

## ANNEX A - 15.209 Conducted (30MHz-26GHz)

Naming Convention:

Frequency (MHz)\_Measured Range (30-1000MHz, 1-26GHz, Band Edge)\_Measurement (Avg, Peak)

Note: below measurements are in units of dBuV/m at 3meters. These measurements are performed conducted in lieu of radiated as permitted by ANSI C63.10-2013. The following formula was used in making such conversions:

Above 1GHz:  $E[\text{dB}\mu\text{V}/\text{m}] = \text{EIRP}[\text{dBm}] - 20 \log(d[\text{m}]) + 104.77$ , where E is field strength and d is distance at which the field strength limit is specified in the applicable requirements.  $E[\text{dB}\mu\text{V}/\text{m}] = \text{EIRP}[\text{dBm}] + 95.2$ , for  $d = 3 \text{ m}$ . Straight conversion between  $E[\text{dB}\mu\text{V}/\text{m}]$  and  $\text{EIRP}[\text{dBm}] = 107$ . Thus offset for dBuV/m at 3meters is  $95.2 - 107 + \text{antenna gain}$ .

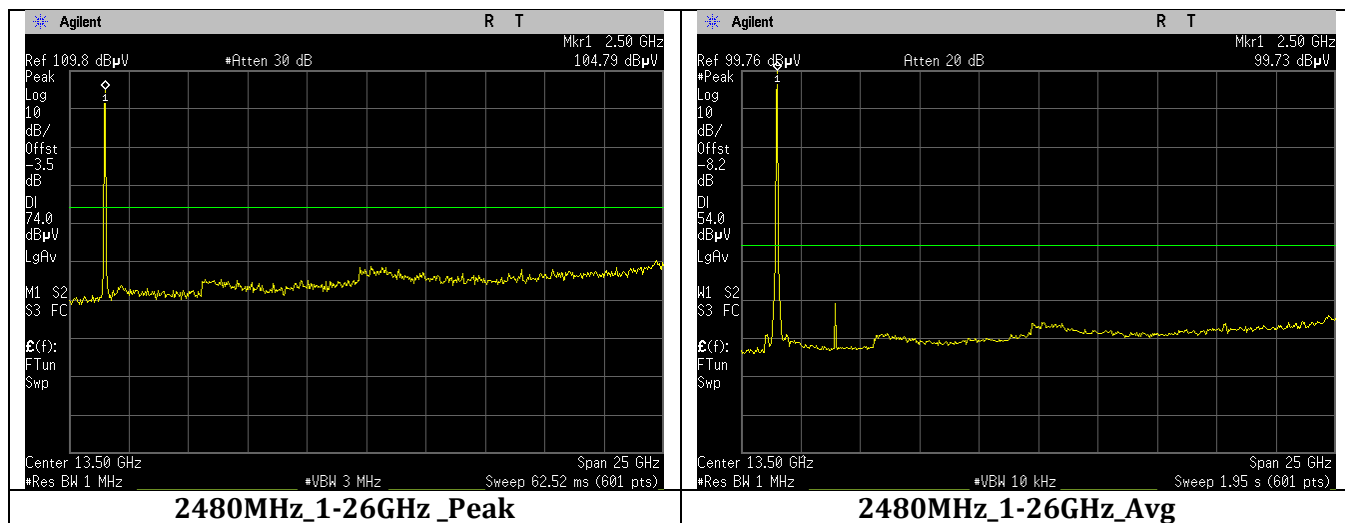
Below 1GHz: above is true in addition to adding ground plane contribution of 4.7dB. Thus offset for dBuV/m at 3meters is  $95.2 - 107 + 4.7 + \text{antenna gain}$ .

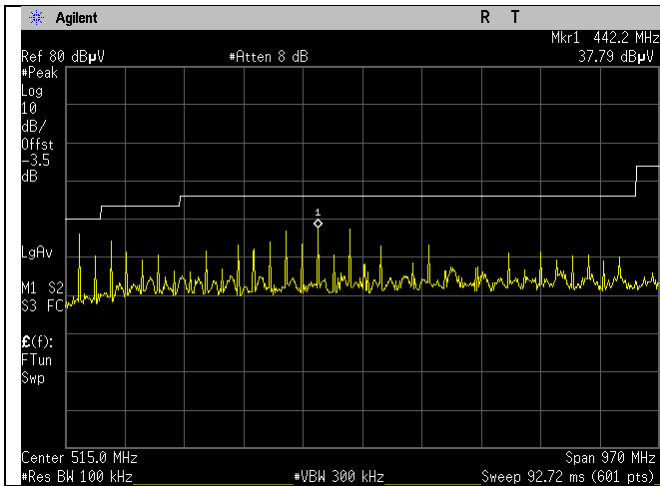
Note: the antenna gain of the EUT is -0.68 dBi(Per ANSI C63.10, no less than 2dBi should be used). The following equation are followed in order to input offset value into the PSA:

For 30-1000MHz  $-11.8 + 4.7\text{dB} + 2\text{dBi} = -5.1\text{dB}$

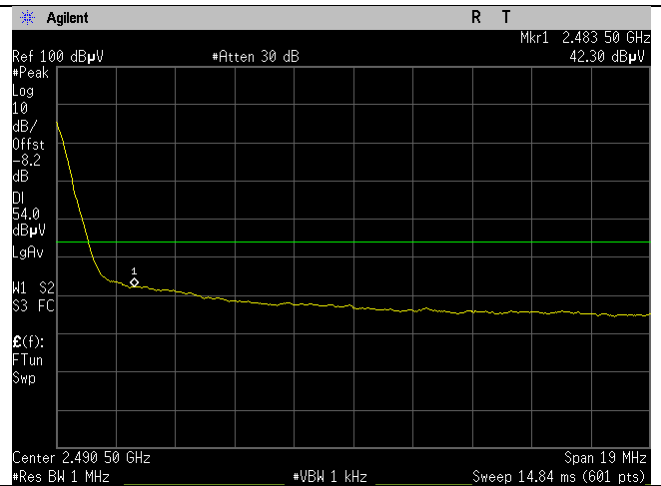
For above 1GHz  $-11.8 + 2\text{dBi} = -9.8\text{dB}$

**Note:** as can be seen in below plots' offsets, higher corrections were used. Thus, compliance is shown under worse-case circumstances (i.e. higher offset than necessary)

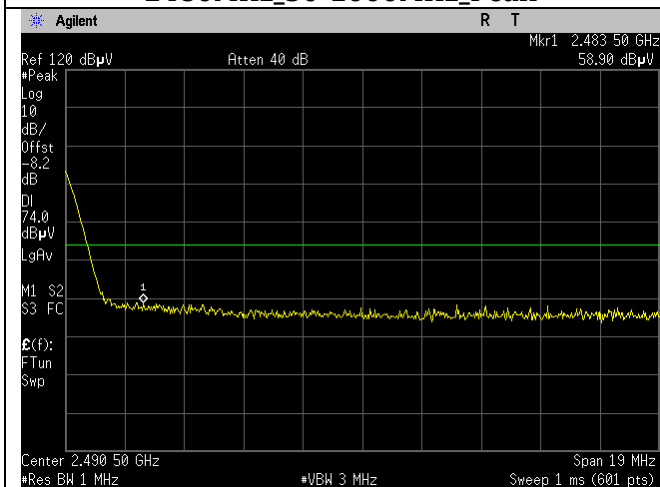




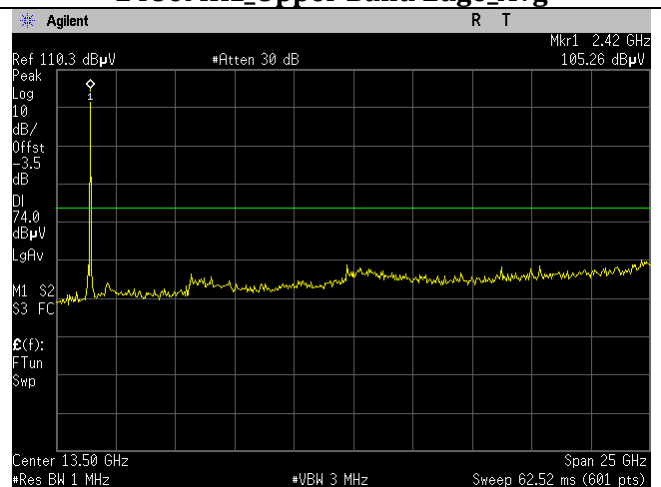
**2480MHz\_30-1000MHz\_Peak**



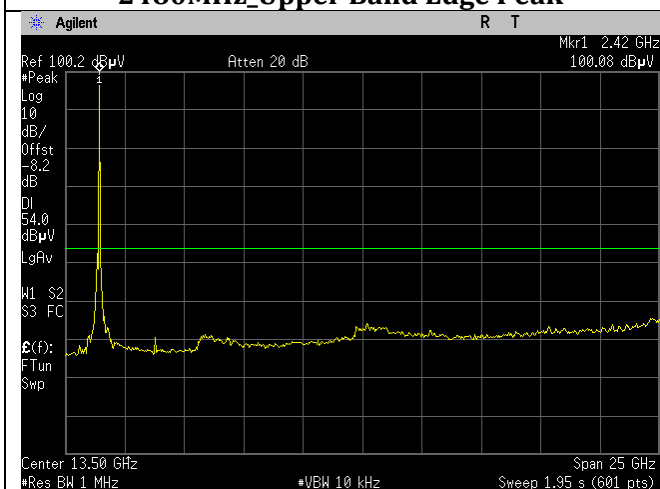
**2480MHz\_Upper Band Edge Avg**



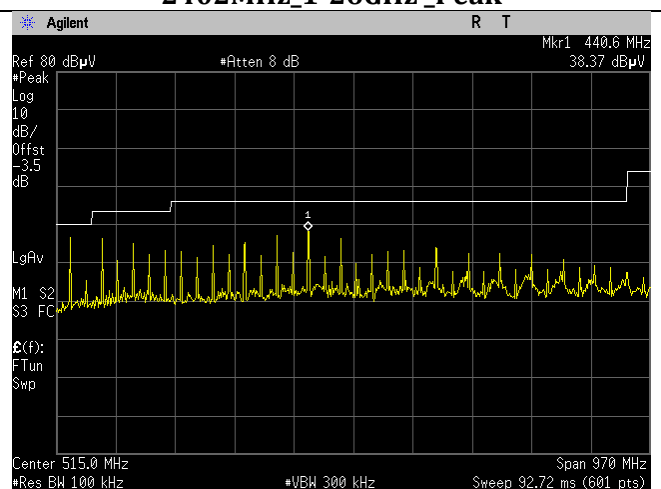
**2480MHz\_Upper Band Edge Peak**



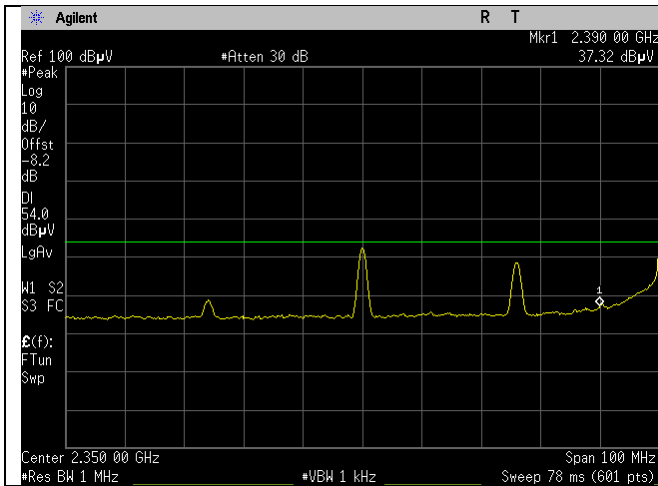
**2402MHz\_1-26GHz\_Peak**



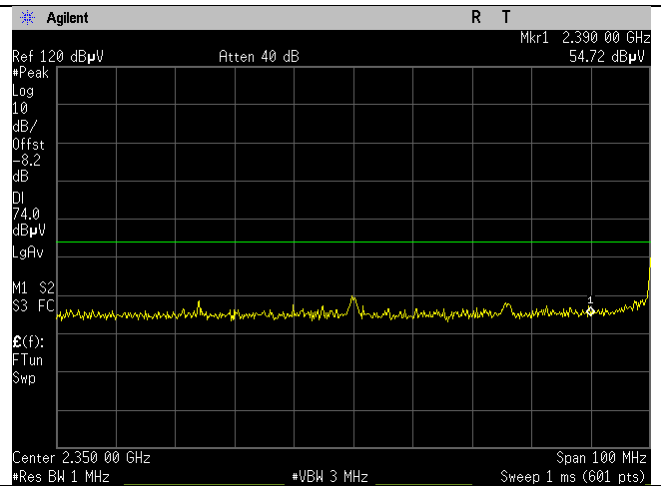
**2402MHz\_1-26GHz\_Avg**



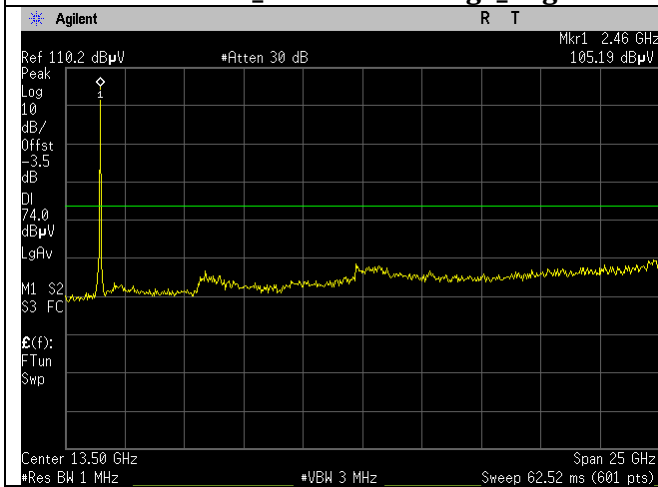
**2402MHz\_30-1000MHz\_Peak**



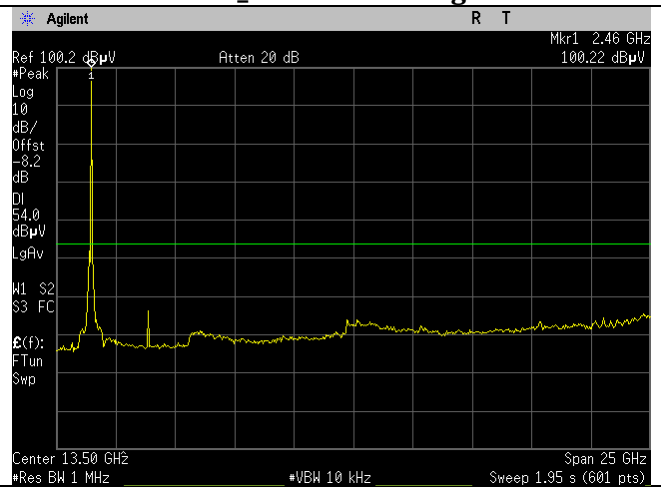
2402MHz\_Lower Band Edge\_Avg



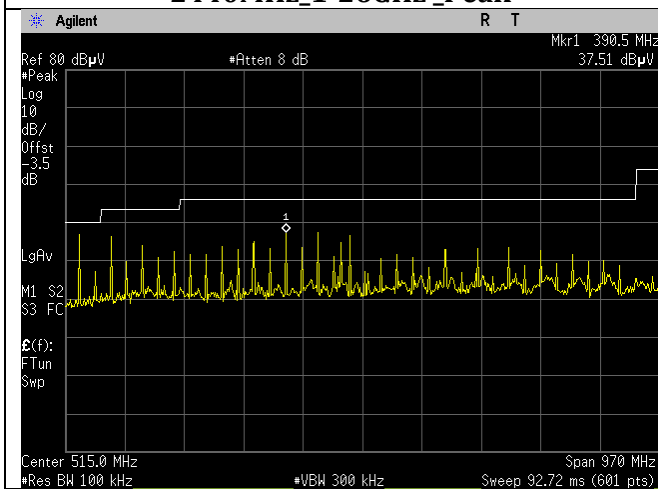
2402MHz\_Lower Band Edge\_Peak



2440MHz\_1-26GHz\_Peak



2440MHz\_1-26GHz\_Avg



2440MHz\_30-1000MHz\_Peak