SAS-2 6G Transmitter Device Common Mode Voltage Measurements

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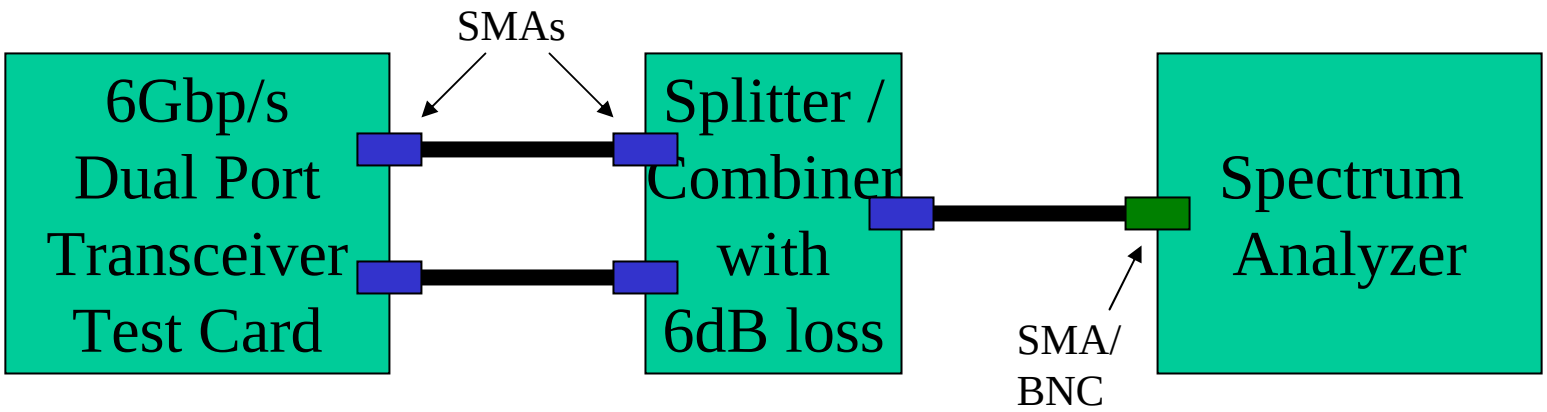
Test Setup

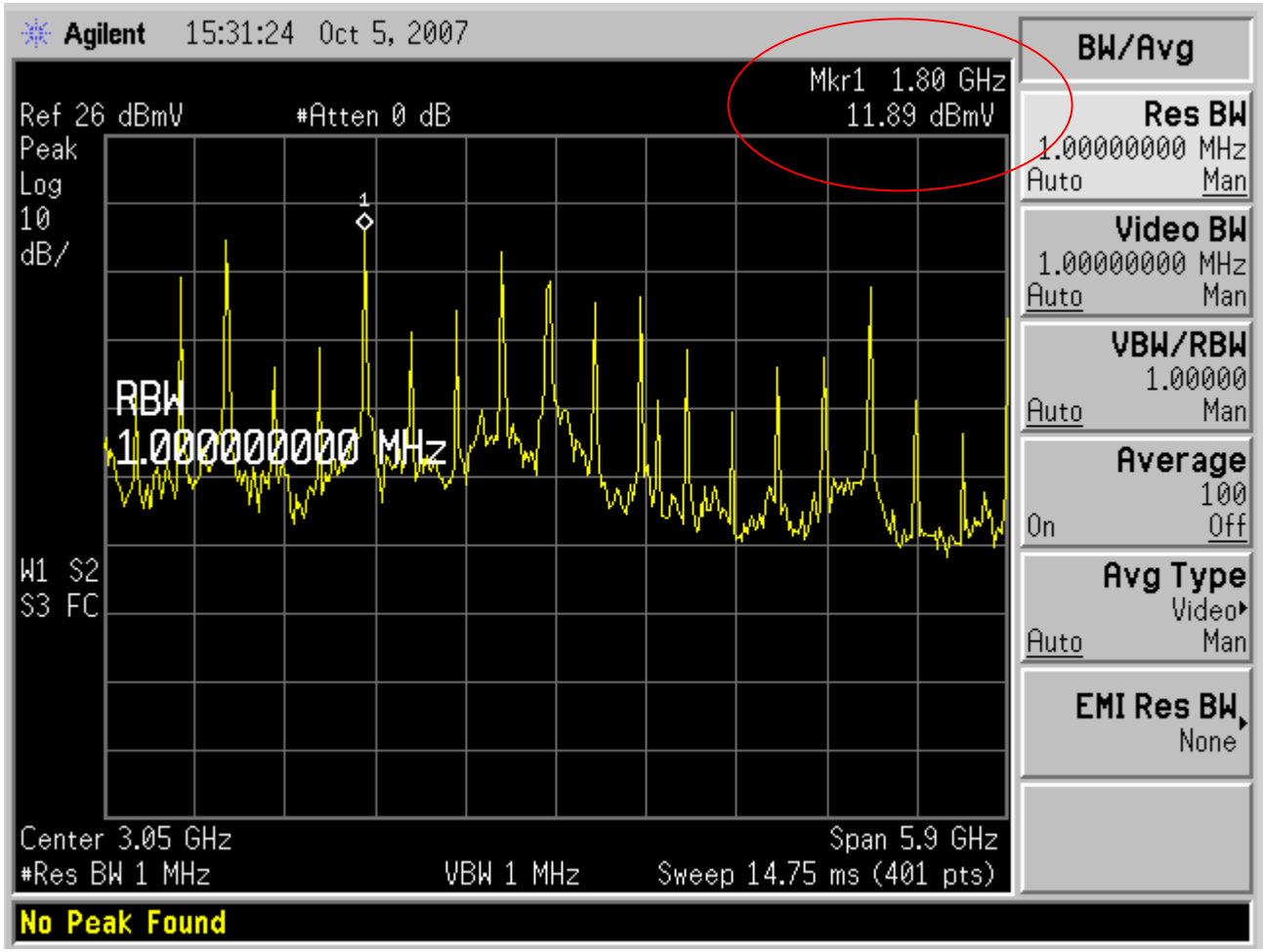


Each transceiver was set to transmit 1200mV differential at 6Gbit/s with no emphasis.

The reference level of Spectrum Analyzer was set to 26dmV.

6dB was added to all measurements (note: a 0dB combiner has been ordered to remove this requirement).

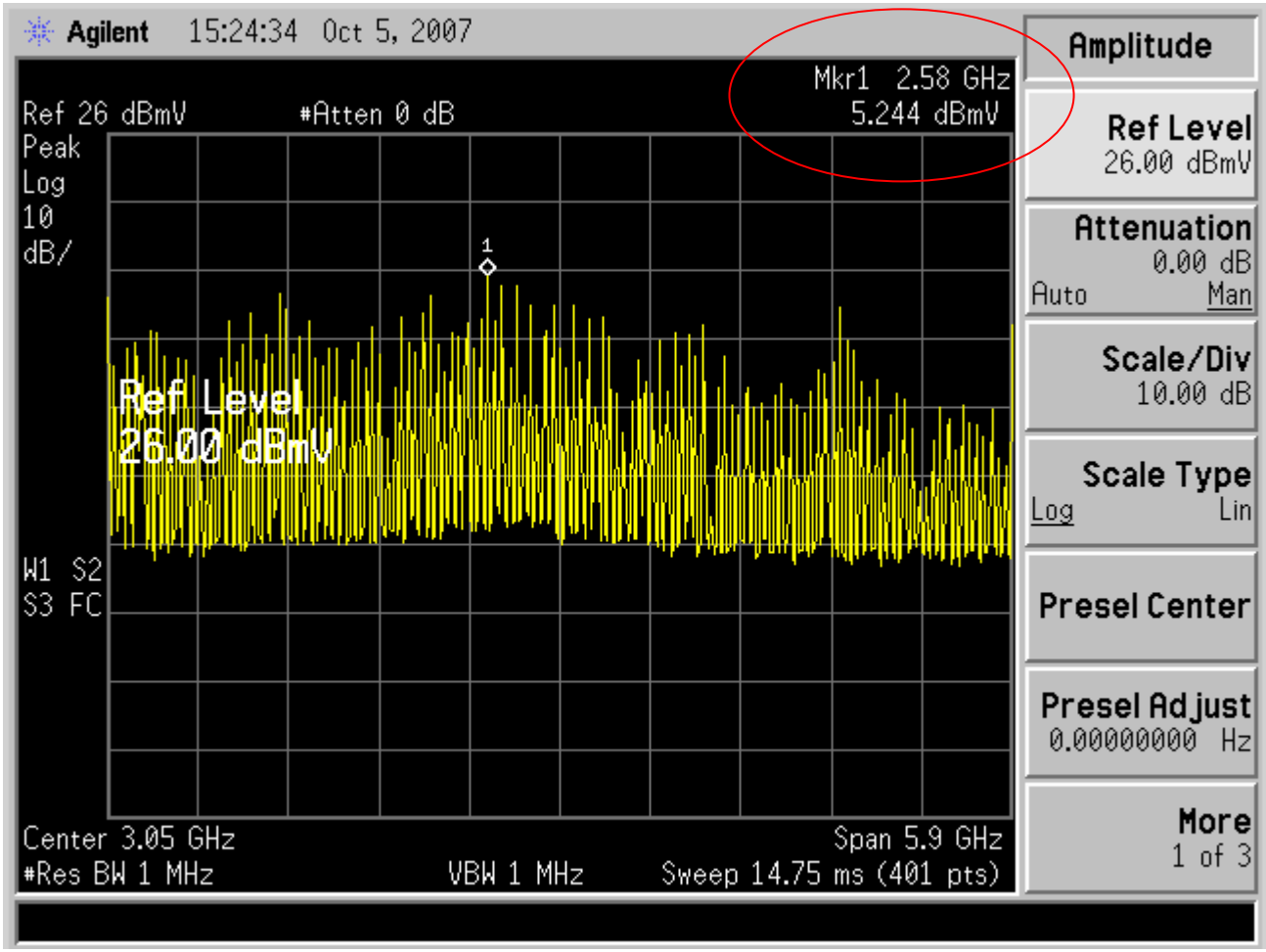
All connectors are SMA/BNC. There where no SAS connectors in this setup.



Transceiver Vendor 1, Port 1

Pattern = SAS CJTPAT; Peak amplitude = 17.89dBmV (=11.89+6)

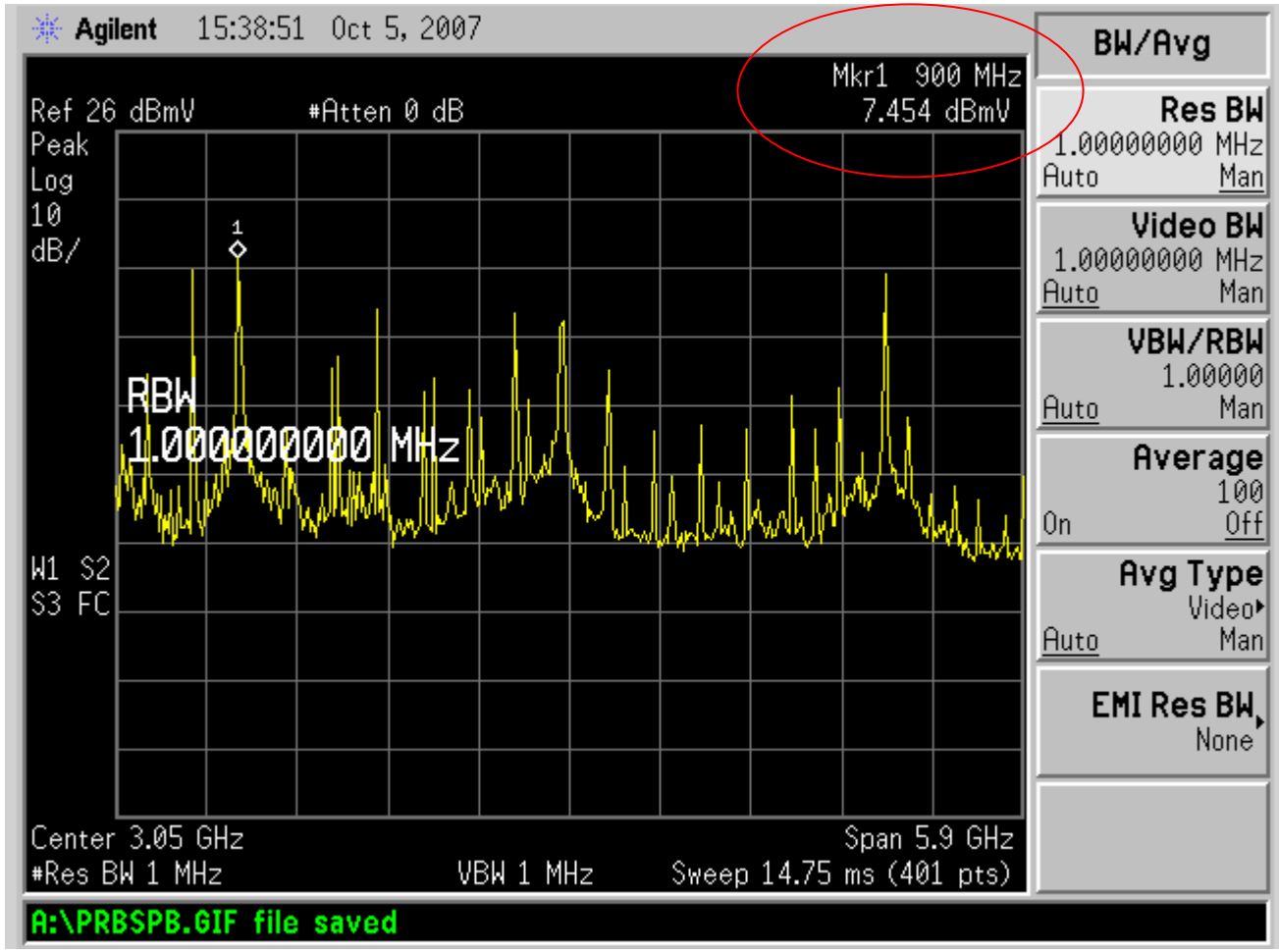
ResBw = 1Mhz, VideoBw = 1Mhz, VBW/RBW=1, Ref = 26dBmV, Span = 5.9G (100Mhz – 6Ghz)



Transceiver Vendor 1, Port 1

Pattern = PBRS7; Peak amplitude = 11.244dBmV (=5.244+6)

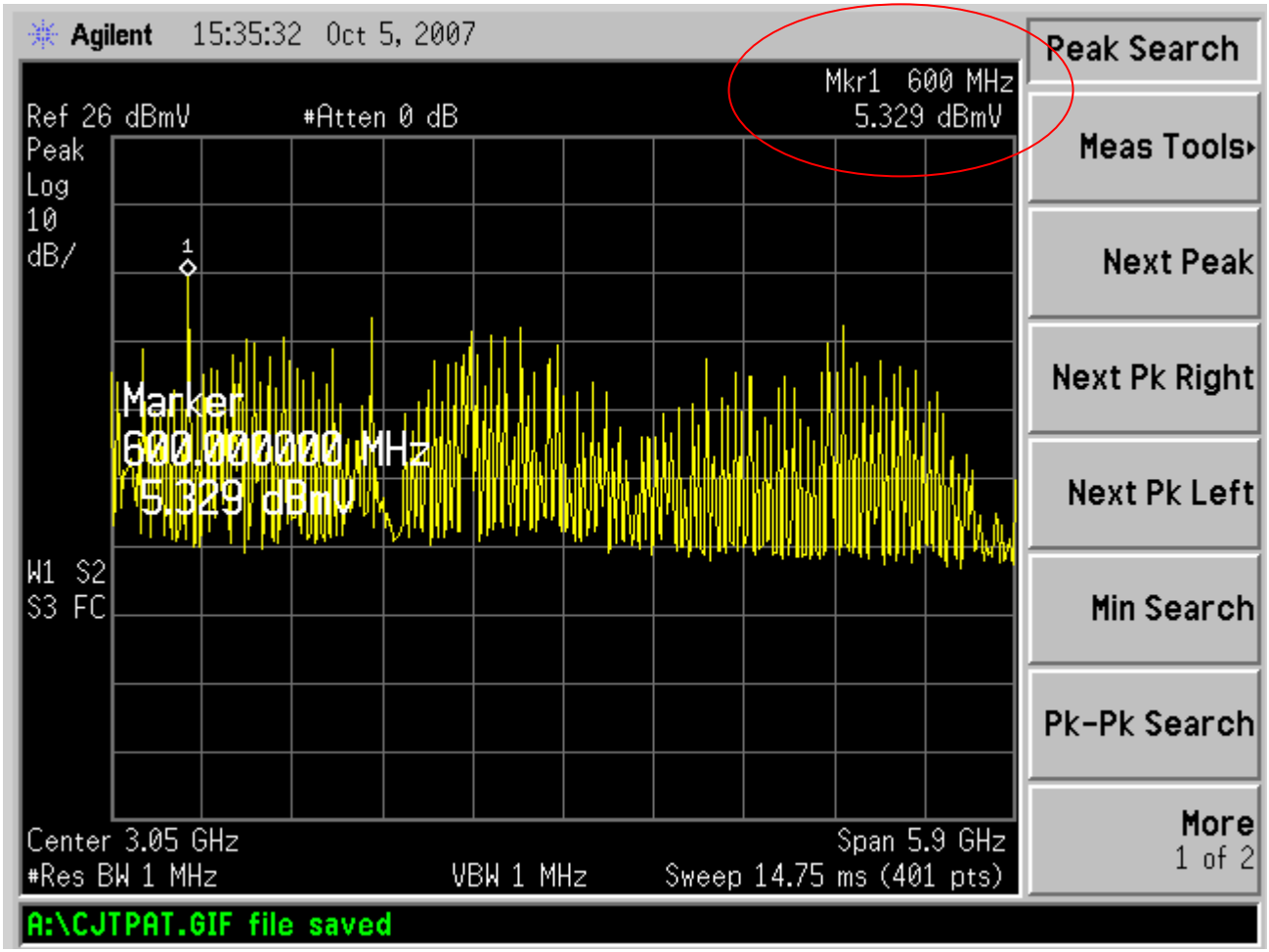
ResBw = 1Mhz, VideoBw = 1Mhz, VBW/RBW=1, Ref = 26dBmV, Span = 5.9G (100Mhz – 6Ghz)



Transceiver Vendor 1, Port 2

Pattern = SAS CJTPAT; Peak amplitude = 13.454dBmV (=7.454+6)

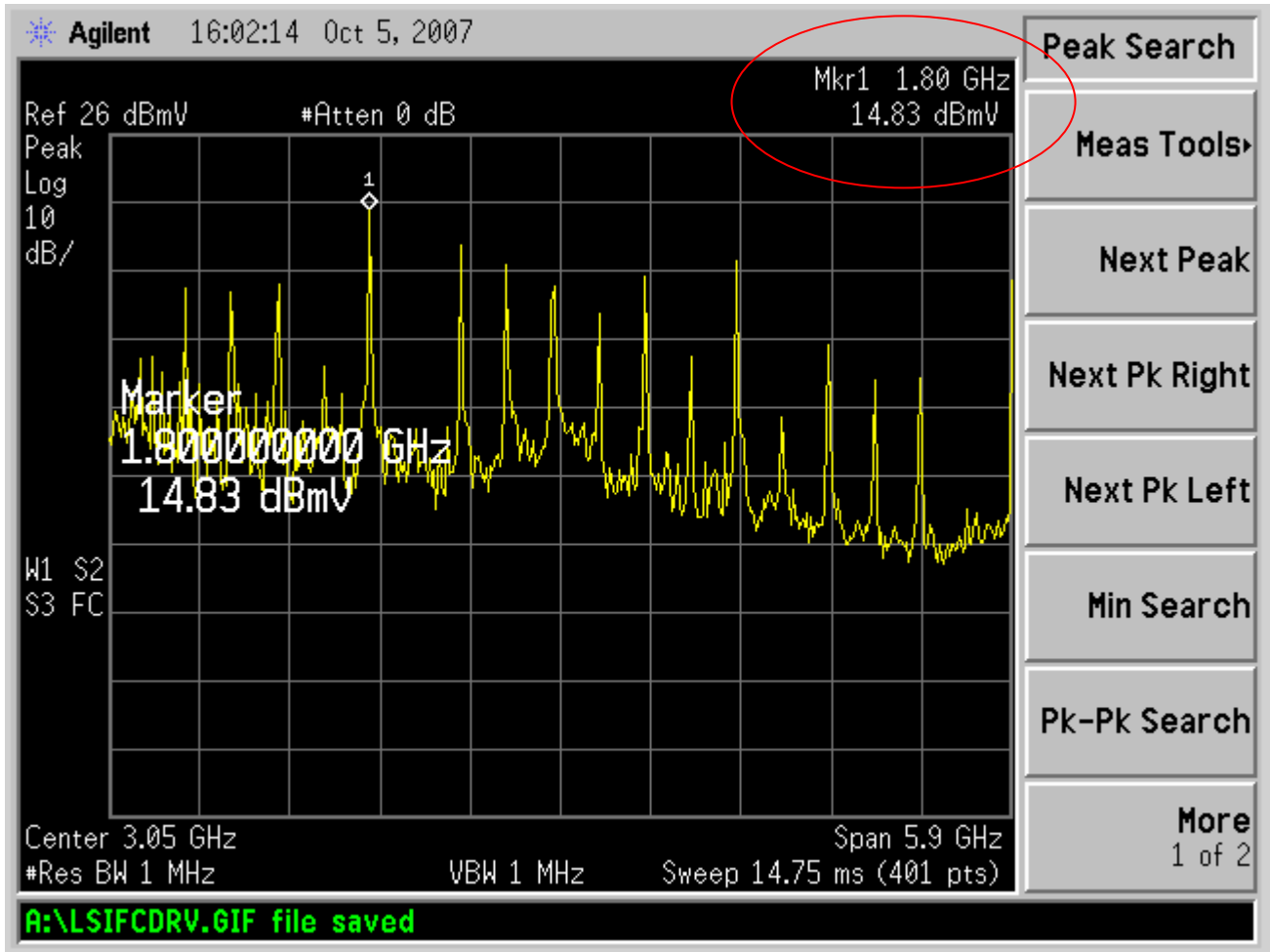
ResBw = 1Mhz, VideoBw = 1Mhz, VBW/RBW=1, Ref = 26dBmV, Span = 5.9G (100Mhz – 6Ghz)



Transceiver Vendor 1, Port 2

Pattern = PBRS7; Peak amplitude = 11.329dBmV (=5.329+6)

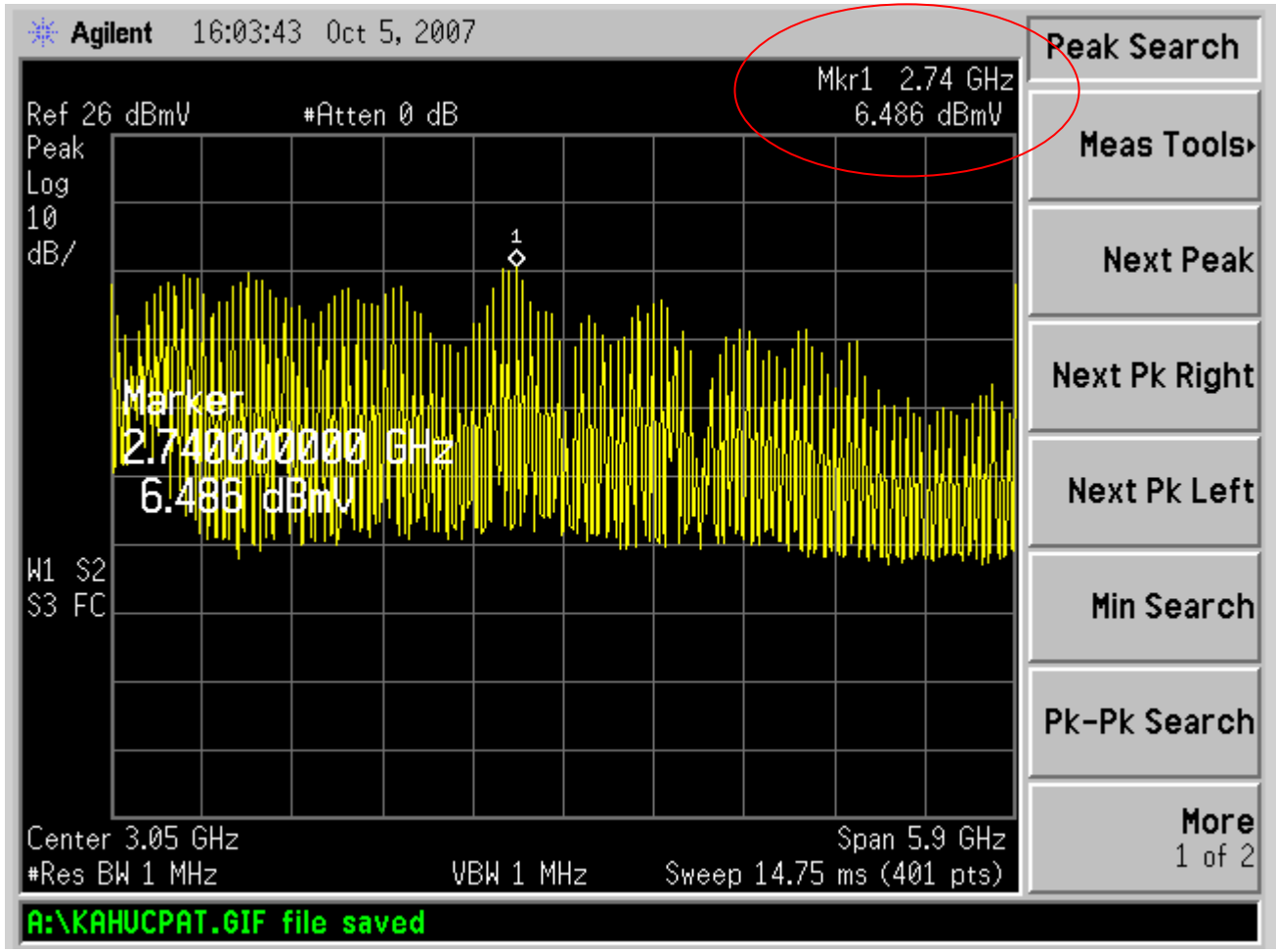
ResBw = 1Mhz, VideoBw = 1Mhz, VBW/RBW=1, Ref = 26dBmV, Span = 5.9G (100Mhz – 6Ghz)



Transceiver Vendor 2, Port 1

Pattern = SAS CJTPAT; Peak amplitude = 20.83dBmV (=14.83+6)

ResBw = 1Mhz, VideoBw = 1Mhz, VBW/RBW=1, Ref = 26dBmV, Span = 5.9G (100Mhz – 6Ghz)



Transceiver Vendor 2, Port 1

Pattern = PBRS7; Peak amplitude = 12.486dBmV (=6.486+6)

ResBw = 1Mhz, VideoBw = 1Mhz, VBW/RBW=1, Ref = 26dBmV, Span = 5.9G (100Mhz – 6Ghz)

Observations:

The amplitudes of the spectrums of the three transceivers that where measured in the manner described on page one tended to be flat rather than rising from 100mhz to 6Ghz.

A flat limit of 26dBmV was met by this sample of transceivers when measured in this manner.