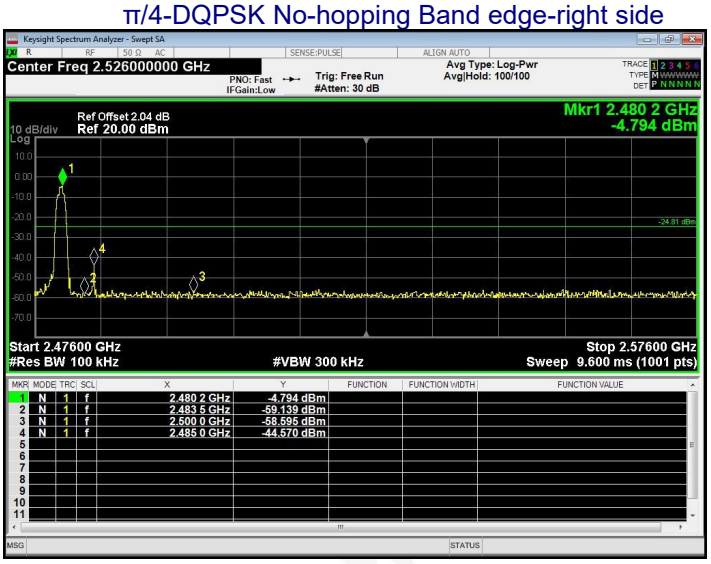
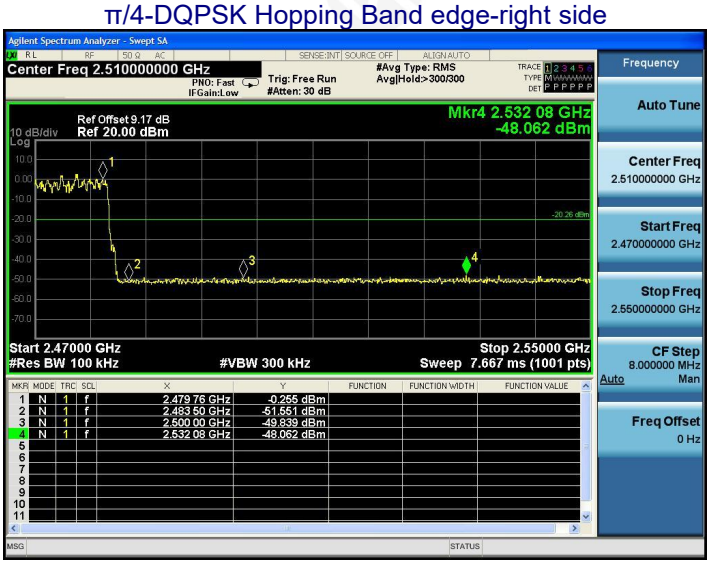
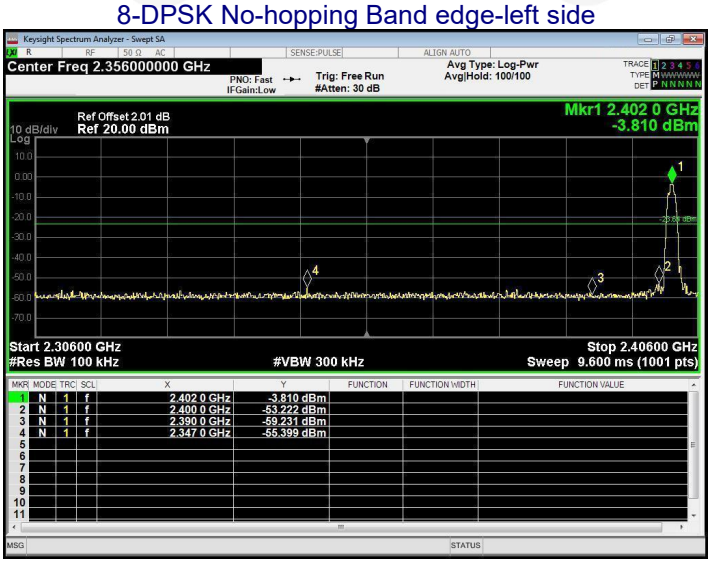
π/4-DQPSK No-hopping Band edge-right side



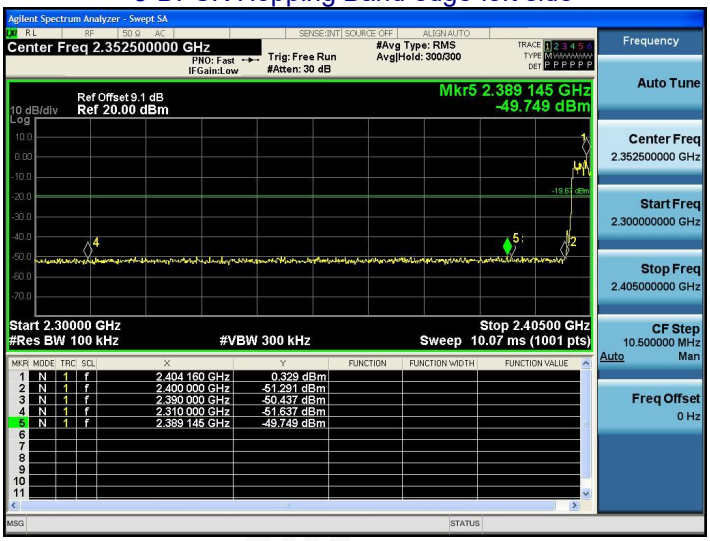
π/4-DQPSK Hopping Band edge-right side



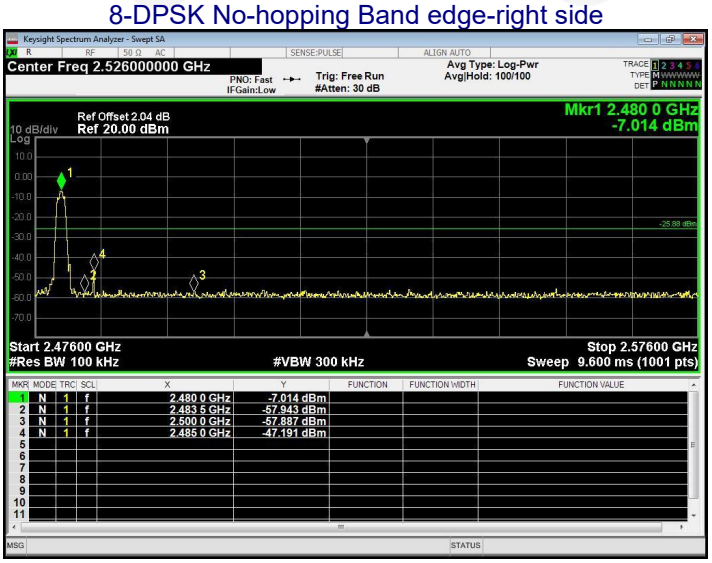
8-DPSK No-hopping Band edge-left side



8-DPSK Hopping Band edge-left side



8-DPSK No-hopping Band edge-right side



8-DPSK Hopping Band edge-right side

7. 20DB BANDWIDTH

Test Requirement:	FCC Part15 C Section 15.247 (a)(1)
Test Method:	ANSI C63.10:2013

7.1 Test Setup

7.2 Limit

N/A

7.3 Test procedure

1. Set RBW = 30 kHz.

2. Set the video bandwidth (VBW) ≥ 3 x RBW.

3. Detector = Peak.

4. Trace mode = max hold.

5. Sweep = auto couple.

6. Allow the trace to stabilize.

7. Measure the maximum width of the emission that is constrained by the frequencies associated with the two outermost amplitude points (upper and lower frequencies) that are attenuated by 6 dB relative to the maximum level measured in the fundamental emission.

7.4 DEVIATION FROM STANDARD

No deviation.

7.5 Test Result

Mode	Test channel	20dB Emission Bandwidth (MHz)	Result
GFSK	Lowest	0.873	Pass
	Middle	0.859	
	Highest	0.873	
π/4-DQPSK	Lowest	1.418	Pass
	Middle	1.431	
	Highest	1.407	
8-DPSK	Lowest	1.442	Pass
	Middle	1.429	
	Highest	1.440	

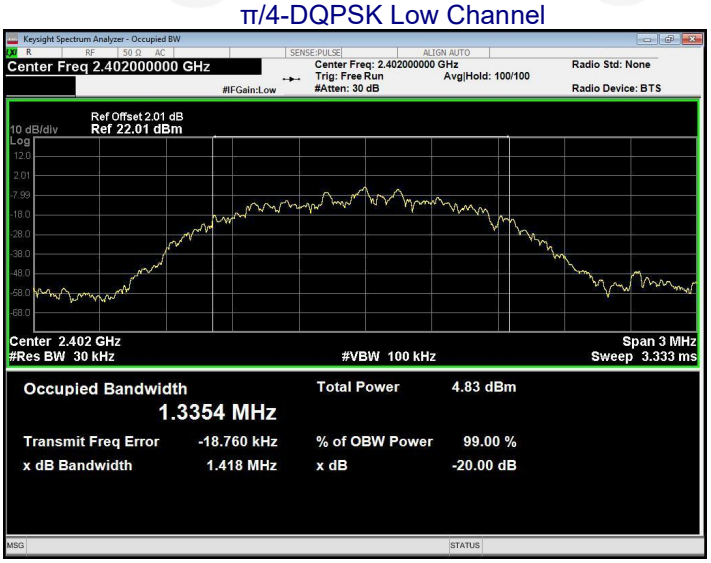
Test plots

GFSK Low Channel

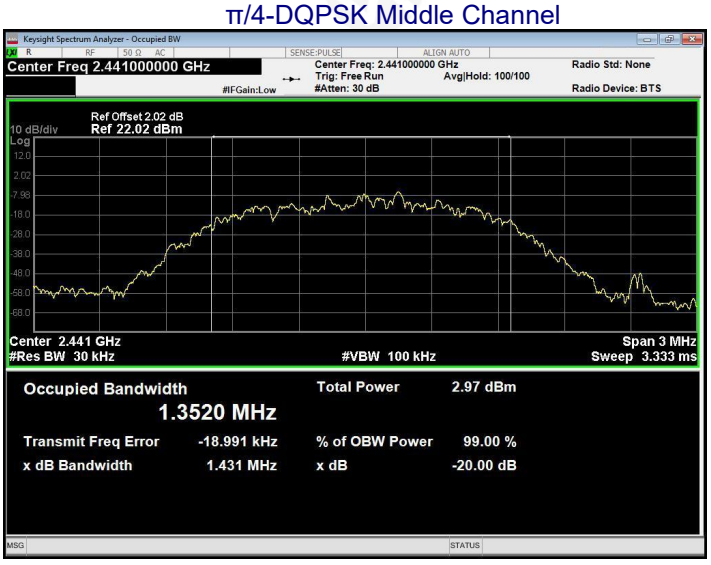
GFSK Middle Channel

GFSK High Channel

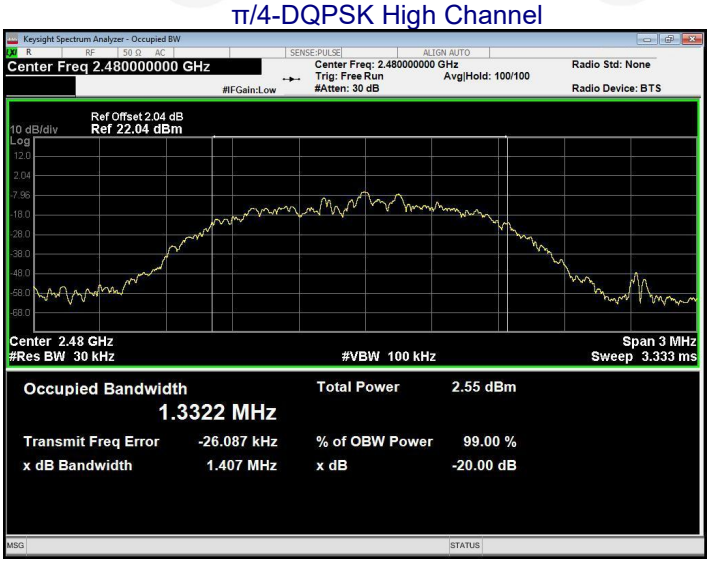
π/4-DQPSK Low Channel



π/4-DQPSK Middle Channel

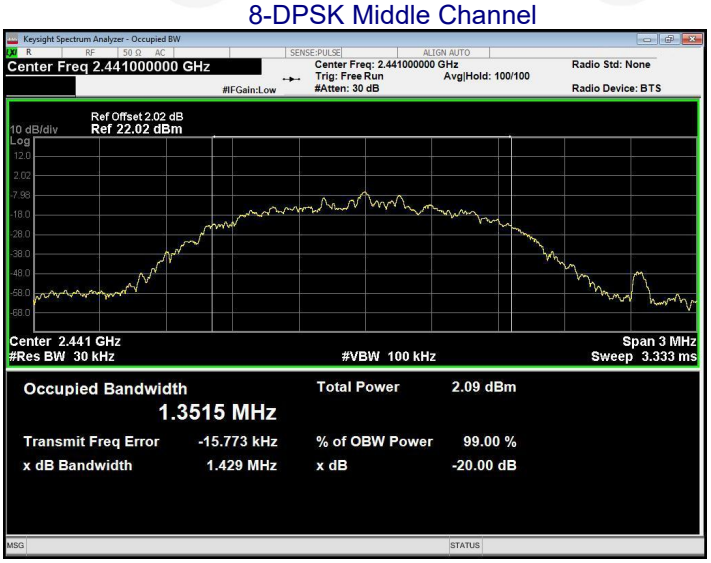


π/4-DQPSK High Channel



8-DPSK Low Channel

8-DPSK Middle Channel



8-DPSK High Channel

8. Maximum Peak Output Power

Test Requirement:	FCC Part15 C Section 15.247 (b)(1)
Test Method:	ANSI C63.10:2013
Limit:	30dBm(for GFSK), 20.97dBm(for EDR)

8.1 Block Diagram Of Test Setup

8.2 Limit

For frequency hopping systems operating in the 2400-2483.5 MHz band employing at least 75 non-overlapping hopping channels, and all frequency hopping systems in the 5725-5850 MHz band: 1 watt. For all other frequency hopping systems in the 2400-2483.5 MHz band: 0.125 watts.

8.3 Test procedure

1. Remove the antenna from the EUT and then connect a low RF cable from the antenna port to the spectrum.

2. Set the spectrum analyzer: RBW = 2MHz. VBW = 6MHz. Sweep = auto; Detector Function = Peak.

3. Keep the EUT in transmitting at lowest, medium and highest channel individually. Record the max value.

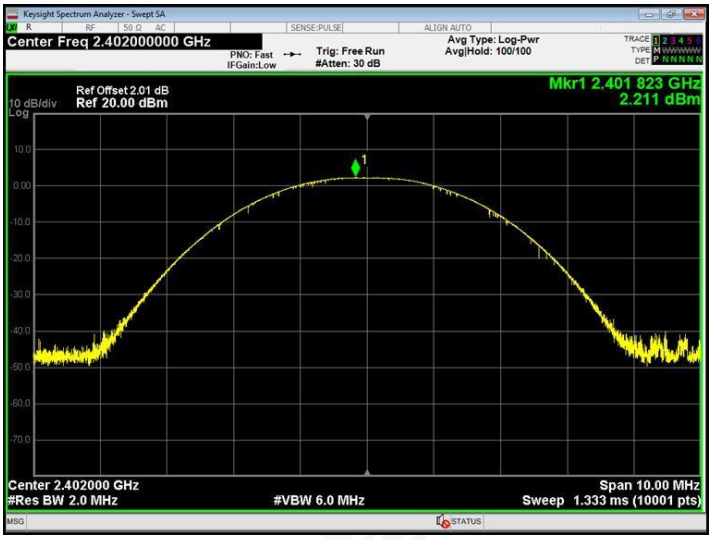
8.4 DEVIATION FROM STANDARD

No deviation.

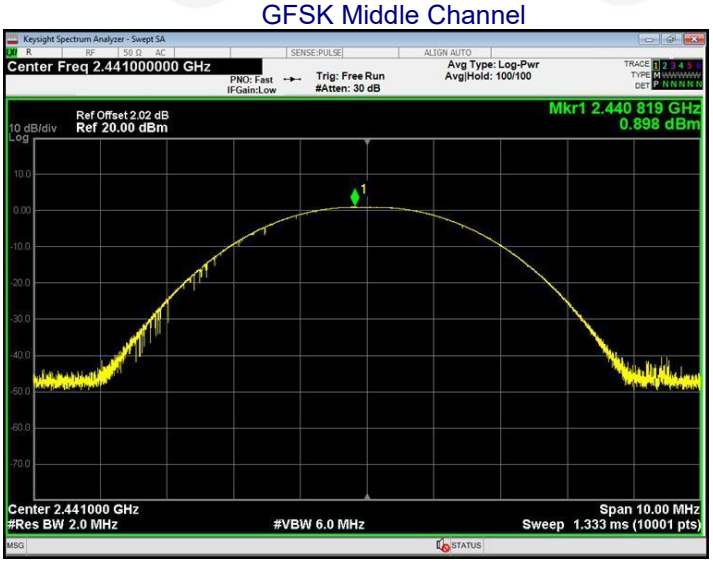
8.5 Test Result

Mode	Test channel	Peak Output Power (dBm)	Limit (dBm)	Result
GFSK	Lowest	2.211	30.00	Pass
	Middle	0.898		
	Highest	-0.34		
π/4-DQPSK	Lowest	-0.493	20.97	Pass
	Middle	-1.896		
	Highest	-2.958		
8-DPSK	Lowest	-1.513	20.97	Pass
	Middle	-2.888		
	Highest	-3.995		

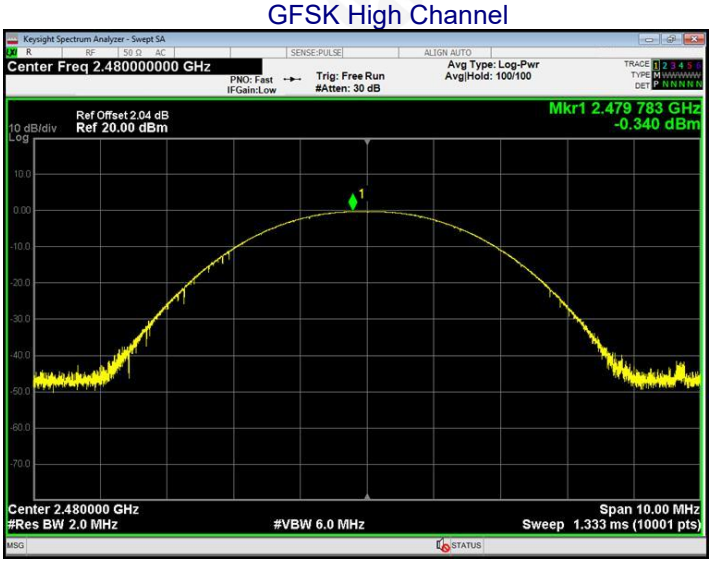
Test plots
GFSK Low Channel



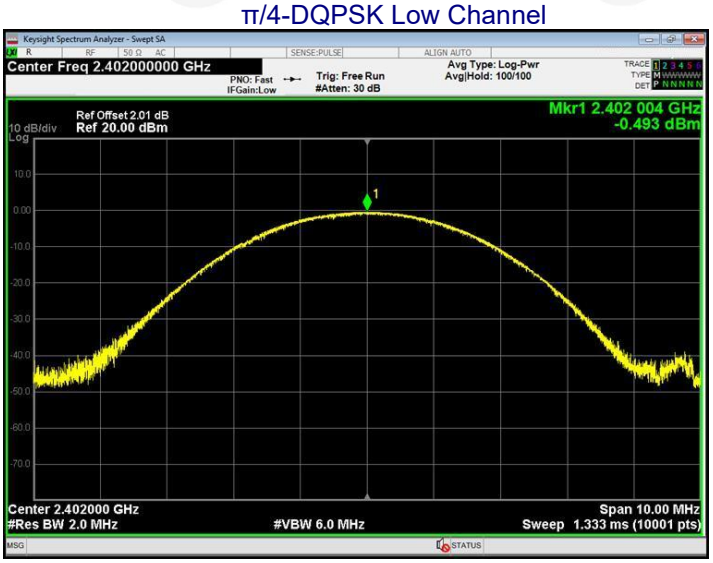
GFSK Middle Channel



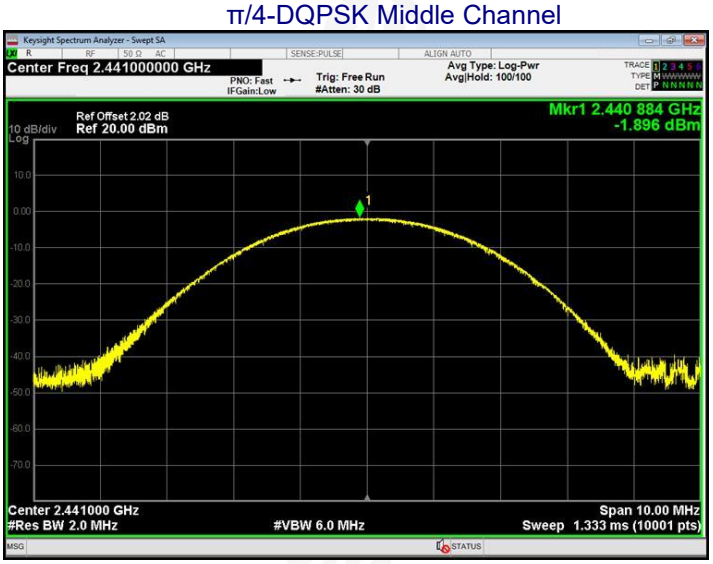
GFSK High Channel



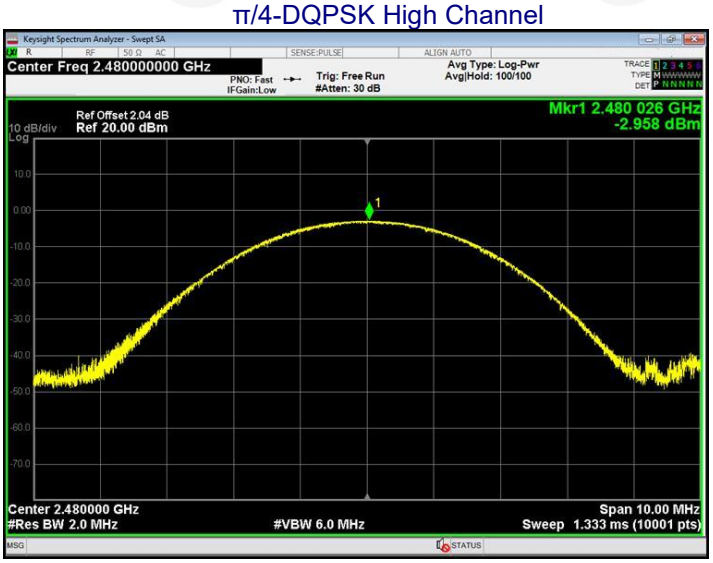
π/4-DQPSK Low Channel



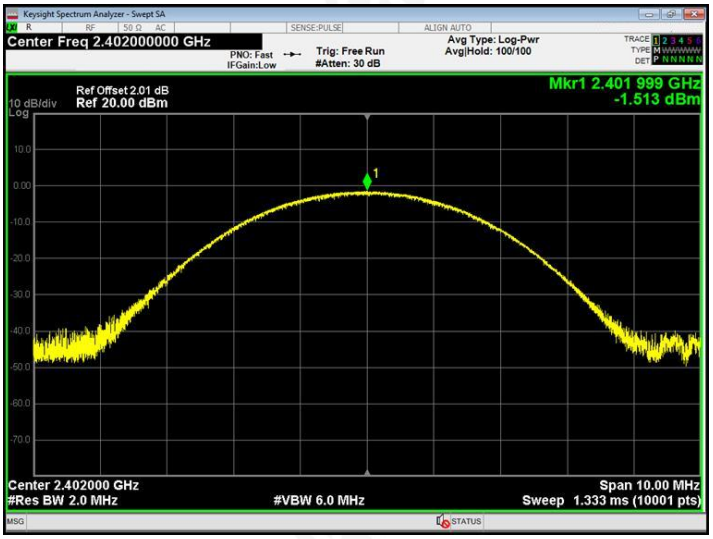
π/4-DQPSK Middle Channel



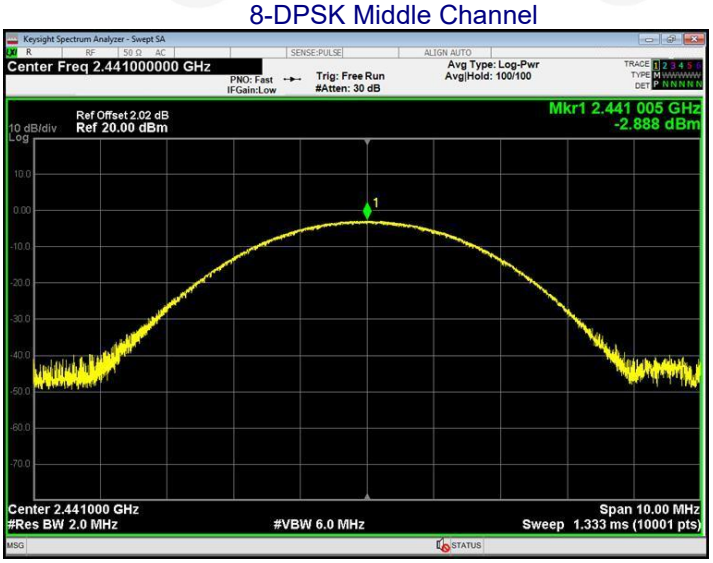
π/4-DQPSK High Channel



8-DPSK Low Channel



8-DPSK Middle Channel



8-DPSK High Channel