freq 79.500 kHz
PNO: Wide
IFGain:Low
Trig: Free Run
#Atten: 10 dB
Avg Type: RMS
Avg|Hold: 17/100
05:39:40 PM Oct 13, 2020
Ref Offset 10 dB
10 dB/div
Ref 10.00 dBm
Mkr1 9.19 kHz
-59.801 dBm
Start 9.00 kHz
#Res BW 1.0 kHz
#VBW 3.0 kHz*
Stop 150.00 kHz
Sweep 174.1 ms (3000 pts)
DC Coupled
Frequency
Auto Tune
Center Freq
79.500 kHz
Start Freq
9.000 kHz
Stop Freq
150.000 kHz
CF Step
14.100 kHz
Auto
Man
Freq Offset
0 Hz


Agilent Spectrum Analyzer - Swept SA
Center Freq 15.075000 MHz
PNO: Fast
IFGain:Low
Trig: Free Run
#Atten: 16 dB
Avg Type: RMS
Avg|Hold: 12/100
05:39:52 PM Oct 13, 2020
Ref Offset 10 dB
10 dB/div
Ref 10.00 dBm
Mkr1 150 kHz
-60.628 dBm
Start 150 kHz
#Res BW 10 kHz
#VBW 30 kHz*
Stop 30.00 MHz
Sweep 368.5 ms (3000 pts)
DC Coupled
Frequency
Auto Tune
Center Freq
15.075000 MHz
Start Freq
150.000 kHz
Stop Freq
30.000000 MHz
CF Step
2.985000 MHz
Auto
Man
Freq Offset
0 Hz

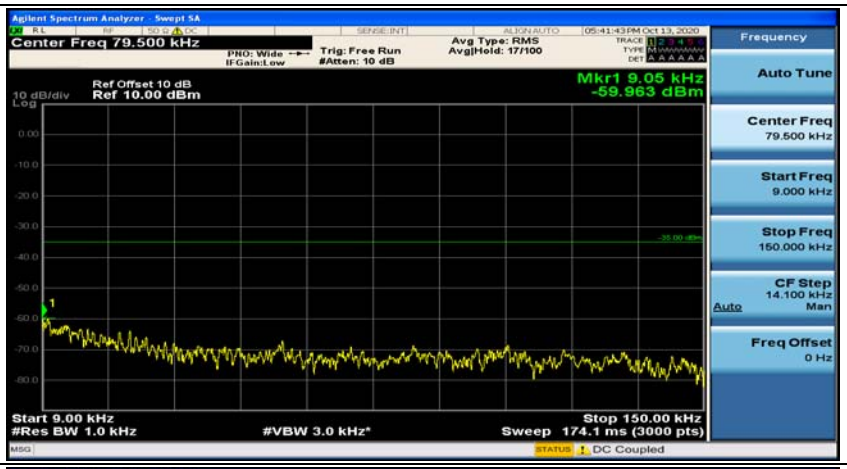
Agilent Spectrum Analyzer - Swept SA
Center Freq 13.015000000 GHz
PNO: Fast
IFGain:Low
Trig: Free Run
#Atten: 20 dB
Avg Type: RMS
Avg|Hold: 10/100
05:39:57 PM Oct 13, 2020
Ref Offset 9.96 dB
10 dB/div
Ref 19.95 dBm
Mkr2 25.541 GHz
-48.465 dBm
Start 30 MHz
#Res BW 1.0 MHz
#VBW 3.0 MHz*
Stop 26.00 GHz
Sweep 64.98 ms (3000 pts)
Frequency
Auto Tune
Center Freq
13.015000000 GHz
Start Freq
30.000000 MHz
Stop Freq
26.000000000 GHz
CF Step
2.597000000 GHz
Auto
Man
Freq Offset
0 Hz

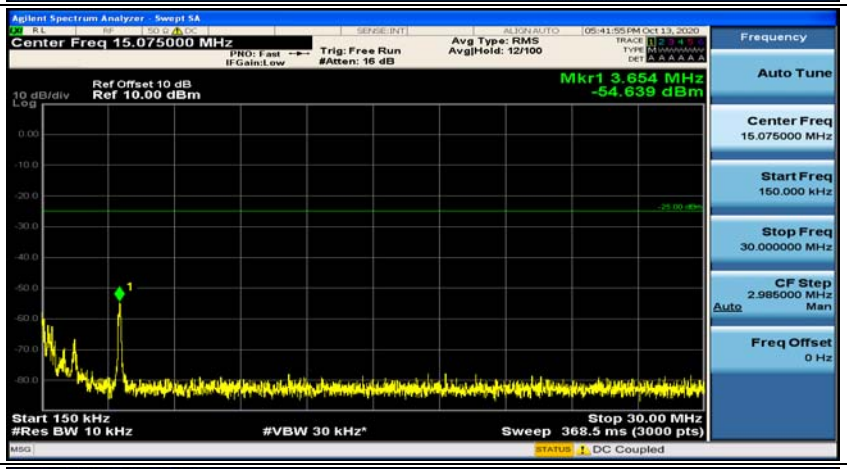
Channel Bandwidth: 10 MHz_HCH_16QAM_1RB#0



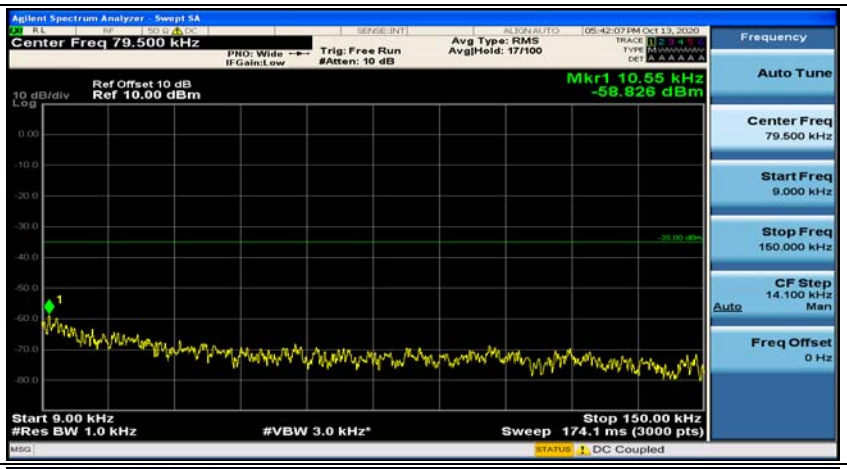


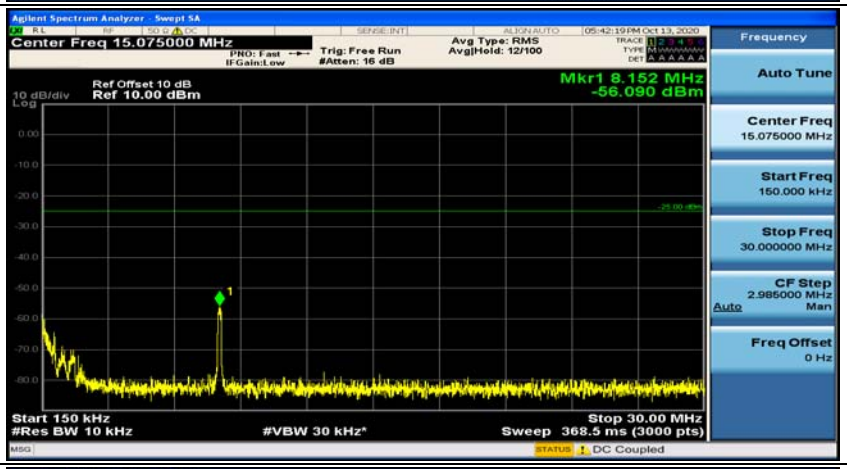
Channel Bandwidth: 10 MHz_HCH_16QAM_1RB#24





Channel Bandwidth: 10 MHz_HCH_16QAM_1RB#49

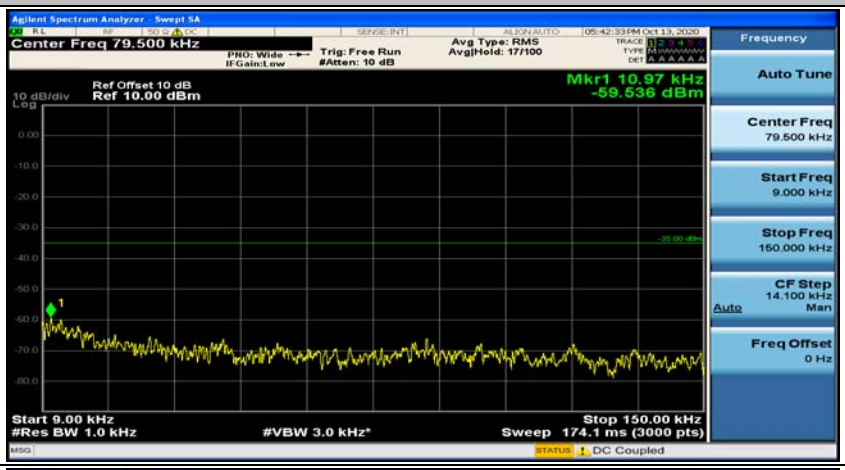

Agilent Spectrum Analyzer - Swept SA
Center Freq 79.500 kHz
PNO: Wide
IFGain:Low
Trig: Free Run
#Atten: 10 dB
Avg Type: RMS
Avg|Hold: 17/100
05:42:07 PM Oct 13, 2020
Ref Offset 10 dB
10 dB/div Ref 10.00 dBm
Log
Mkr1 10.55 kHz
-58.826 dBm
Start 9.00 kHz
#Res BW 1.0 kHz
#VBW 3.0 kHz*
Stop 150.00 kHz
Sweep 174.1 ms (3000 pts)
DC Coupled
Frequency
Auto Tune
Center Freq
79.500 kHz
Start Freq
9.000 kHz
Stop Freq
150.000 kHz
CF Step
14.100 kHz
Auto
Man
Freq Offset
0 Hz

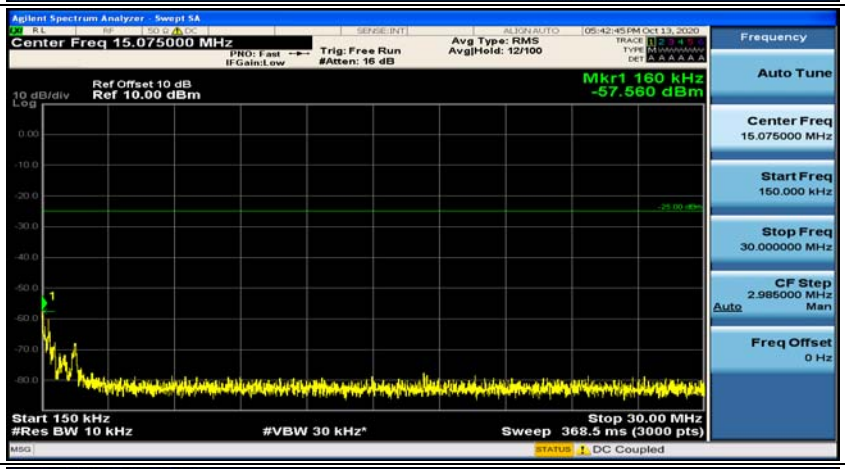

Agilent Spectrum Analyzer - Swept SA
Center Freq 15.075000 MHz
PNO: Fast
IFGain:Low
Trig: Free Run
#Atten: 16 dB
Avg Type: RMS
Avg|Hold: 12/100
05:42:19 PM Oct 13, 2020
Ref Offset 10 dB
10 dB/div Ref 10.00 dBm
Log
Mkr1 8.152 MHz
-56.090 dBm
Start 150 kHz
#Res BW 10 kHz
#VBW 30 kHz*
Stop 30.00 MHz
Sweep 368.5 ms (3000 pts)
DC Coupled
Frequency
Auto Tune
Center Freq
15.075000 MHz
Start Freq
150.000 kHz
Stop Freq
30.000000 MHz
CF Step
2.985000 MHz
Auto
Man
Freq Offset
0 Hz

Agilent Spectrum Analyzer - Swept SA
Center Freq 13.015000000 GHz
PNO: Fast
IFGain:Low
Trig: Free Run
#Atten: 20 dB
Avg Type: RMS
Avg|Hold: 10/100
05:42:24 PM Oct 13, 2020
Ref Offset 9.95 dB
10 dB/div Ref 19.95 dBm
Log
Mkr2 25.515 GHz
-48.093 dBm
Start 30 MHz
#Res BW 1.0 MHz
#VBW 3.0 MHz*
Stop 26.00 GHz
Sweep 64.98 ms (3000 pts)
Frequency
Auto Tune
Center Freq
13.015000000 GHz
Start Freq
30.000000 MHz
Stop Freq
26.000000000 GHz
CF Step
2.597000000 GHz
Auto
Man
Freq Offset
0 Hz

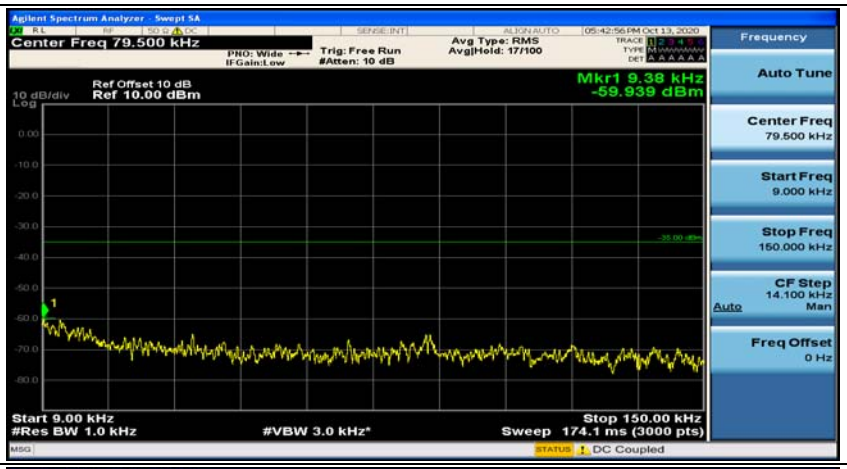
Channel Bandwidth: 15 MHz

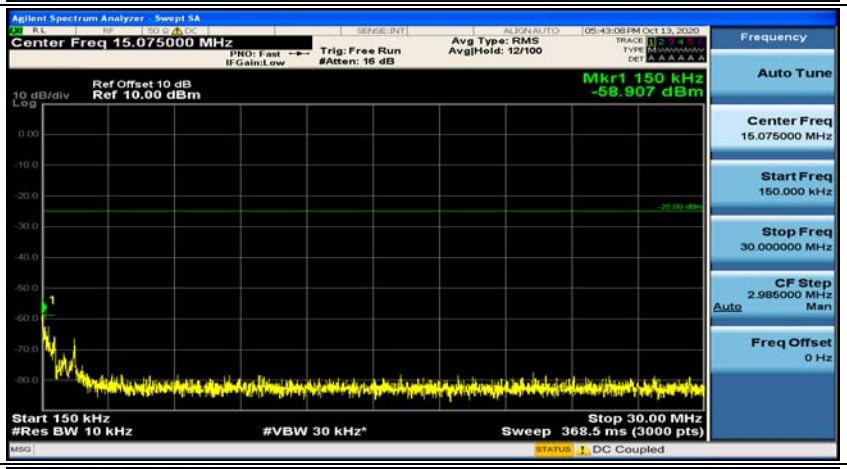
(Channel Bandwidth:15 MHz)_LCH_QPSK_1RB#0



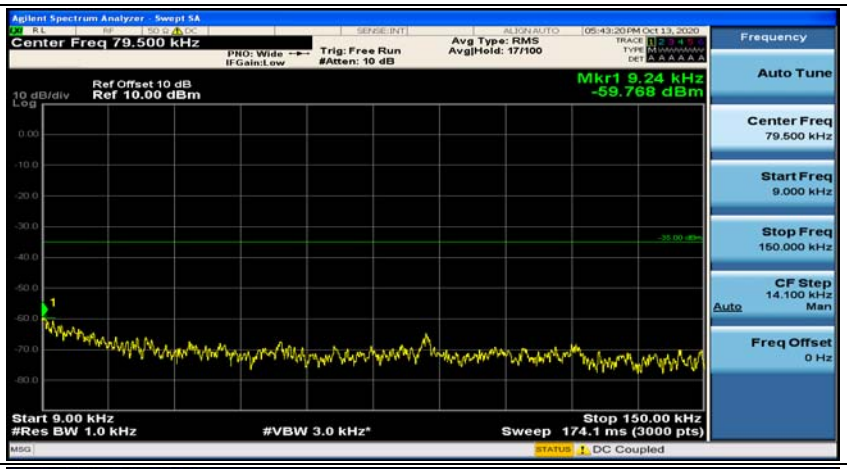


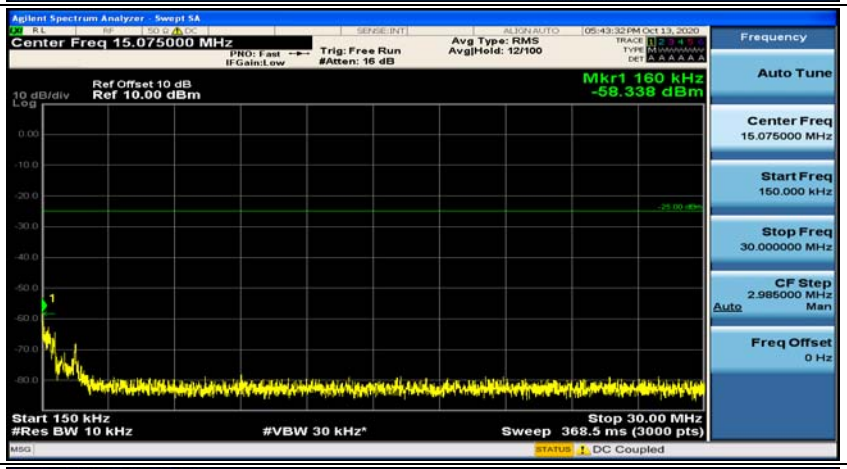
(Channel Bandwidth:15 MHz)_LCH_QPSK_1RB#37





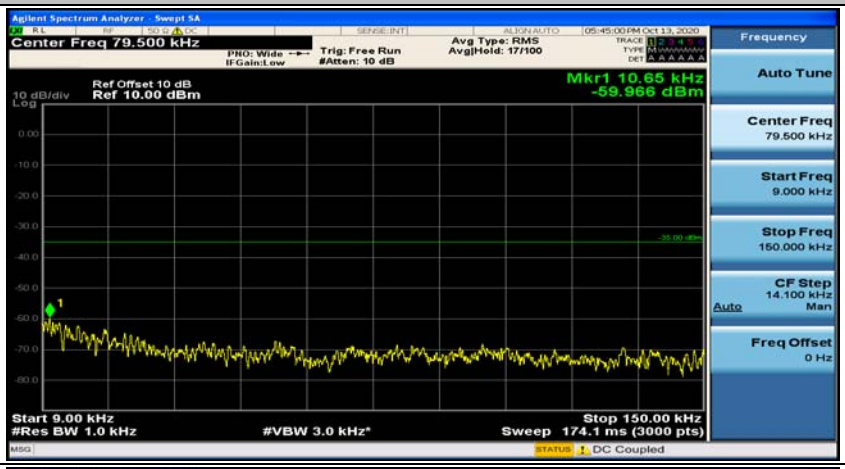
(Channel Bandwidth:15 MHz)_LCH_QPSK_1RB#74

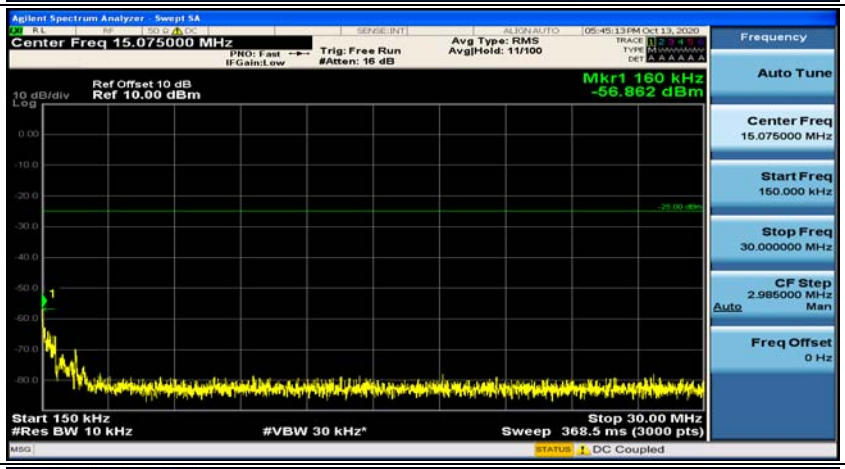

Agilent Spectrum Analyzer - Swept SA
Center Freq 79.500 kHz
PNO: Wide
IFGain:Low
Trig: Free Run
#Atten: 10 dB
Avg Type: RMS
Avg|Hold: 17/100
05:43:20 PM Oct 13, 2020
Ref Offset 10 dB
10 dB/div
Ref 10.00 dBm
Mkr1 9.24 kHz
-59.768 dBm
Start 9.00 kHz
#Res BW 1.0 kHz
#VBW 3.0 kHz*
Stop 150.00 kHz
Sweep 174.1 ms (3000 pts)
DC Coupled
Frequency
Auto Tune
Center Freq
79.500 kHz
Start Freq
9.000 kHz
Stop Freq
150.000 kHz
CF Step
14.100 kHz
Auto
Man
Freq Offset
0 Hz


Agilent Spectrum Analyzer - Swept SA
Center Freq 15.075000 MHz
PNO: Fast
IFGain:Low
Trig: Free Run
#Atten: 16 dB
Avg Type: RMS
Avg|Hold: 12/100
05:43:32 PM Oct 13, 2020
Ref Offset 10 dB
10 dB/div
Ref 10.00 dBm
Mkr1 160 kHz
-58.338 dBm
Start 150 kHz
#Res BW 10 kHz
#VBW 30 kHz*
Stop 30.00 MHz
Sweep 368.5 ms (3000 pts)
DC Coupled
Frequency
Auto Tune
Center Freq
15.075000 MHz
Start Freq
150.000 kHz
Stop Freq
30.000000 MHz
CF Step
2.985000 MHz
Auto
Man
Freq Offset
0 Hz

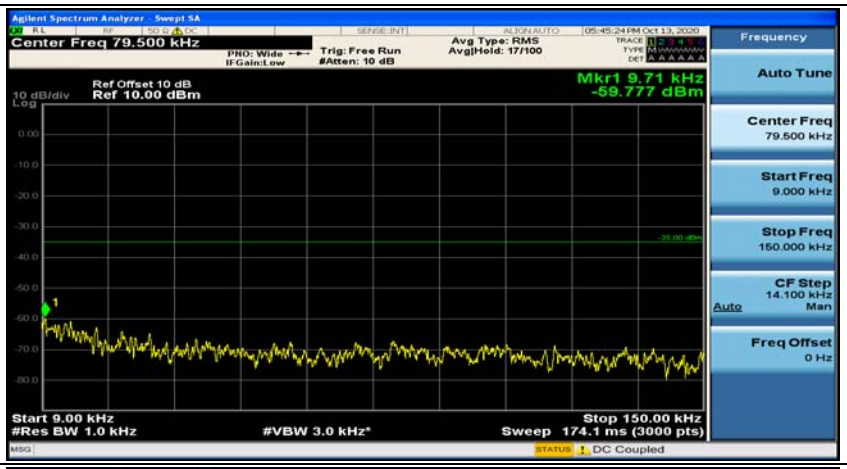
Agilent Spectrum Analyzer - Swept SA
Center Freq 13.015000000 GHz
PNO: Fast
IFGain:Low
Trig: Free Run
#Atten: 20 dB
Avg Type: RMS
Avg|Hold: 10/100
05:43:37 PM Oct 13, 2020
Ref Offset 9.95 dB
10 dB/div
Ref 19.95 dBm
Mkr2 25.870 GHz
-48.244 dBm
Start 30 MHz
#Res BW 1.0 MHz
#VBW 3.0 MHz*
Stop 26.00 GHz
Sweep 64.98 ms (3000 pts)
Frequency
Auto Tune
Center Freq
13.015000000 GHz
Start Freq
30.000000 MHz
Stop Freq
26.000000000 GHz
CF Step
2.597000000 GHz
Auto
Man
Freq Offset
0 Hz

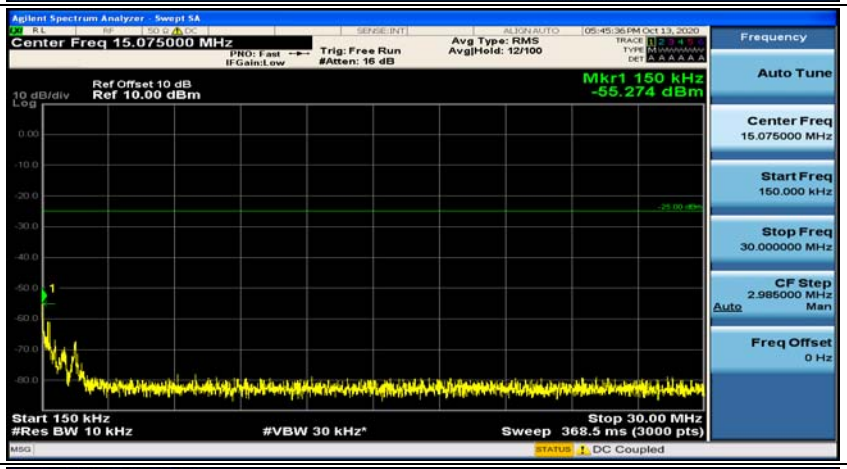
(Channel Bandwidth:15 MHz)_MCH_QPSK_1RB#0



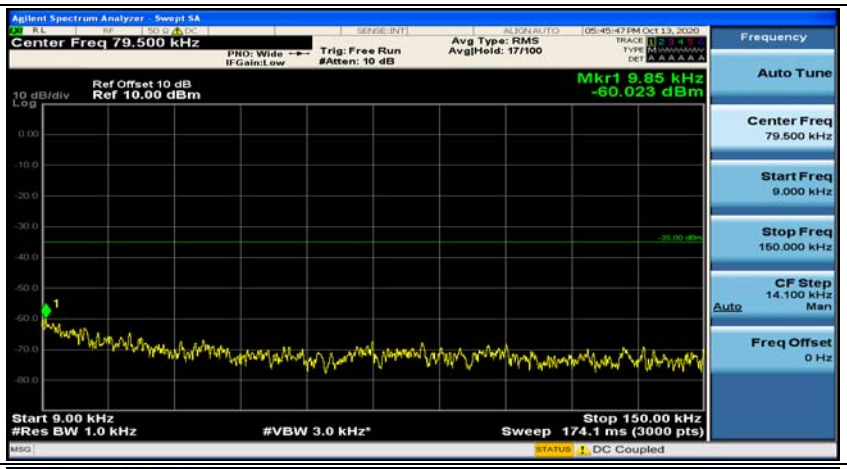


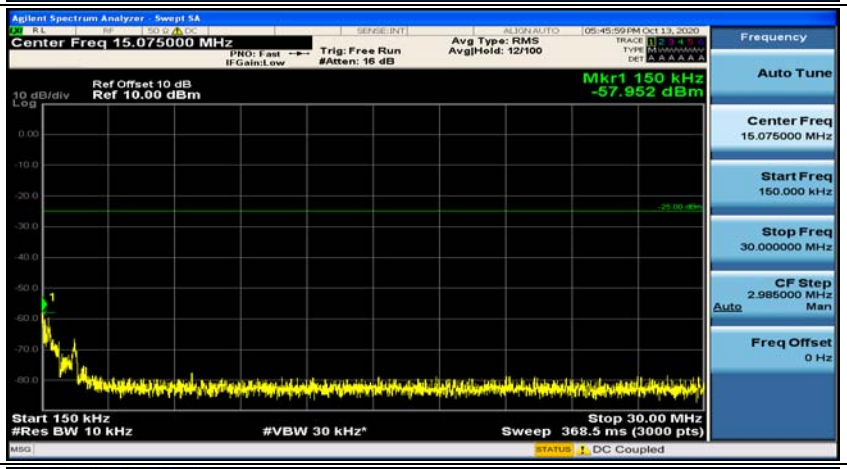
(Channel Bandwidth:15 MHz)_MCH_QPSK_1RB#37





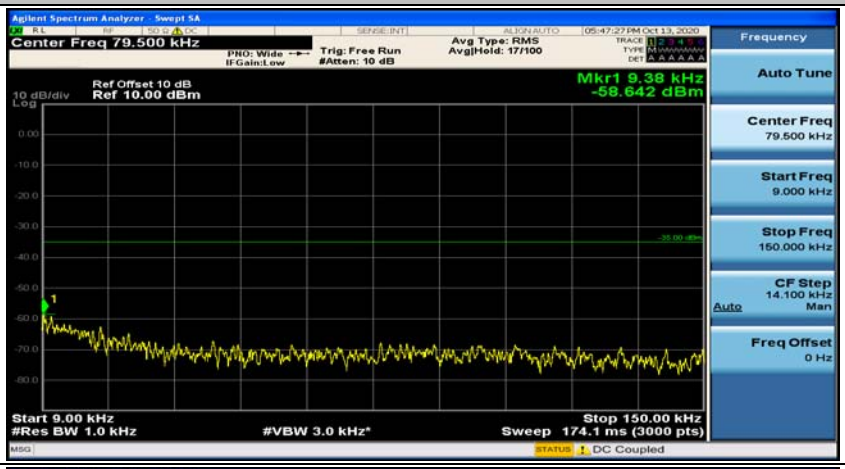
(Channel Bandwidth:15 MHz)_MCH_QPSK_1RB#74

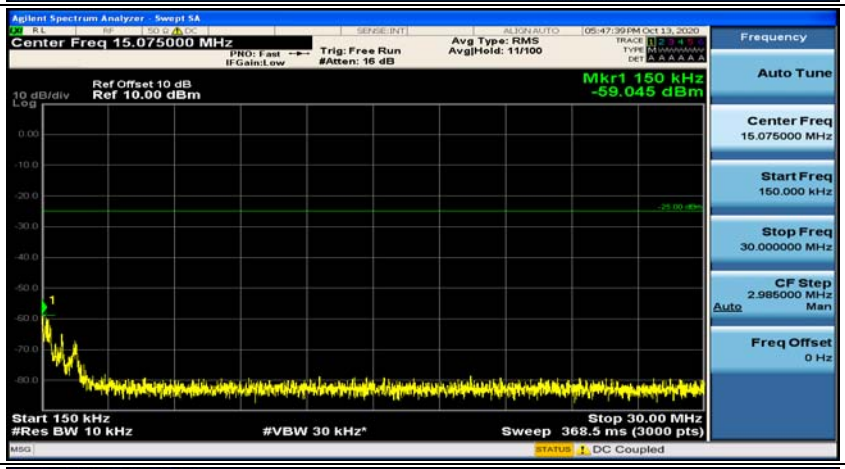

Agilent Spectrum Analyzer - Swept SA
Center Freq 79.500 kHz
PNO: Wide
IFGain:Low
Trig: Free Run
#Atten: 10 dB
Avg Type: RMS
Avg|Hold: 17/100
05:45:47 PM Oct 13, 2020
Ref Offset 10 dB
10 dB/div
Ref 10.00 dBm
Mkr1 9.85 kHz
-60.023 dBm
Start 9.00 kHz
#Res BW 1.0 kHz
#VBW 3.0 kHz*
Stop 150.00 kHz
Sweep 174.1 ms (3000 pts)
DC Coupled
Frequency
Auto Tune
Center Freq
79.500 kHz
Start Freq
9.000 kHz
Stop Freq
150.000 kHz
CF Step
14.100 kHz
Auto
Man
Freq Offset
0 Hz


Agilent Spectrum Analyzer - Swept SA
Center Freq 15.075000 MHz
PNO: Fast
IFGain:Low
Trig: Free Run
#Atten: 16 dB
Avg Type: RMS
Avg|Hold: 12/100
05:45:59 PM Oct 13, 2020
Ref Offset 10 dB
10 dB/div
Ref 10.00 dBm
Mkr1 150 kHz
-57.952 dBm
Start 150 kHz
#Res BW 10 kHz
#VBW 30 kHz*
Stop 30.00 MHz
Sweep 368.5 ms (3000 pts)
DC Coupled
Frequency
Auto Tune
Center Freq
15.075000 MHz
Start Freq
150.000 kHz
Stop Freq
30.000000 MHz
CF Step
2.985000 MHz
Auto
Man
Freq Offset
0 Hz

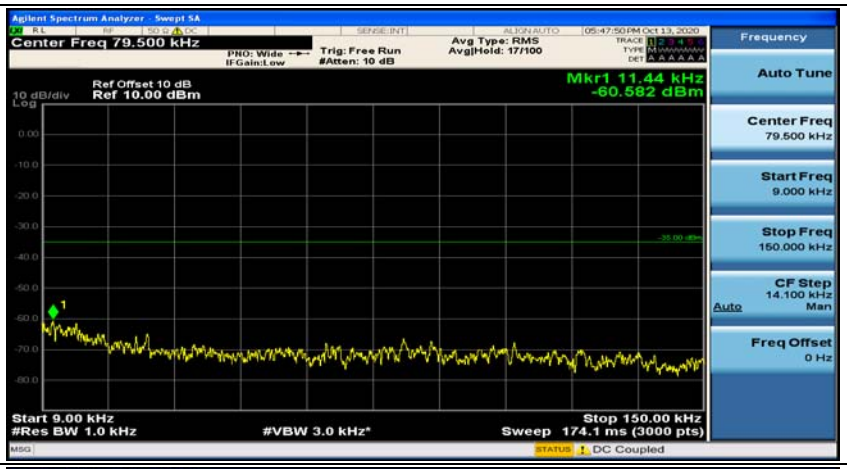
Agilent Spectrum Analyzer - Swept SA
Center Freq 13.015000000 GHz
PNO: Fast
IFGain:Low
Trig: Free Run
#Atten: 20 dB
Avg Type: RMS
Avg|Hold: 10/100
05:46:05 PM Oct 13, 2020
Ref Offset 9.95 dB
10 dB/div
Ref 19.95 dBm
Mkr2 25.463 GHz
-48.220 dBm
Start 30 MHz
#Res BW 1.0 MHz
#VBW 3.0 MHz*
Stop 26.00 GHz
Sweep 64.98 ms (3000 pts)
Frequency
Auto Tune
Center Freq
13.015000000 GHz
Start Freq
30.000000 MHz
Stop Freq
26.000000000 GHz
CF Step
2.597000000 GHz
Auto
Man
Freq Offset
0 Hz

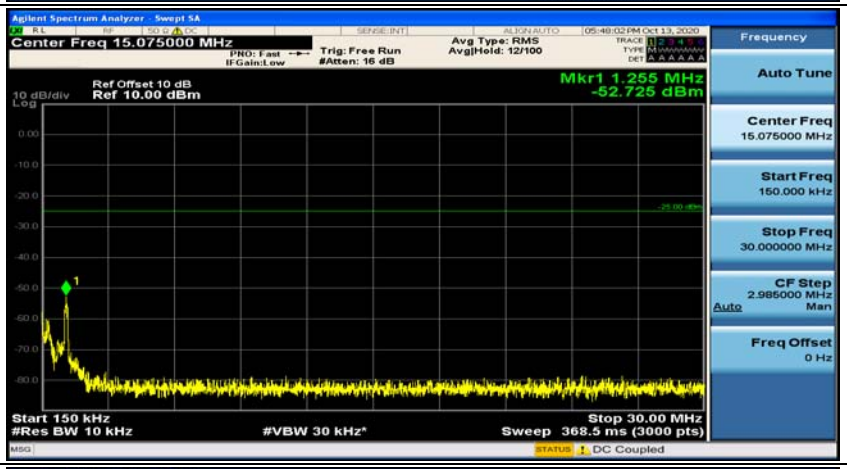
(Channel Bandwidth:15 MHz)_HCH_QPSK_1RB#0



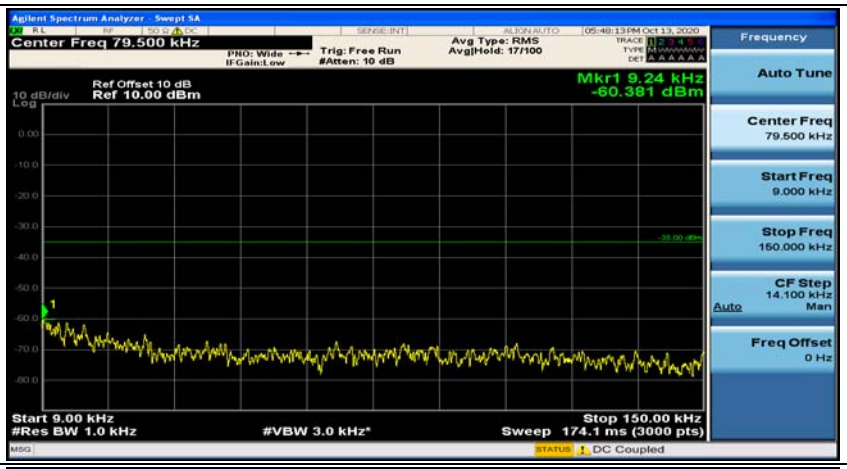


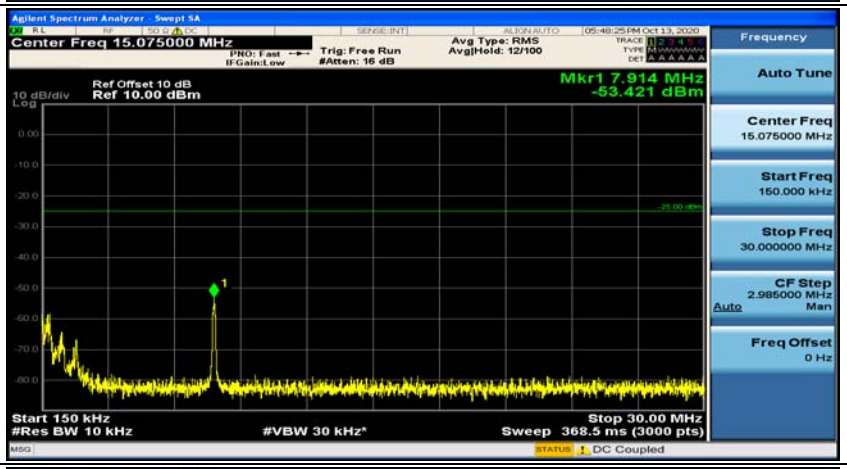
(Channel Bandwidth:15 MHz)_HCH_QPSK_1RB#37





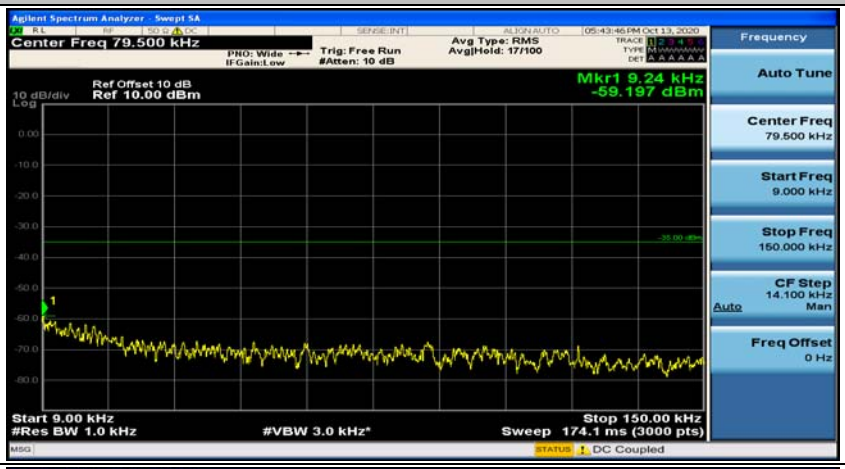
(Channel Bandwidth:15 MHz)_HCH_QPSK_1RB#74

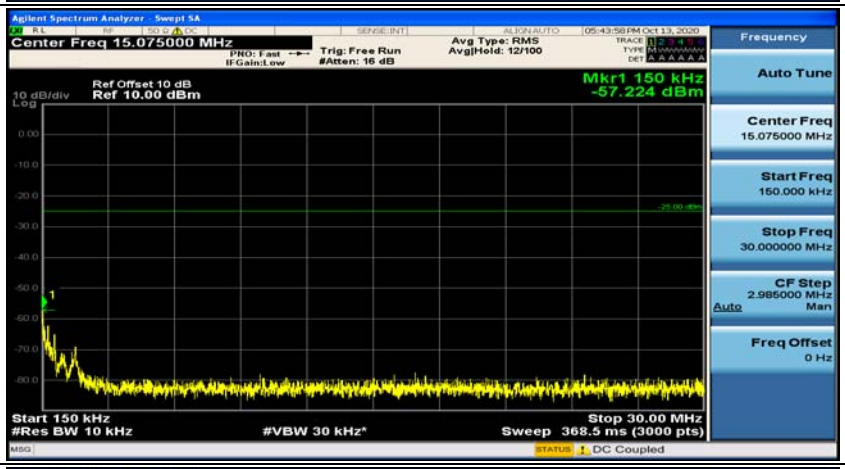

Agilent Spectrum Analyzer - Swept SA
Center Freq 79.500 kHz
PNO: Wide
IFGain:Low
Trig: Free Run
#Atten: 10 dB
Avg Type: RMS
Avg|Hold: 17/100
05:48:13 PM Oct 13, 2020
Ref Offset 10 dB
10 dB/div
Ref 10.00 dBm
Mkr1 9.24 kHz
-60.381 dBm
Start 9.00 kHz
#Res BW 1.0 kHz
#VBW 3.0 kHz*
Stop 150.00 kHz
Sweep 174.1 ms (3000 pts)
DC Coupled
Frequency
Auto Tune
Center Freq
79.500 kHz
Start Freq
9.000 kHz
Stop Freq
150.000 kHz
CF Step
14.100 kHz
Auto
Man
Freq Offset
0 Hz


Agilent Spectrum Analyzer - Swept SA
Center Freq 15.075000 MHz
PNO: Fast
IFGain:Low
Trig: Free Run
#Atten: 16 dB
Avg Type: RMS
Avg|Hold: 12/100
05:48:25 PM Oct 13, 2020
Ref Offset 10 dB
10 dB/div
Ref 10.00 dBm
Mkr1 7.914 MHz
-53.421 dBm
Start 150 kHz
#Res BW 10 kHz
#VBW 30 kHz*
Stop 30.00 MHz
Sweep 368.5 ms (3000 pts)
DC Coupled
Frequency
Auto Tune
Center Freq
15.075000 MHz
Start Freq
150.000 kHz
Stop Freq
30.000000 MHz
CF Step
2.985000 MHz
Auto
Man
Freq Offset
0 Hz

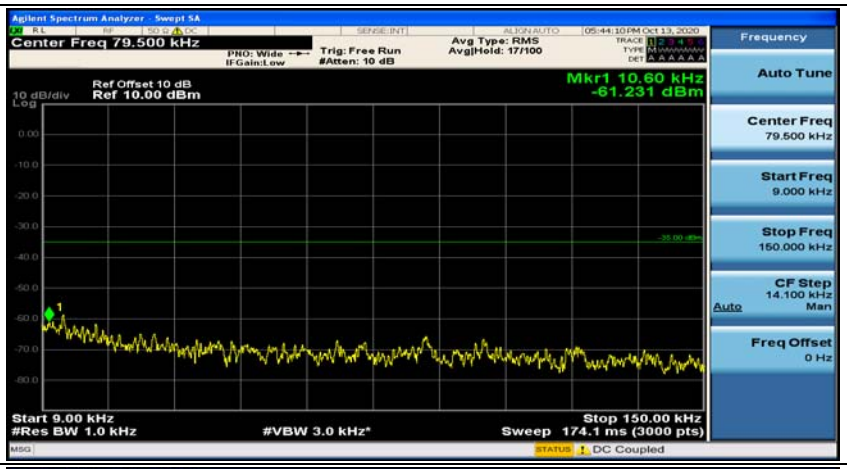
Agilent Spectrum Analyzer - Swept SA
Center Freq 13.015000000 GHz
PNO: Fast
IFGain:Low
Trig: Free Run
#Atten: 20 dB
Avg Type: RMS
Avg|Hold: 10/100
05:48:31 PM Oct 13, 2020
Ref Offset 9.95 dB
10 dB/div
Ref 19.95 dBm
Mkr2 25.368 GHz
-48.034 dBm
Start 30 MHz
#Res BW 1.0 MHz
#VBW 3.0 MHz*
Stop 26.00 GHz
Sweep 64.98 ms (3000 pts)
Frequency
Auto Tune
Center Freq
13.015000000 GHz
Start Freq
30.000000 MHz
Stop Freq
26.000000000 GHz
CF Step
2.597000000 GHz
Auto
Man
Freq Offset
0 Hz

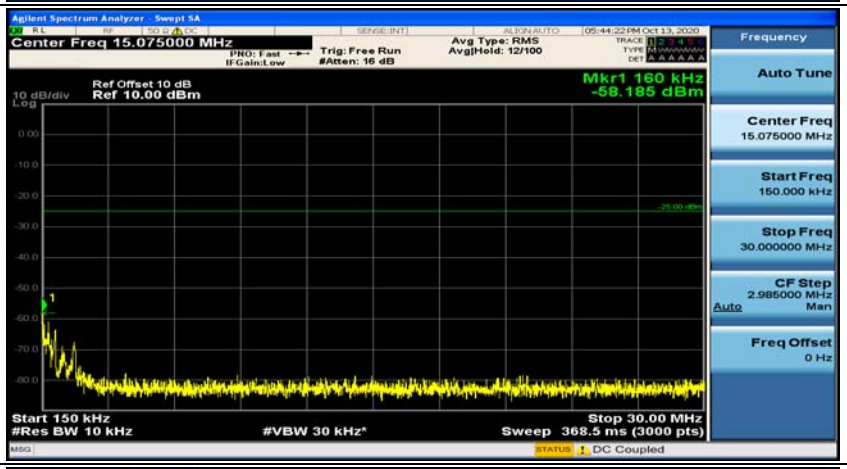
(Channel Bandwidth:15 MHz)_LCH_16QAM_1RB#0



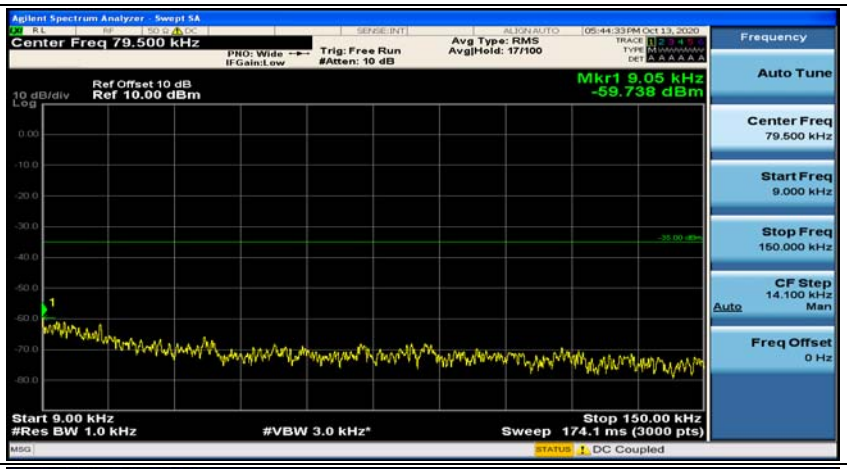


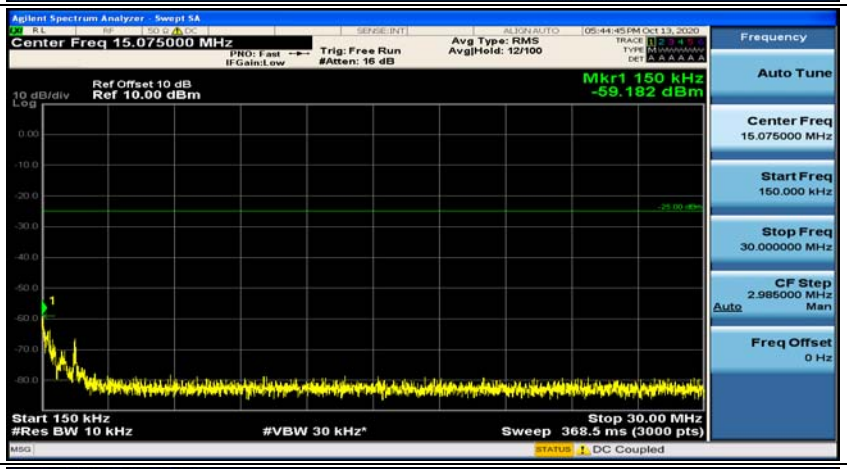
(Channel Bandwidth:15 MHz)_LCH_16QAM_1RB#37





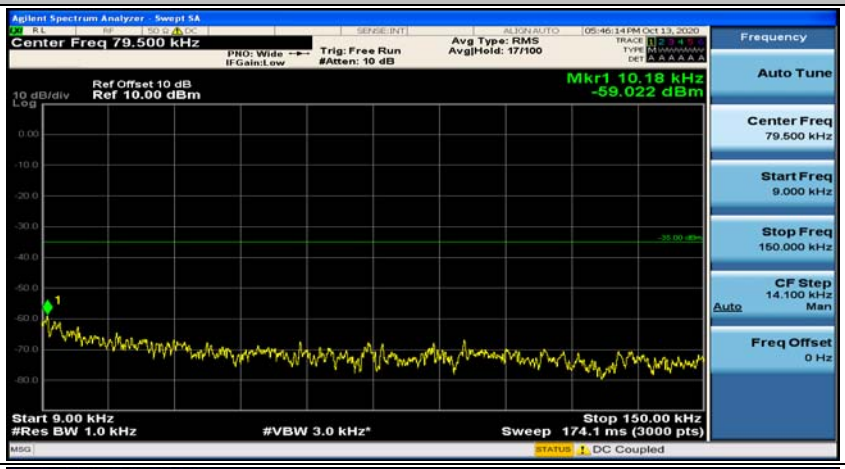
(Channel Bandwidth:15 MHz)_LCH_16QAM_1RB#74

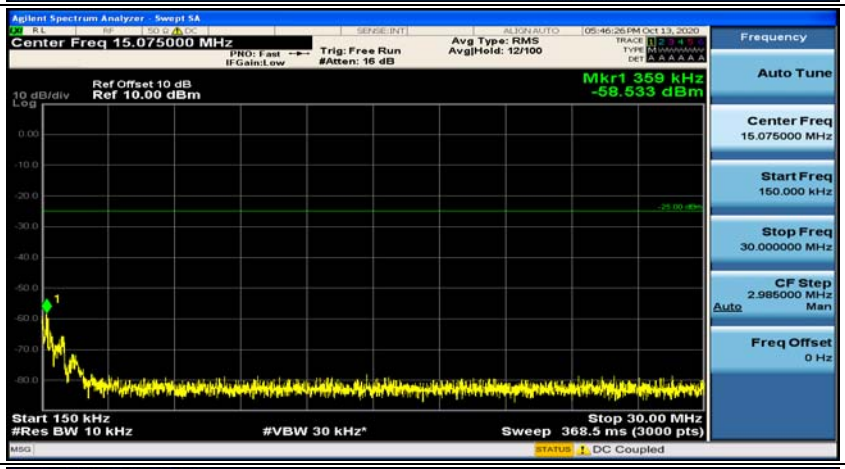

Agilent Spectrum Analyzer - Swept SA
Center Freq 79.500 kHz
PNO: Wide
IFGain:Low
Trig: Free Run
#Atten: 10 dB
Avg Type: RMS
Avg|Hold: 17/100
05:44:33 PM Oct 13, 2020
Ref Offset 10 dB
10 dB/div Ref 10.00 dBm
Log
Mkr1 9.05 kHz
-59.738 dBm
Start 9.00 kHz
#Res BW 1.0 kHz
#VBW 3.0 kHz*
Stop 150.00 kHz
Sweep 174.1 ms (3000 pts)
DC Coupled
Frequency
Auto Tune
Center Freq 79.500 kHz
Start Freq 9.000 kHz
Stop Freq 150.000 kHz
CF Step 14.100 kHz
Auto Man
Freq Offset 0 Hz


Agilent Spectrum Analyzer - Swept SA
Center Freq 15.075000 MHz
PNO: Fast
IFGain:Low
Trig: Free Run
#Atten: 16 dB
Avg Type: RMS
Avg|Hold: 12/100
05:44:45 PM Oct 13, 2020
Ref Offset 10 dB
10 dB/div Ref 10.00 dBm
Log
Mkr1 150 kHz
-59.182 dBm
Start 150 kHz
#Res BW 10 kHz
#VBW 30 kHz*
Stop 30.00 MHz
Sweep 368.5 ms (3000 pts)
DC Coupled
Frequency
Auto Tune
Center Freq 15.075000 MHz
Start Freq 150.000 kHz
Stop Freq 30.000000 MHz
CF Step 2.985000 MHz
Auto Man
Freq Offset 0 Hz

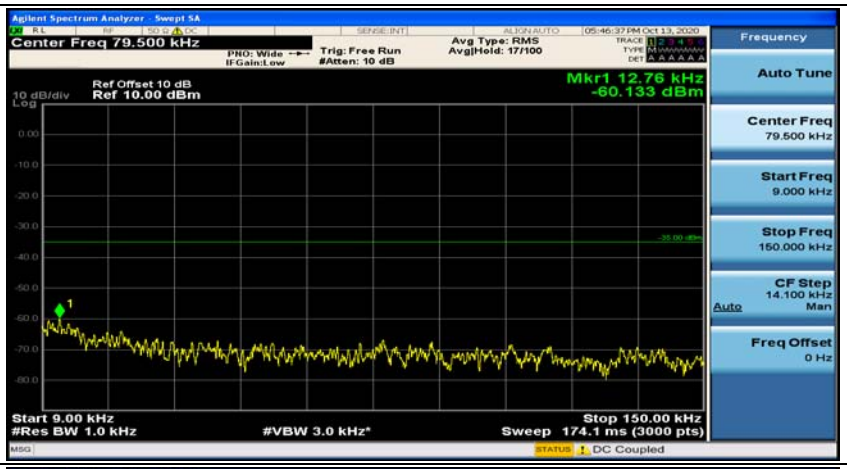
Agilent Spectrum Analyzer - Swept SA
Center Freq 13.015000000 GHz
PNO: Fast
IFGain:Low
Trig: Free Run
#Atten: 20 dB
Avg Type: RMS
Avg|Hold: 10/100
05:44:51 PM Oct 13, 2020
Ref Offset 9.95 dB
10 dB/div Ref 19.95 dBm
Log
Mkr2 25.385 GHz
-48.255 dBm
Start 30 MHz
#Res BW 1.0 MHz
#VBW 3.0 MHz*
Stop 26.00 GHz
Sweep 64.98 ms (3000 pts)
Frequency
Auto Tune
Center Freq 13.015000000 GHz
Start Freq 30.000000 MHz
Stop Freq 26.000000000 GHz
CF Step 2.597000000 GHz
Auto Man
Freq Offset 0 Hz

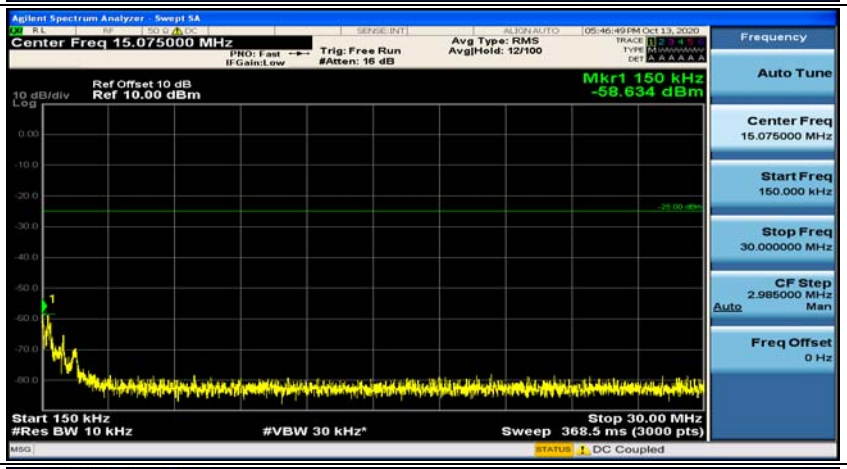
(Channel Bandwidth:15 MHz)_MCH_16QAM_1RB#0



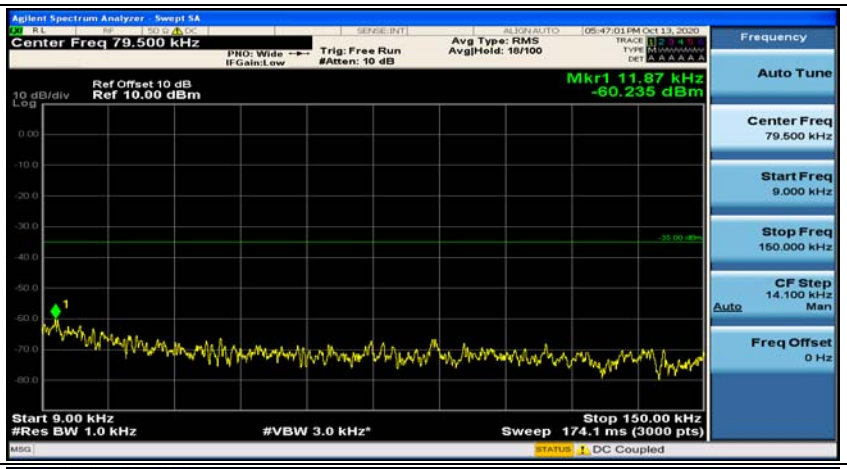


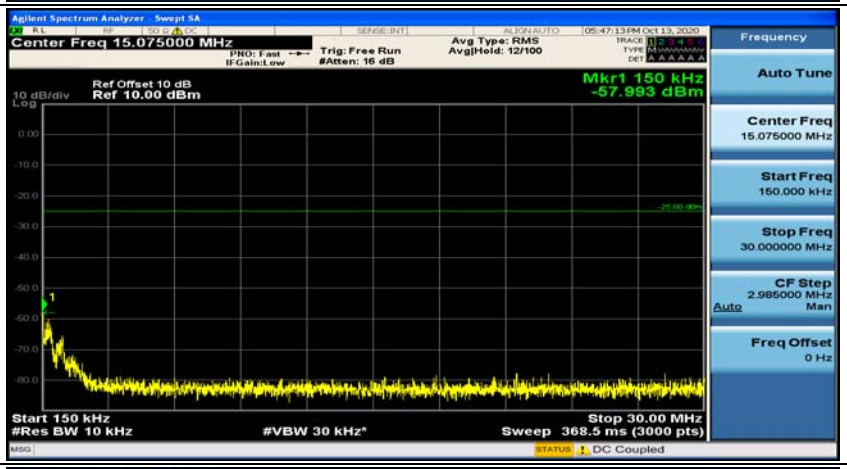
(Channel Bandwidth:15 MHz)_MCH_16QAM_1RB#37





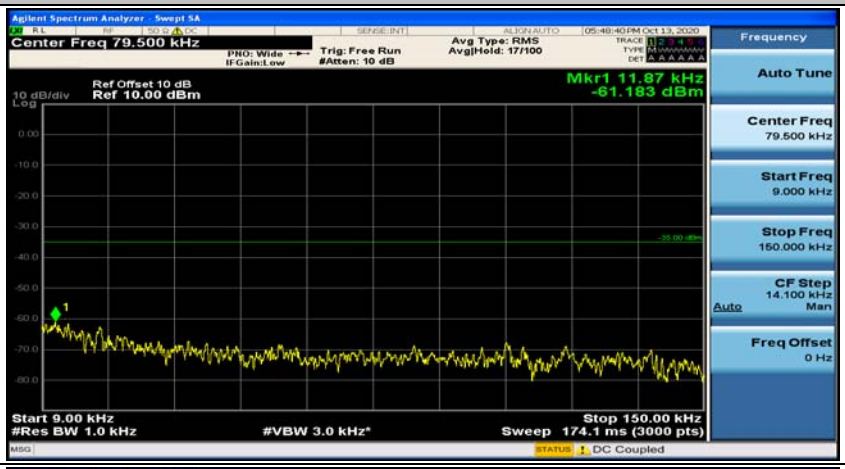
(Channel Bandwidth:15 MHz)_MCH_16QAM_1RB#74

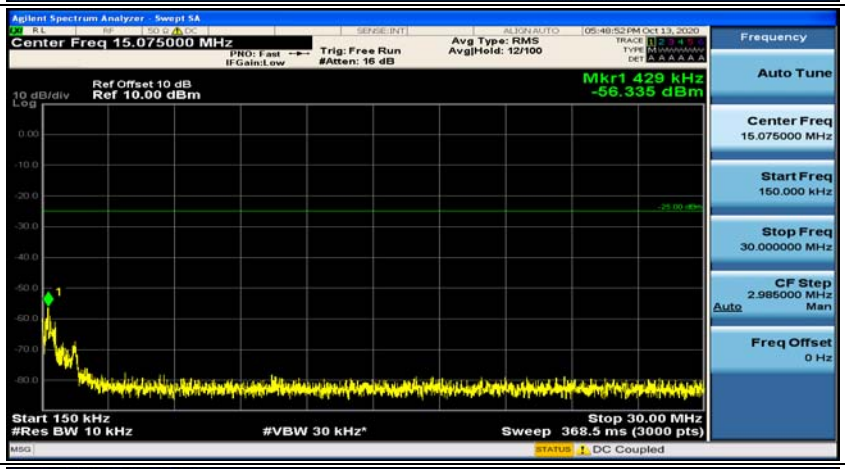

Agilent Spectrum Analyzer - Swept SA
Center Freq 79.500 kHz
PNO: Wide
IFGain:Low
Trig: Free Run
#Atten: 10 dB
Avg Type: RMS
Avg|Hold: 18/100
05:47:01 PM Oct 13, 2020
Ref Offset 10 dB
10 dB/div
Ref 10.00 dBm
Mkr1 11.87 kHz
-60.235 dBm
Start 9.00 kHz
#Res BW 1.0 kHz
#VBW 3.0 kHz*
Stop 150.00 kHz
Sweep 174.1 ms (3000 pts)
DC Coupled
Frequency
Auto Tune
Center Freq
79.500 kHz
Start Freq
9.000 kHz
Stop Freq
150.000 kHz
CF Step
14.100 kHz
Auto
Man
Freq Offset
0 Hz


Agilent Spectrum Analyzer - Swept SA
Center Freq 15.075000 MHz
PNO: Fast
IFGain:Low
Trig: Free Run
#Atten: 16 dB
Avg Type: RMS
Avg|Hold: 12/100
05:47:13 PM Oct 13, 2020
Ref Offset 10 dB
10 dB/div
Ref 10.00 dBm
Mkr1 150 kHz
-57.993 dBm
Start 150 kHz
#Res BW 10 kHz
#VBW 30 kHz*
Stop 30.00 MHz
Sweep 368.5 ms (3000 pts)
DC Coupled
Frequency
Auto Tune
Center Freq
15.075000 MHz
Start Freq
150.000 kHz
Stop Freq
30.000000 MHz
CF Step
2.985000 MHz
Auto
Man
Freq Offset
0 Hz

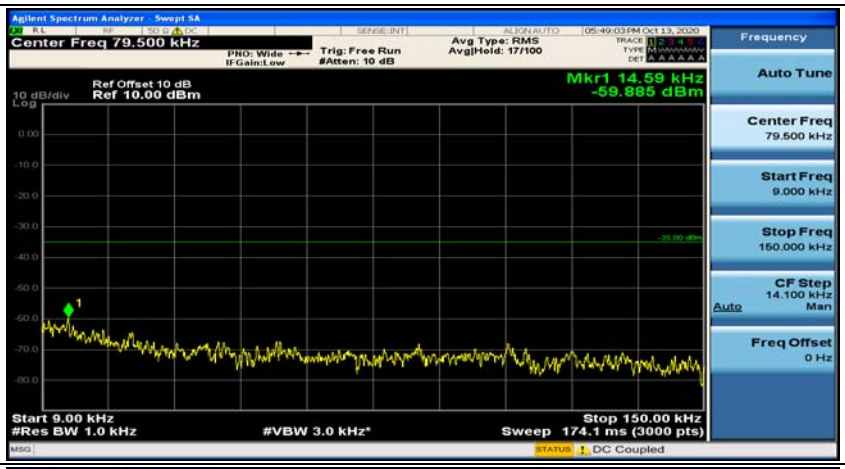
Agilent Spectrum Analyzer - Swept SA
Center Freq 13.015000000 GHz
PNO: Fast
IFGain:Low
Trig: Free Run
#Atten: 20 dB
Avg Type: RMS
Avg|Hold: 10/100
05:47:18 PM Oct 13, 2020
Ref Offset 9.96 dB
10 dB/div
Ref 19.95 dBm
Mkr2 25.524 GHz
-48.009 dBm
Start 30 MHz
#Res BW 1.0 MHz
#VBW 3.0 MHz*
Stop 26.00 GHz
Sweep 64.98 ms (3000 pts)
Frequency
Auto Tune
Center Freq
13.015000000 GHz
Start Freq
30.000000 MHz
Stop Freq
26.000000000 GHz
CF Step
2.597000000 GHz
Auto
Man
Freq Offset
0 Hz

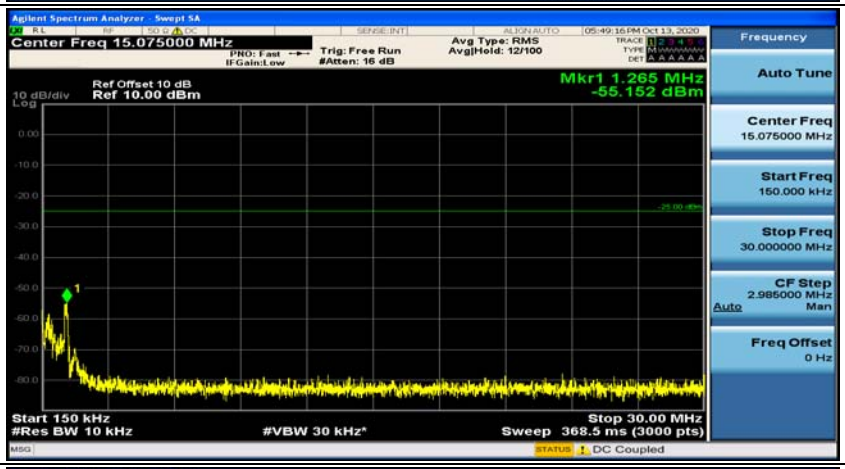
(Channel Bandwidth:15 MHz)_HCH_16QAM_1RB#0



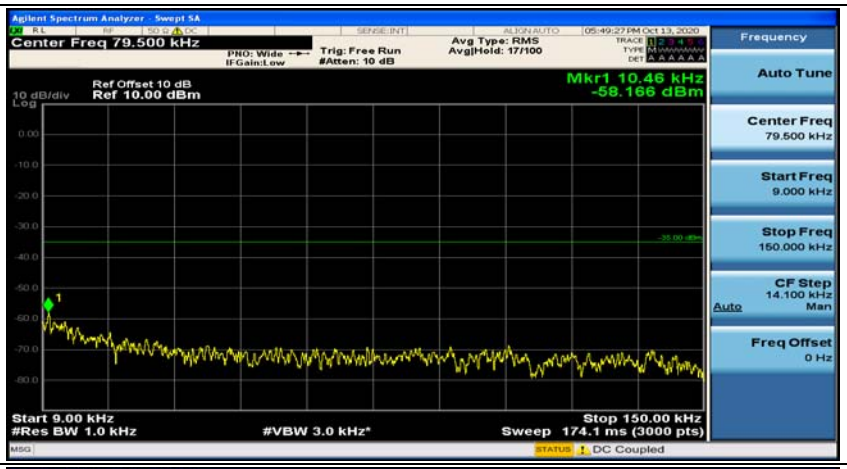


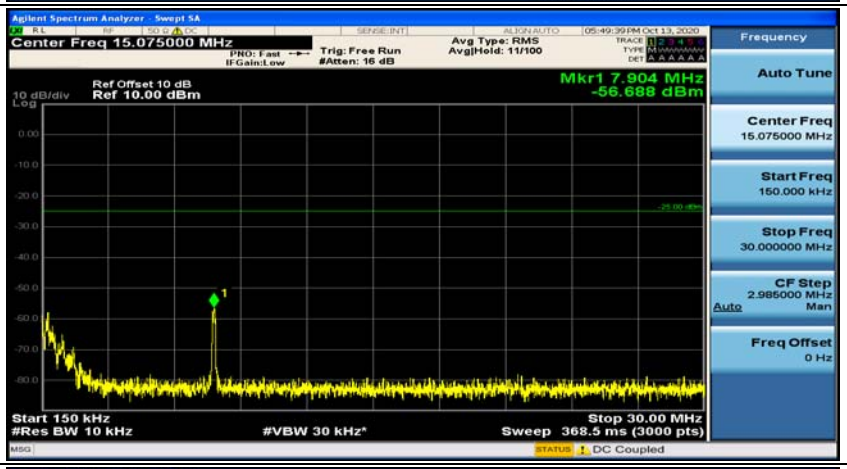
(Channel Bandwidth:15 MHz)_HCH_16QAM_1RB#37





(Channel Bandwidth:15 MHz)_HCH_16QAM_1RB#74

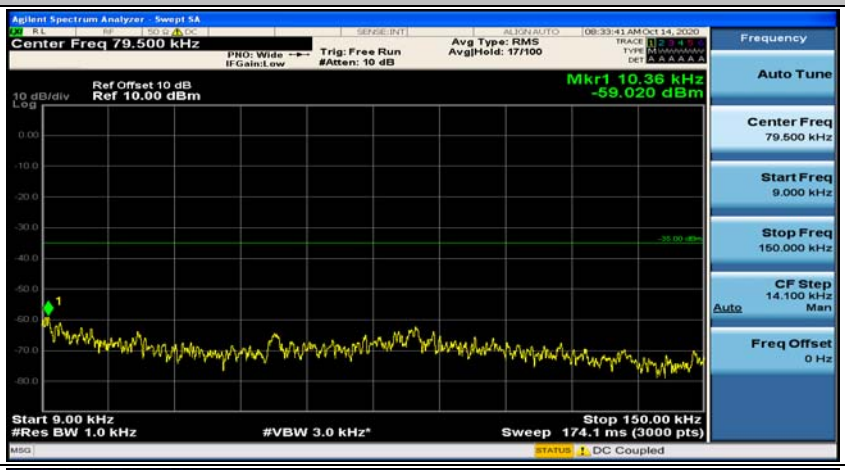

Agilent Spectrum Analyzer - Swept SA
Center Freq 79.500 kHz
PNO: Wide
IFGain:Low
Trig: Free Run
#Atten: 10 dB
Avg Type: RMS
Avg|Hold: 17/100
05:49:27 PM Oct 13, 2020
Ref Offset 10 dB
10 dB/div Ref 10.00 dBm
Log
Mkr1 10.46 kHz
-58.166 dBm
Start 9.00 kHz
#Res BW 1.0 kHz
#VBW 3.0 kHz*
Stop 150.00 kHz
Sweep 174.1 ms (3000 pts)
DC Coupled
Frequency
Auto Tune
Center Freq 79.500 kHz
Start Freq 9.000 kHz
Stop Freq 150.000 kHz
CF Step 14.100 kHz
Auto Man
Freq Offset 0 Hz

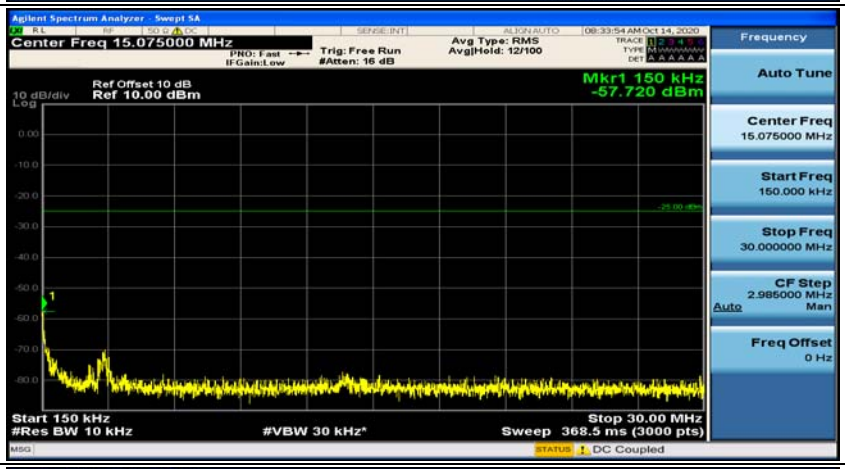

Agilent Spectrum Analyzer - Swept SA
Center Freq 15.075000 MHz
PNO: Fast
IFGain:Low
Trig: Free Run
#Atten: 16 dB
Avg Type: RMS
Avg|Hold: 11/100
05:49:39 PM Oct 13, 2020
Ref Offset 10 dB
10 dB/div Ref 10.00 dBm
Log
Mkr1 7.904 MHz
-56.688 dBm
Start 150 kHz
#Res BW 10 kHz
#VBW 30 kHz*
Stop 30.00 MHz
Sweep 368.5 ms (3000 pts)
DC Coupled
Frequency
Auto Tune
Center Freq 15.075000 MHz
Start Freq 150.000 kHz
Stop Freq 30.000000 MHz
CF Step 2.985000 MHz
Auto Man
Freq Offset 0 Hz

Agilent Spectrum Analyzer - Swept SA
Center Freq 13.015000000 GHz
PNO: Fast
IFGain:Low
Trig: Free Run
#Atten: 20 dB
Avg Type: RMS
Avg|Hold: 11/100
05:49:45 PM Oct 13, 2020
Ref Offset 9.95 dB
10 dB/div Ref 19.95 dBm
Log
Mkr2 25.065 GHz
-48.123 dBm
Start 30 MHz
#Res BW 1.0 MHz
#VBW 3.0 MHz*
Stop 26.00 GHz
Sweep 64.98 ms (3000 pts)
Frequency
Auto Tune
Center Freq 13.015000000 GHz
Start Freq 30.000000 MHz
Stop Freq 26.000000000 GHz
CF Step 2.597000000 GHz
Auto Man
Freq Offset 0 Hz

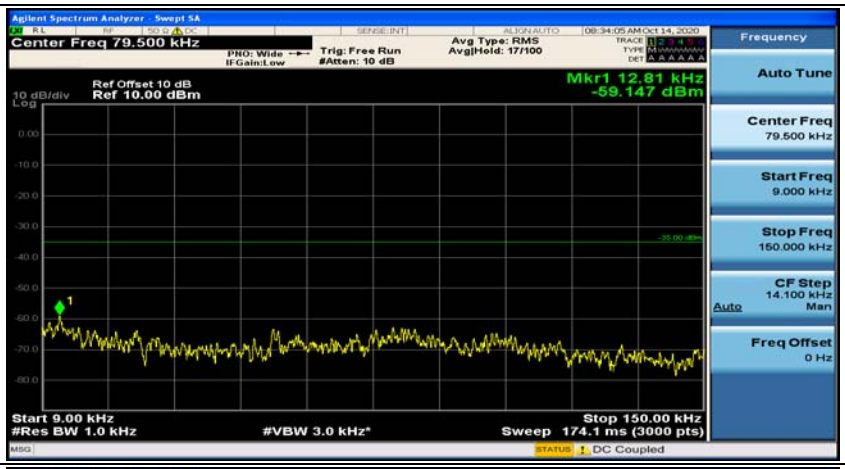
Channel Bandwidth: 20 MHz

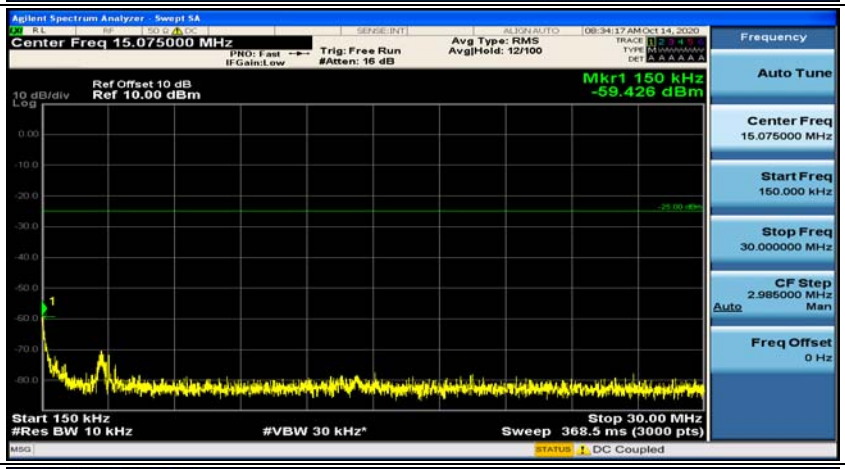
(Channel Bandwidth:20 MHz)_LCH_QPSK_1RB#0



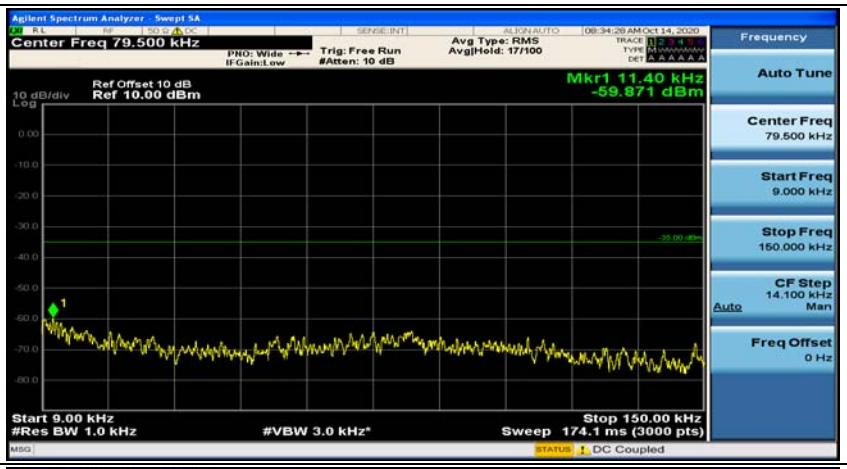


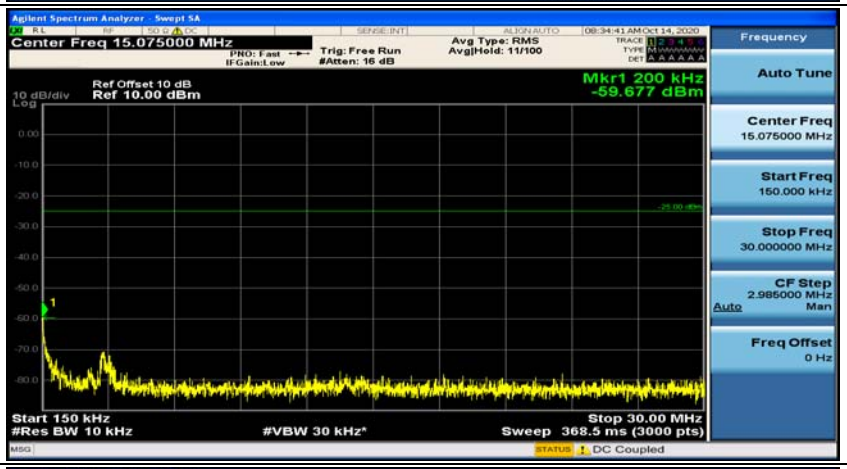
(Channel Bandwidth:20 MHz)_LCH_QPSK_1RB#49





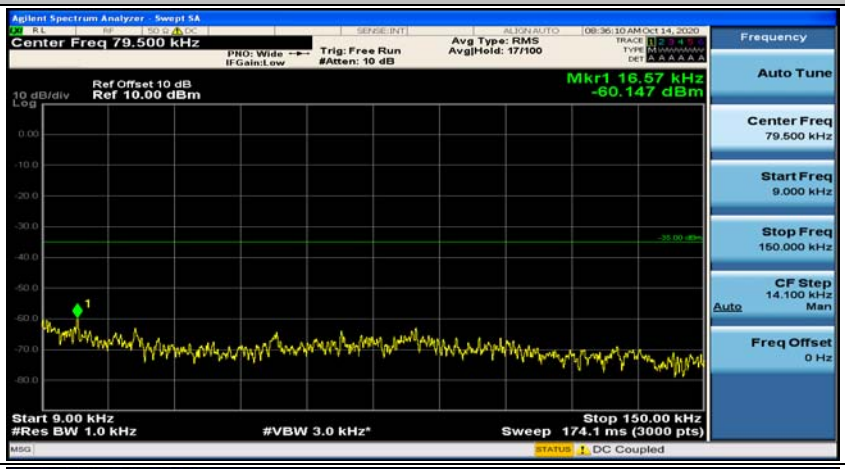
(Channel Bandwidth:20 MHz)_LCH_QPSK_1RB#99

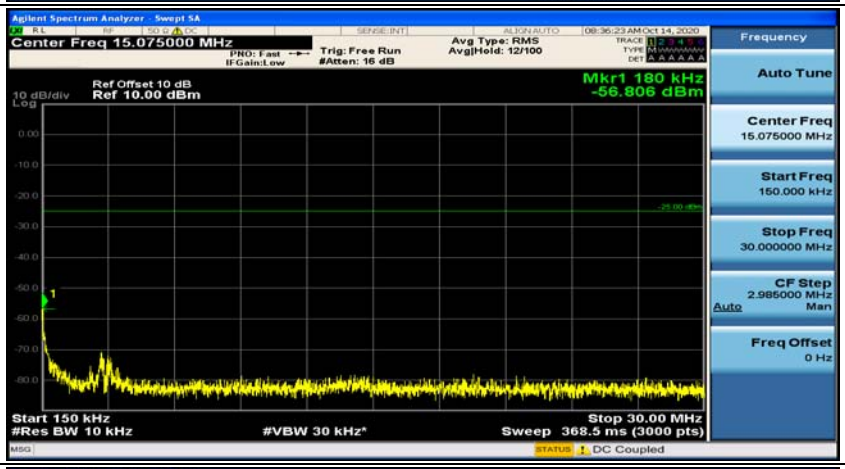

Agilent Spectrum Analyzer - Swept SA
Center Freq 79.500 kHz
PNO: Wide
IFGain:Low
Trig: Free Run
#Atten: 10 dB
Avg Type: RMS
Avg|Hold: 17/100
08:34:28 AM Oct 14, 2020
Ref Offset 10 dB
10 dB/div Ref 10.00 dBm
Log
Mkr1 11.40 kHz
-59.871 dBm
Start 9.00 kHz
#Res BW 1.0 kHz
#VBW 3.0 kHz*
Stop 150.00 kHz
Sweep 174.1 ms (3000 pts)
DC Coupled
Frequency
Auto Tune
Center Freq 79.500 kHz
Start Freq 9.000 kHz
Stop Freq 150.000 kHz
CF Step 14.100 kHz
Auto Man
Freq Offset 0 Hz


Agilent Spectrum Analyzer - Swept SA
Center Freq 15.075000 MHz
PNO: Fast
IFGain:Low
Trig: Free Run
#Atten: 16 dB
Avg Type: RMS
Avg|Hold: 11/100
08:34:41 AM Oct 14, 2020
Ref Offset 10 dB
10 dB/div Ref 10.00 dBm
Log
Mkr1 200 kHz
-59.677 dBm
Start 150 kHz
#Res BW 10 kHz
#VBW 30 kHz*
Stop 30.00 MHz
Sweep 368.5 ms (3000 pts)
DC Coupled
Frequency
Auto Tune
Center Freq 15.075000 MHz
Start Freq 150.000 kHz
Stop Freq 30.000000 MHz
CF Step 2.985000 MHz
Auto Man
Freq Offset 0 Hz

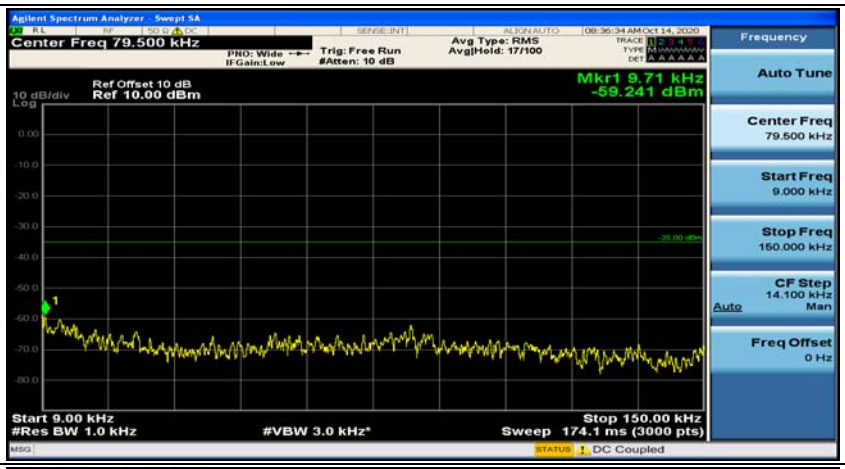
Agilent Spectrum Analyzer - Swept SA
Center Freq 13.015000000 GHz
PNO: Fast
IFGain:Low
Trig: Free Run
#Atten: 20 dB
Avg Type: RMS
Avg|Hold: 11/100
08:34:47 AM Oct 14, 2020
Ref Offset 9.95 dB
10 dB/div Ref 19.95 dBm
Log
Mkr2 25.948 GHz
-48.430 dBm
Start 30 MHz
#Res BW 1.0 MHz
#VBW 3.0 MHz*
Stop 26.00 GHz
Sweep 64.98 ms (3000 pts)
Frequency
Auto Tune
Center Freq 13.015000000 GHz
Start Freq 30.000000 MHz
Stop Freq 26.000000000 GHz
CF Step 2.597000000 GHz
Auto Man
Freq Offset 0 Hz

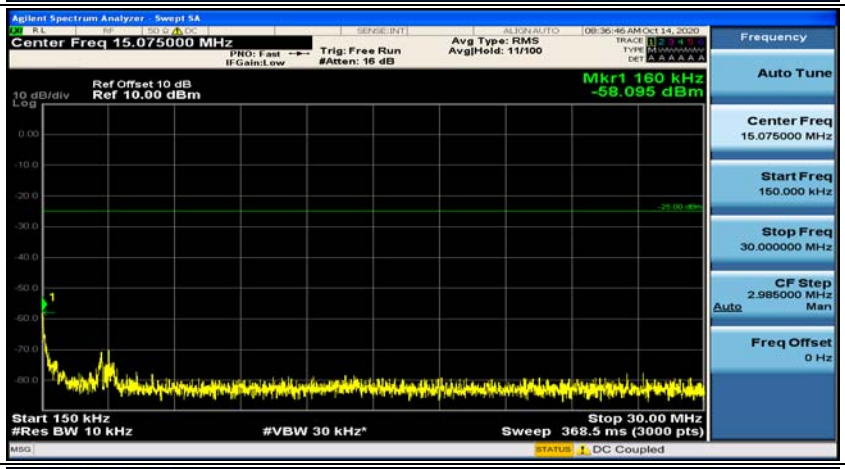
(Channel Bandwidth:20 MHz)_MCH_QPSK_1RB#0



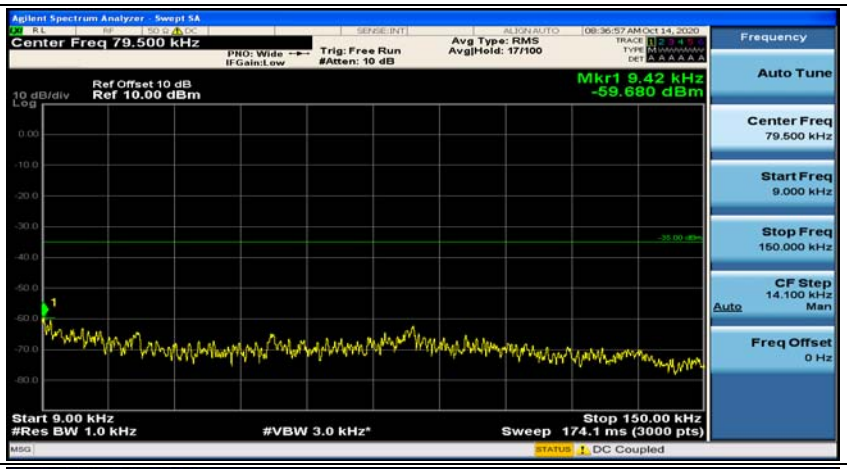


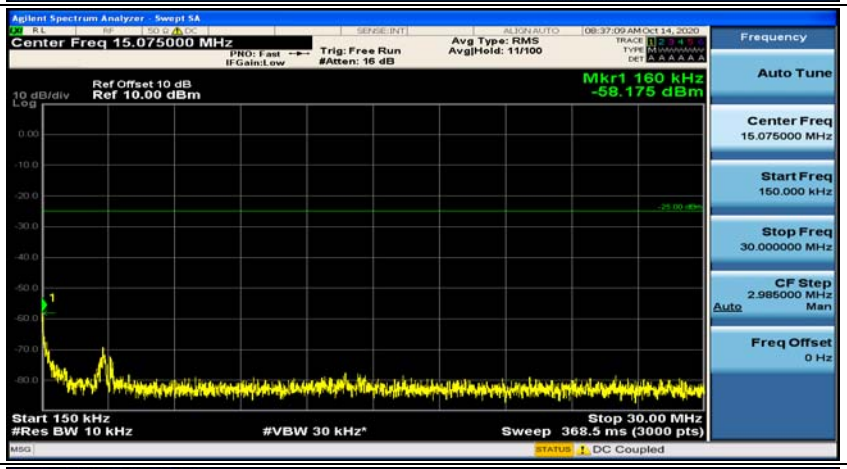
(Channel Bandwidth:20 MHz)_MCH_QPSK_1RB#49





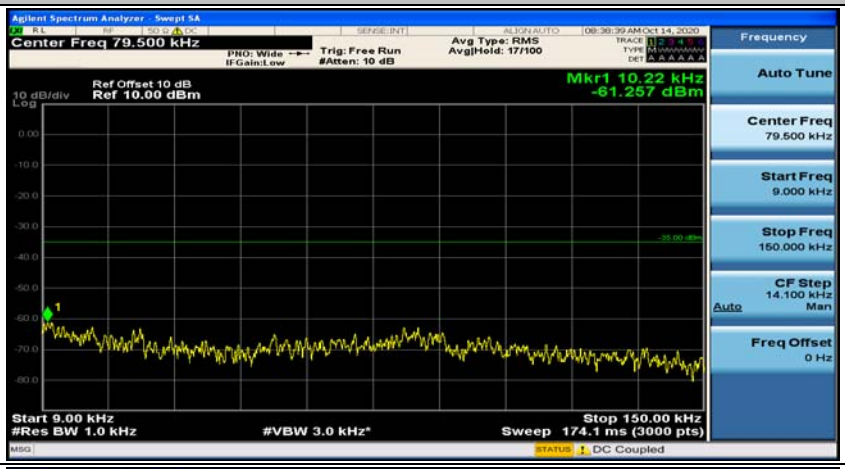
(Channel Bandwidth:20 MHz)_MCH_QPSK_1RB#99

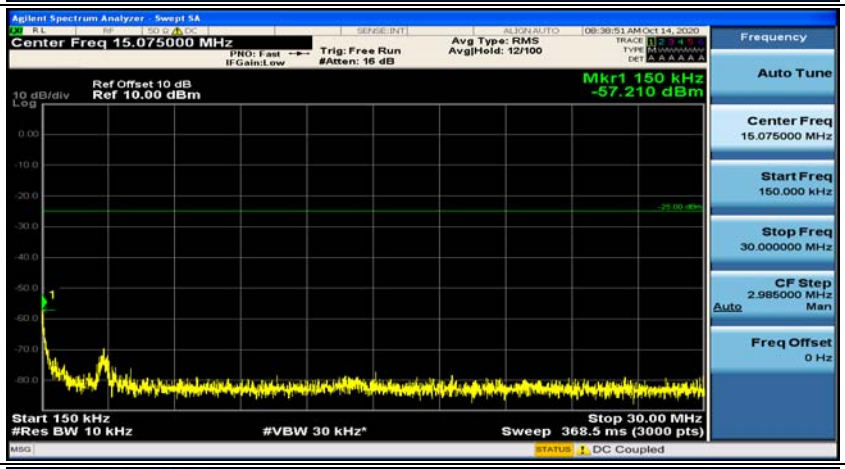

Agilent Spectrum Analyzer - Swept SA
Center Freq 79.500 kHz
PNO: Wide
IFGain:Low
Trig: Free Run
#Atten: 10 dB
Avg Type: RMS
Avg|Hold: 17/100
08:36:57 AM Oct 14, 2020
Ref Offset 10 dB
10 dB/div
Ref 10.00 dBm
Mkr1 9.42 kHz
-59.680 dBm
Start 9.00 kHz
#Res BW 1.0 kHz
#VBW 3.0 kHz*
Stop 150.00 kHz
Sweep 174.1 ms (3000 pts)
DC Coupled
Frequency
Auto Tune
Center Freq
79.500 kHz
Start Freq
9.000 kHz
Stop Freq
150.000 kHz
CF Step
14.100 kHz
Auto
Man
Freq Offset
0 Hz


Agilent Spectrum Analyzer - Swept SA
Center Freq 15.075000 MHz
PNO: Fast
IFGain:Low
Trig: Free Run
#Atten: 16 dB
Avg Type: RMS
Avg|Hold: 11/100
08:37:09 AM Oct 14, 2020
Ref Offset 10 dB
10 dB/div
Ref 10.00 dBm
Mkr1 160 kHz
-58.175 dBm
Start 150 kHz
#Res BW 10 kHz
#VBW 30 kHz*
Stop 30.00 MHz
Sweep 368.5 ms (3000 pts)
DC Coupled
Frequency
Auto Tune
Center Freq
15.075000 MHz
Start Freq
150.000 kHz
Stop Freq
30.000000 MHz
CF Step
2.985000 MHz
Auto
Man
Freq Offset
0 Hz

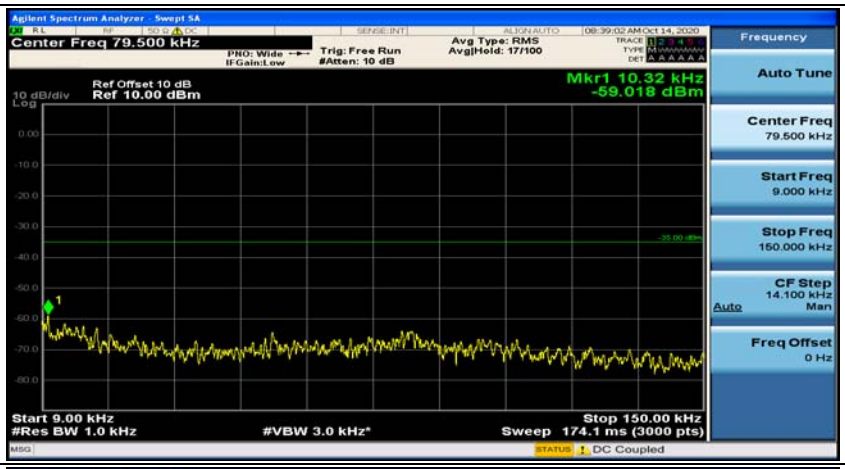
Agilent Spectrum Analyzer - Swept SA
Center Freq 13.015000000 GHz
PNO: Fast
IFGain:Low
Trig: Free Run
#Atten: 20 dB
Avg Type: RMS
Avg|Hold: 11/100
08:37:15 AM Oct 14, 2020
Ref Offset 9.96 dB
10 dB/div
Ref 19.95 dBm
Mkr2 25.896 GHz
-48.771 dBm
Start 30 MHz
#Res BW 1.0 MHz
#VBW 3.0 MHz*
Stop 26.00 GHz
Sweep 64.98 ms (3000 pts)
Frequency
Auto Tune
Center Freq
13.015000000 GHz
Start Freq
30.000000 MHz
Stop Freq
26.000000000 GHz
CF Step
2.597000000 GHz
Auto
Man
Freq Offset
0 Hz

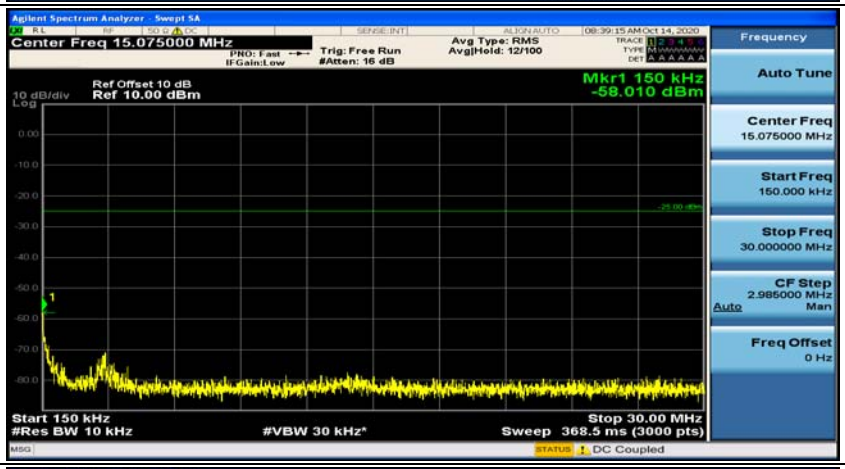
(Channel Bandwidth:20 MHz)_HCH_QPSK_1RB#0



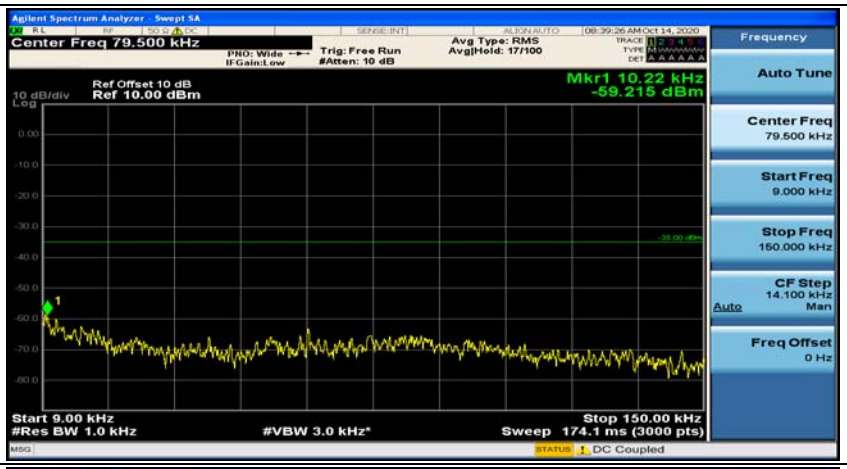


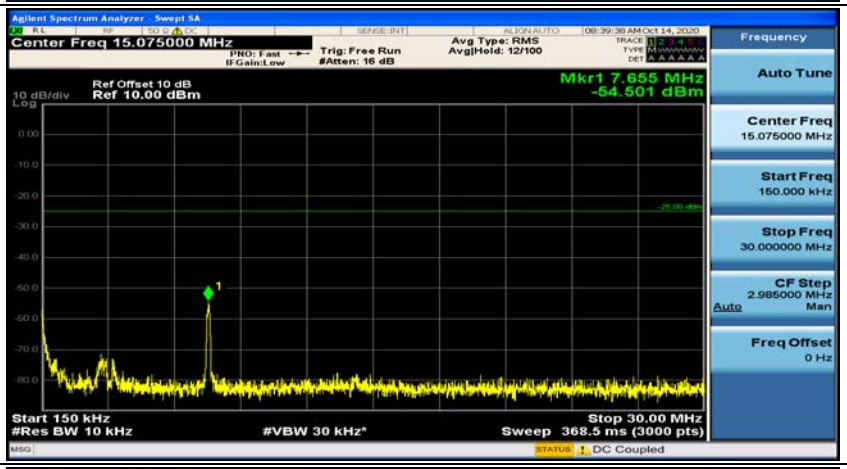
(Channel Bandwidth:20 MHz)_HCH_QPSK_1RB#49





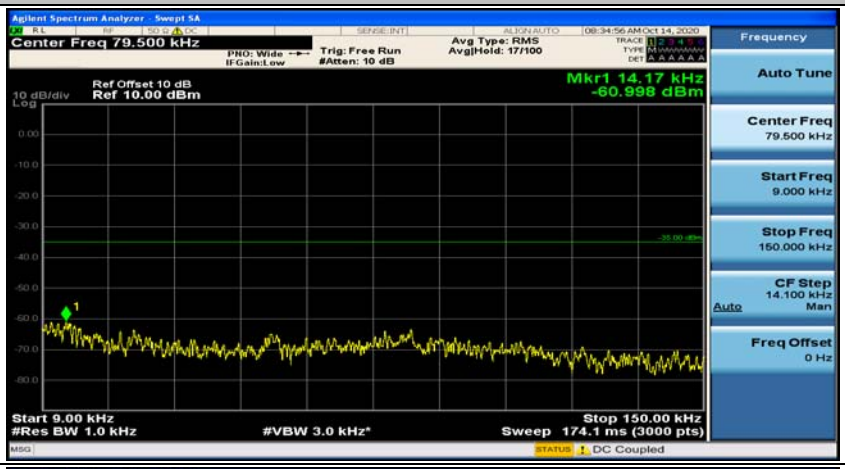
(Channel Bandwidth:20 MHz)_HCH_QPSK_1RB#99

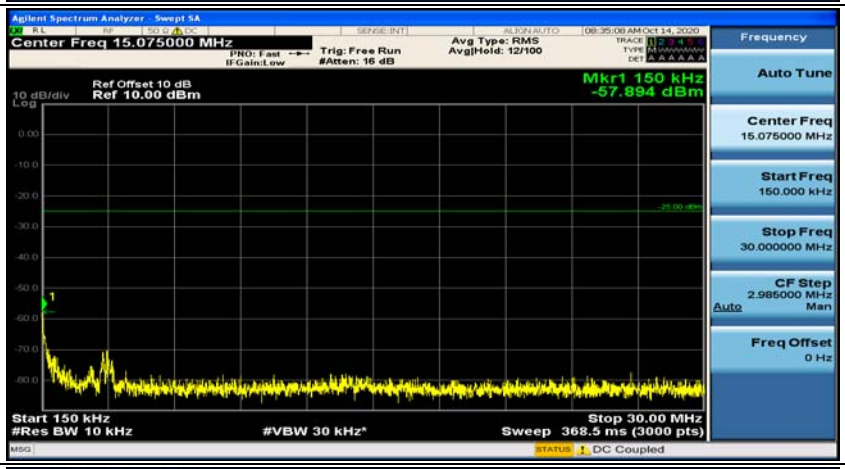

Agilent Spectrum Analyzer - Swept SA
Center Freq 79.500 kHz
PNO: Wide
IFGain:Low
Trig: Free Run
#Atten: 10 dB
Avg Type: RMS
Avg|Hold: 17/100
08:39:26 AM Oct 14, 2020
Ref Offset 10 dB
10 dB/div Ref 10.00 dBm
Log
Mkr1 10.22 kHz
-59.215 dBm
Start 9.00 kHz
#Res BW 1.0 kHz
#VBW 3.0 kHz*
Stop 150.00 kHz
Sweep 174.1 ms (3000 pts)
DC Coupled
Frequency
Auto Tune
Center Freq
79.500 kHz
Start Freq
9.000 kHz
Stop Freq
150.000 kHz
CF Step
14.100 kHz
Auto
Man
Freq Offset
0 Hz


Agilent Spectrum Analyzer - Swept SA
Center Freq 15.075000 MHz
PNO: Fast
IFGain:Low
Trig: Free Run
#Atten: 16 dB
Avg Type: RMS
Avg|Hold: 12/100
08:39:38 AM Oct 14, 2020
Ref Offset 10 dB
10 dB/div Ref 10.00 dBm
Log
Mkr1 7.655 MHz
-54.501 dBm
Start 150 kHz
#Res BW 10 kHz
#VBW 30 kHz*
Stop 30.00 MHz
Sweep 368.5 ms (3000 pts)
DC Coupled
Frequency
Auto Tune
Center Freq
15.075000 MHz
Start Freq
150.000 kHz
Stop Freq
30.000000 MHz
CF Step
2.985000 MHz
Auto
Man
Freq Offset
0 Hz

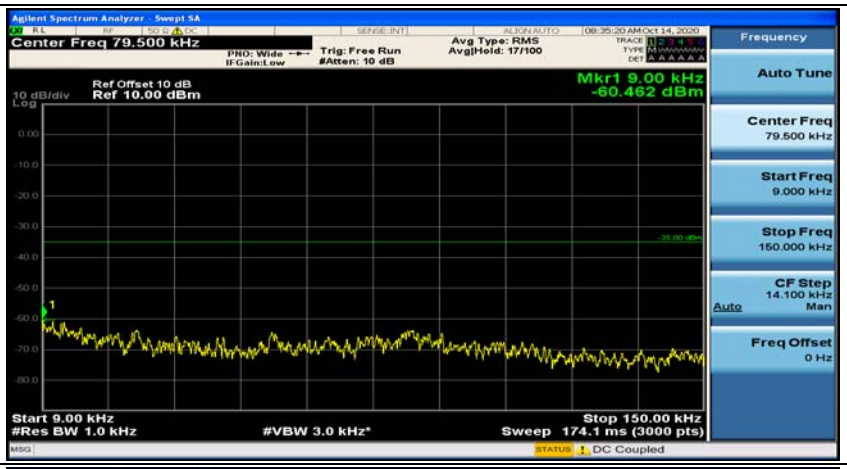
Agilent Spectrum Analyzer - Swept SA
Center Freq 13.015000000 GHz
PNO: Fast
IFGain:Low
Trig: Free Run
#Atten: 20 dB
Avg Type: RMS
Avg|Hold: 11/100
08:39:44 AM Oct 14, 2020
Ref Offset 9.95 dB
10 dB/div Ref 19.95 dBm
Log
Mkr2 25.922 GHz
-47.839 dBm
Start 30 MHz
#Res BW 1.0 MHz
#VBW 3.0 MHz*
Stop 26.00 GHz
Sweep 64.98 ms (3000 pts)
Frequency
Auto Tune
Center Freq
13.015000000 GHz
Start Freq
30.000000 MHz
Stop Freq
26.000000000 GHz
CF Step
2.597000000 GHz
Auto
Man
Freq Offset
0 Hz

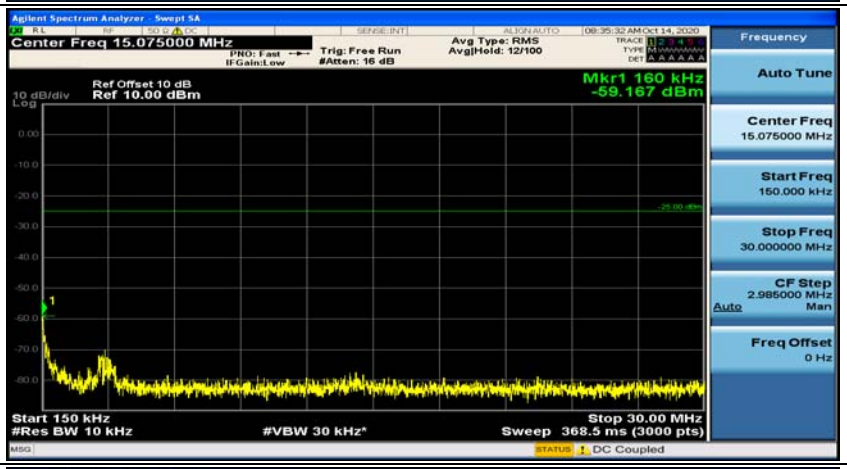
(Channel Bandwidth:20 MHz)_LCH_16QAM_1RB#0



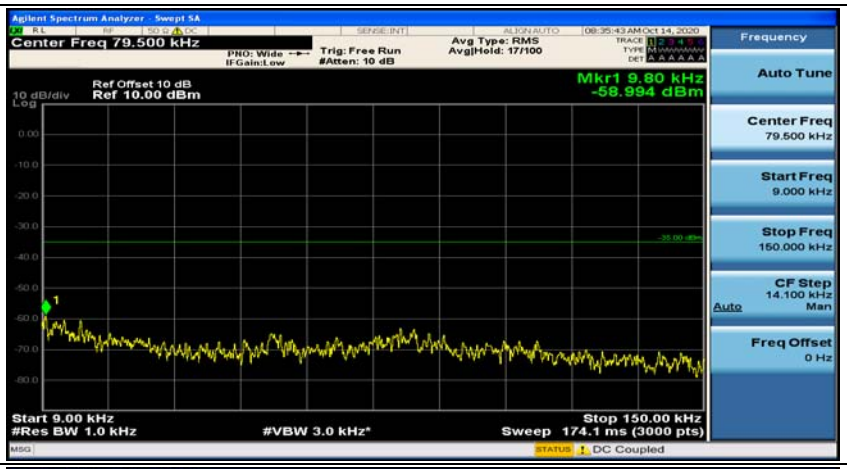


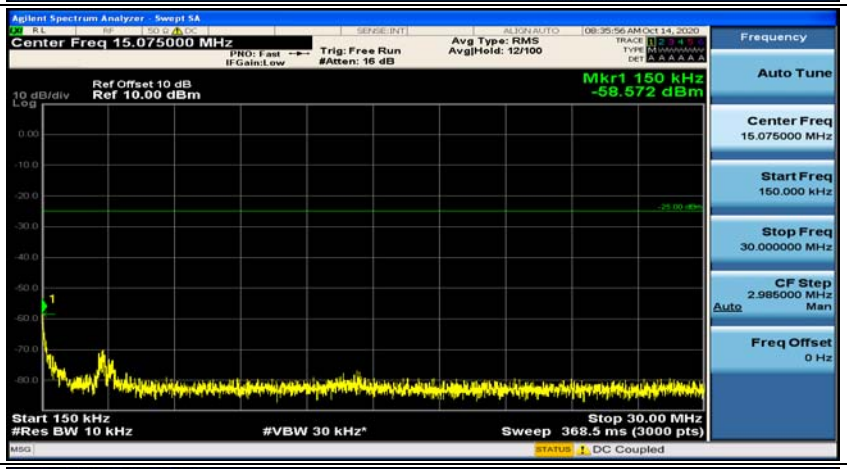
(Channel Bandwidth:20 MHz)_LCH_16QAM_1RB#49





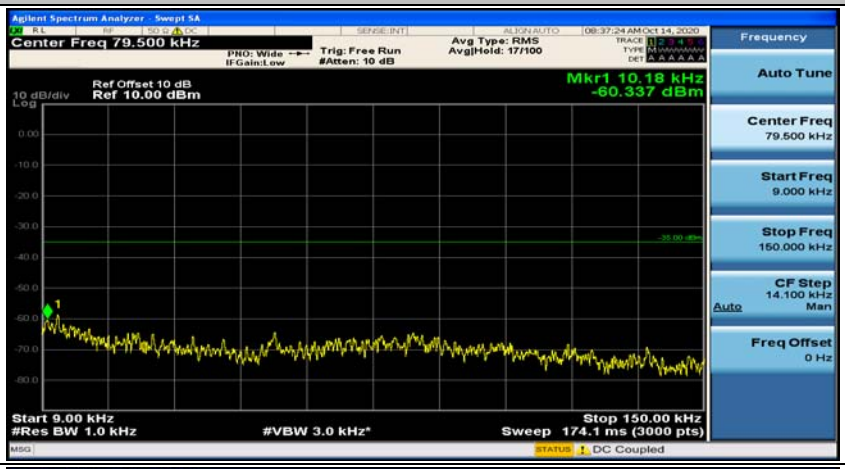
(Channel Bandwidth:20 MHz)_LCH_16QAM_1RB#99

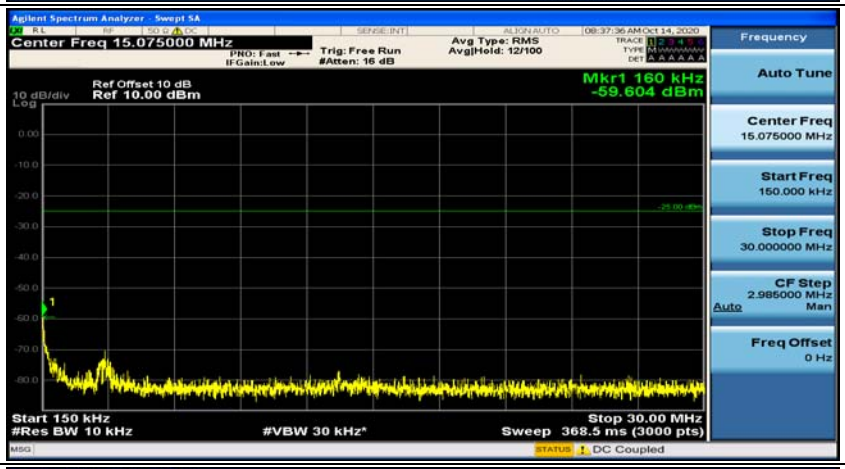

Agilent Spectrum Analyzer - Swept SA
Center Freq 79.500 kHz
PNO: Wide
IFGain:Low
Trig: Free Run
#Atten: 10 dB
Avg Type: RMS
Avg|Hold: 17/100
08:35:43 AM Oct 14, 2020
Ref Offset 10 dB
10 dB/div
Ref 10.00 dBm
Mkr1 9.80 kHz
-58.994 dBm
Start 9.00 kHz
#Res BW 1.0 kHz
#VBW 3.0 kHz*
Stop 150.00 kHz
Sweep 174.1 ms (3000 pts)
DC Coupled
Frequency
Auto Tune
Center Freq
79.500 kHz
Start Freq
9.000 kHz
Stop Freq
150.000 kHz
CF Step
14.100 kHz
Auto
Man
Freq Offset
0 Hz


Agilent Spectrum Analyzer - Swept SA
Center Freq 15.075000 MHz
PNO: Fast
IFGain:Low
Trig: Free Run
#Atten: 16 dB
Avg Type: RMS
Avg|Hold: 12/100
08:35:56 AM Oct 14, 2020
Ref Offset 10 dB
10 dB/div
Ref 10.00 dBm
Mkr1 150 kHz
-58.572 dBm
Start 150 kHz
#Res BW 10 kHz
#VBW 30 kHz*
Stop 30.00 MHz
Sweep 368.5 ms (3000 pts)
DC Coupled
Frequency
Auto Tune
Center Freq
15.075000 MHz
Start Freq
150.000 kHz
Stop Freq
30.000000 MHz
CF Step
2.985000 MHz
Auto
Man
Freq Offset
0 Hz

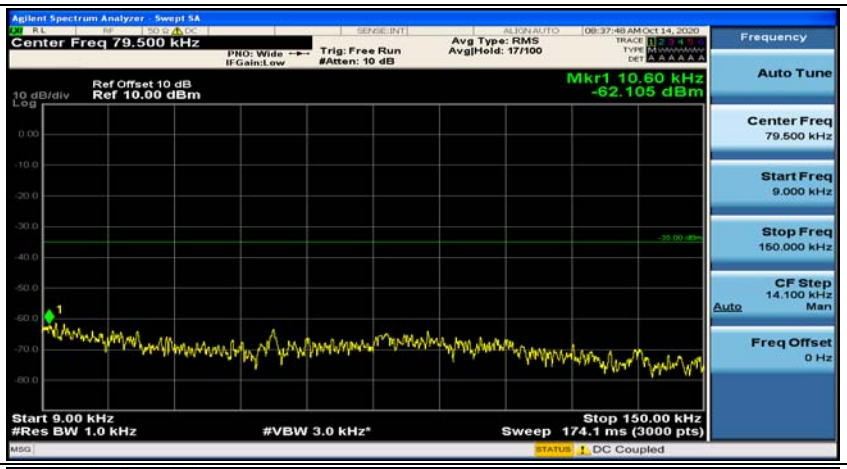
Agilent Spectrum Analyzer - Swept SA
Center Freq 13.015000000 GHz
PNO: Fast
IFGain:Low
Trig: Free Run
#Atten: 20 dB
Avg Type: RMS
Avg|Hold: 11/100
08:36:01 AM Oct 14, 2020
Ref Offset 9.95 dB
10 dB/div
Ref 19.95 dBm
Mkr2 25.922 GHz
-48.868 dBm
Start 30 MHz
#Res BW 1.0 MHz
#VBW 3.0 MHz*
Stop 26.00 GHz
Sweep 64.98 ms (3000 pts)
Frequency
Auto Tune
Center Freq
13.015000000 GHz
Start Freq
30.000000 MHz
Stop Freq
26.000000000 GHz
CF Step
2.597000000 GHz
Auto
Man
Freq Offset
0 Hz

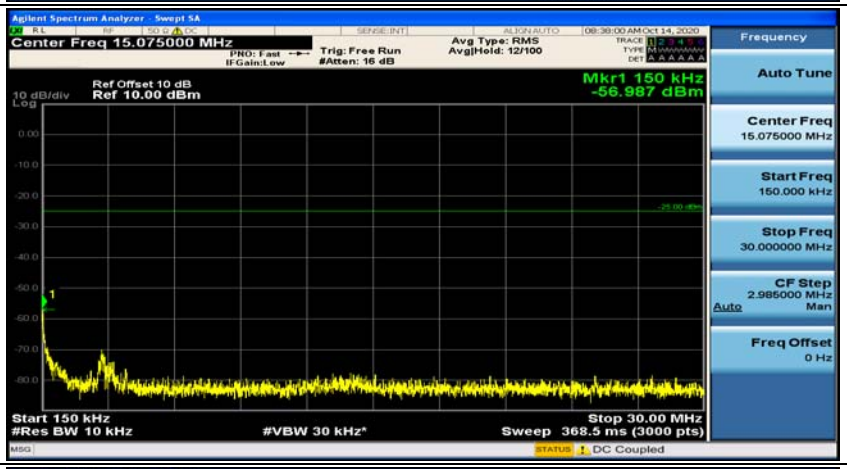
(Channel Bandwidth:20 MHz)_MCH_16QAM_1RB#0



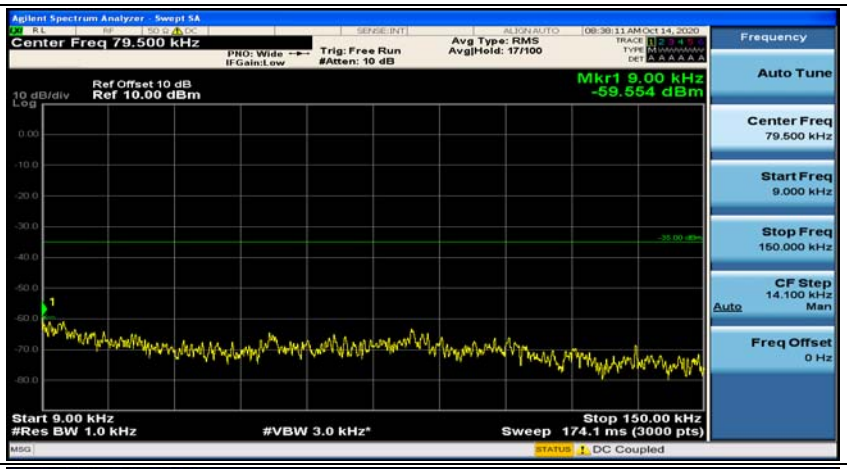


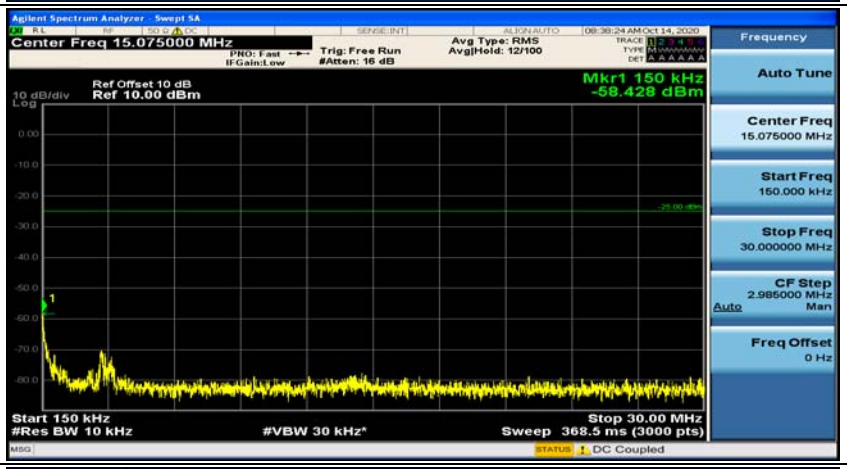
(Channel Bandwidth:20 MHz)_MCH_16QAM_1RB#49





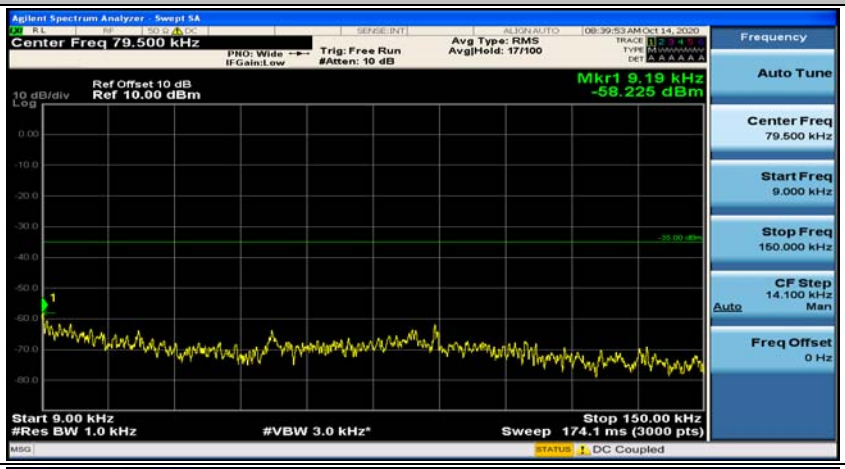
(Channel Bandwidth:20 MHz)_MCH_16QAM_1RB#99

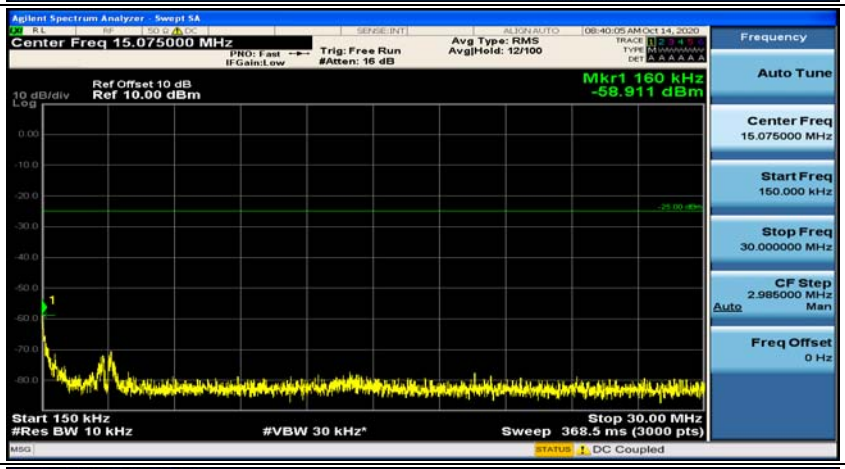

Agilent Spectrum Analyzer - Swept SA
Center Freq 79.500 kHz
PNO: Wide
IFGain:Low
Trig: Free Run
#Atten: 10 dB
Avg Type: RMS
Avg|Hold: 17/100
08:38:11 AM Oct 14, 2020
Ref Offset 10 dB
10 dB/div
Ref 10.00 dBm
Mkr1 9.00 kHz
-59.554 dBm
Start 9.00 kHz
#Res BW 1.0 kHz
#VBW 3.0 kHz*
Stop 150.00 kHz
Sweep 174.1 ms (3000 pts)
DC Coupled
Frequency
Auto Tune
Center Freq
79.500 kHz
Start Freq
9.000 kHz
Stop Freq
150.000 kHz
CF Step
14.100 kHz
Auto
Man
Freq Offset
0 Hz


Agilent Spectrum Analyzer - Swept SA
Center Freq 15.075000 MHz
PNO: Fast
IFGain:Low
Trig: Free Run
#Atten: 16 dB
Avg Type: RMS
Avg|Hold: 12/100
08:38:24 AM Oct 14, 2020
Ref Offset 10 dB
10 dB/div
Ref 10.00 dBm
Mkr1 150 kHz
-58.428 dBm
Start 150 kHz
#Res BW 10 kHz
#VBW 30 kHz*
Stop 30.00 MHz
Sweep 368.5 ms (3000 pts)
DC Coupled
Frequency
Auto Tune
Center Freq
15.075000 MHz
Start Freq
150.000 kHz
Stop Freq
30.000000 MHz
CF Step
2.985000 MHz
Auto
Man
Freq Offset
0 Hz

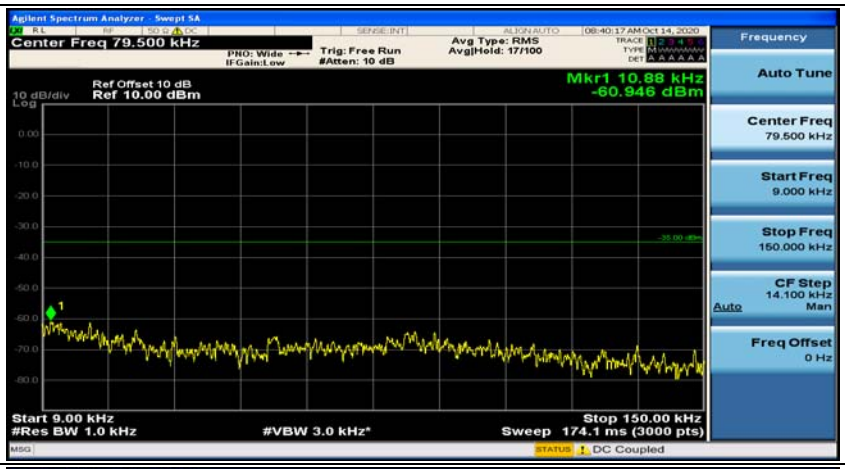
Agilent Spectrum Analyzer - Swept SA
Center Freq 13.015000000 GHz
PNO: Fast
IFGain:Low
Trig: Free Run
#Atten: 20 dB
Avg Type: RMS
Avg|Hold: 11/100
08:38:30 AM Oct 14, 2020
Ref Offset 9.95 dB
10 dB/div
Ref 19.95 dBm
Mkr2 25.515 GHz
-48.476 dBm
Start 30 MHz
#Res BW 1.0 MHz
#VBW 3.0 MHz*
Stop 26.00 GHz
Sweep 64.98 ms (3000 pts)
Frequency
Auto Tune
Center Freq
13.015000000 GHz
Start Freq
30.000000 MHz
Stop Freq
26.000000000 GHz
CF Step
2.597000000 GHz
Auto
Man
Freq Offset
0 Hz

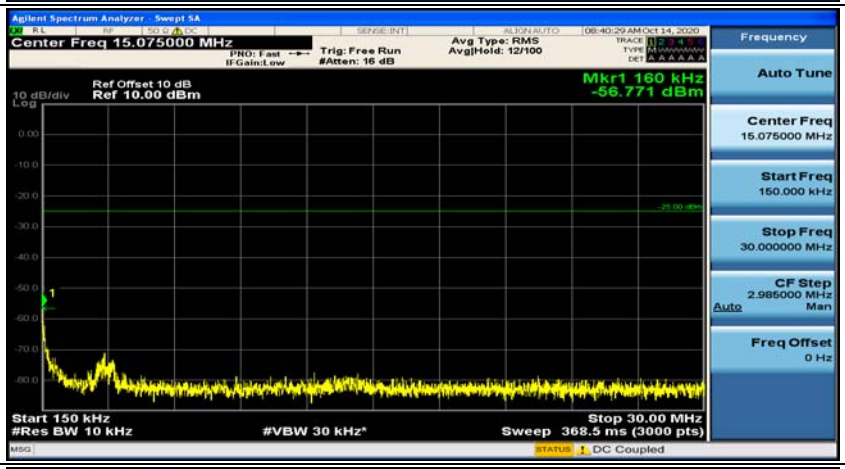
(Channel Bandwidth:20 MHz)_HCH_16QAM_1RB#0



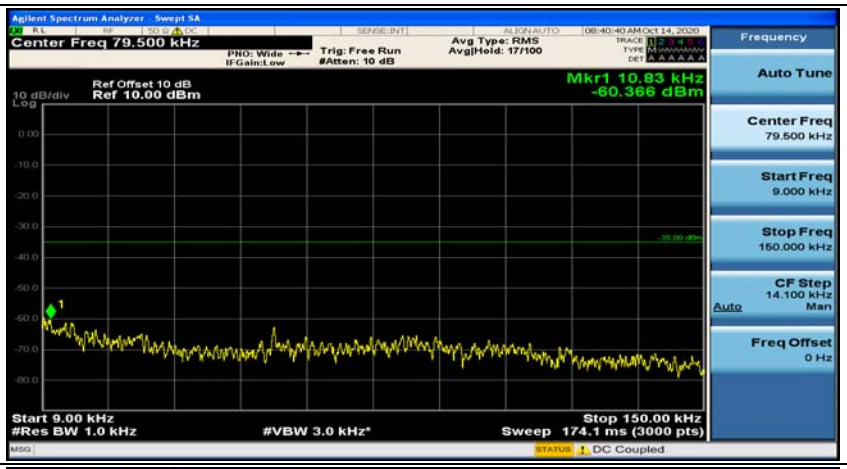


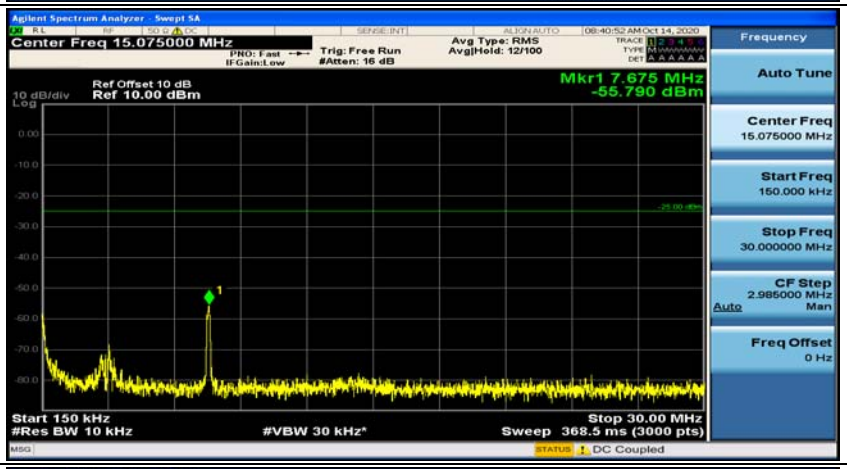
(Channel Bandwidth:20 MHz)_HCH_16QAM_1RB#49





(Channel Bandwidth:20 MHz)_HCH_16QAM_1RB#99


Agilent Spectrum Analyzer - Swept SA
Center Freq 79.500 kHz
PNO: Wide
IFGain:Low
Trig: Free Run
#Atten: 10 dB
Avg Type: RMS
Avg|Hold: 17/100
08:40:40 AM Oct 14, 2020
Ref Offset 10 dB
10 dB/div
Ref 10.00 dBm
Mkr1 10.83 kHz
-60.366 dBm
Start 9.00 kHz
#Res BW 1.0 kHz
#VBW 3.0 kHz*
Stop 150.00 kHz
Sweep 174.1 ms (3000 pts)
DC Coupled
Frequency
Auto Tune
Center Freq
79.500 kHz
Start Freq
9.000 kHz
Stop Freq
150.000 kHz
CF Step
14.100 kHz
Auto
Man
Freq Offset
0 Hz


Agilent Spectrum Analyzer - Swept SA
Center Freq 15.075000 MHz
PNO: Fast
IFGain:Low
Trig: Free Run
#Atten: 16 dB
Avg Type: RMS
Avg|Hold: 12/100
08:40:52 AM Oct 14, 2020
Ref Offset 10 dB
10 dB/div
Ref 10.00 dBm
Mkr1 7.675 MHz
-55.790 dBm
Start 150 kHz
#Res BW 10 kHz
#VBW 30 kHz*
Stop 30.00 MHz
Sweep 368.5 ms (3000 pts)
DC Coupled
Frequency
Auto Tune
Center Freq
15.075000 MHz
Start Freq
150.000 kHz
Stop Freq
30.000000 MHz
CF Step
2.985000 MHz
Auto
Man
Freq Offset
0 Hz

Agilent Spectrum Analyzer - Swept SA
Center Freq 13.015000000 GHz
PNO: Fast
IFGain:Low
Trig: Free Run
#Atten: 20 dB
Avg Type: RMS
Avg|Hold: 11/100
08:40:58 AM Oct 14, 2020
Ref Offset 9.95 dB
10 dB/div
Ref 19.95 dBm
Mkr2 25.922 GHz
-48.446 dBm
Start 30 MHz
#Res BW 1.0 MHz
#VBW 3.0 MHz*
Stop 26.00 GHz
Sweep 64.98 ms (3000 pts)
Frequency
Auto Tune
Center Freq
13.015000000 GHz
Start Freq
30.000000 MHz
Stop Freq
26.000000000 GHz
CF Step
2.597000000 GHz
Auto
Man
Freq Offset
0 Hz

Appendix F: Frequency Stability

Test Result

Channel Bandwidth: 5 MHz

Channel Bandwidth: 5 MHz							
Voltage							
Modulation	Channel	Voltage [Vdc]	Temperature (℃)	Deviation (Hz)	Deviation (ppm)	Limit (ppm)	Verdict
QPSK	LCH	VL	TN	4.88	0.001950	± 2.5	PASS
		VN	TN	4.8	0.001918	± 2.5	PASS
		VH	TN	-1.04	-0.000416	± 2.5	PASS
	MCH	VL	TN	1.72	0.000679	± 2.5	PASS
		VN	TN	1.82	0.000718	± 2.5	PASS
		VH	TN	4.79	0.001890	± 2.5	PASS
	HCH	VL	TN	-1.13	-0.000440	± 2.5	PASS
		VN	TN	-0.93	-0.000362	± 2.5	PASS
		VH	TN	4.28	0.001667	± 2.5	PASS
16QAM	LCH	VL	TN	3.1	0.001239	± 2.5	PASS
		VN	TN	-1.36	-0.000543	± 2.5	PASS
		VH	TN	2.97	0.001187	± 2.5	PASS
	MCH	VL	TN	-1.05	-0.000414	± 2.5	PASS
		VN	TN	0.47	0.000185	± 2.5	PASS
		VH	TN	-1.89	-0.000746	± 2.5	PASS
	HCH	VL	TN	3.66	0.001426	± 2.5	PASS
		VN	TN	0.68	0.000265	± 2.5	PASS
		VH	TN	0.91	0.000354	± 2.5	PASS
Temperature							
Modulation	Channel	Voltage [Vdc]	Temperature (℃)	Deviation (Hz)	Deviation (ppm)	Limit (ppm)	Verdict
QPSK	LCH	VN	-30	0.38	0.000152	± 2.5	PASS
		VN	-20	3.27	0.001307	± 2.5	PASS
		VN	-10	3.06	0.001223	± 2.5	PASS
		VN	0	0.67	0.000268	± 2.5	PASS
		VN	10	4.45	0.001778	± 2.5	PASS
		VN	20	-1.17	-0.000468	± 2.5	PASS
		VN	30	2.65	0.001059	± 2.5	PASS
		VN	40	3.86	0.001542	± 2.5	PASS
		VN	50	0.65	0.000260	± 2.5	PASS
	MCH	VN	-30	3.13	0.001235	± 2.5	PASS
		VN	-20	2.75	0.001085	± 2.5	PASS

		VN	-10	-0.85	-0.000335	± 2.5	PASS
		VN	0	3.09	0.001219	± 2.5	PASS
		VN	10	1.58	0.000623	± 2.5	PASS
		VN	20	-0.49	-0.000193	± 2.5	PASS
		VN	30	3.8	0.001499	± 2.5	PASS
		VN	40	-0.5	-0.000197	± 2.5	PASS
		VN	50	1.99	0.000785	± 2.5	PASS
	HCH	VN	-30	-0.36	-0.000140	± 2.5	PASS
		VN	-20	-1.67	-0.000650	± 2.5	PASS
		VN	-10	3.85	0.001500	± 2.5	PASS
		VN	0	3.81	0.001484	± 2.5	PASS
		VN	10	2.38	0.000927	± 2.5	PASS
		VN	20	2.31	0.000900	± 2.5	PASS
		VN	30	0.85	0.000331	± 2.5	PASS
		VN	40	-1.02	-0.000397	± 2.5	PASS
		VN	50	-0.35	-0.000136	± 2.5	PASS
16QAM	LCH	VN	-30	0.63	0.000252	± 2.5	PASS
		VN	-20	2.68	0.001071	± 2.5	PASS
		VN	-10	1.88	0.000751	± 2.5	PASS
		VN	0	-1.92	-0.000767	± 2.5	PASS
		VN	10	-1.58	-0.000631	± 2.5	PASS
		VN	20	-1.93	-0.000771	± 2.5	PASS
		VN	30	1.59	0.000635	± 2.5	PASS
		VN	40	-1.77	-0.000707	± 2.5	PASS
		VN	50	1.02	0.000408	± 2.5	PASS
	MCH	VN	-30	2.97	0.001172	± 2.5	PASS
		VN	-20	3.91	0.001542	± 2.5	PASS
		VN	-10	3.49	0.001377	± 2.5	PASS
		VN	0	1.73	0.000682	± 2.5	PASS
		VN	10	3.02	0.001191	± 2.5	PASS
		VN	20	4.73	0.001866	± 2.5	PASS
		VN	30	3.82	0.001507	± 2.5	PASS
		VN	40	2.75	0.001085	± 2.5	PASS
		VN	50	1.47	0.000580	± 2.5	PASS
	HCH	VN	-30	-1.91	-0.000744	± 2.5	PASS
		VN	-20	-0.67	-0.000261	± 2.5	PASS
		VN	-10	-0.94	-0.000366	± 2.5	PASS
		VN	0	4.92	0.001916	± 2.5	PASS
		VN	10	3.73	0.001453	± 2.5	PASS
		VN	20	0.67	0.000261	± 2.5	PASS
		VN	30	0.91	0.000354	± 2.5	PASS

		VN	40	2.05	0.000798	± 2.5	PASS
		VN	50	3.06	0.001192	± 2.5	PASS

Channel Bandwidth: 10 MHz

Channel Bandwidth: 10 MHz							
Voltage							
Modulation	Channel	Voltage [Vdc]	Temperature (℃)	Deviation (Hz)	Deviation (ppm)	Limit (ppm)	Verdict
QPSK	LCH	VL	TN	-1.27	-0.000507	± 2.5	PASS
		VN	TN	4.27	0.001705	± 2.5	PASS
		VH	TN	-1.32	-0.000527	± 2.5	PASS
	MCH	VL	TN	-1.6	-0.000631	± 2.5	PASS
		VN	TN	0.57	0.000225	± 2.5	PASS
		VH	TN	-1.42	-0.000560	± 2.5	PASS
	HCH	VL	TN	1.5	0.000585	± 2.5	PASS
		VN	TN	-2	-0.000780	± 2.5	PASS
		VH	TN	1.43	0.000558	± 2.5	PASS
16QAM	LCH	VL	TN	-1.14	-0.000455	± 2.5	PASS
		VN	TN	0.91	0.000363	± 2.5	PASS
		VH	TN	-0.31	-0.000124	± 2.5	PASS
	MCH	VL	TN	4.8	0.001893	± 2.5	PASS
		VN	TN	3.36	0.001325	± 2.5	PASS
		VH	TN	1.59	0.000627	± 2.5	PASS
	HCH	VL	TN	-0.25	-0.000097	± 2.5	PASS
		VN	TN	-0.39	-0.000152	± 2.5	PASS
		VH	TN	4.84	0.001887	± 2.5	PASS
Temperature							
Modulation	Channel	Voltage [Vdc]	Temperature (℃)	Deviation (Hz)	Deviation (ppm)	Limit (ppm)	Verdict
QPSK	LCH	VN	-30	1.3	0.000519	± 2.5	PASS
		VN	-20	0.85	0.000339	± 2.5	PASS
		VN	-10	3.5	0.001397	± 2.5	PASS
		VN	0	-1.36	-0.000543	± 2.5	PASS
		VN	10	3.81	0.001521	± 2.5	PASS
		VN	20	3.99	0.001593	± 2.5	PASS
		VN	30	4.68	0.001868	± 2.5	PASS
		VN	40	-1.38	-0.000551	± 2.5	PASS
		VN	50	3.21	0.001281	± 2.5	PASS
	MCH	VN	-30	4.85	0.001913	± 2.5	PASS
		VN	-20	0.11	0.000043	± 2.5	PASS
		VN	-10	3.12	0.001231	± 2.5	PASS

		VN	0	0.38	0.000150	± 2.5	PASS
		VN	10	-0.47	-0.000185	± 2.5	PASS
		VN	20	-1.85	-0.000730	± 2.5	PASS
		VN	30	1.96	0.000773	± 2.5	PASS
		VN	40	-1.13	-0.000446	± 2.5	PASS
		VN	50	3.6	0.001420	± 2.5	PASS
	HCH	VN	-30	0.86	0.000335	± 2.5	PASS
		VN	-20	4.89	0.001906	± 2.5	PASS
		VN	-10	3.31	0.001290	± 2.5	PASS
		VN	0	-0.75	-0.000292	± 2.5	PASS
		VN	10	-0.24	-0.000094	± 2.5	PASS
		VN	20	3.3	0.001287	± 2.5	PASS
		VN	30	-0.72	-0.000281	± 2.5	PASS
		VN	40	2.92	0.001138	± 2.5	PASS
		VN	50	0.7	0.000273	± 2.5	PASS
16QAM	LCH	VN	-30	1.58	0.000631	± 2.5	PASS
		VN	-20	2.87	0.001146	± 2.5	PASS
		VN	-10	1.4	0.000559	± 2.5	PASS
		VN	0	3.58	0.001429	± 2.5	PASS
		VN	10	2.88	0.001150	± 2.5	PASS
		VN	20	0.9	0.000359	± 2.5	PASS
		VN	30	3.61	0.001441	± 2.5	PASS
		VN	40	0.85	0.000339	± 2.5	PASS
		VN	50	3.75	0.001497	± 2.5	PASS
	MCH	VN	-30	1.15	0.000454	± 2.5	PASS
		VN	-20	1.51	0.000596	± 2.5	PASS
		VN	-10	-0.75	-0.000296	± 2.5	PASS
		VN	0	2.52	0.000994	± 2.5	PASS
		VN	10	4.32	0.001704	± 2.5	PASS
		VN	20	-1.8	-0.000710	± 2.5	PASS
		VN	30	2.92	0.001152	± 2.5	PASS
		VN	40	0.87	0.000343	± 2.5	PASS
		VN	50	-1.45	-0.000572	± 2.5	PASS
	HCH	VN	-30	1.59	0.000620	± 2.5	PASS
		VN	-20	2.85	0.001111	± 2.5	PASS
		VN	-10	4.01	0.001563	± 2.5	PASS
		VN	0	-1.53	-0.000596	± 2.5	PASS
		VN	10	-0.1	-0.000039	± 2.5	PASS
		VN	20	-0.08	-0.000031	± 2.5	PASS
		VN	30	2.33	0.000908	± 2.5	PASS
		VN	40	1.98	0.000772	± 2.5	PASS

		VN	50	3.31	0.001290	± 2.5	PASS

Channel Bandwidth: 15 MHz

Channel Bandwidth: 15 MHz							
Voltage							
Modulation	Channel	Voltage [Vdc]	Temperature (℃)	Deviation (Hz)	Deviation (ppm)	Limit (ppm)	Verdict
QPSK	LCH	VL	TN	0.26	0.000104	± 2.5	PASS
		VN	TN	0.31	0.000124	± 2.5	PASS
		VH	TN	3.35	0.001336	± 2.5	PASS
	MCH	VL	TN	0.86	0.000339	± 2.5	PASS
		VN	TN	1.08	0.000426	± 2.5	PASS
		VH	TN	2.82	0.001112	± 2.5	PASS
	HCH	VL	TN	-1.9	-0.000741	± 2.5	PASS
		VN	TN	4.04	0.001577	± 2.5	PASS
		VH	TN	3.66	0.001428	± 2.5	PASS
16QAM	LCH	VL	TN	4.34	0.001731	± 2.5	PASS
		VN	TN	-0.8	-0.000319	± 2.5	PASS
		VH	TN	1.42	0.000566	± 2.5	PASS
	MCH	VL	TN	4.87	0.001921	± 2.5	PASS
		VN	TN	0.48	0.000189	± 2.5	PASS
		VH	TN	1.48	0.000584	± 2.5	PASS
	HCH	VL	TN	-1.49	-0.000581	± 2.5	PASS
		VN	TN	2.85	0.001112	± 2.5	PASS
		VH	TN	0.04	0.000016	± 2.5	PASS
Temperature							
Modulation	Channel	Voltage [Vdc]	Temperature (℃)	Deviation (Hz)	Deviation (ppm)	Limit (ppm)	Verdict
QPSK	LCH	VN	-30	-1.54	-0.000614	± 2.5	PASS
		VN	-20	-1.25	-0.000499	± 2.5	PASS
		VN	-10	3.27	0.001304	± 2.5	PASS
		VN	0	2.55	0.001017	± 2.5	PASS
		VN	10	-0.45	-0.000179	± 2.5	PASS
		VN	20	4.58	0.001827	± 2.5	PASS
		VN	30	4.23	0.001687	± 2.5	PASS
		VN	40	1.75	0.000698	± 2.5	PASS
		VN	50	3.84	0.001531	± 2.5	PASS
	MCH	VN	-30	1.91	0.000753	± 2.5	PASS
		VN	-20	-1.44	-0.000568	± 2.5	PASS
		VN	-10	3.8	0.001499	± 2.5	PASS
		VN	0	2.62	0.001034	± 2.5	PASS

		VN	10	0.33	0.000130	± 2.5	PASS
		VN	20	-0.73	-0.000288	± 2.5	PASS
		VN	30	2.47	0.000974	± 2.5	PASS
		VN	40	0.15	0.000059	± 2.5	PASS
		VN	50	-1.3	-0.000513	± 2.5	PASS
	HCH	VN	-30	-0.8	-0.000312	± 2.5	PASS
		VN	-20	1.2	0.000468	± 2.5	PASS
		VN	-10	0.26	0.000101	± 2.5	PASS
		VN	0	0.34	0.000133	± 2.5	PASS
		VN	10	-1.11	-0.000433	± 2.5	PASS
		VN	20	2.01	0.000784	± 2.5	PASS
		VN	30	-1.42	-0.000554	± 2.5	PASS
		VN	40	4.03	0.001573	± 2.5	PASS
		VN	50	-0.78	-0.000304	± 2.5	PASS
16QAM	LCH	VN	-30	-1.47	-0.000586	± 2.5	PASS
		VN	-20	4.21	0.001679	± 2.5	PASS
		VN	-10	0.48	0.000191	± 2.5	PASS
		VN	0	4.34	0.001731	± 2.5	PASS
		VN	10	3.07	0.001224	± 2.5	PASS
		VN	20	0.98	0.000391	± 2.5	PASS
		VN	30	-1.59	-0.000634	± 2.5	PASS
		VN	40	-1.08	-0.000431	± 2.5	PASS
		VN	50	4.51	0.001799	± 2.5	PASS
	MCH	VN	-30	-0.52	-0.000205	± 2.5	PASS
		VN	-20	-0.76	-0.000300	± 2.5	PASS
		VN	-10	-0.86	-0.000339	± 2.5	PASS
		VN	0	1.07	0.000422	± 2.5	PASS
		VN	10	3.79	0.001495	± 2.5	PASS
		VN	20	2.91	0.001148	± 2.5	PASS
		VN	30	-1.08	-0.000426	± 2.5	PASS
		VN	40	4.43	0.001748	± 2.5	PASS
		VN	50	1.78	0.000702	± 2.5	PASS
	HCH	VN	-30	4.6	0.001795	± 2.5	PASS
		VN	-20	-1.45	-0.000566	± 2.5	PASS
		VN	-10	4.38	0.001709	± 2.5	PASS
		VN	0	0.83	0.000324	± 2.5	PASS
		VN	10	3.8	0.001483	± 2.5	PASS
		VN	20	2.83	0.001104	± 2.5	PASS
		VN	30	2.25	0.000878	± 2.5	PASS
		VN	40	4.65	0.001815	± 2.5	PASS
		VN	50	1.37	0.000535	± 2.5	PASS

Channel Bandwidth: 20 MHz

Channel Bandwidth: 20 MHz							
Voltage							
Modulation	Channel	Voltage [Vdc]	Temperature (℃)	Deviation (Hz)	Deviation (ppm)	Limit (ppm)	Verdict
QPSK	LCH	VL	TN	0.37	0.000147	± 2.5	PASS
		VN	TN	1.88	0.000749	± 2.5	PASS
		VH	TN	-1.98	-0.000789	± 2.5	PASS
	MCH	VL	TN	3.67	0.001448	± 2.5	PASS
		VN	TN	-0.31	-0.000122	± 2.5	PASS
		VH	TN	3.74	0.001475	± 2.5	PASS
	HCH	VL	TN	-0.69	-0.000270	± 2.5	PASS
		VN	TN	-1.73	-0.000676	± 2.5	PASS
		VH	TN	3.6	0.001406	± 2.5	PASS
16QAM	LCH	VL	TN	1.18	0.000470	± 2.5	PASS
		VN	TN	2.51	0.001000	± 2.5	PASS
		VH	TN	-1.99	-0.000793	± 2.5	PASS
	MCH	VL	TN	4.57	0.001803	± 2.5	PASS
		VN	TN	0.13	0.000051	± 2.5	PASS
		VH	TN	4.18	0.001649	± 2.5	PASS
	HCH	VL	TN	0.37	0.000145	± 2.5	PASS
		VN	TN	-1.95	-0.000762	± 2.5	PASS
		VH	TN	1.51	0.000590	± 2.5	PASS
Temperature							
Modulation	Channel	Voltage [Vdc]	Temperature (℃)	Deviation (Hz)	Deviation (ppm)	Limit (ppm)	Verdict
QPSK	LCH	VN	-30	1.28	0.000510	± 2.5	PASS
		VN	-20	1.64	0.000653	± 2.5	PASS
		VN	-10	2.6	0.001036	± 2.5	PASS
		VN	0	-1.51	-0.000602	± 2.5	PASS
		VN	10	-0.94	-0.000375	± 2.5	PASS
		VN	20	3.83	0.001526	± 2.5	PASS
		VN	30	2.43	0.000968	± 2.5	PASS
		VN	40	0.33	0.000131	± 2.5	PASS
		VN	50	0.18	0.000072	± 2.5	PASS
	MCH	VN	-30	0.74	0.000292	± 2.5	PASS
		VN	-20	0.81	0.000320	± 2.5	PASS
		VN	-10	-0.61	-0.000241	± 2.5	PASS
		VN	0	1.54	0.000607	± 2.5	PASS
		VN	10	2.83	0.001116	± 2.5	PASS

		VN	20	0.77	0.000304	± 2.5	PASS
		VN	30	0.99	0.000391	± 2.5	PASS
		VN	40	1.73	0.000682	± 2.5	PASS
		VN	50	0.55	0.000217	± 2.5	PASS
	HCH	VN	-30	0.22	0.000086	± 2.5	PASS
		VN	-20	2	0.000781	± 2.5	PASS
		VN	-10	3.42	0.001336	± 2.5	PASS
		VN	0	1.36	0.000531	± 2.5	PASS
		VN	10	4.13	0.001613	± 2.5	PASS
		VN	20	0.54	0.000211	± 2.5	PASS
		VN	30	-1.18	-0.000461	± 2.5	PASS
		VN	40	0.46	0.000180	± 2.5	PASS
		VN	50	-1.27	-0.000496	± 2.5	PASS
16QAM	LCH	VN	-30	2.48	0.000988	± 2.5	PASS
		VN	-20	1.69	0.000673	± 2.5	PASS
		VN	-10	2.8	0.001116	± 2.5	PASS
		VN	0	-0.59	-0.000235	± 2.5	PASS
		VN	10	2.57	0.001024	± 2.5	PASS
		VN	20	3.95	0.001574	± 2.5	PASS
		VN	30	1.08	0.000430	± 2.5	PASS
		VN	40	4.28	0.001705	± 2.5	PASS
		VN	50	1.15	0.000458	± 2.5	PASS
	MCH	VN	-30	-0.07	-0.000028	± 2.5	PASS
		VN	-20	0.68	0.000268	± 2.5	PASS
		VN	-10	-0.74	-0.000292	± 2.5	PASS
		VN	0	-0.56	-0.000221	± 2.5	PASS
		VN	10	-1.02	-0.000402	± 2.5	PASS
		VN	20	2.45	0.000966	± 2.5	PASS
		VN	30	4.65	0.001834	± 2.5	PASS
		VN	40	2.09	0.000824	± 2.5	PASS
		VN	50	0.01	0.000004	± 2.5	PASS
	HCH	VN	-30	-0.68	-0.000266	± 2.5	PASS
		VN	-20	1.22	0.000477	± 2.5	PASS
		VN	-10	-0.09	-0.000035	± 2.5	PASS
		VN	0	4.62	0.001805	± 2.5	PASS
		VN	10	0.21	0.000082	± 2.5	PASS
		VN	20	3.74	0.001461	± 2.5	PASS
		VN	30	2.08	0.000813	± 2.5	PASS
		VN	40	-0.79	-0.000309	± 2.5	PASS
		VN	50	-1.2	-0.000469	± 2.5	PASS