

**FCC §15.249(a), RSS-210 Radiated Field Strength**

Frequency (MHz)	Mode	Modulation	Bit Rate (Mbps)	Detector	Antenna Polarization	Measured Field Strength [FS <sub>Meas</sub> ] (dBuV @ 3m)	Cable Loss [L <sub>c</sub> ] (dBm)	Receive Antenna [ACF] (dB)	Corrected Field Strength [FS <sub>Corr</sub> ] (dBuV @3m)	Limit (dBuV)	Margin (dB)		
2402.0	BT BR	GFSK	-	RMS	Horizontal	55.97	4.6	28.28	<b>88.85</b>	94.0	<b>5.2</b>		
2441.0						55.20	4.7	28.22	88.12		<b>5.9</b>		
2480.0						55.01	4.8	28.17	87.98		<b>6.0</b>		
2402.0					Vertical	42.20	4.6	28.28	75.08		<b>18.9</b>		
2441.0						44.55	4.7	28.22	77.47		<b>16.5</b>		
2480.0						42.03	4.8	28.17	75.00		<b>19.0</b>		
2402.0				Peak	Horizontal	56.21	4.6	28.28	<b>89.09</b>	114.0	<b>24.9</b>		
2441.0						55.65	4.7	28.22	88.57		<b>25.4</b>		
2480.0						55.51	4.8	28.17	88.48		<b>25.5</b>		
2402.0					Vertical	43.66	4.6	28.28	76.54		<b>37.5</b>		
2441.0						46.20	4.7	28.22	79.12		<b>34.9</b>		
2480.0						43.94	4.8	28.17	76.91		<b>37.1</b>		
<b>Result:</b>									<b>Complies</b>				

$$FS_{Corr} = FS_{Meas} + ACF + L_C$$

$$Margin = Limit - FS_{Corr}$$

# Field Strength (Average)

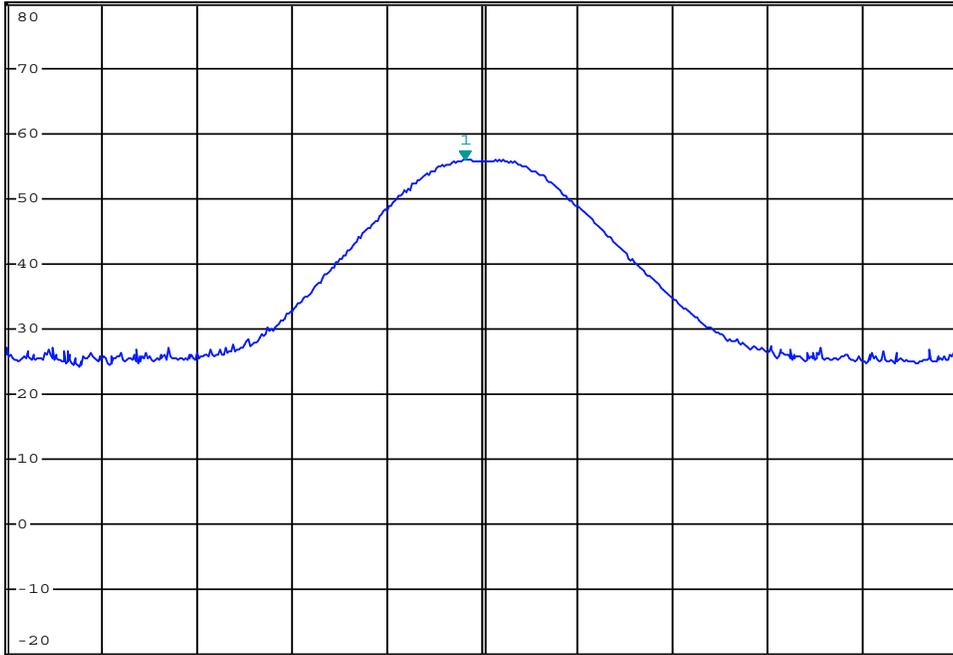


\*RBW 1 MHz      Marker 1 [T1 ]  
VBW 10 MHz      55.97 dBμV  
SWT 2.5 ms      2.401820000 GHz

Ref 80 dBμV

\*Att 10 dB

1 RM\*  
VIEW



Center 2.402 GHz

1 MHz/

Span 10 MHz

Date: 3.JUN.2021 14:23:27

Channel Frequency (MHz): <b>2402</b>	Antenna Polarization: <b>H</b>	Channel Power (dBuV): <b>55.97</b>
Modulation: <b>GFSK</b>	Bit Rate (Mbps): <b>-</b>	

# Field Strength (Average)

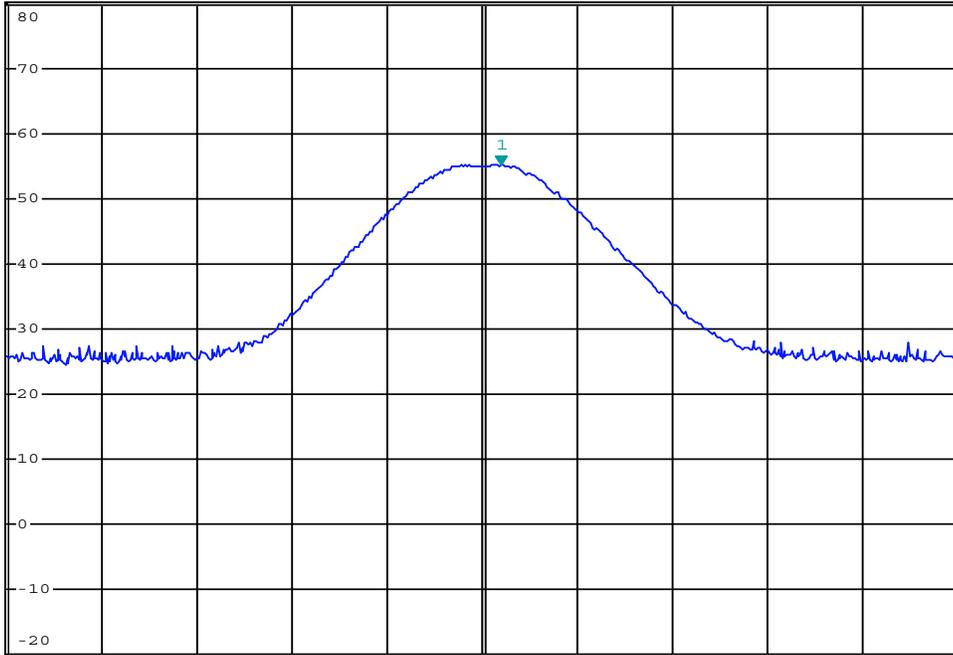


\*RBW 1 MHz      Marker 1 [T1 ]  
VBW 10 MHz      55.20 dBμV  
SWT 2.5 ms      2.441200000 GHz

Ref 80 dBμV

\*Att 10 dB

1 RM\*  
VIEW



Center 2.441 GHz      1 MHz/      Span 10 MHz

Date: 3.JUN.2021 14:35:27

Channel Frequency (MHz): <b>2441</b>	Antenna Polarization: <b>H</b>	Channel Power (dBuV): <b>55.20</b>
Modulation: <b>GFSK</b>	Bit Rate (Mbps): <b>-</b>	

# Field Strength (Average)

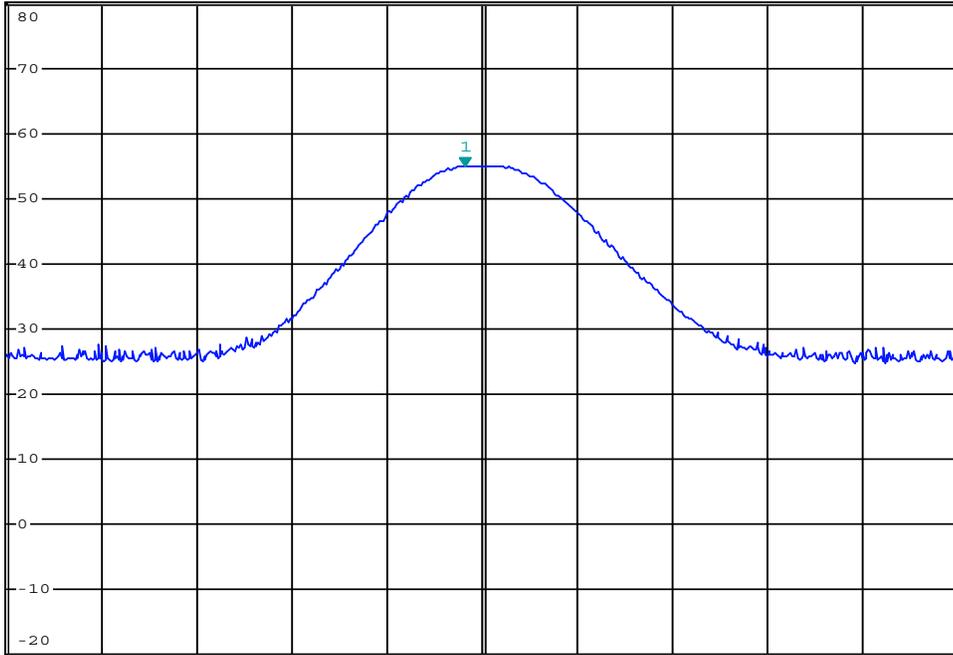


\*RBW 1 MHz    Marker 1 [T1 ]  
VBW 10 MHz    55.01 dBμV  
SWT 2.5 ms    2.479820000 GHz

Ref 80 dBμV

\*Att 10 dB

1 RM\*  
VIEW



A

3DB

Center 2.48 GHz

1 MHz/

Span 10 MHz

Date: 3.JUN.2021 14:32:51

Channel Frequency (MHz): **2480**

Antenna Polarization: **H**

Channel Power (dBuV): **55.01**

Modulation: **GFSK**

Bit Rate (Mbps): **-**

# Field Strength (Average)

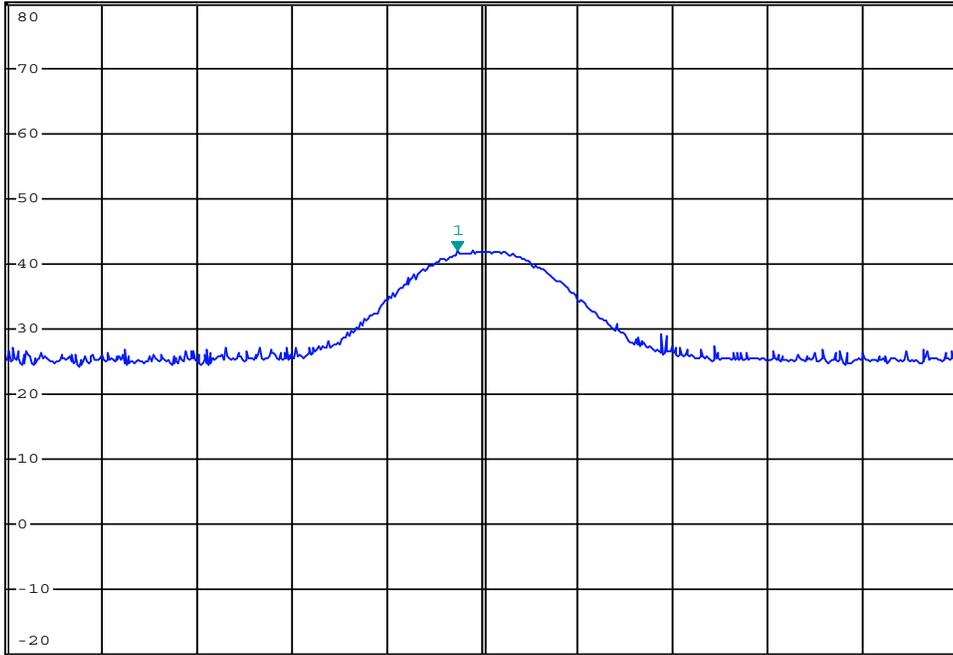


\*RBW 1 MHz      Marker 1 [T1 ]  
VBW 10 MHz      42.20 dBμV  
SWT 2.5 ms      2.401740000 GHz

Ref 80 dBμV

\*Att 10 dB

1 RM\*  
VIEW



Center 2.402 GHz      1 MHz/      Span 10 MHz

Date: 3.JUN.2021 14:26:18

Channel Frequency (MHz): **2402**

Antenna Polarization: **V**

Channel Power (dBuV): **42.20**

Modulation: **GFSK**

Bit Rate (Mbps): **-**

# Field Strength (Average)

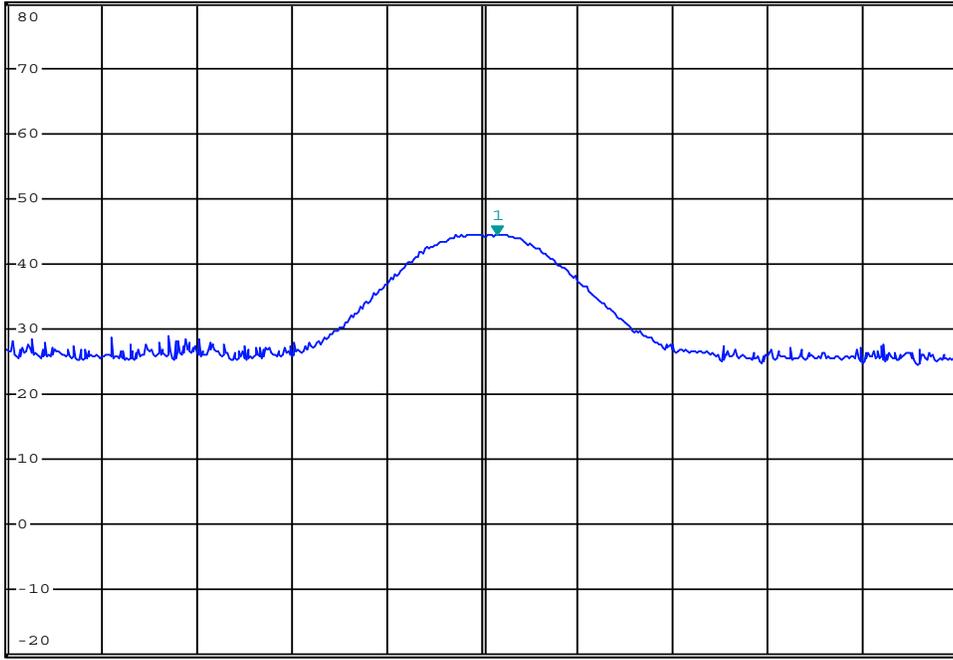


\*RBW 1 MHz      Marker 1 [T1 ]  
VBW 10 MHz      44.55 dBμV  
SWT 2.5 ms      2.441160000 GHz

Ref 80 dBμV

\*Att 10 dB

1 RM\*  
VIEW



Date: 3.JUN.2021 14:37:56

Channel Frequency (MHz): **2441**

Antenna Polarization: **V**

Channel Power (dBuV): **44.55**

Modulation: **GFSK**

Bit Rate (Mbps): **-**

# Field Strength (Average)

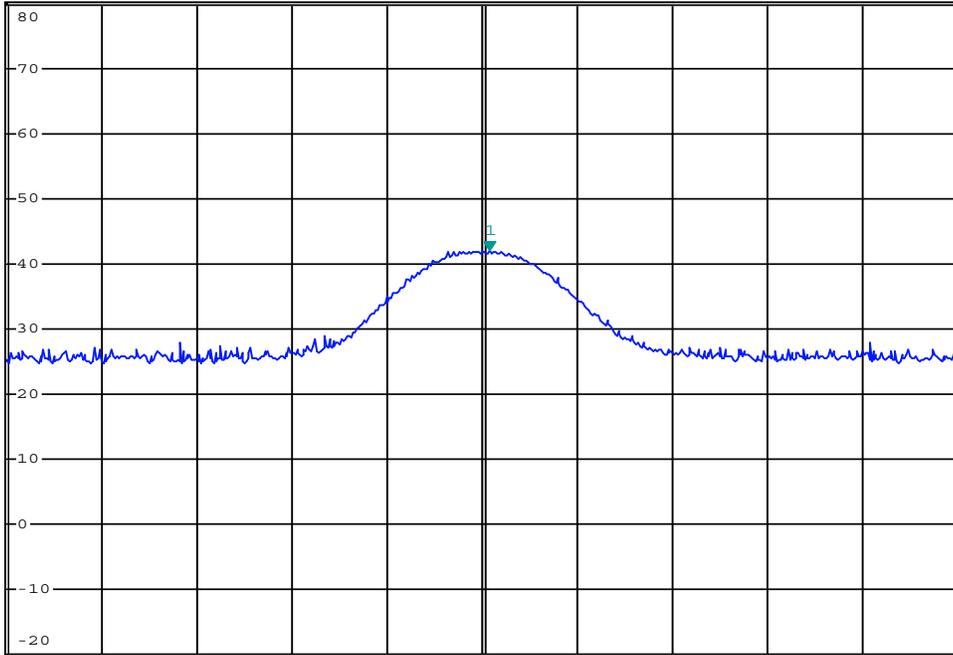


\*RBW 1 MHz      Marker 1 [T1 ]  
VBW 10 MHz      42.03 dBμV  
SWT 2.5 ms      2.480080000 GHz

Ref 80 dBμV

\*Att 10 dB

1 RM\*  
VIEW



Center 2.48 GHz      1 MHz/      Span 10 MHz

Date: 3.JUN.2021 14:28:39

Channel Frequency (MHz): **2480**

Antenna Polarization: **V**

Channel Power (dBμV): **42.03**

Modulation: **GFSK**

Bit Rate (Mbps): **-**

# Field Strength (Peak)

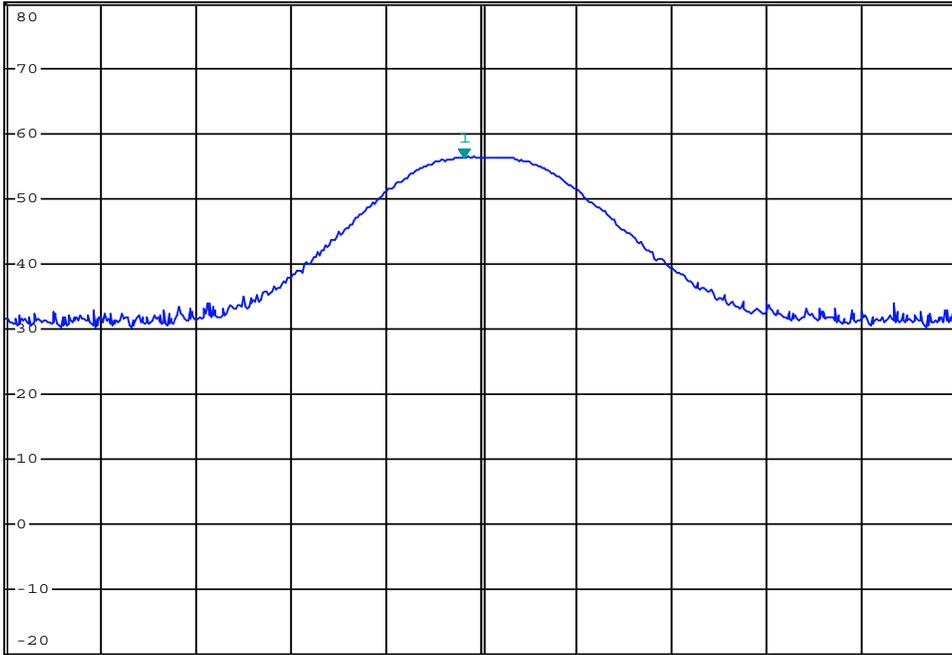


\*RBW 1 MHz    Marker 1 [T1 ]  
VBW 3 MHz    56.21 dBμV  
SWT 2.5 ms    2.401820000 GHz

Ref 80 dBμV

\*Att 10 dB

1 PK  
VIEW



Center 2.402 GHz    1 MHz/    Span 10 MHz

Date: 3.JUN.2021 14:24:04

Channel Frequency (MHz): **2402**

Antenna Polarization: **H**

Channel Power (dBμV): **56.21**

Modulation: **GFSK**

Bit Rate (Mbps): **-**

# Field Strength (Peak)

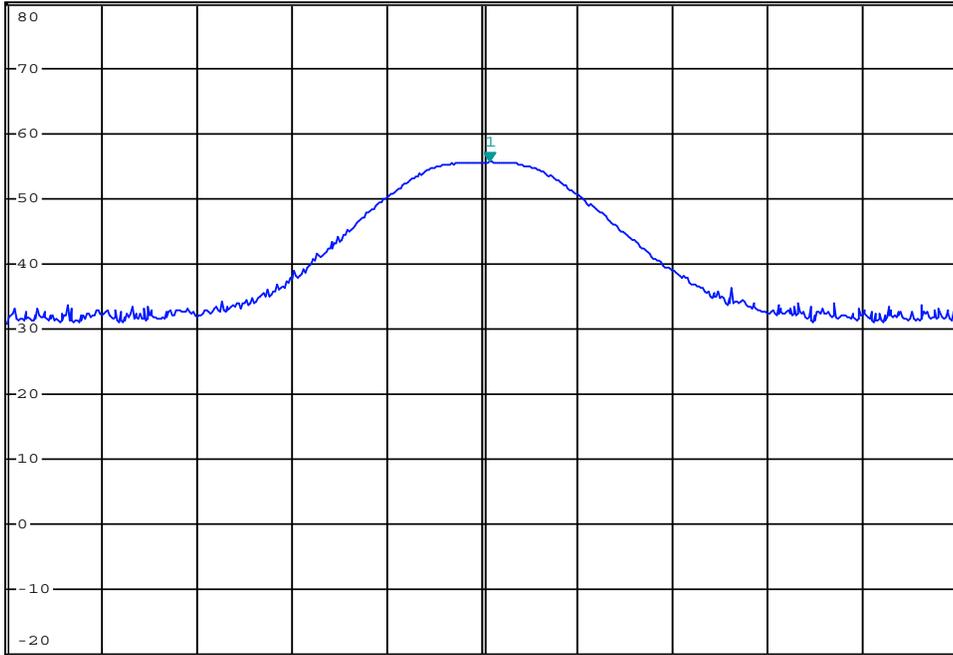


\*RBW 1 MHz      Marker 1 [T1 ]  
VBW 3 MHz      55.65 dBuV  
SWT 2.5 ms      2.441080000 GHz

Ref 80 dBuV

\*Att 10 dB

1 PK  
VIEW



A

3DB

Date: 3.JUN.2021 14:35:53

Channel Frequency (MHz): **2441**

Antenna Polarization: **H**

Channel Power (dBuV): **55.65**

Modulation: **GFSK**

Bit Rate (Mbps): **-**

# Field Strength (Peak)

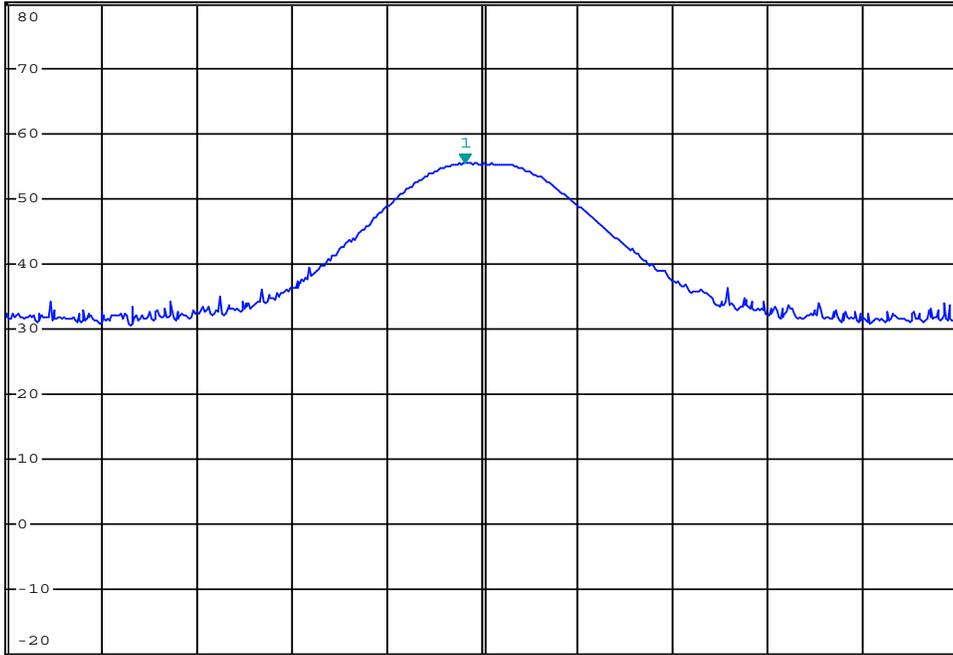


\*RBW 1 MHz    Marker 1 [T1 ]  
VBW 3 MHz    55.51 dBμV  
SWT 2.5 ms    2.479820000 GHz

Ref 80 dBμV

\*Att 10 dB

1 PK  
VIEW



Center 2.48 GHz    1 MHz/    Span 10 MHz

Date: 3.JUN.2021 14:32:23

Channel Frequency (MHz): **2480**

Antenna Polarization: **H**

Channel Power (dBμV): **55.51**

Modulation: **GFSK**

Bit Rate (Mbps): **-**

# Field Strength (Peak)

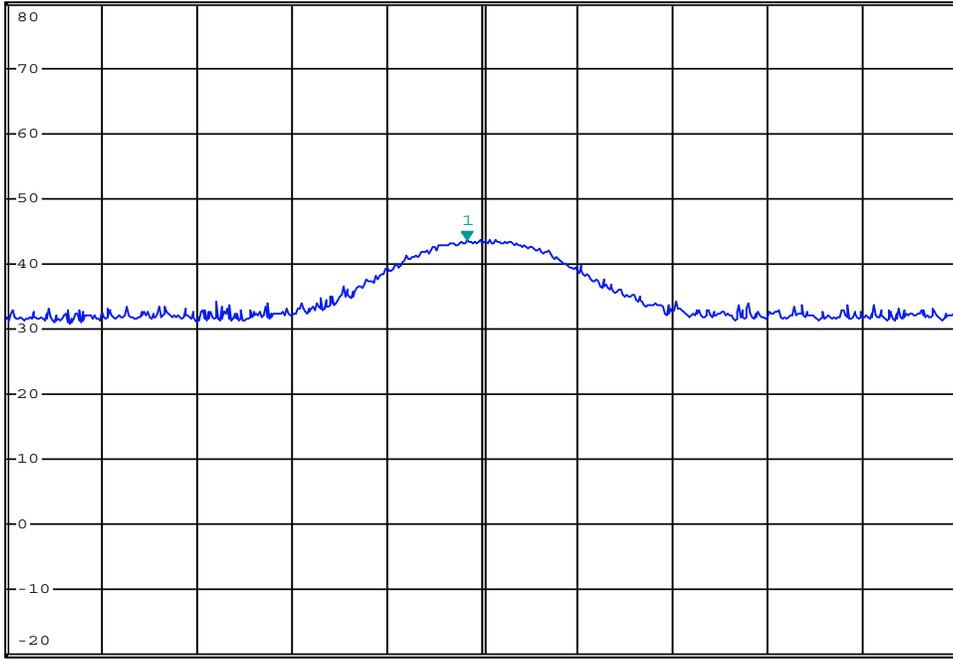


\*RBW 1 MHz    Marker 1 [T1 ]  
VBW 3 MHz    43.66 dBμV  
SWT 2.5 ms    2.401840000 GHz

Ref 80 dBμV

\*Att 10 dB

1 PK  
VIEW



Date: 3.JUN.2021 14:25:47

Channel Frequency (MHz): **2402**

Antenna Polarization: **V**

Channel Power (dBμV): **43.66**

Modulation: **GFSK**

Bit Rate (Mbps): **-**

# Field Strength (Peak)

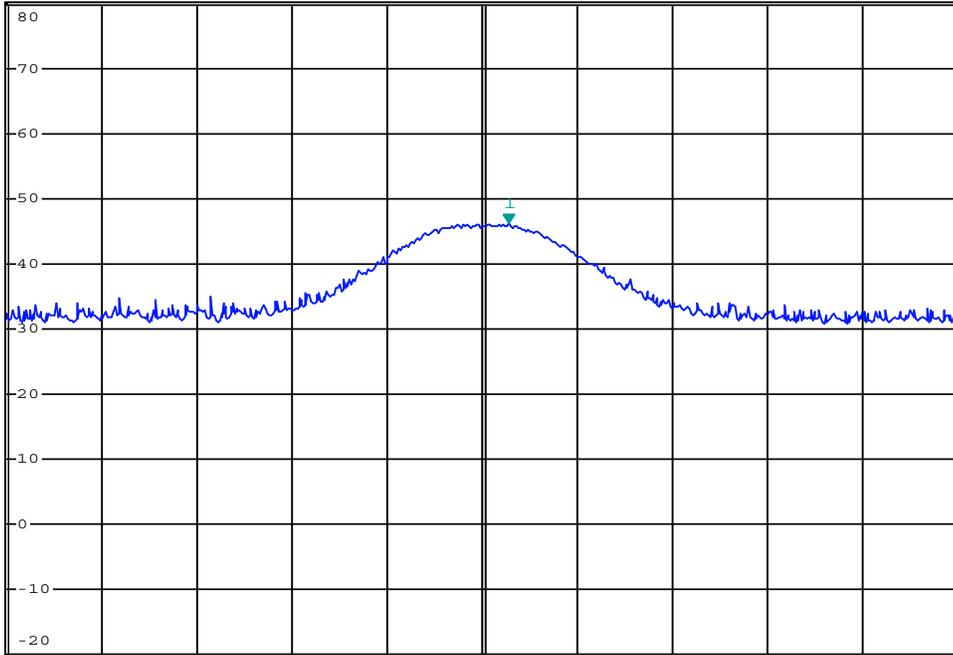


\*RBW 1 MHz      Marker 1 [T1 ]  
VBW 3 MHz      46.20 dBuV  
SWT 2.5 ms      2.441280000 GHz

Ref 80 dBuV

\*Att 10 dB

1 PK  
VIEW



Center 2.441 GHz      1 MHz/      Span 10 MHz

Date: 3.JUN.2021 14:37:23

Channel Frequency (MHz): **2441**

Antenna Polarization: **V**

Channel Power (dBuV): **46.20**

Modulation: **GFSK**

Bit Rate (Mbps): **-**

# Field Strength (Peak)

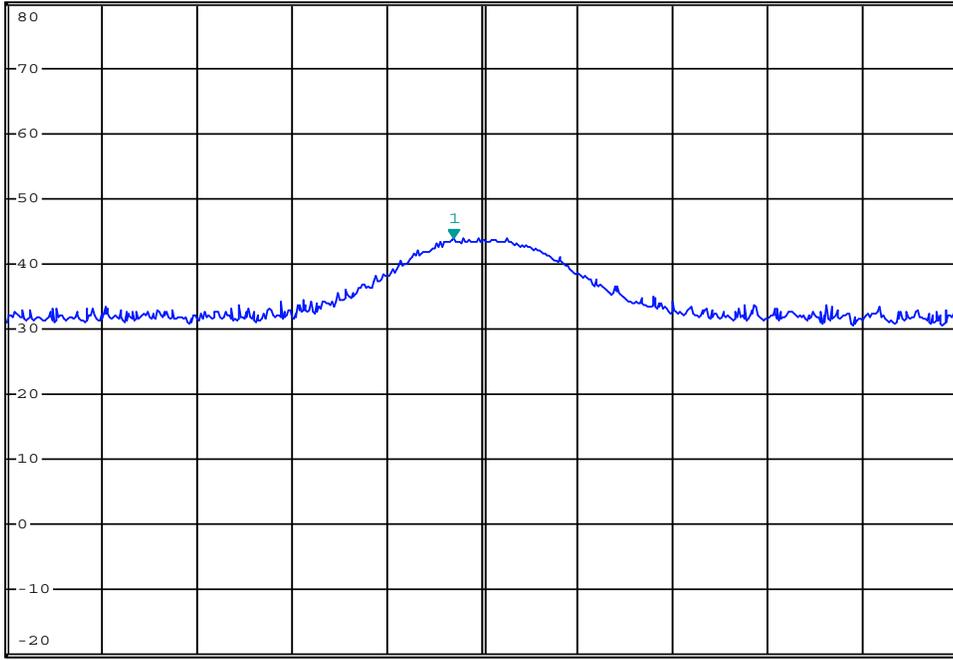


\*RBW 1 MHz    Marker 1 [T1 ]  
VBW 3 MHz    43.94 dBμV  
SWT 2.5 ms    2.479700000 GHz

Ref 80 dBμV

\*Att 10 dB

1 PK  
VIEW



Date: 3.JUN.2021 14:29:10

Channel Frequency (MHz): **2480**

Antenna Polarization: **V**

Channel Power (dBμV): **43.94**

Modulation: **GFSK**

Bit Rate (Mbps): **-**

**FCC §15.249(a), RSS-210 Radiated Field Strength**

Frequency (MHz)	Mode	Modulation	Bit Rate (Mbps)	Detector	Antenna Polarization	Measured Field Strength [FS <sub>Meas</sub> ] (dBuV @ 3m)	Cable Loss [L <sub>c</sub> ] (dBm)	Receive Antenna [ACF] (dB)	Corrected Field Strength [FS <sub>Corr</sub> ] (dBuV @3m)	Limit (dBuV)	Margin (dB)		
2402.0	BLE	GMSK	2	RMS	Horizontal	56.24	4.6	28.28	89.12	94.0	4.9		
2441.0						56.02	4.6	28.28	88.90		5.1		
2480.0						55.20	4.6	28.28	88.08		5.9		
2402.0					Vertical	40.61	4.6	28.28	73.49		20.5		
2441.0						41.50	4.6	28.28	74.38		19.6		
2480.0						42.55	4.6	28.28	75.43		18.6		
2402.0				Peak	Horizontal	56.71	4.6	28.28	89.59	114.0	24.4		
2441.0						56.47	4.6	28.28	89.35		24.7		
2480.0						55.71	4.6	28.28	88.59		25.4		
2402.0					Vertical	42.75	4.6	28.28	75.63		38.4		
2441.0						43.24	4.6	28.28	76.12		37.9		
2480.0						44.19	4.6	28.28	77.07		36.9		
<b>Result:</b>									<b>Complies</b>				

$$FS_{Corr} = FS_{Meas} + ACF + L_C$$

$$Margin = Limit - FS_{Corr}$$

# Field Strength (Average)

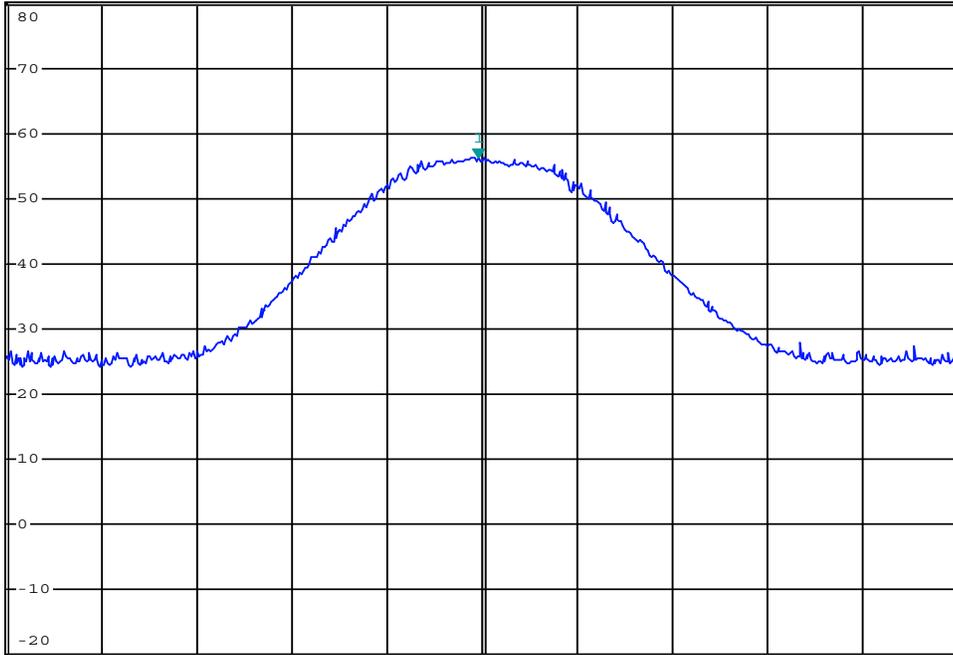


\*RBW 1 MHz      Marker 1 [T1 ]  
VBW 10 MHz      56.24 dBuV  
SWT 2.5 ms      2.401960000 GHz

Ref 80 dBuV

\*Att 10 dB

1 RM\*  
VIEW



Center 2.402 GHz

1 MHz/

Span 10 MHz

Date: 3.JUN.2021 14:47:02

Channel Frequency (MHz): **2402**

Antenna Polarization: **H**

Channel Power (dBuV): **56.24**

Modulation: **GMSK**

Bit Rate (Mbps): **-**

# Field Strength (Average)

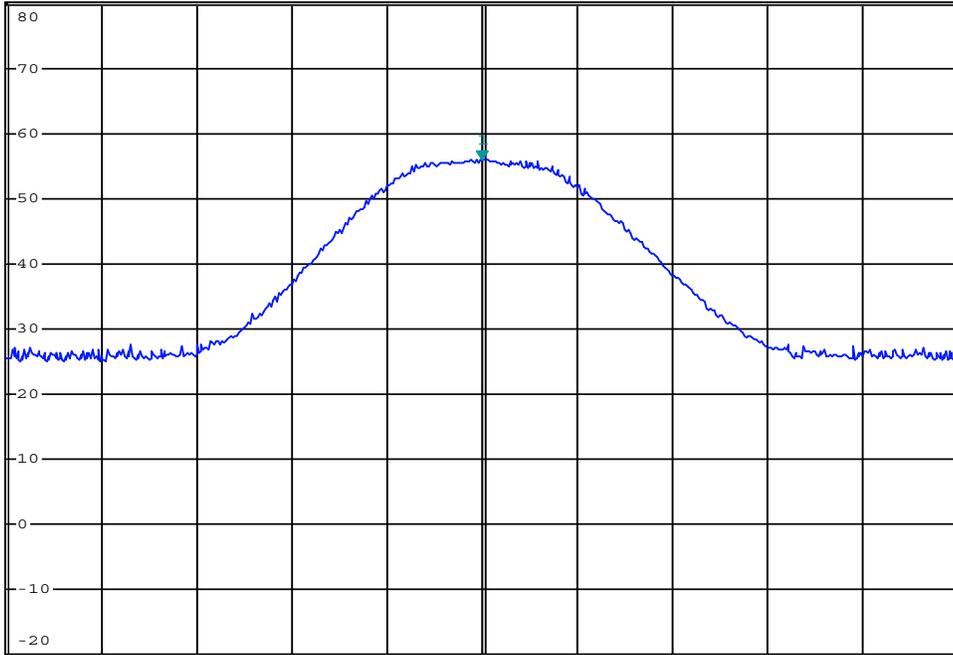


\*RBW 1 MHz      Marker 1 [T1 ]  
VBW 10 MHz      56.02 dBuV  
SWT 2.5 ms      2.440000000 GHz

Ref 80 dBuV

\*Att 10 dB

1 RM\*  
VIEW



Center 2.44 GHz      1 MHz/      Span 10 MHz

Date: 3.JUN.2021 14:44:45

Channel Frequency (MHz): <b>2441</b>	Antenna Polarization: <b>H</b>	Channel Power (dBuV): <b>56.02</b>
Modulation: <b>GMSK</b>	Bit Rate (Mbps): <b>-</b>	

# Field Strength (Average)

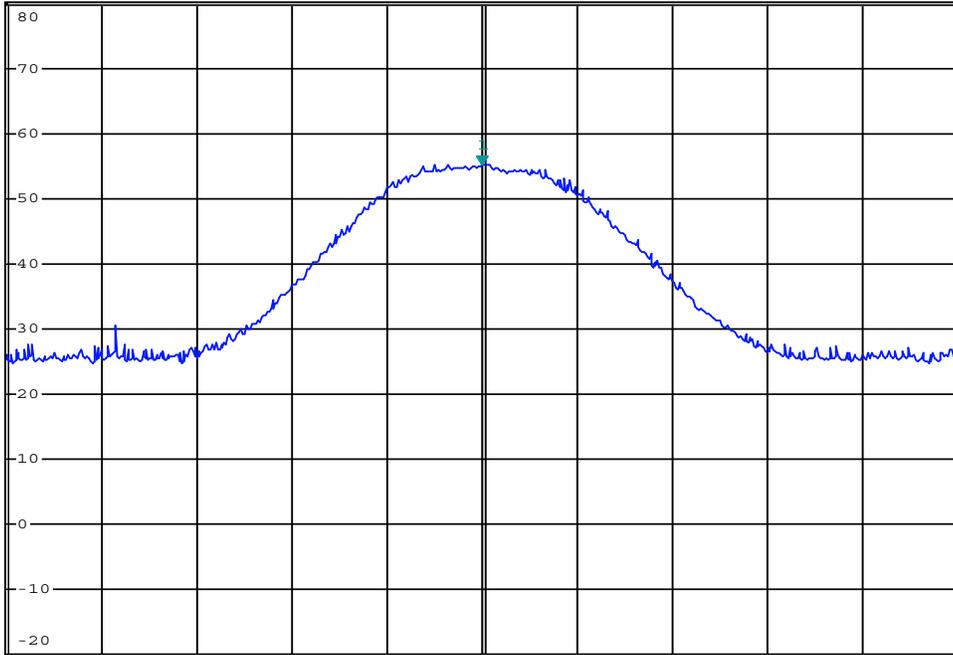


\*RBW 1 MHz      Marker 1 [T1 ]  
VBW 10 MHz      55.20 dBuV  
SWT 2.5 ms      2.48000000 GHz

Ref 80 dBuV

\*Att 10 dB

1 RM\*  
VIEW



Center 2.48 GHz      1 MHz/      Span 10 MHz

Date: 3.JUN.2021 14:53:18

Channel Frequency (MHz): **2480**

Antenna Polarization: **H**

Channel Power (dBuV): **55.20**

Modulation: **GMSK**

Bit Rate (Mbps): **-**

# Field Strength (Average)

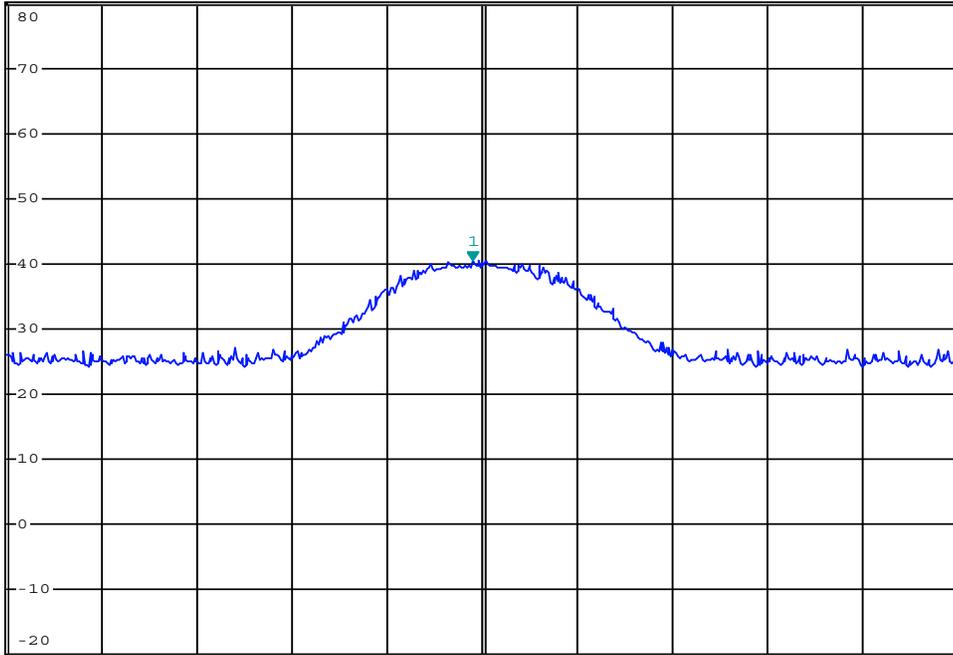


\*RBW 1 MHz      Marker 1 [T1 ]  
VBW 10 MHz      40.61 dBuV  
SWT 2.5 ms      2.401900000 GHz

Ref 80 dBuV

\*Att 10 dB

1 RM\*  
VIEW



Center 2.402 GHz      1 MHz/      Span 10 MHz

Date: 3.JUN.2021 14:49:20

Channel Frequency (MHz): **2402**

Antenna Polarization: **V**

Channel Power (dBuV): **40.61**

Modulation: **GMSK**

Bit Rate (Mbps): **-**

# Field Strength (Average)

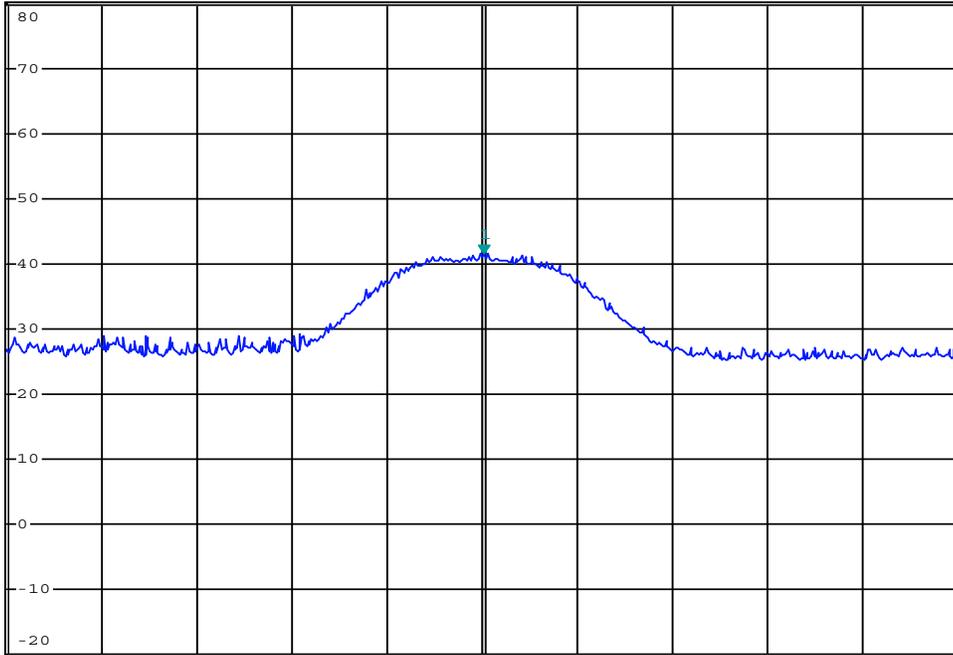


\*RBW 1 MHz    Marker 1 [T1 ]  
VBW 10 MHz    41.50 dBμV  
SWT 2.5 ms    2.440020000 GHz

Ref 80 dBμV

\*Att 10 dB

1 RM\*  
VIEW



Center 2.44 GHz    1 MHz/    Span 10 MHz

Date: 3.JUN.2021 14:42:13

Channel Frequency (MHz): <b>2441</b>	Antenna Polarization: <b>V</b>	Channel Power (dBuV): <b>41.50</b>
Modulation: <b>GMSK</b>	Bit Rate (Mbps): <b>-</b>	

# Field Strength (Average)

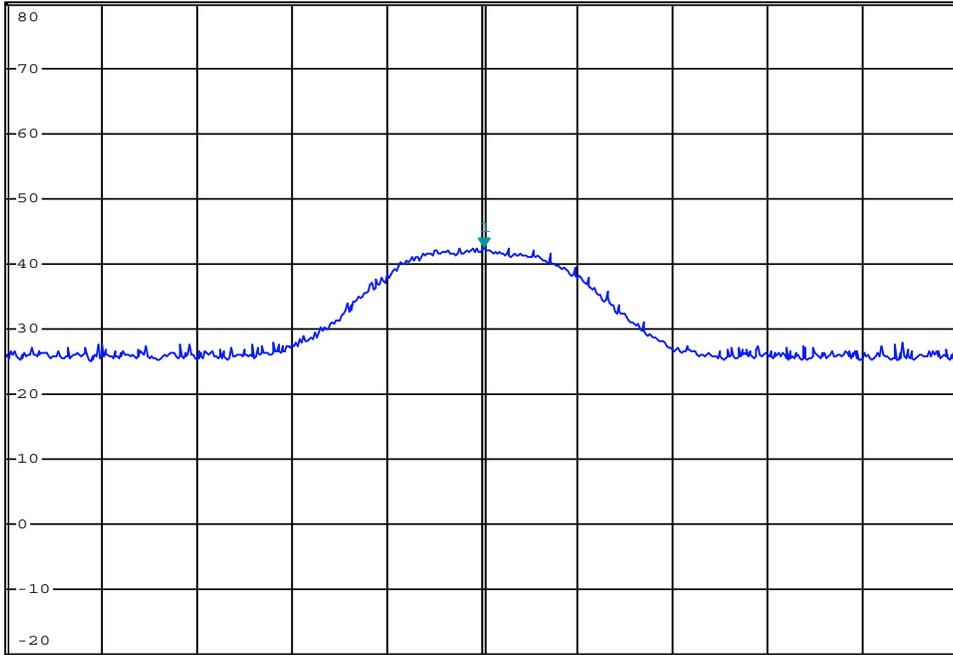


\*RBW 1 MHz      Marker 1 [T1 ]  
VBW 10 MHz      42.55 dBuV  
SWT 2.5 ms      2.480020000 GHz

Ref 80 dBuV

\*Att 10 dB

1 RM\*  
VIEW



Center 2.48 GHz

1 MHz/

Span 10 MHz

Date: 3.JUN.2021 14:50:58

Channel Frequency (MHz): **2480**

Antenna Polarization: **V**

Channel Power (dBuV): **42.55**

Modulation: **GMSK**

Bit Rate (Mbps): **-**

# Field Strength (Peak)

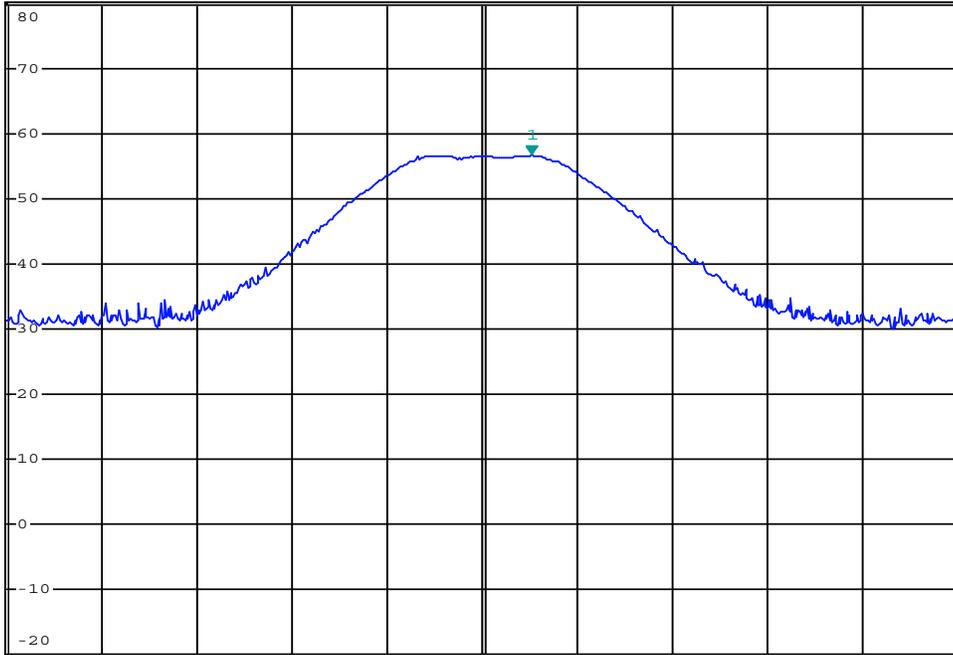


\*RBW 1 MHz    Marker 1 [T1 ]  
VBW 3 MHz    56.71 dBμV  
SWT 2.5 ms    2.402520000 GHz

Ref 80 dBμV

\*Att 10 dB

1 PK  
VIEW



Center 2.402 GHz    1 MHz/    Span 10 MHz

Date: 3.JUN.2021 14:47:29

Channel Frequency (MHz): <b>2402</b>	Antenna Polarization: <b>H</b>	Channel Power (dBμV): <b>56.71</b>
Modulation: <b>GMSK</b>	Bit Rate (Mbps): <b>-</b>	

# Field Strength (Peak)

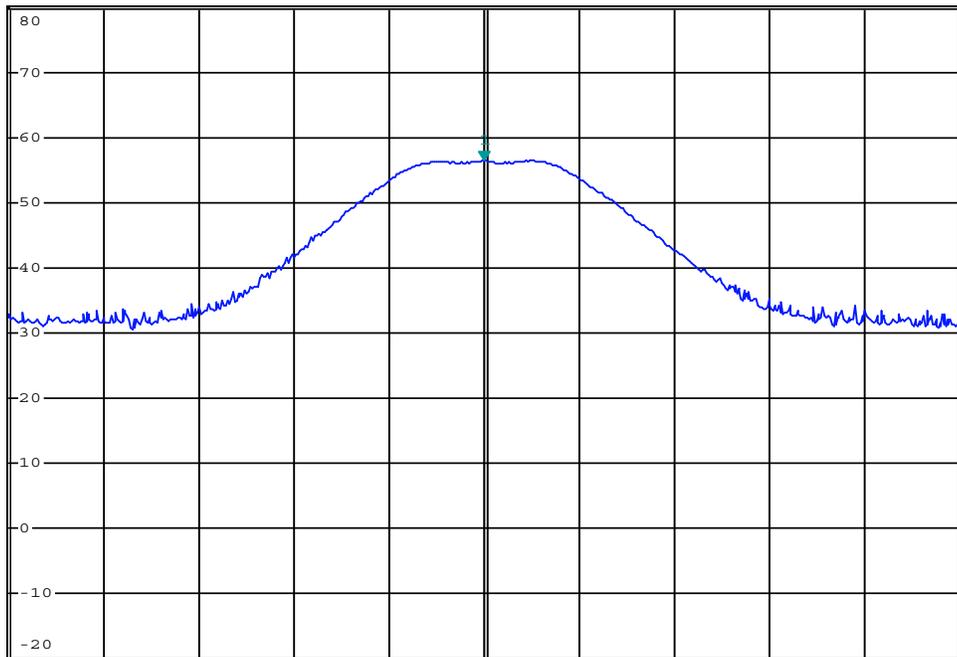


\*RBW 1 MHz      Marker 1 [T1 ]  
VBW 3 MHz      56.47 dBuV  
SWT 2.5 ms      2.440000000 GHz

Ref 80 dBuV

\*Att 10 dB

1 PK  
VIEW



Center 2.44 GHz

1 MHz/

Span 10 MHz

Date: 3.JUN.2021 14:44:11

Channel Frequency (MHz): **2441**

Antenna Polarization: **H**

Channel Power (dBuV): **56.47**

Modulation: **GMSK**

Bit Rate (Mbps): **-**

# Field Strength (Peak)

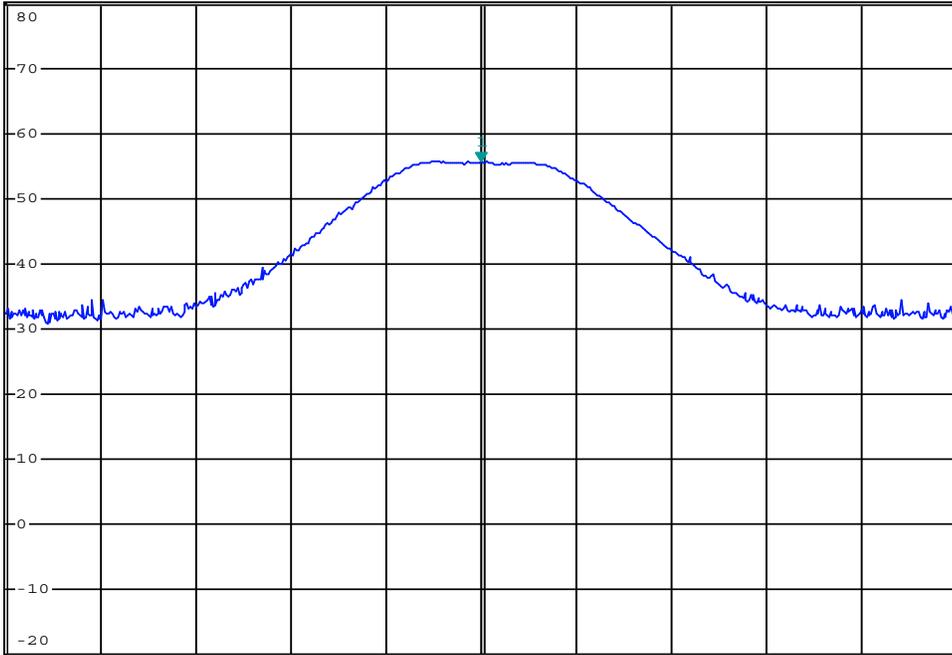


\*RBW 1 MHz    Marker 1 [T1 ]  
VBW 3 MHz    55.77 dBuV  
SWT 2.5 ms    2.48000000 GHz

Ref 80 dBuV

\*Att 10 dB

1 PK  
VIEW



Center 2.48 GHz    1 MHz/    Span 10 MHz

Date: 3.JUN.2021 14:52:51

Channel Frequency (MHz): **2480**

Antenna Polarization: **H**

Channel Power (dBuV): **55.71**

Modulation: **GMSK**

Bit Rate (Mbps): **-**

# Field Strength (Peak)

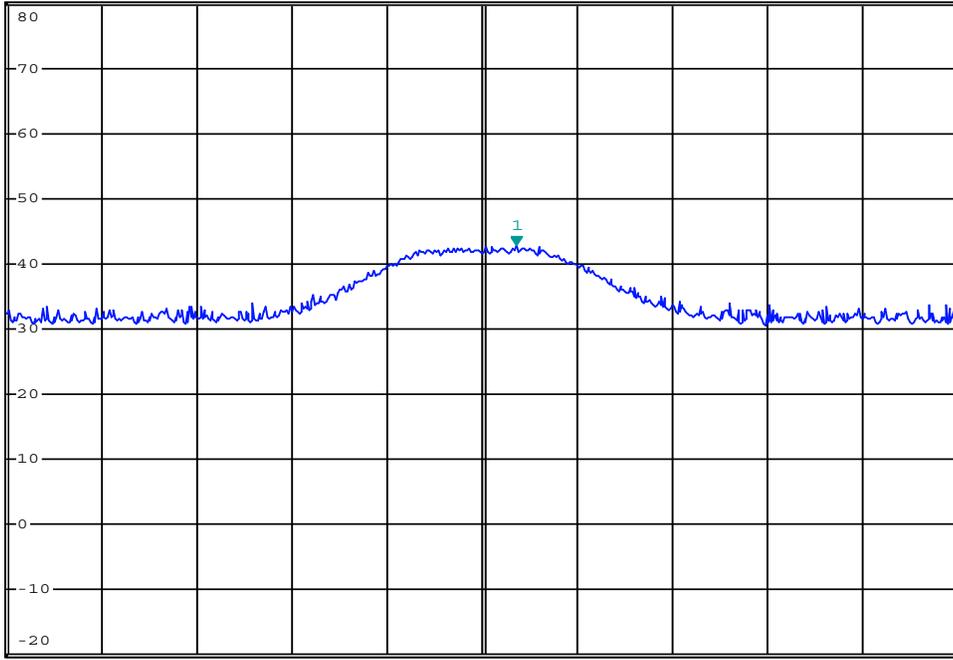


\*RBW 1 MHz      Marker 1 [T1 ]  
VBW 3 MHz      42.75 dBμV  
SWT 2.5 ms      2.402360000 GHz

Ref 80 dBμV

\*Att 10 dB

1 PK  
VIEW



Date: 3.JUN.2021 14:48:56

Channel Frequency (MHz): **2402**

Antenna Polarization: **V**

Channel Power (dBμV): **42.75**

Modulation: **GMSK**

Bit Rate (Mbps): **-**

# Field Strength (Peak)

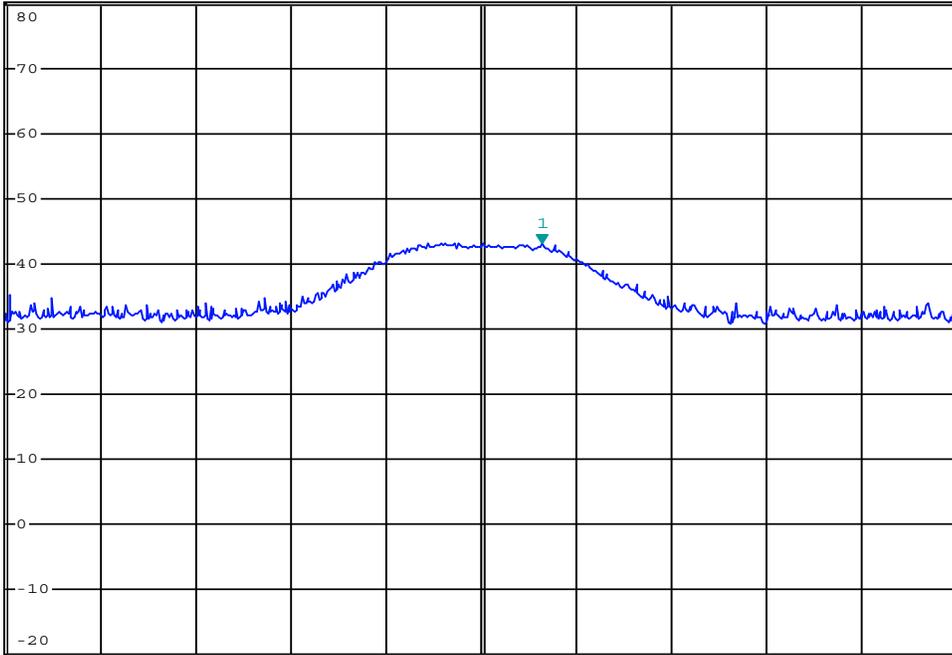


\*RBW 1 MHz    Marker 1 [T1 ]  
VBW 3 MHz    43.24 dBuV  
SWT 2.5 ms    2.440640000 GHz

Ref 80 dBuV

\*Att 10 dB

1 PK  
VIEW



Center 2.44 GHz    1 MHz/    Span 10 MHz

Date: 3.JUN.2021 14:42:46

Channel Frequency (MHz): **2441**

Antenna Polarization: **V**

Channel Power (dBuV): **43.24**

Modulation: **GMSK**

Bit Rate (Mbps): **-**

# Field Strength (Peak)

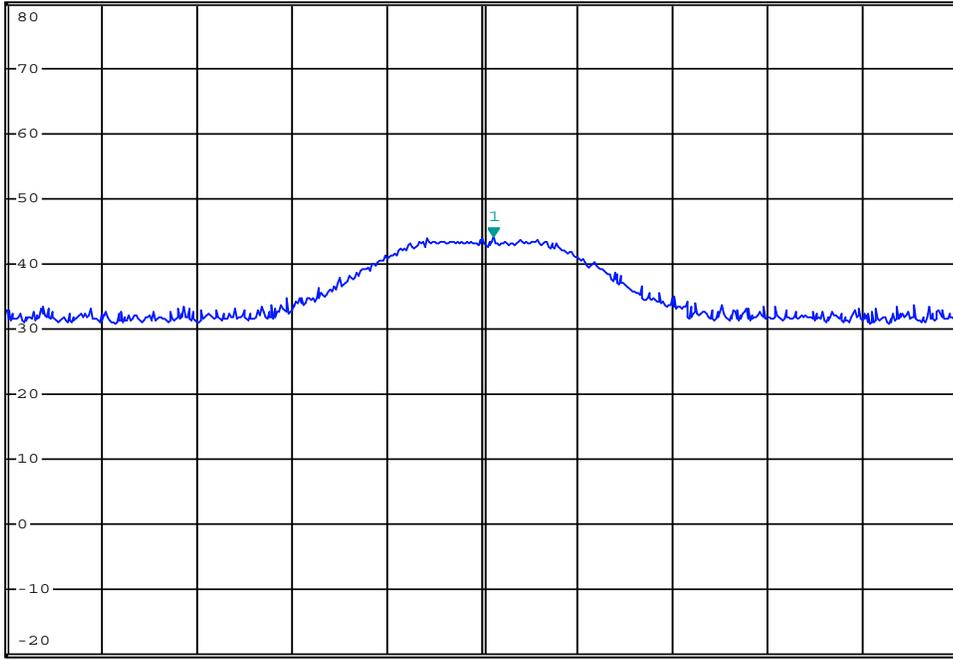


\*RBW 1 MHz      Marker 1 [T1 ]  
VBW 3 MHz      44.19 dBuV  
SWT 2.5 ms      2.480120000 GHz

Ref 80 dBuV

\*Att 10 dB

1 PK  
VIEW



Date: 3.JUN.2021 14:51:22

Channel Frequency (MHz): **2480**

Antenna Polarization: **V**

Channel Power (dBuV): **44.19**

Modulation: **GMSK**

Bit Rate (Mbps): **-**

### FCC §15.249(a), RSS-210 Radiated Field Strength

Frequency (MHz)	Mode	Modulation	Bit Rate (Mbps)	Detector	Antenna Polarization	Measured Field Strength [FS <sub>Meas</sub> ] (dBuV @ 3m)	Cable Loss [L <sub>c</sub> ] (dBm)	Receive Antenna [ACF] (dB)	Corrected Field Strength [FS <sub>Corr</sub> ] (dBuV @3m)	Limit (dBuV)	Margin (dB)		
2402.0	ANT	GFSK	-	RMS	Horizontal	56.56	4.6	28.28	89.44	94.0	4.6		
2441.0						55.58	4.7	28.22	88.50		5.5		
2480.0						55.07	4.8	28.17	88.04		6.0		
2402.0					Vertical	41.67	4.6	28.28	74.55		19.5		
2441.0						45.64	4.7	28.22	78.56		15.4		
2480.0						41.50	4.8	28.17	74.47		19.5		
2402.0				Peak	Horizontal	56.95	4.6	28.28	89.83	114.0	24.2		
2441.0						56.04	4.7	28.22	88.96		25.0		
2480.0						55.55	4.8	28.17	88.52		25.5		
2402.0					Vertical	43.58	4.6	28.28	76.46		37.5		
2441.0						47.00	4.7	28.22	79.92		34.1		
2480.0						43.33	4.8	28.17	76.30		37.7		
<b>Result:</b>									<b>Complies</b>				

$$FS_{Corr} = FS_{Meas} + ACF + L_C$$

$$Margin = Limit - FS_{Corr}$$

# Field Strength (Average)

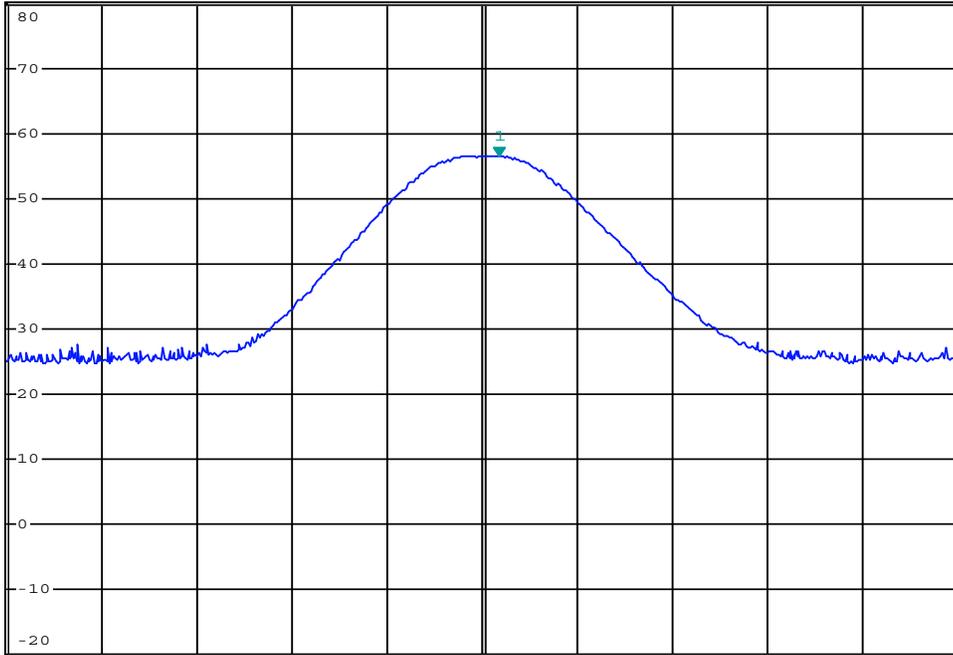


\*RBW 1 MHz      Marker 1 [T1 ]  
VBW 10 MHz      56.56 dBμV  
SWT 2.5 ms      2.402180000 GHz

Ref 80 dBμV

\*Att 10 dB

1 RM\*  
VIEW



Date: 3.JUN.2021 15:05:06

Channel Frequency (MHz): **2402**

Antenna Polarization: **H**

Channel Power (dBuV): **56.56**

Modulation: **GFSK**

Bit Rate (Mbps): **-**

# Field Strength (Average)

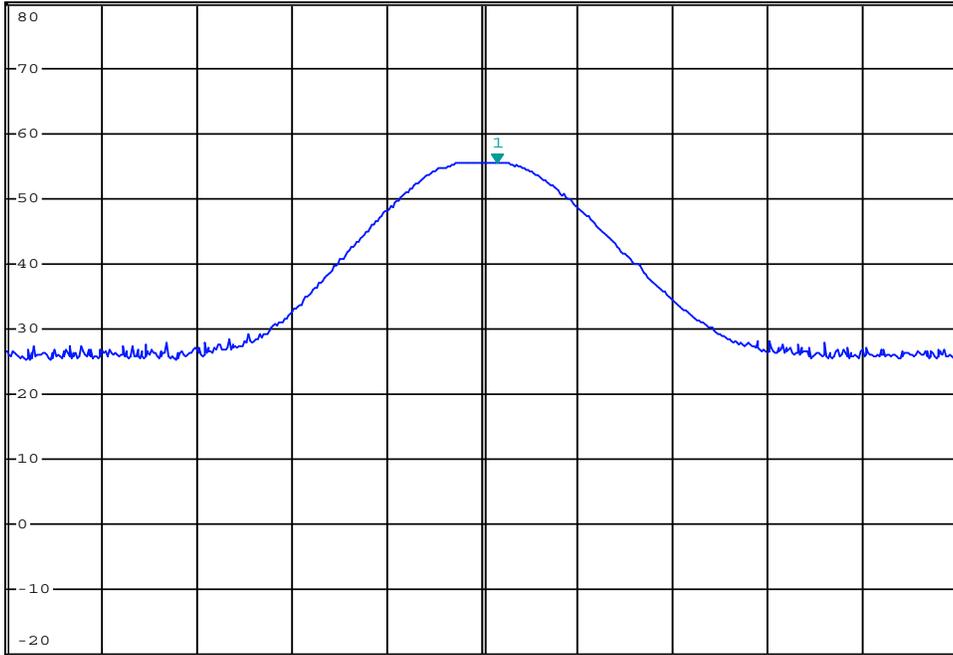


\*RBW 1 MHz      Marker 1 [T1 ]  
VBW 10 MHz      55.58 dBμV  
SWT 2.5 ms      2.441160000 GHz

Ref 80 dBμV

\*Att 10 dB

1 RM\*  
VIEW



Center 2.441 GHz

1 MHz/

Span 10 MHz

Date: 3.JUN.2021 15:06:50

Channel Frequency (MHz): **2441**

Antenna Polarization: **H**

Channel Power (dBuV): **55.58**

Modulation: **GFSK**

Bit Rate (Mbps): **-**

# Field Strength (Average)

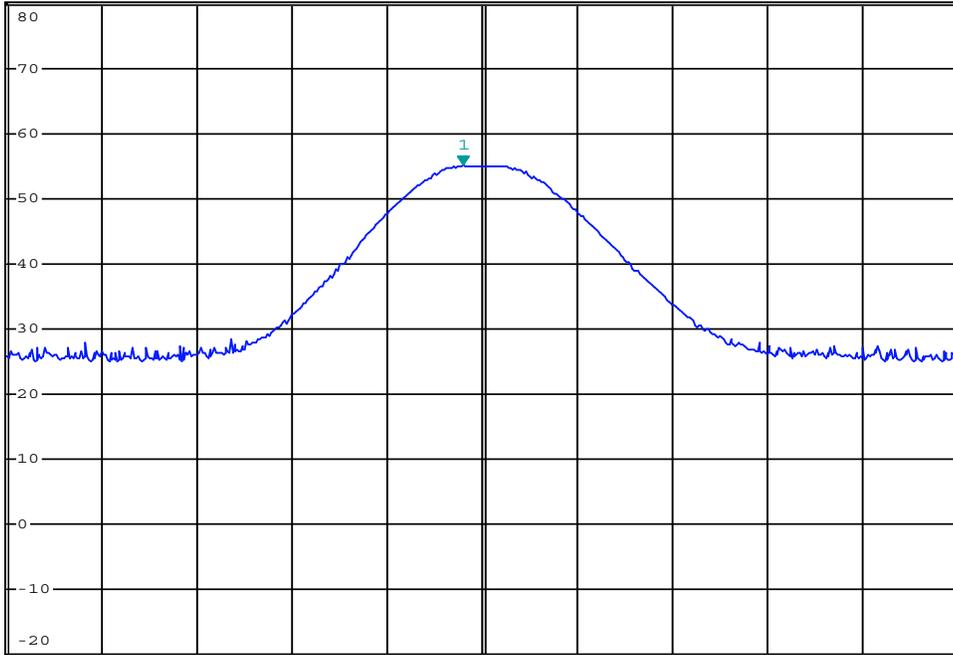


\*RBW 1 MHz    Marker 1 [T1 ]  
VBW 10 MHz    55.07 dBμV  
SWT 2.5 ms    2.479800000 GHz

Ref 80 dBμV

\*Att 10 dB

1 RM\*  
VIEW



Center 2.48 GHz    1 MHz/    Span 10 MHz

Date: 3.JUN.2021 14:58:15

Channel Frequency (MHz): **2480**

Antenna Polarization: **H**

Channel Power (dBuV): **55.07**

Modulation: **GFSK**

Bit Rate (Mbps): **-**

# Field Strength (Average)

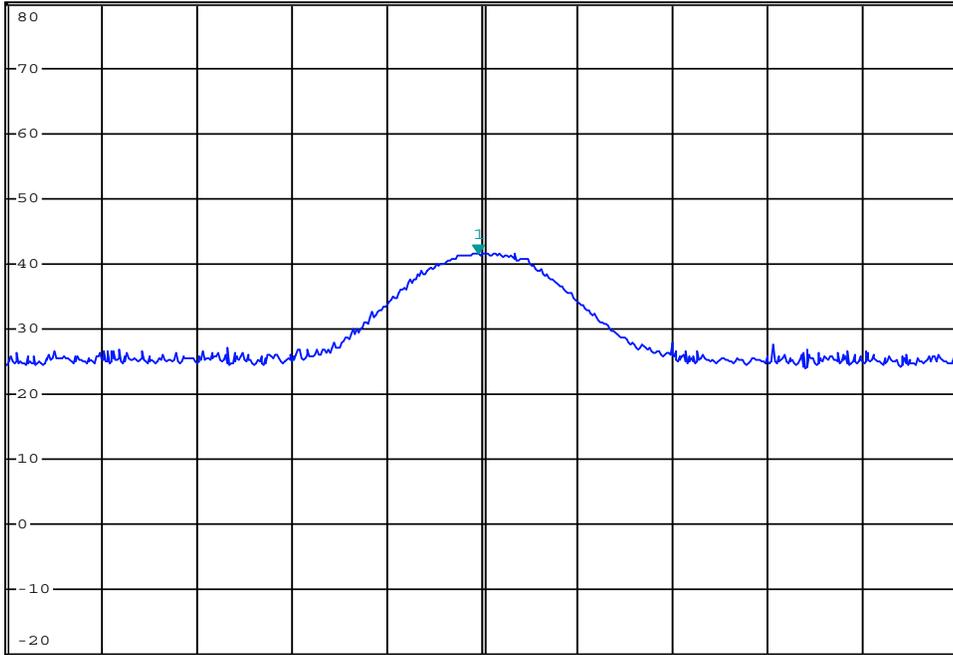


\*RBW 1 MHz      Marker 1 [T1 ]  
VBW 10 MHz      41.67 dBμV  
SWT 2.5 ms      2.401960000 GHz

Ref 80 dBμV

\*Att 10 dB

1 RM\*  
VIEW



Center 2.402 GHz

1 MHz/

Span 10 MHz

Date: 3.JUN.2021 15:02:37

Channel Frequency (MHz): **2402**

Antenna Polarization: **V**

Channel Power (dBuV): **41.67**

Modulation: **GFSK**

Bit Rate (Mbps): **-**

# Field Strength (Average)

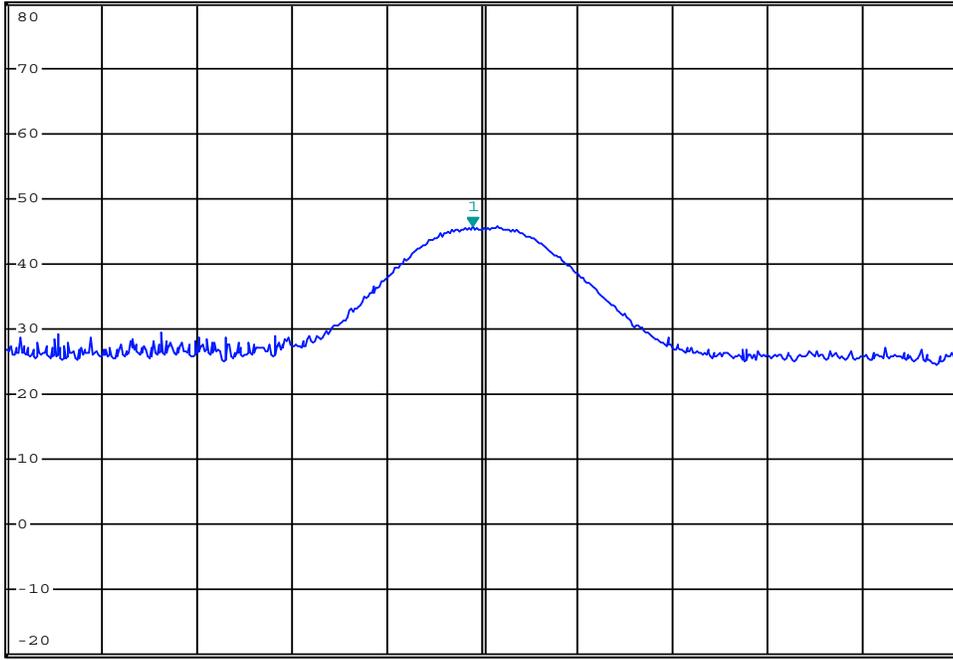


\*RBW 1 MHz      Marker 1 [T1 ]  
VBW 10 MHz      45.64 dBμV  
SWT 2.5 ms      2.440900000 GHz

Ref 80 dBμV

\*Att 10 dB

1 RM\*  
VIEW



Date: 3.JUN.2021 15:08:57

Channel Frequency (MHz): **2441**

Antenna Polarization: **V**

Channel Power (dBuV): **45.64**

Modulation: **GFSK**

Bit Rate (Mbps): **-**

# Field Strength (Average)

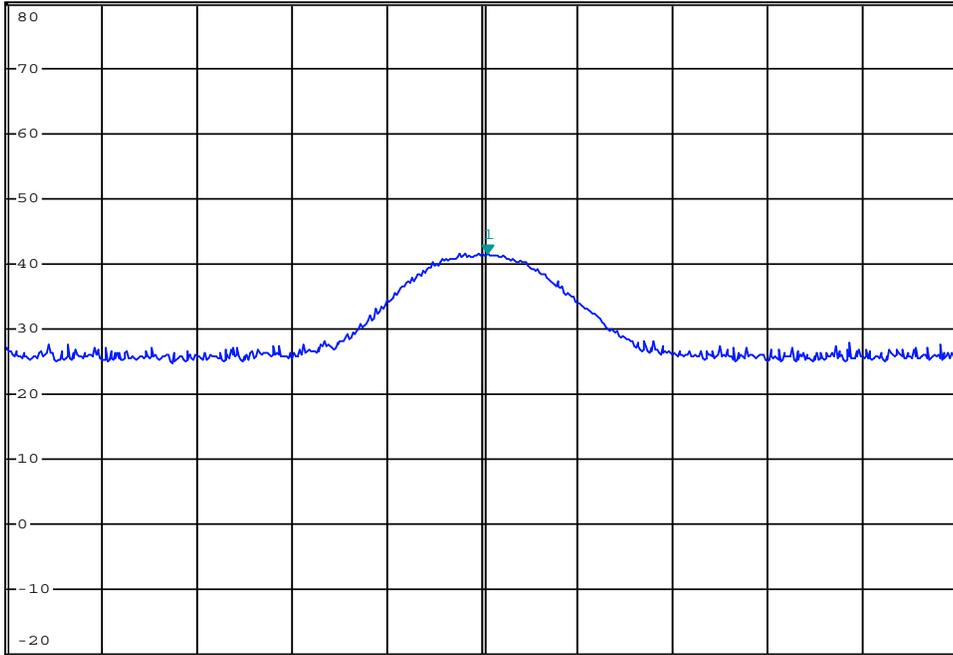


\*RBW 1 MHz    Marker 1 [T1 ]  
VBW 10 MHz    41.50 dBμV  
SWT 2.5 ms    2.480060000 GHz

Ref 80 dBμV

\*Att 10 dB

1 RM\*  
VIEW



Center 2.48 GHz

1 MHz/

Span 10 MHz

Date: 3.JUN.2021 15:00:54

Channel Frequency (MHz): **2480**

Antenna Polarization: **V**

Channel Power (dBuV): **41.50**

Modulation: **GFSK**

Bit Rate (Mbps): **-**

# Field Strength (Peak)

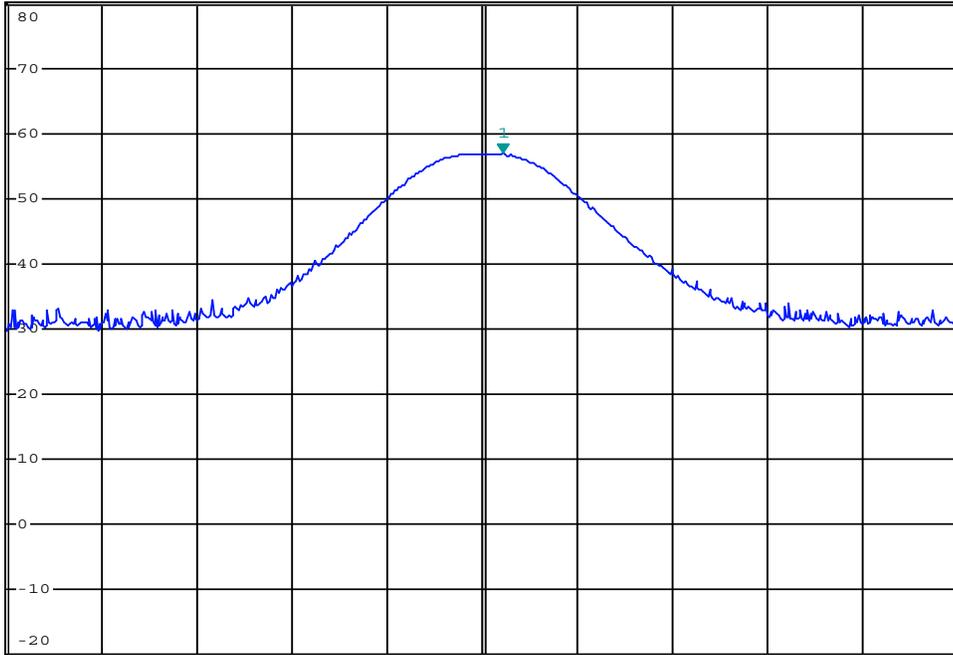


\*RBW 1 MHz      Marker 1 [T1 ]  
VBW 3 MHz      56.95 dBμV  
SWT 2.5 ms      2.402220000 GHz

Ref 80 dBμV

\*Att 10 dB

1 PK  
VIEW



Center 2.402 GHz

1 MHz/

Span 10 MHz

Date: 3.JUN.2021 15:04:34

Channel Frequency (MHz): **2402**

Antenna Polarization: **H**

Channel Power (dBμV): **56.95**

Modulation: **GFSK**

Bit Rate (Mbps): **-**

# Field Strength (Peak)

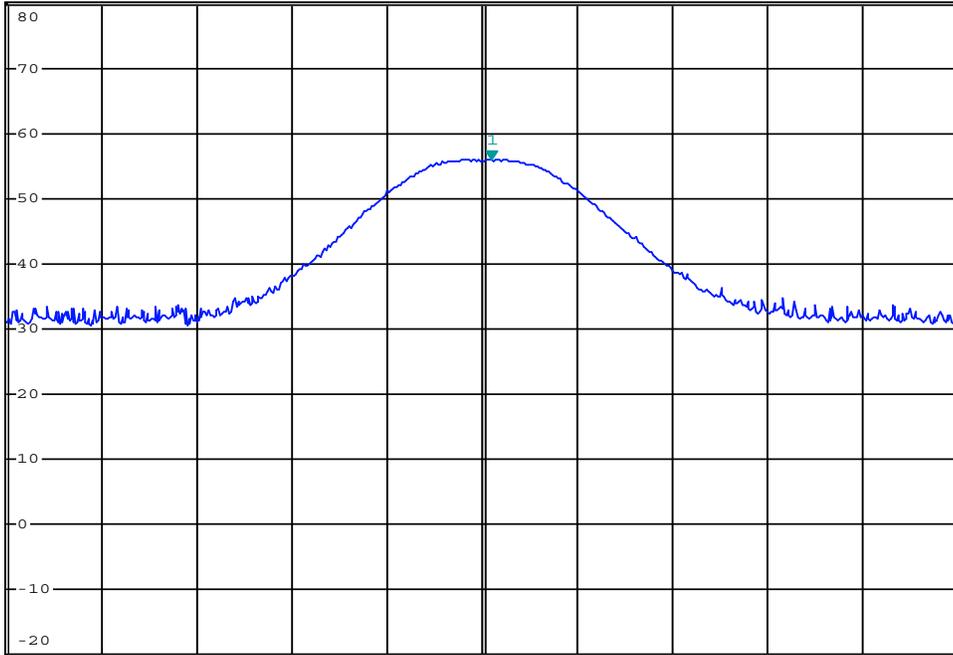


\*RBW 1 MHz    Marker 1 [T1 ]  
VBW 3 MHz    56.04 dBuV  
SWT 2.5 ms    2.441100000 GHz

Ref 80 dBuV

\*Att 10 dB

1 PK  
VIEW



Center 2.441 GHz

1 MHz/

Span 10 MHz

Date: 3.JUN.2021 15:07:13

Channel Frequency (MHz): **2441**

Antenna Polarization: **H**

Channel Power (dBuV): **56.04**

Modulation: **GFSK**

Bit Rate (Mbps): **-**

# Field Strength (Peak)

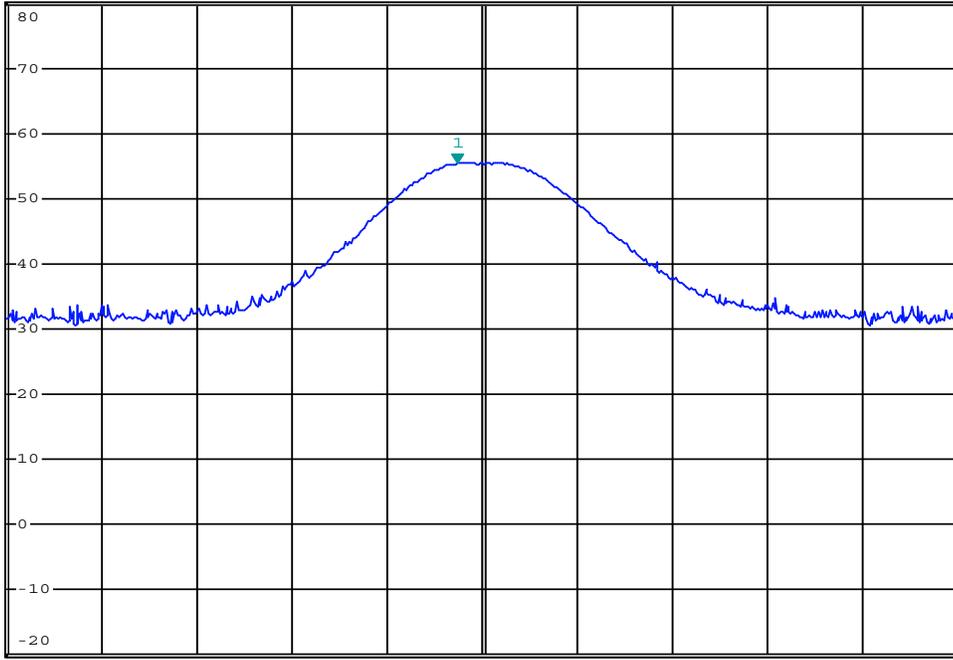


\*RBW 1 MHz      Marker 1 [T1 ]  
VBW 3 MHz      55.55 dBμV  
SWT 2.5 ms      2.479740000 GHz

Ref 80 dBμV

\*Att 10 dB

1 PK  
VIEW



Date: 3.JUN.2021 14:58:42

Channel Frequency (MHz): **2480**

Antenna Polarization: **H**

Channel Power (dBuV): **55.55**

Modulation: **GFSK**

Bit Rate (Mbps): **-**

# Field Strength (Peak)

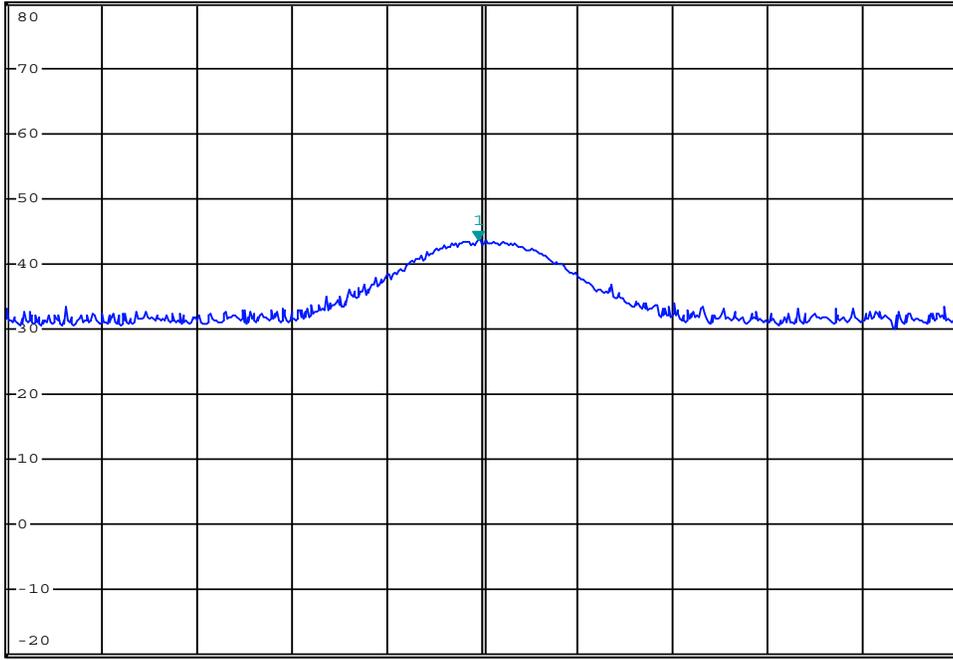


\*RBW 1 MHz      Marker 1 [T1 ]  
VBW 3 MHz      43.58 dBμV  
SWT 2.5 ms      2.401960000 GHz

Ref 80 dBμV

\*Att 10 dB

1 PK  
VIEW



Date: 3.JUN.2021 15:03:05

Channel Frequency (MHz): **2402**

Antenna Polarization: **V**

Channel Power (dBμV): **43.58**

Modulation: **GFSK**

Bit Rate (Mbps): **-**

# Field Strength (Peak)

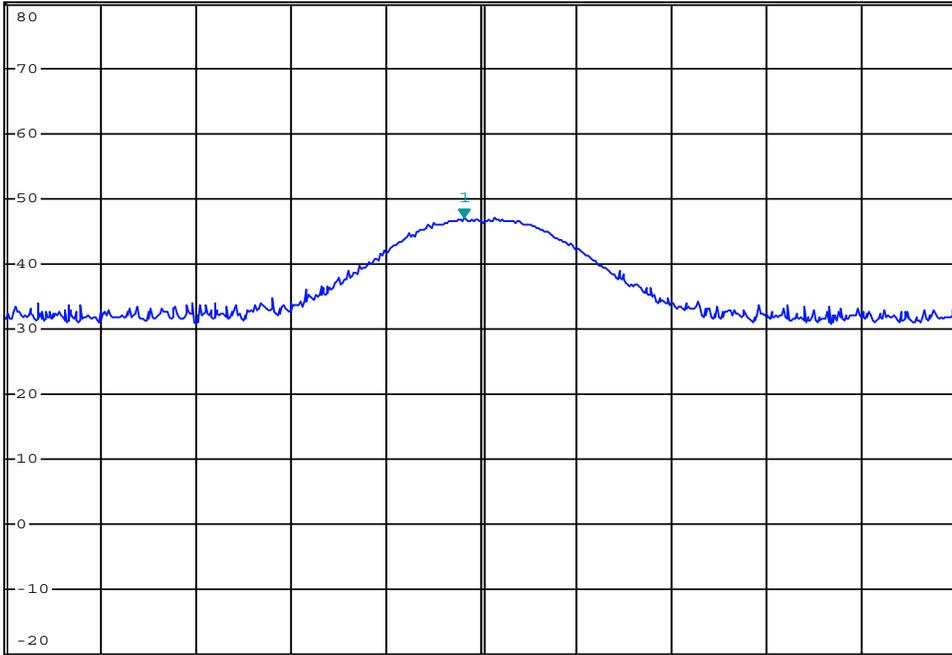


\*RBW 1 MHz    Marker 1 [T1 ]  
VBW 3 MHz    47.00 dBμV  
SWT 2.5 ms    2.440820000 GHz

Ref 80 dBμV

\*Att 10 dB

1 PK  
VIEW



Center 2.441 GHz    1 MHz/    Span 10 MHz

Date: 3.JUN.2021 15:08:38

Channel Frequency (MHz): **2441**

Antenna Polarization: **V**

Channel Power (dBμV): **47.00**

Modulation: **GFSK**

Bit Rate (Mbps): **-**

# Field Strength (Peak)

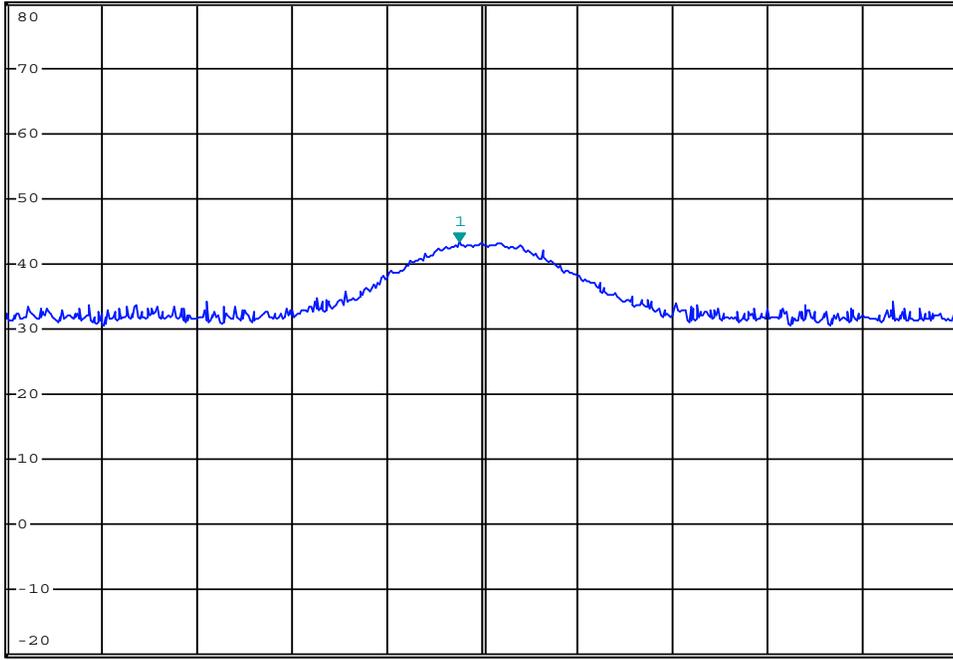


\*RBW 1 MHz      Marker 1 [T1 ]  
VBW 3 MHz      43.33 dBμV  
SWT 2.5 ms      2.479760000 GHz

Ref 80 dBμV

\*Att 10 dB

1 PK  
VIEW



Date: 3.JUN.2021 15:00:18

Channel Frequency (MHz): **2480**

Antenna Polarization: **V**

Channel Power (dBuV): **43.33**

Modulation: **GFSK**

Bit Rate (Mbps): **-**

Radiated Field Strength											
Frequency (MHz)	Mode	Modulation	Detector	Antenna Polarization	Measured Field Strength [FS <sub>Meas</sub> ] (dBuV @ 3m)	Cable Loss [L <sub>c</sub> ] (dBm)	Receive Antenna [ACF] (dB)	Corrected Field Strength [FS <sub>Corr</sub> ] (dBuV/m @3m)	Limit @30m [Lim <sub>30m</sub> ] (dBuV/m)	Limit* @3m [Lim <sub>3m</sub> ] (dBuV/m)	Margin (dB)
13.56	NFC	ASK	RMS	Front	22.98	0.5	10.65	34.13	84.00	124.0	89.9
				Side	21.28			32.43			91.6
			Peak	Front	24.41			35.56	104.00	144.0	108.4
				Side	21.81			32.96			111.0
<b>Result:</b>									<b>Complies</b>		

\* Limit @ 3m = Limit @ 30m + 40dB/decade = 84dBuV/m + 40dB = 124dBuV/m (Average)

\* Limit @ 3m = Limit @ 30m + 40dB/decade = 104dBuV/m + 40dB = 144dBuV/m (Peak)

$$FS_{Corr} = FS_{Meas} + ACF + L_c$$

$$Margin = Limit_{3m} - FS_{Corr}$$

Radiated Field Strength											
Frequency (MHz)	Mode	Modulation	Detector	Antenna Polarization	Measured Field Strength [FS <sub>Meas</sub> ] (dBuV @ 3m)	Cable Loss [L <sub>c</sub> ] (dBm)	Receive Antenna [ACF <sup>H</sup> ] (dBuA/m)	Corrected Field Strength [H <sub>Corr</sub> ] (dBuA/m @3m)	Limit @30m [Lim <sub>30m</sub> ] (dBuV/m)	Limit** @3m [Lim <sub>3m</sub> ] (dBuA/m)	Margin (dB)
13.56	NFC	ASK	RMS	Front	22.98	0.5	-40.85	-17.37	84.00	72.5	89.9
				Side	21.28			-19.07			91.6
			Peak	Front	24.41			-15.94	104.00	92.5	108.4
				Side	21.81			-18.54			111.0
<b>Result:</b>									<b>Complies</b>		

\*\* Limit @ 3m = Limit @ 30m + 40dB/decade = 84dBuV/m + 40dB = 124dBuV/m (Average)

\*\* Limit @ 3m = Limit @ 30m + 40dB/decade = 104dBuV/m + 40dB = 144dBuV/m (Peak)

In accordance with ISED Notice 2020 - DRS0023:

"Guidance on Magnetic Field Strength Radiated Emissions Measurements 9kHz - 30MHz"

#### Limit Correction

$$Limit^H (dBuA/m) = Limit^E (dBuV/m) - Z_0 (dB\Omega)$$

Where  $Z_0 = \text{Free-Space Impedance} = 120\pi\Omega = 377\Omega \Rightarrow 20\log 377\Omega = 51.5\text{dB}\Omega$

$$Limit^H (dBuA/m) = Limit^E (dBuV/m) - Z_0 (dB\Omega) = 124\text{dBuV/m} - 51.5\text{dB}\Omega = 72.5\text{dBuA/m @ 3m (Average)}$$

$$Limit^H (dBuA/m) = Limit^E (dBuV/m) - Z_0 (dB\Omega) = 144\text{dBuV/m} - 51.5\text{dB}\Omega = 92.5\text{dBuA/m @ 3m (Peak)}$$

#### Measurement Correction

$$H_{Corr}(dBuA/m) = E_{Meas}(dBuV) + ACF^H(dB/\Omega m) + L_c - G_A$$

Where  $ACF^H$  is the Magnetic Antenna Correction Factor,  $L_c$  is Cable Loss,  $G_A$  is Pre-Amplifier Gain

External Pre-Amplifier ( $G_A$ ) not used

$$Margin = Limit_{3m} - H_{Corr}$$

# Field Strength (Average)

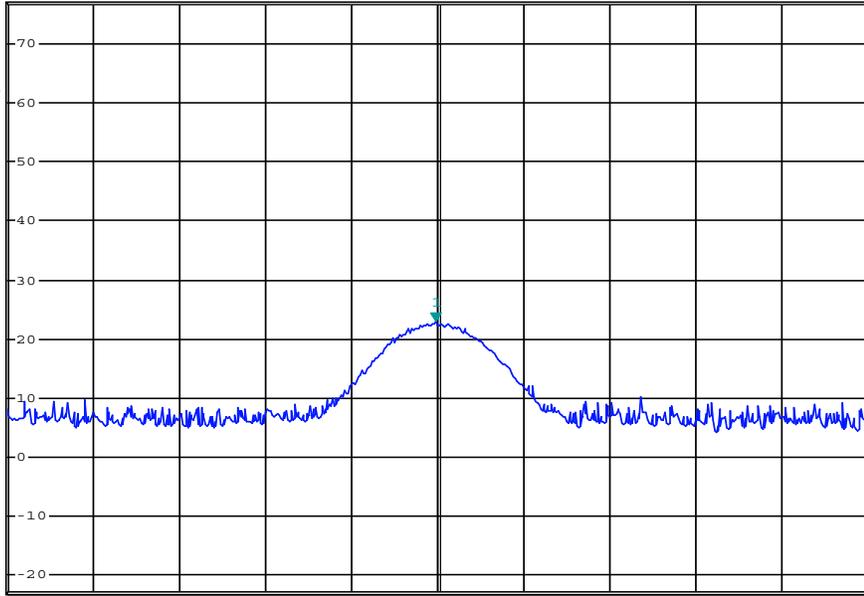


\*RBW 10 kHz    Marker 1 [T1 ]  
 VBW 100 kHz    22.98 dBuV  
 \*Att 10 dB    \*SWT 100 ms    13.559800000 MHz

Ref 77 dBuV

\*Att 10 dB

1 RMS  
 VIEW



Center 13.56 MHz    10 kHz/    Span 100 kHz

Date: 2.JUN.2021 13:04:03

Channel Frequency: <b>13.56 MHz</b>	Detector: <b>RMS</b>	Antenna Polarization: <b>Front</b>
Modulation Setting: <b>ASK</b>	Protocol: <b>NFC</b>	Measured Field Strength: <b>22.98 dBuV</b>

# Field Strength (Average)

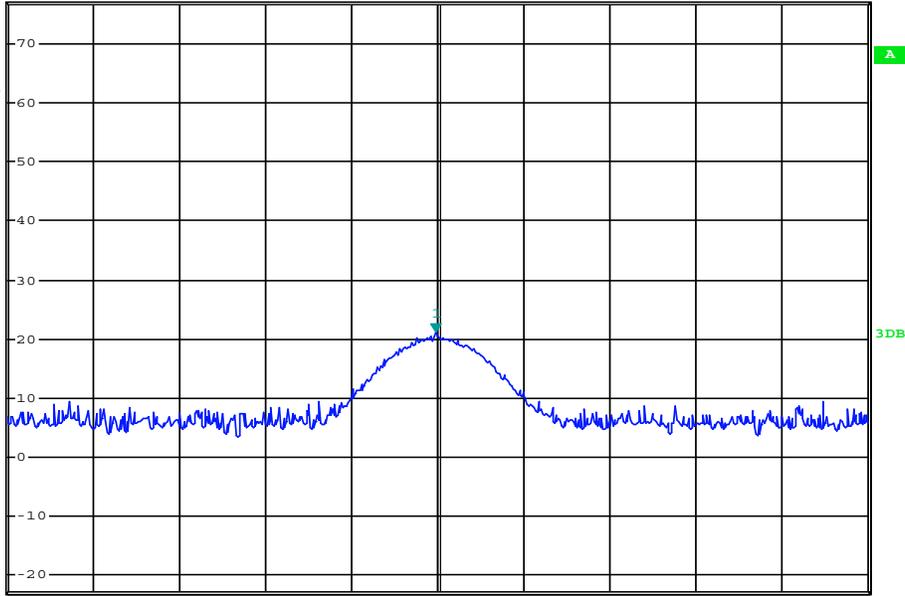


\*RBW 10 kHz    Marker 1 [T1 ]  
VBW 100 kHz    21.28 dBμV  
\*SWT 100 ms    13.559800000 MHz

Ref 77 dBμV

\*Att 10 dB

1 RM  
VIEW



Center 13.56 MHz

10 kHz/

Span 100 kHz

Date: 2.JUN.2021 13:05:52

Channel Frequency: <b>13.56 MHz</b>	Detector: <b>RMS</b>	Antenna Polarization: <b>Side</b>
Modulation Setting: <b>ASK</b>	Protocol: <b>NFC</b>	Measured Field Strength: <b>21.28 dBuV</b>

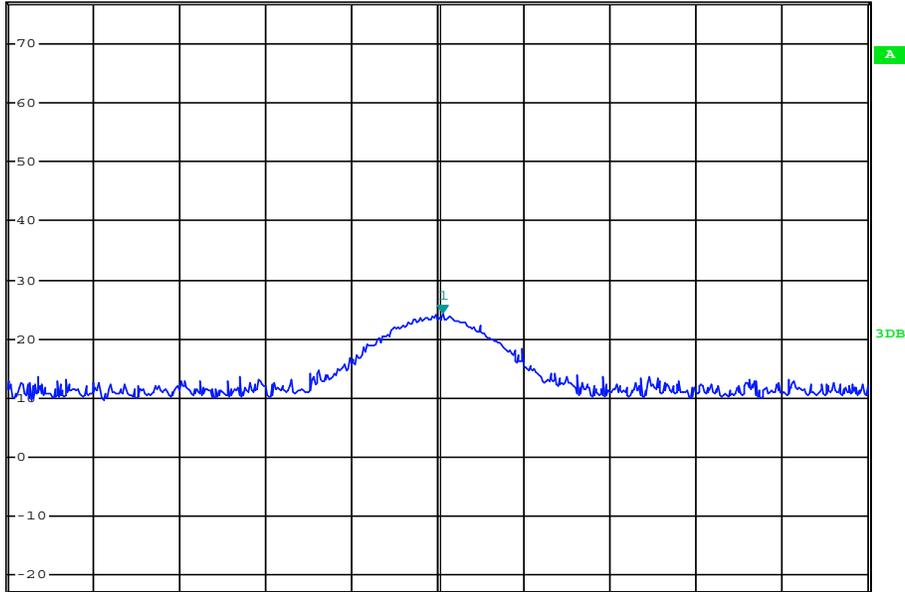
# Field Strength (Peak)



\*RBW 10 kHz    Marker 1 [T1 ]  
VBW 30 kHz    24.41 dBuV  
\*Att 10 dB    \*SWT 100 ms    13.560600000 MHz

Ref 77 dBuV

1 PK  
VIEW



Date: 2.JUN.2021 13:04:53

Channel Frequency: <b>13.56 MHz</b>	Detector: <b>Peak</b>	Antenna Polarization: <b>Front</b>
Modulation Setting: <b>ASK</b>	Protocol: <b>NFC</b>	Measured Field Strength: <b>24.41 dBuV</b>

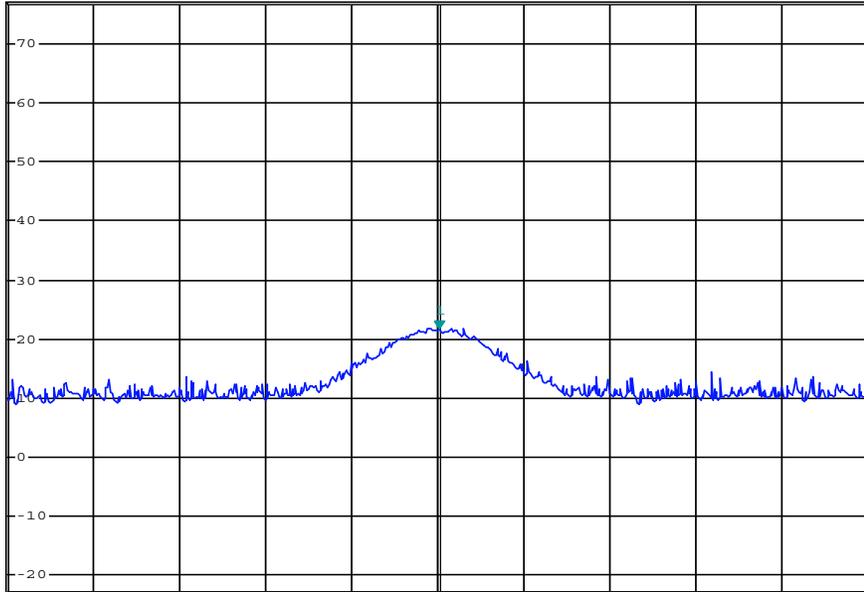
# Field Strength (Peak)



\*RBW 10 kHz    Marker 1 [T1 ]  
VBW 30 kHz    21.81 dBuV  
\*SWT 100 ms    13.56020000 MHz

Ref 77 dBuV    \*Att 10 dB

1 PK  
VIEW



Center 13.56 MHz    10 kHz/    Span 100 kHz

Date: 2.JUN.2021 13:06:34

Channel Frequency: <b>13.56 MHz</b>	Detector: <b>Peak</b>	Antenna Polarization: <b>Side</b>
Modulation Setting: <b>ASK</b>	Protocol: <b>NFC</b>	Measured Field Strength: <b>21.81 dBuV</b>