

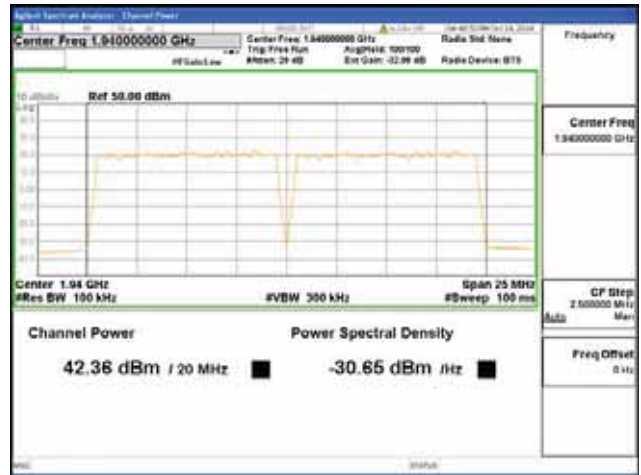
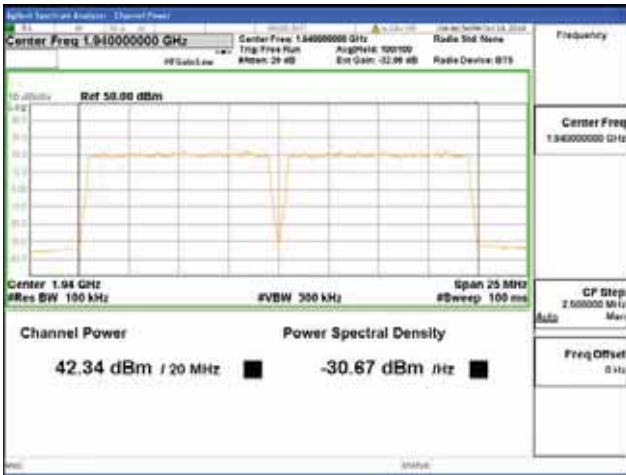


ANT 3

Band 2, BW 10MHz + BW 10MHz, Multi carrier(Contiguous), 4TX, Bottom

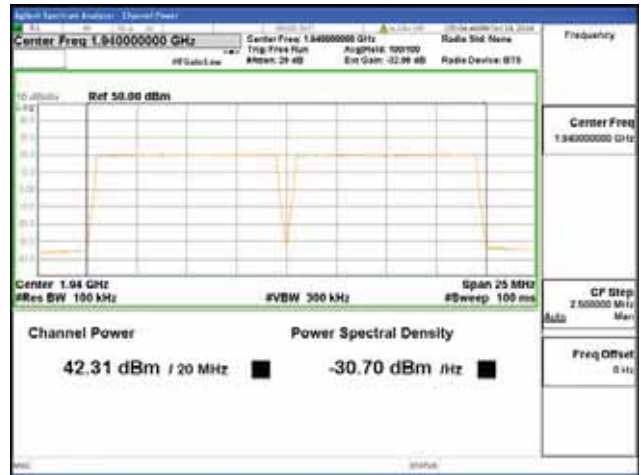
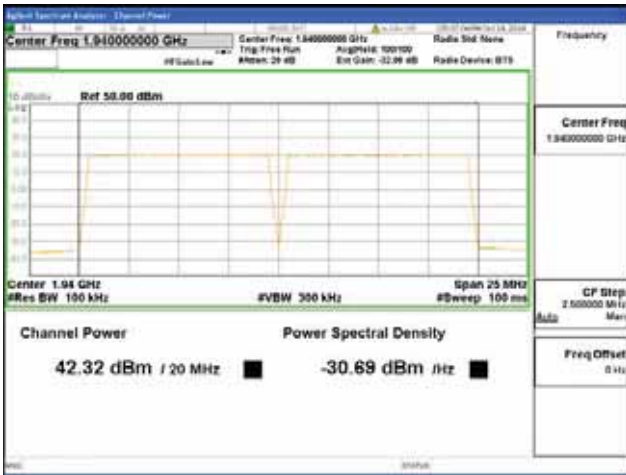
QPSK

16QAM



64QAM

256QAM





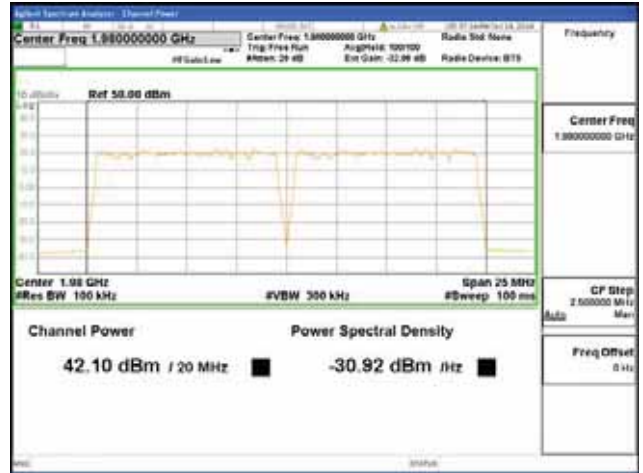
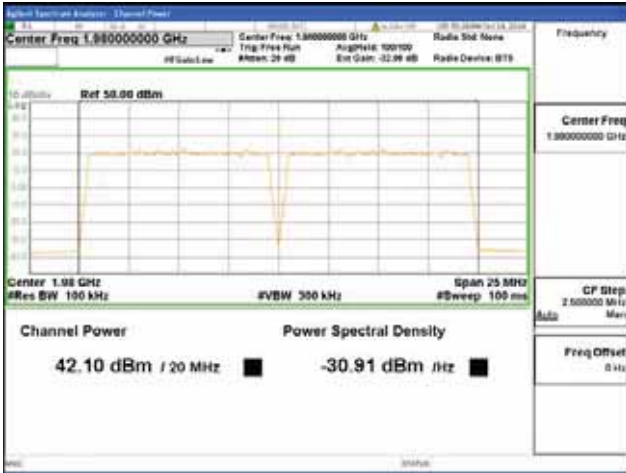
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Band 2, BW 10MHz + BW 10MHz, Multi carrier(Contiguous), 4TX, Top

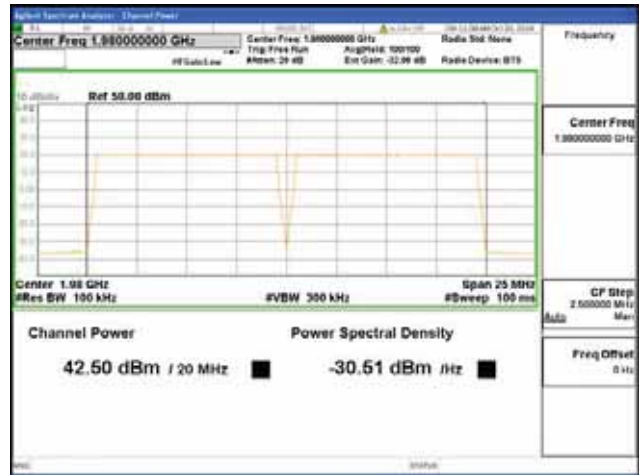
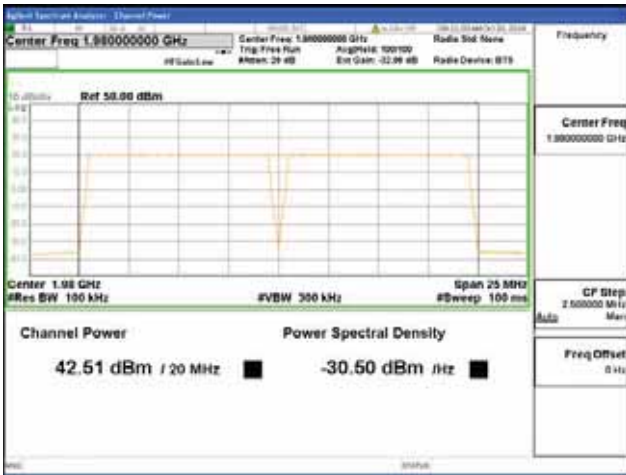
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64QAM

256QAM





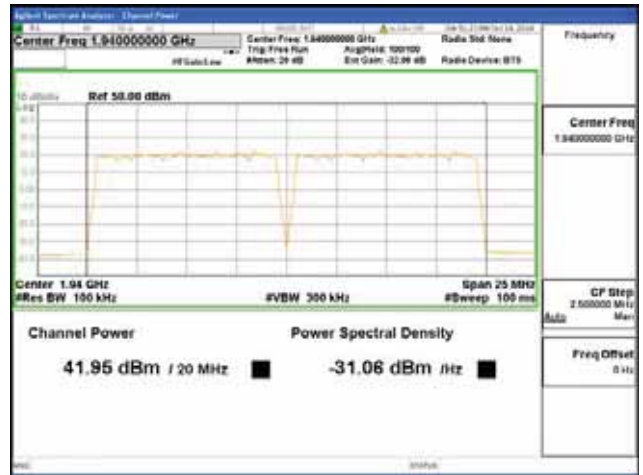
ANT 4

Band 2, BW 10MHz + BW 10MHz, Multi carrier(Contiguous), 4TX, Bottom

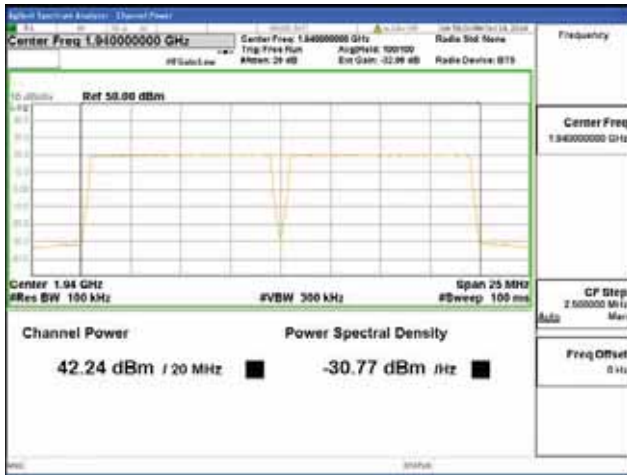
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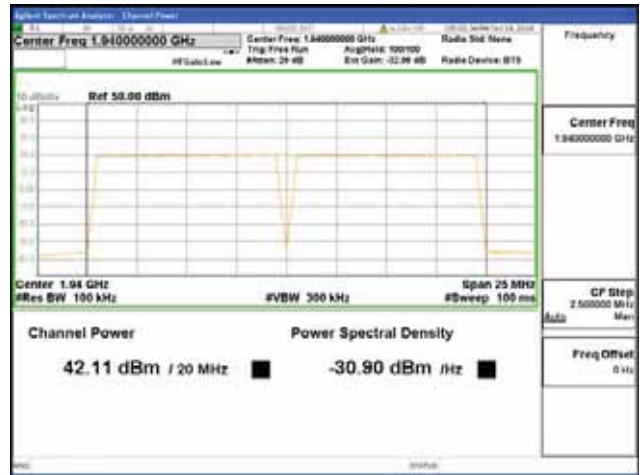
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64QAM



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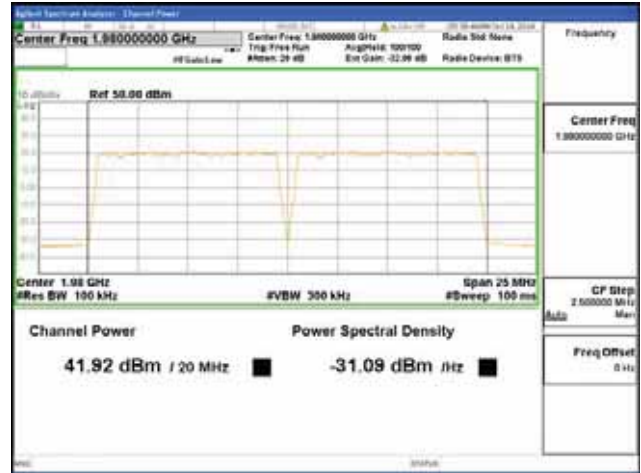
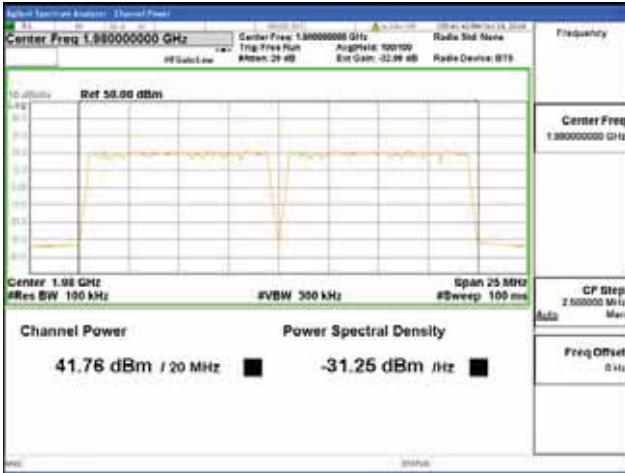




Band 2, BW 10MHz + BW 10MHz, Multi carrier(Contiguous), 4TX, Top

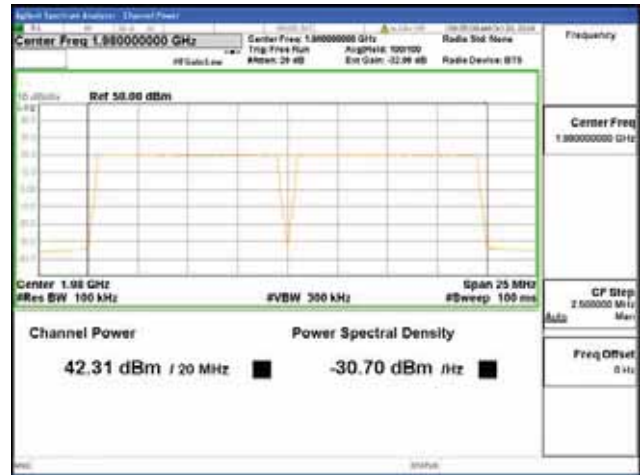
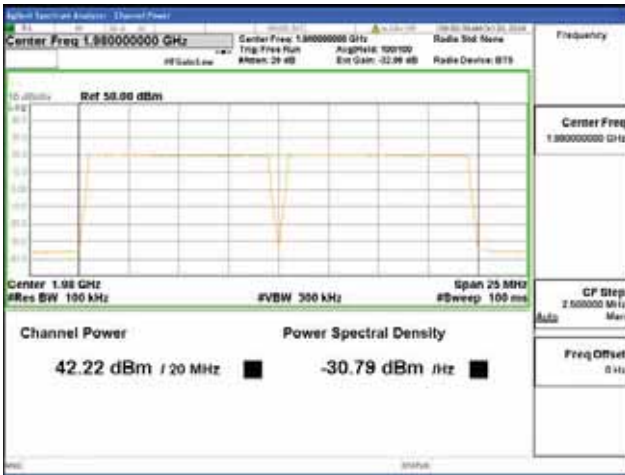
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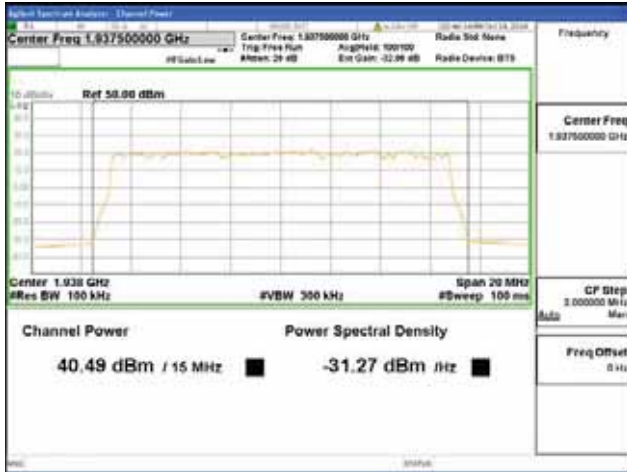




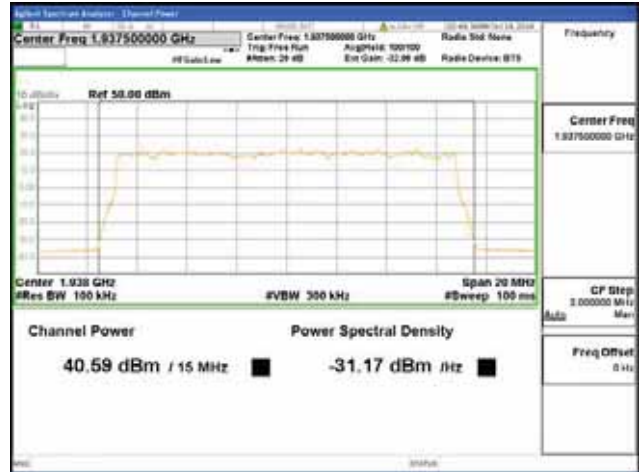
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Band 2, BW 15MHz + BW 5MHz, Multi carrier(Non-Contiguous), 4TX, Bottom

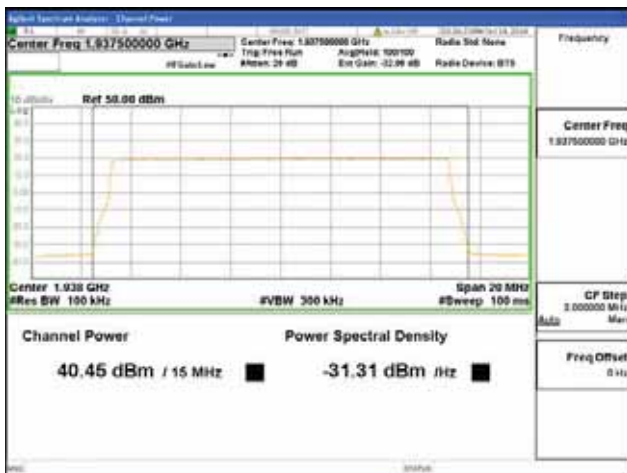
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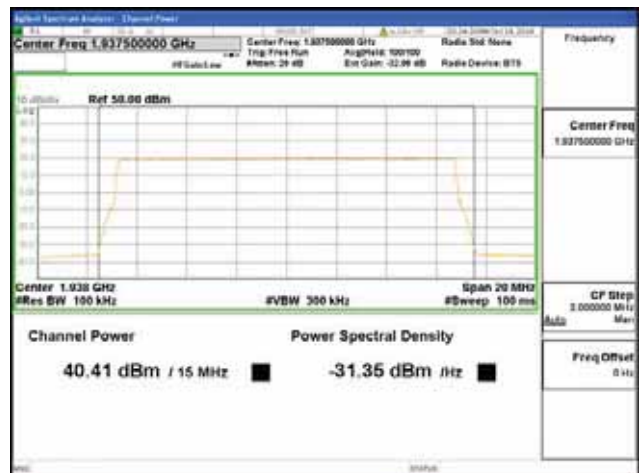
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64QAM



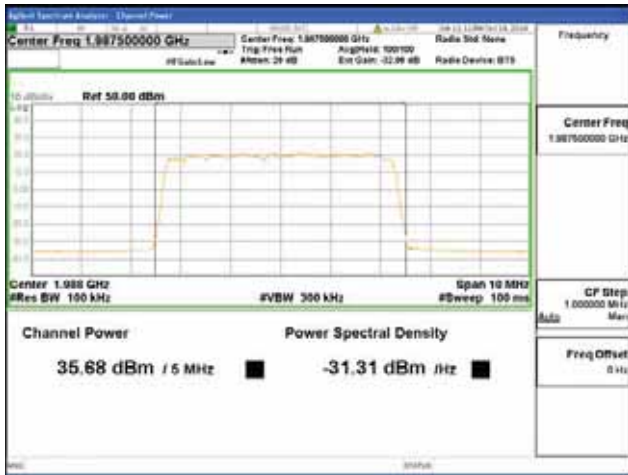
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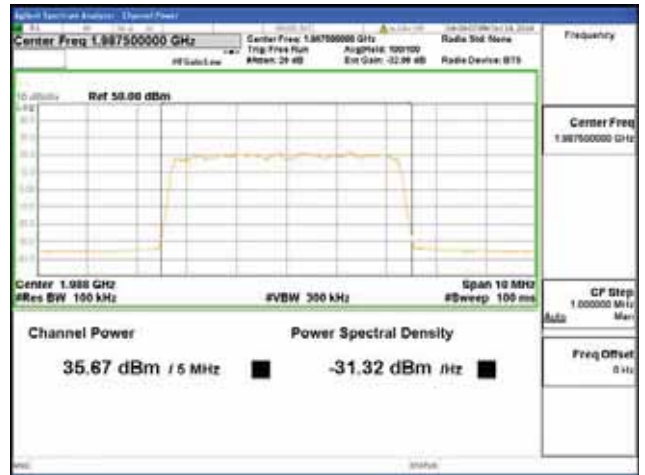


Band 2, BW 15MHz + BW 5MHz, Multi carrier(Non-Contiguous), 4TX, Top

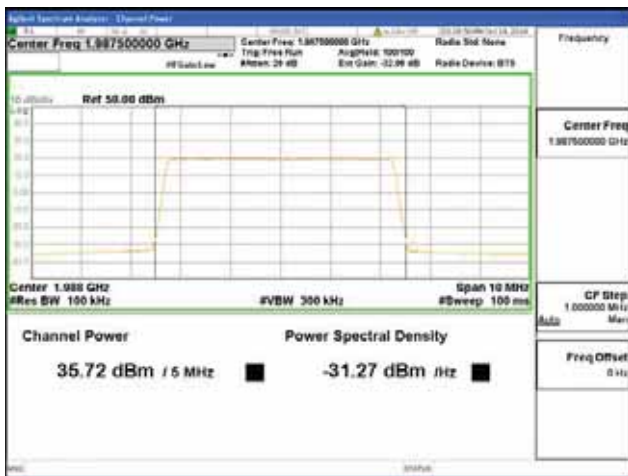
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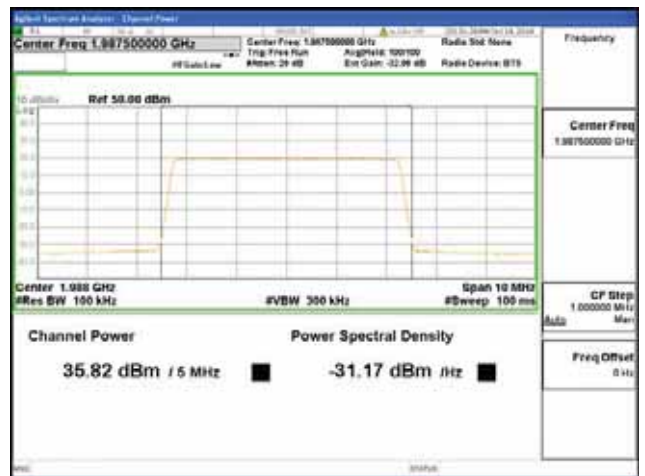
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64QAM



256QAM



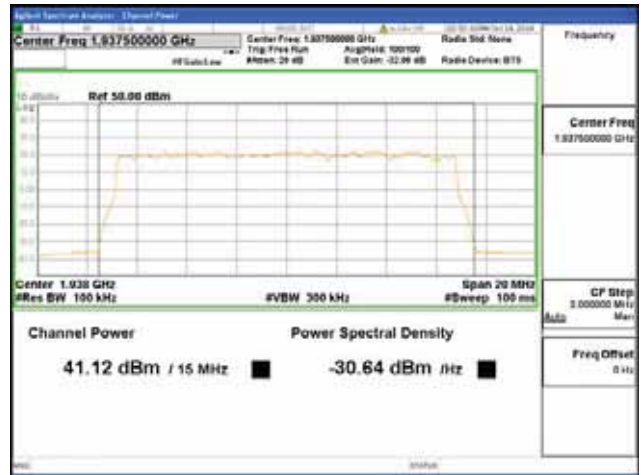
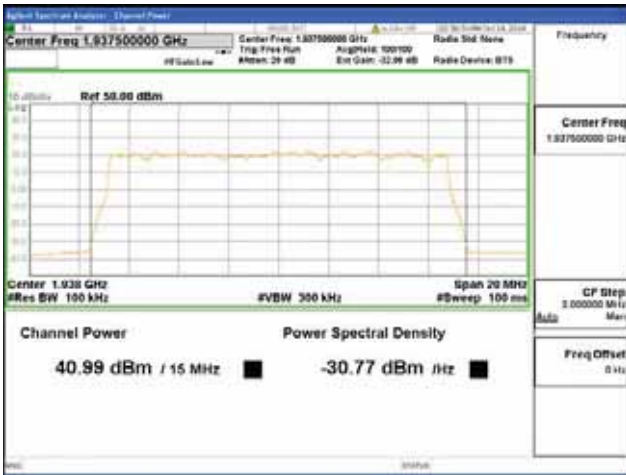


ANT 2

Band 2, BW 15MHz + BW 5MHz, Multi carrier(Non-Contiguous), 4TX, Bottom

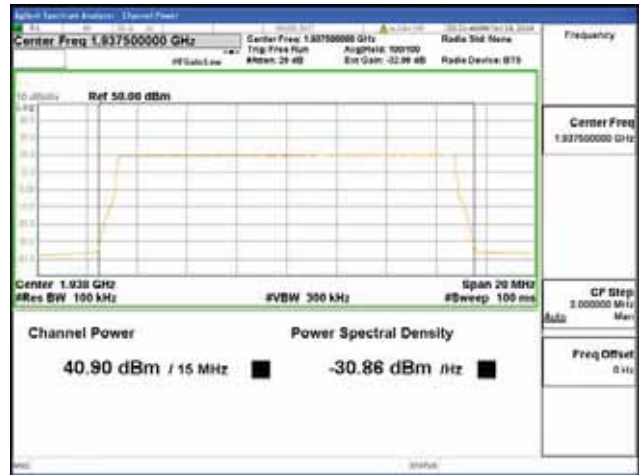
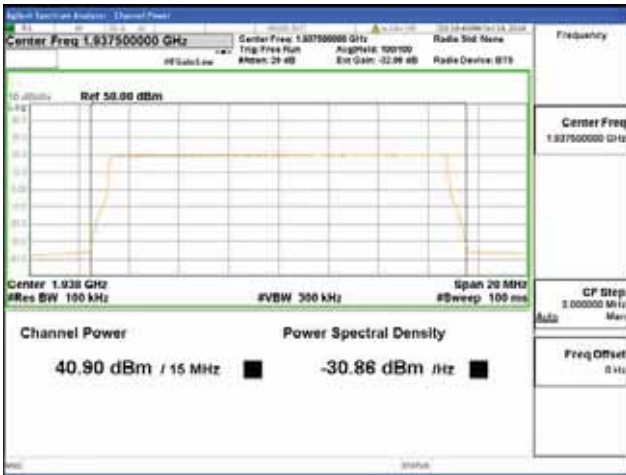
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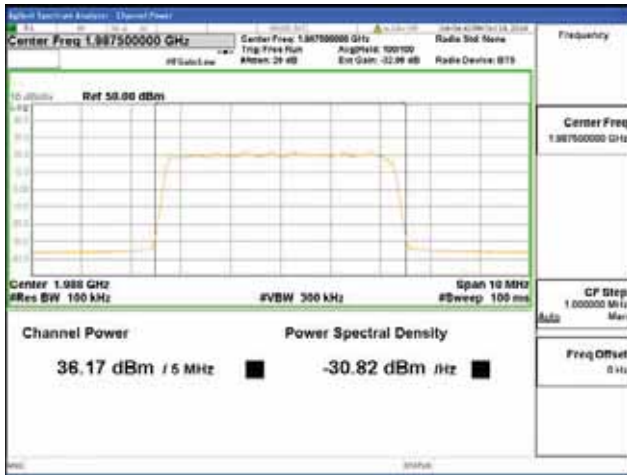
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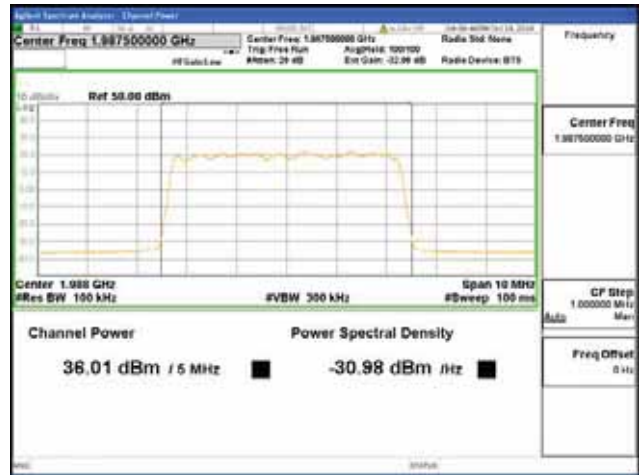


Band 2, BW 15MHz + BW 5MHz, Multi carrier(Non-Contiguous), 4TX, Top

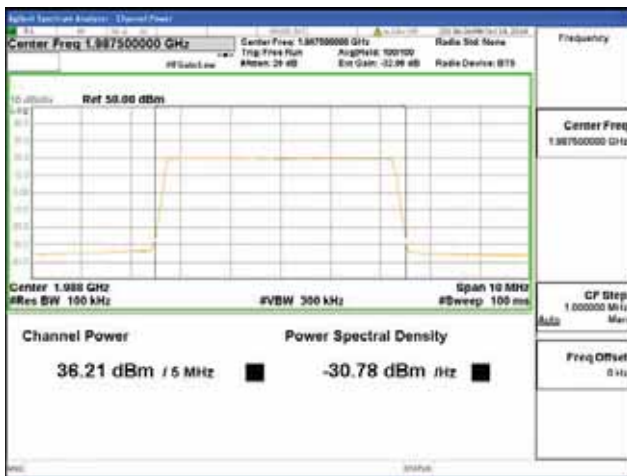
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16QAM



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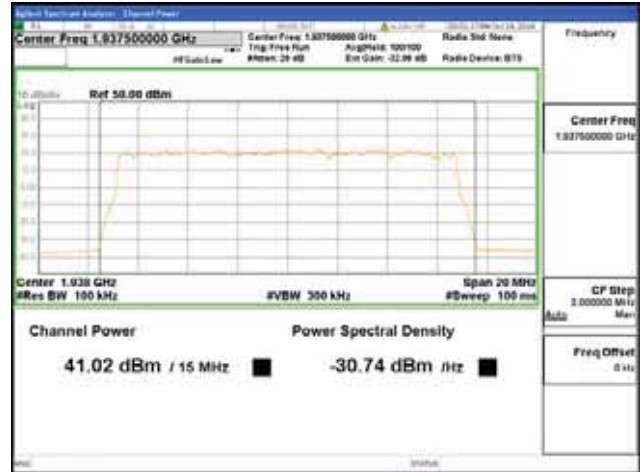
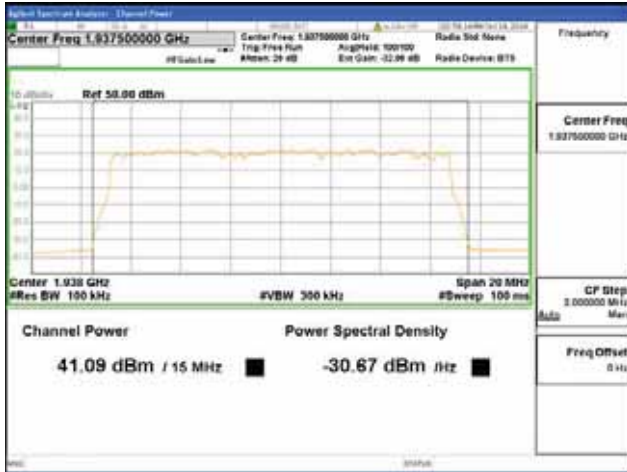


ANT 3

Band 2, BW 15MHz + BW 5MHz, Multi carrier(Non-Contiguous), 4TX, Bottom

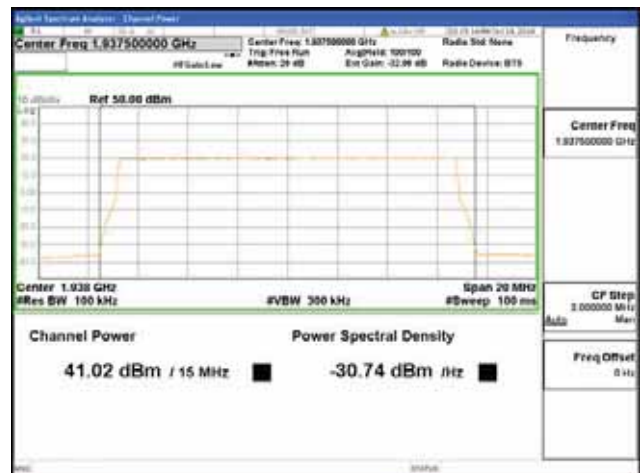
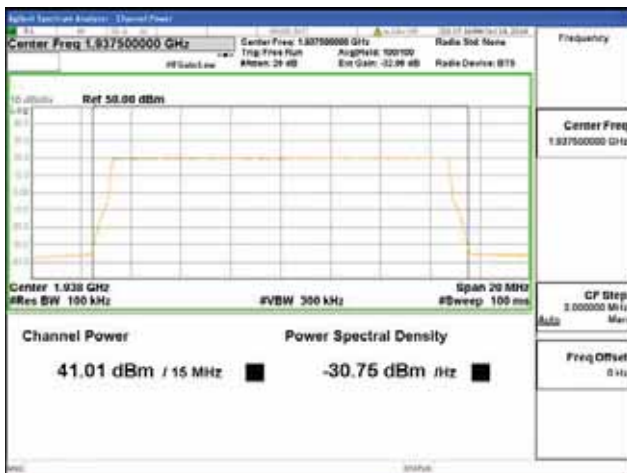
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16QAM



64QAM

256QAM



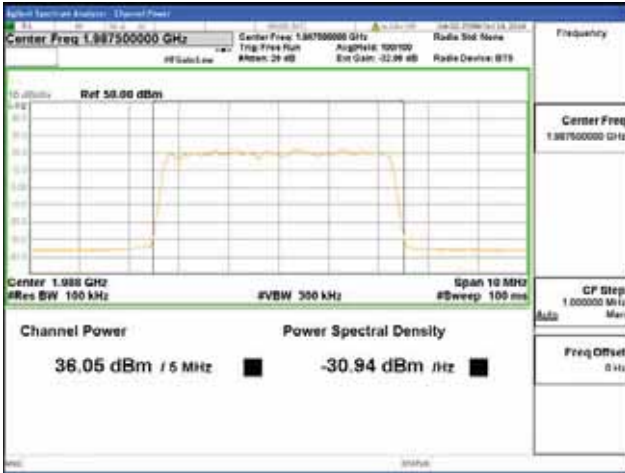


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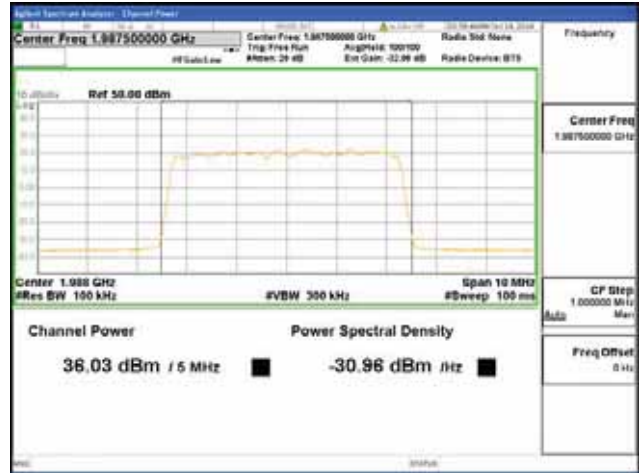
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Band 2, BW 15MHz + BW 5MHz, Multi carrier(Non-Contiguous), 4TX, Top

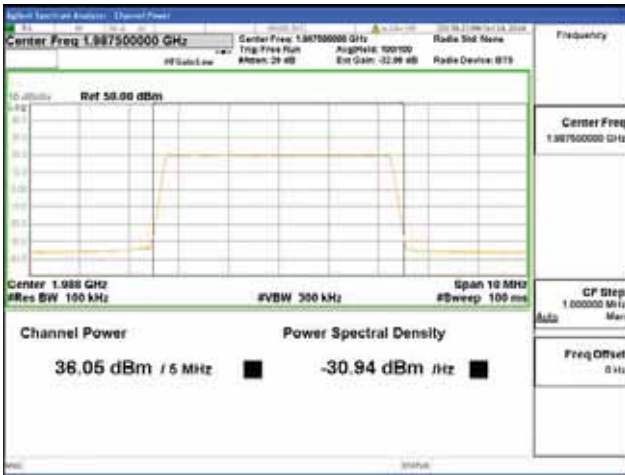
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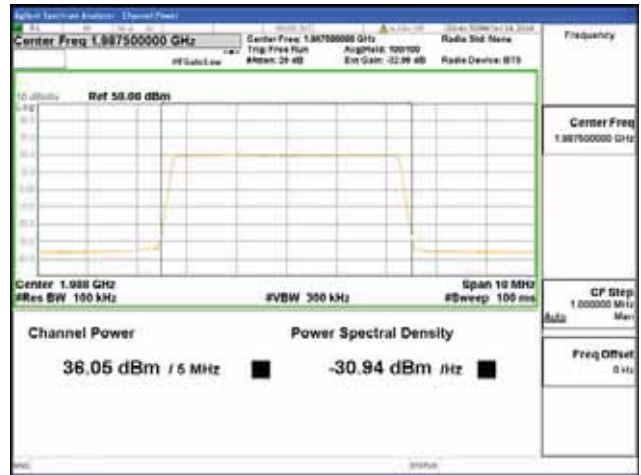
16QAM



64QAM



256QAM





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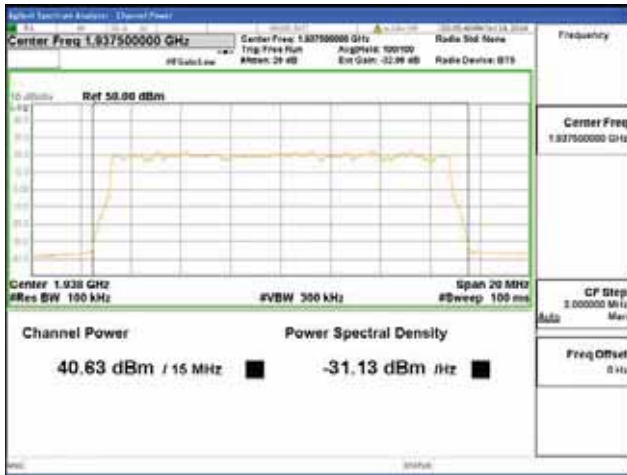
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ANT 4

Band 2, BW 15MHz + BW 5MHz, Multi carrier(Non-Contiguous), 4TX, Bottom

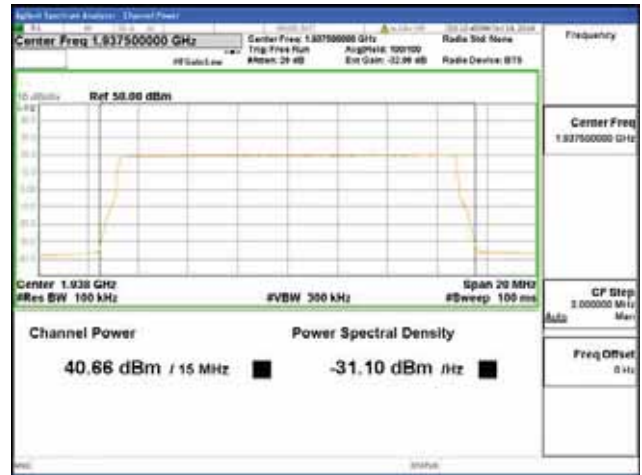
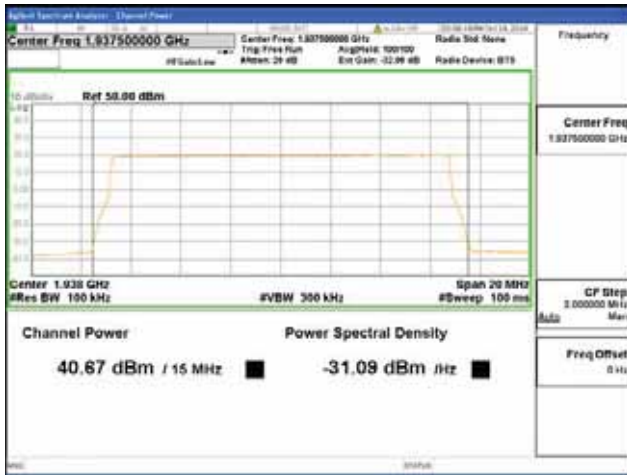
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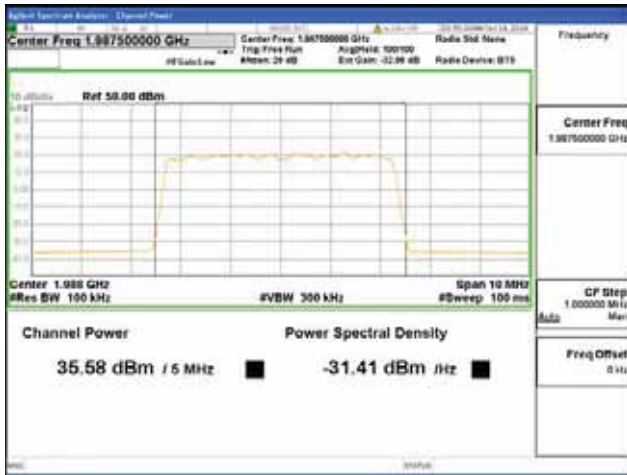


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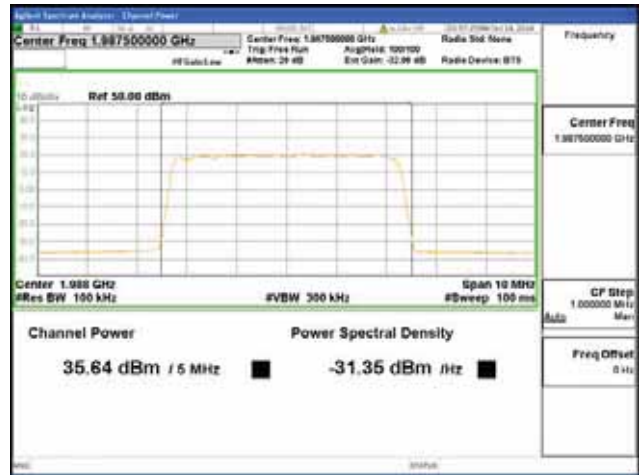
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Band 2, BW 15MHz + BW 5MHz, Multi carrier(Non-Contiguous), 4TX, Top

QPSK



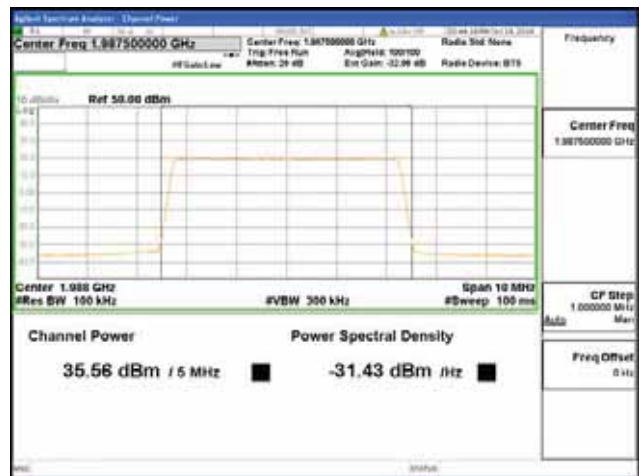
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64QAM



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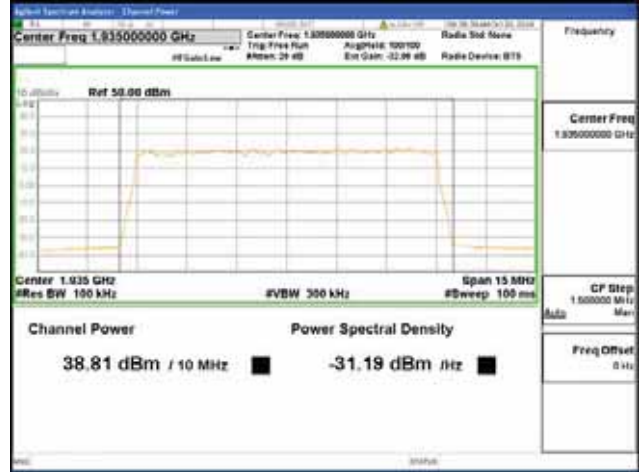
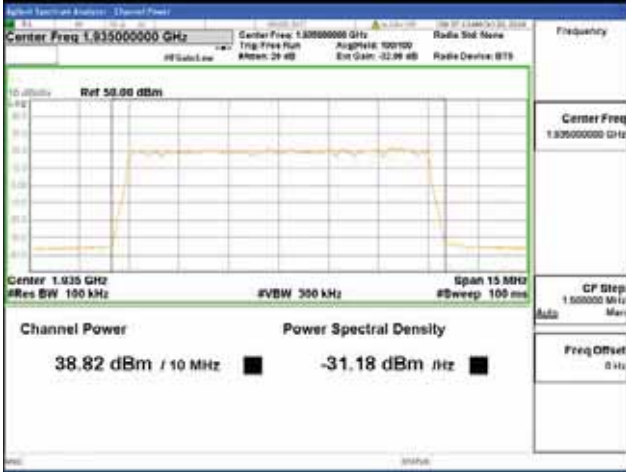


ANT 1

Band 2, BW 10MHz + BW 10MHz, Multi carrier(Non-Contiguous), 4TX, Bottom

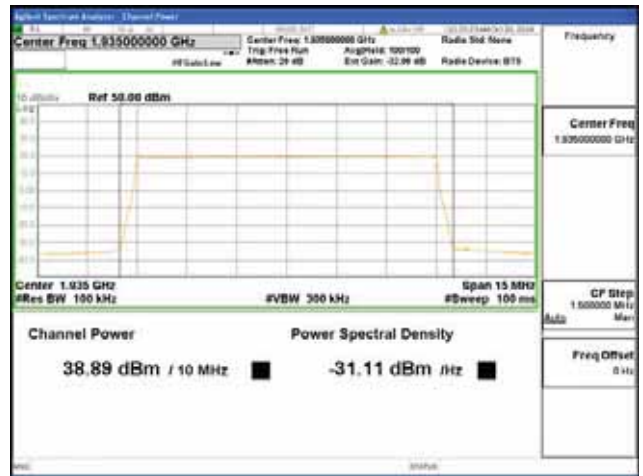
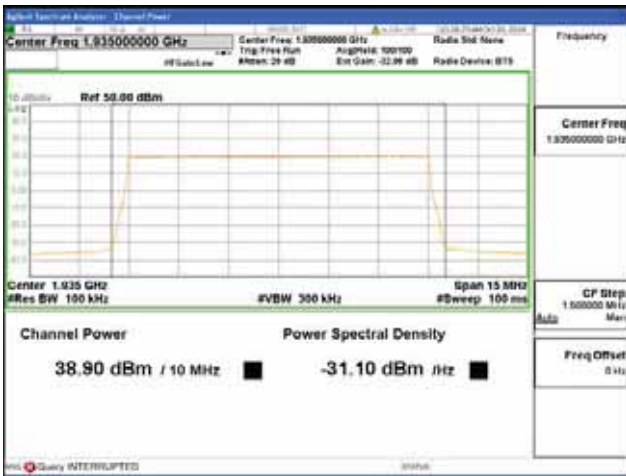
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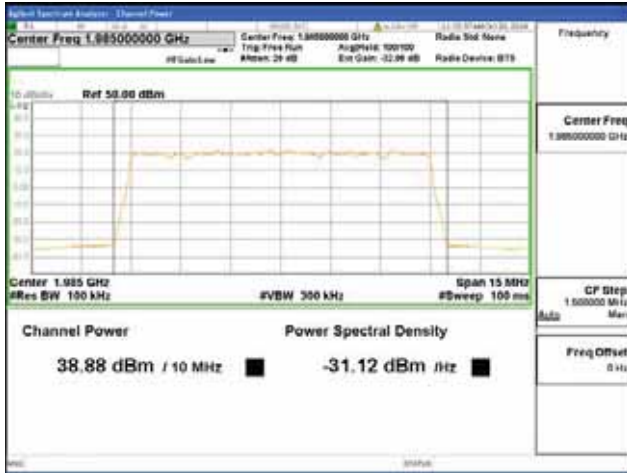


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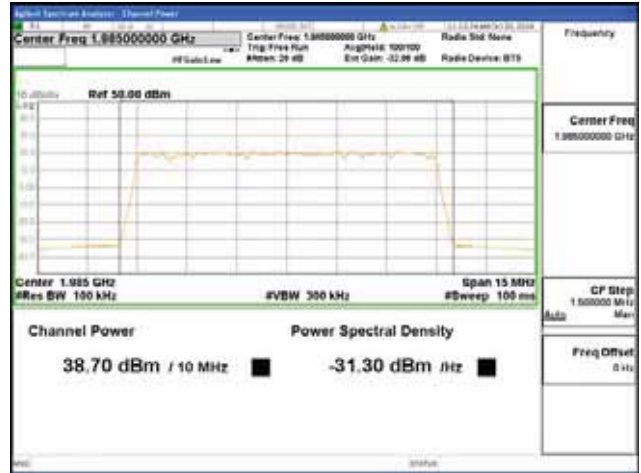
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Band 2, BW 10MHz + BW 10MHz, Multi carrier(Non-Contiguous), 4TX, Top

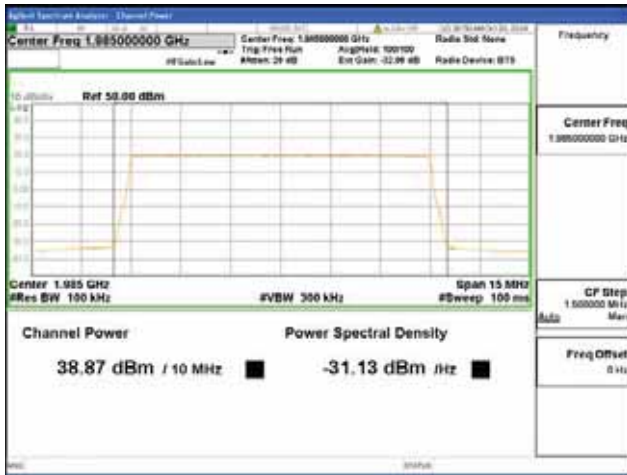
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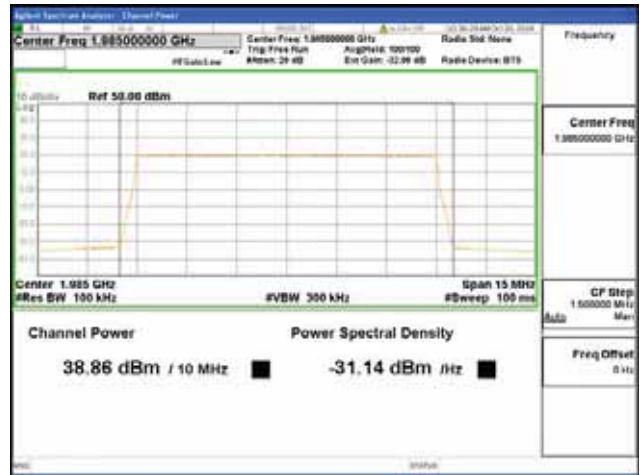
16QAM



64QAM



256QAM





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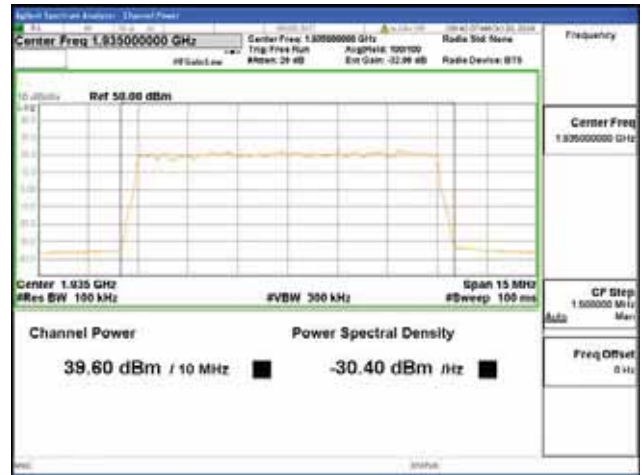
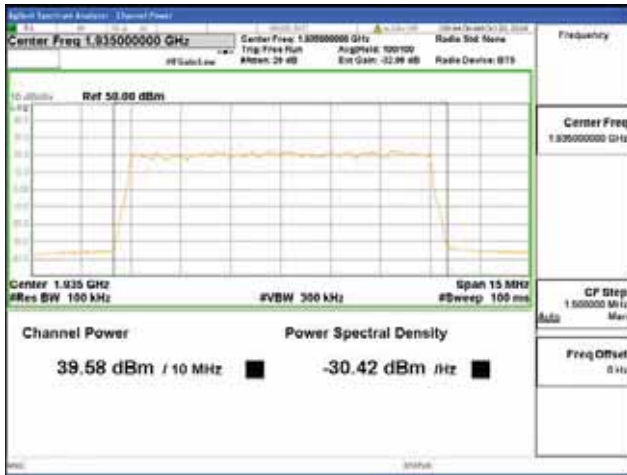
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ANT 2

Band 2, BW 10MHz + BW 10MHz, Multi carrier(Non-Contiguous), 4TX, Bottom

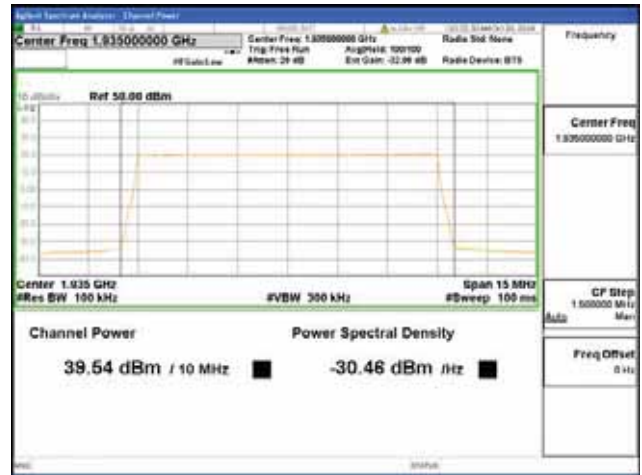
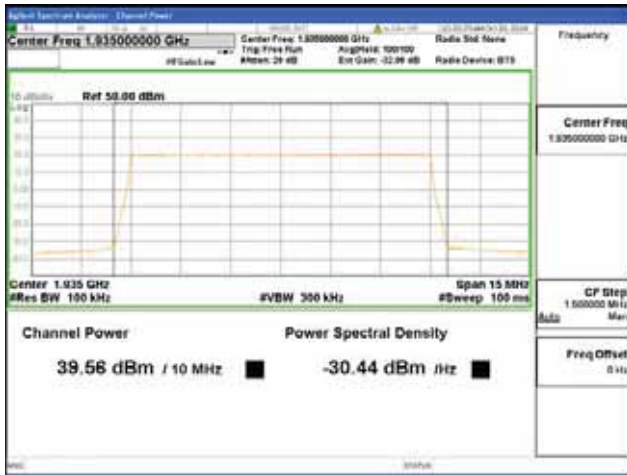
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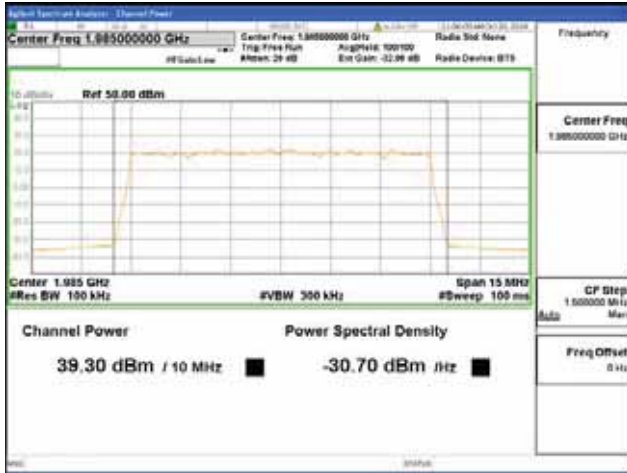


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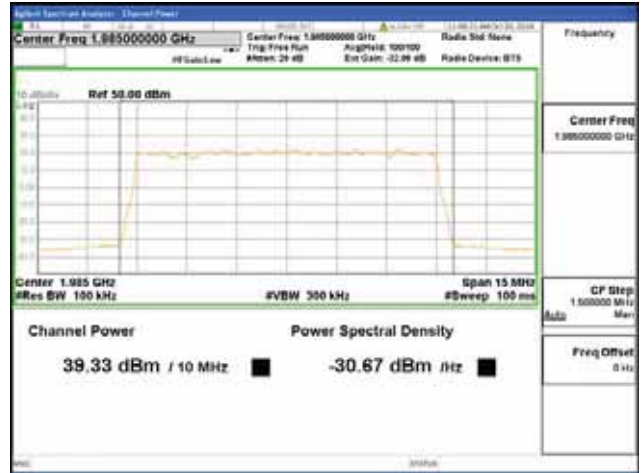
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Band 2, BW 10MHz + BW 10MHz, Multi carrier(Non-Contiguous), 4TX, Top

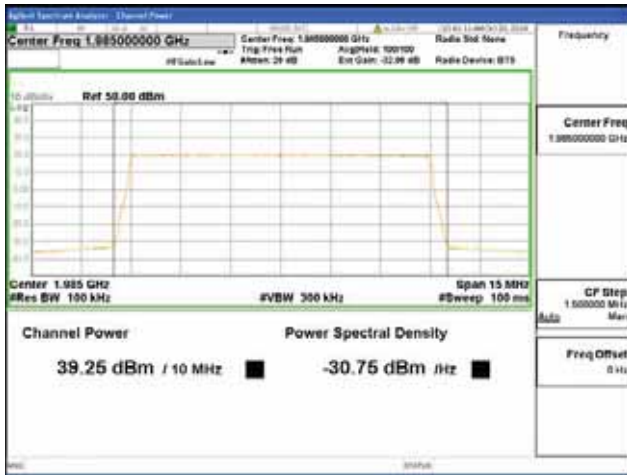
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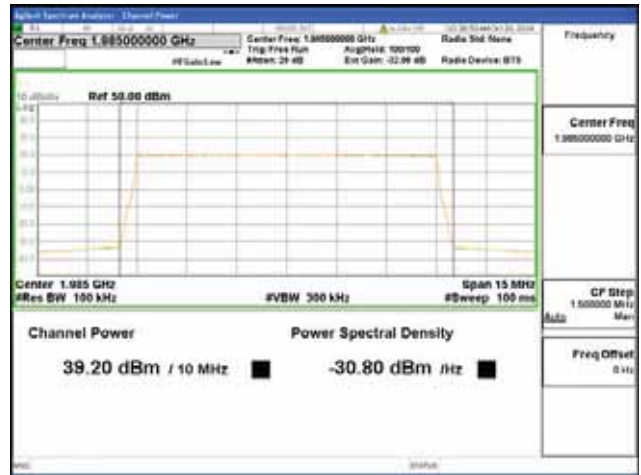
16QAM



64QAM



256QAM





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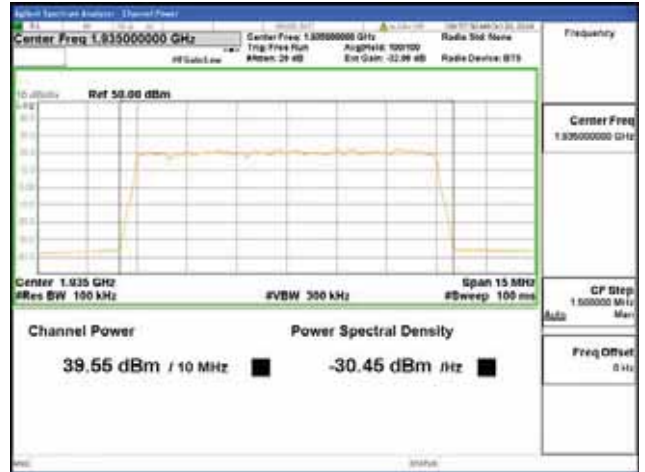
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ANT 3

Band 2, BW 10MHz + BW 10MHz, Multi carrier(Non-Contiguous), 4TX, Bottom

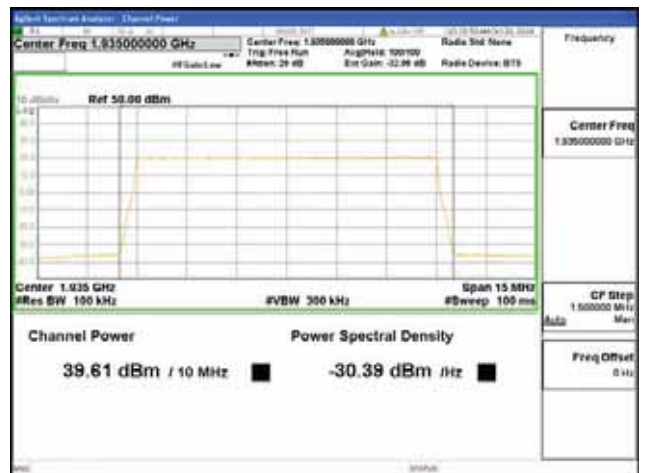
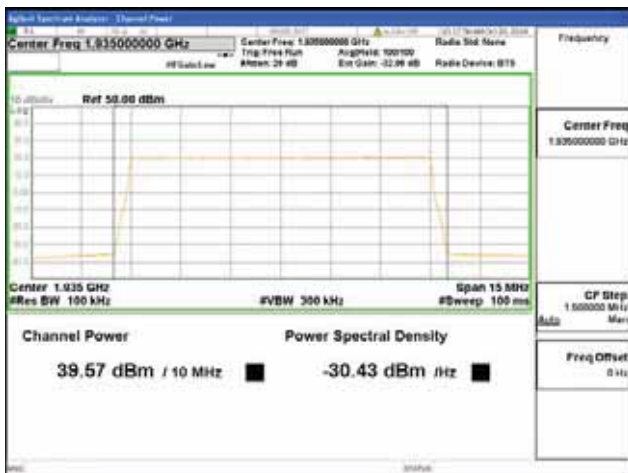
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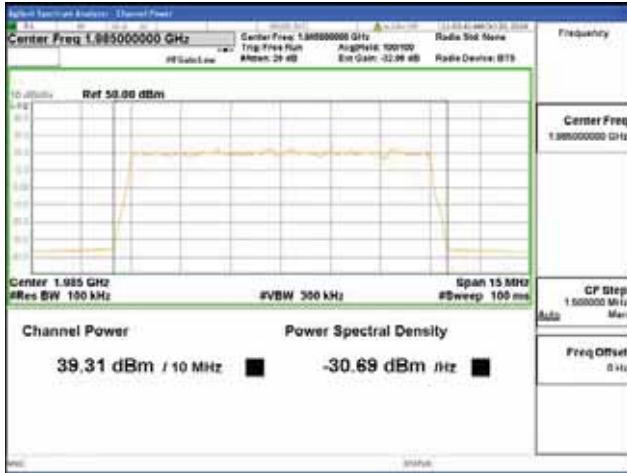


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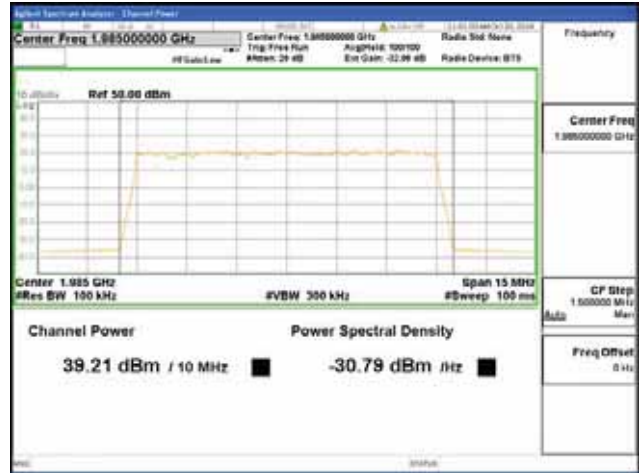
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Band 2, BW 10MHz + BW 10MHz, Multi carrier(Non-Contiguous), 4TX, Top

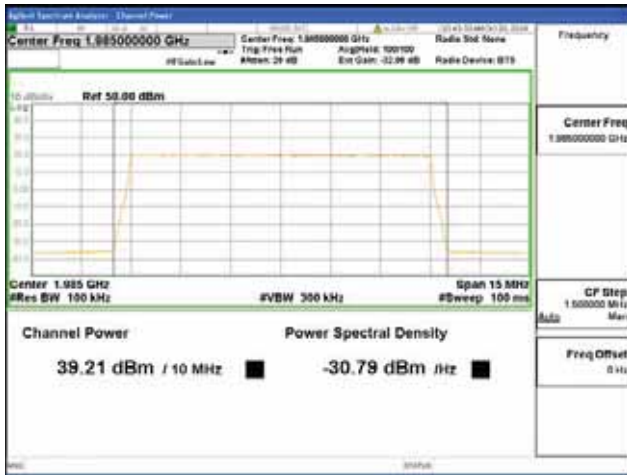
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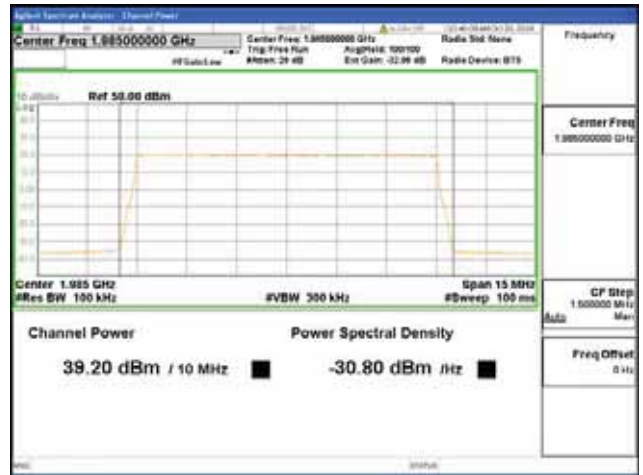
16QAM



64QAM



256QAM





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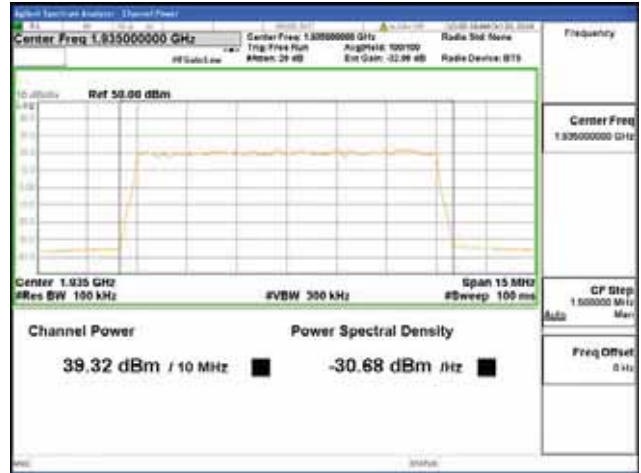
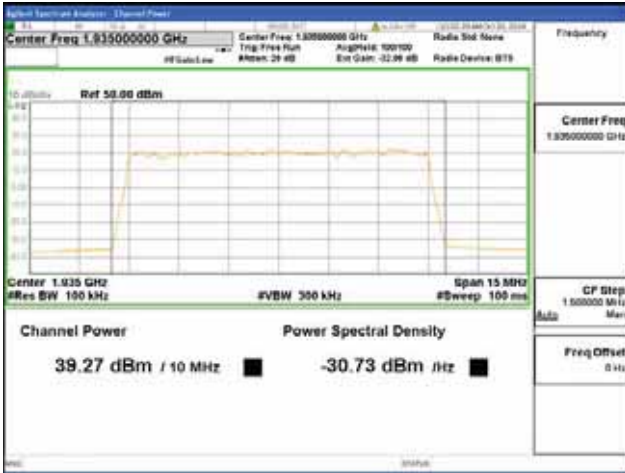
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ANT 4

Band 2, BW 10MHz + BW 10MHz, Multi carrier(Non-Contiguous), 4TX, Bottom

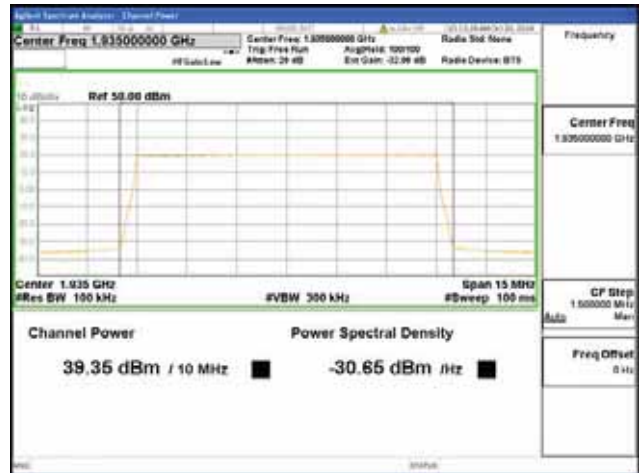
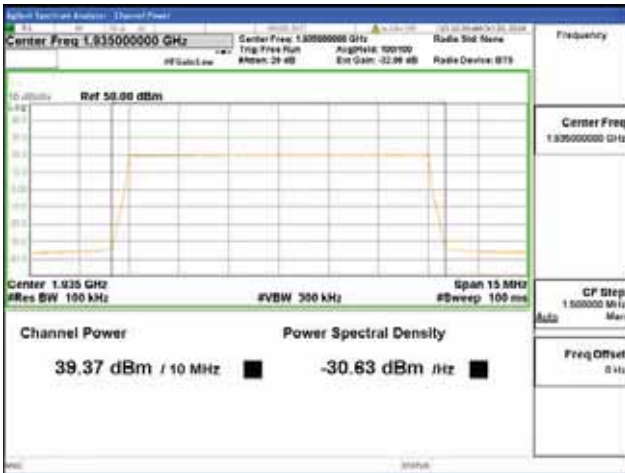
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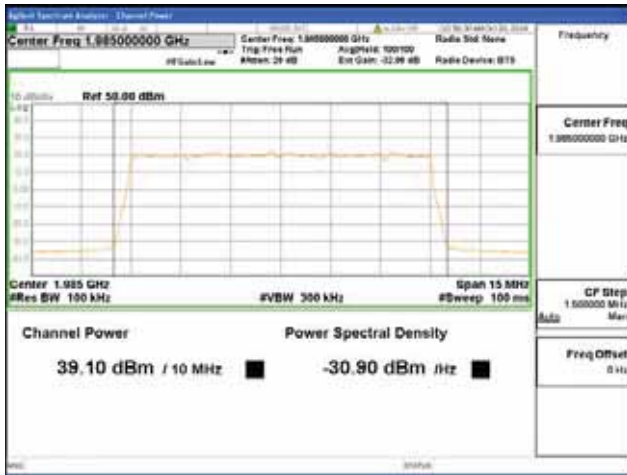


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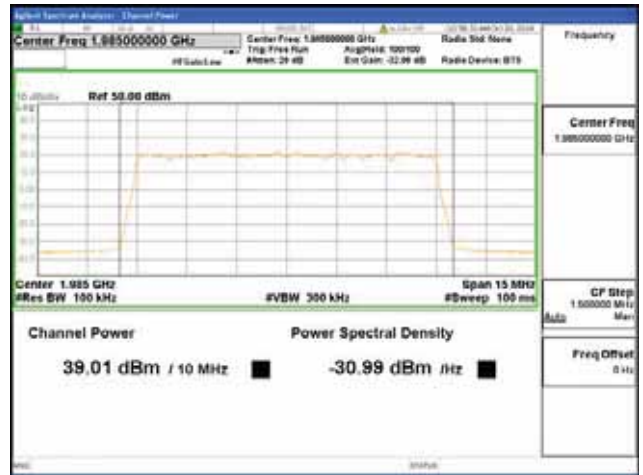
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Band 2, BW 10MHz + BW 10MHz, Multi carrier(Non-Contiguous), 4TX, Top

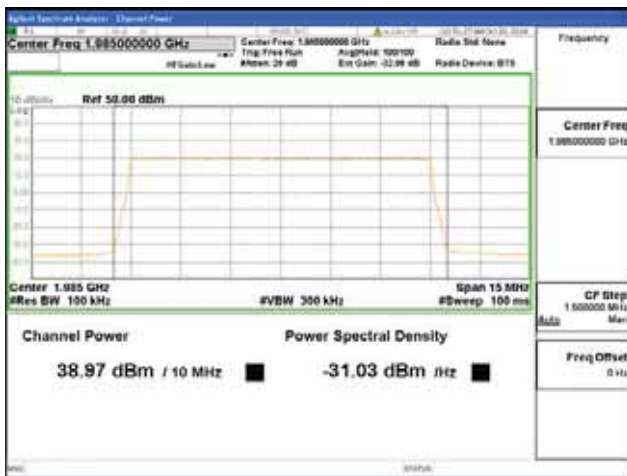
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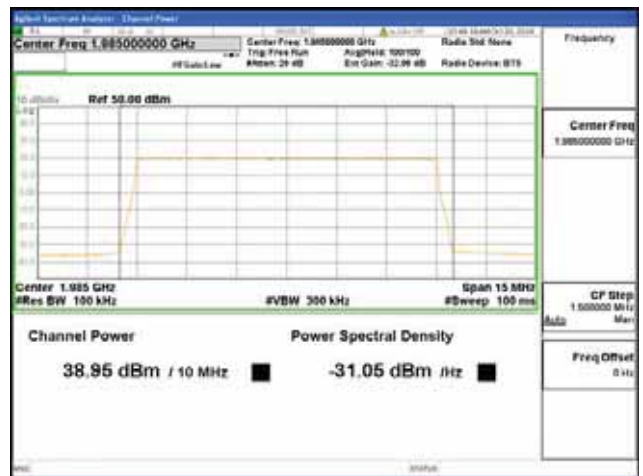
16QAM



64QAM



256QAM





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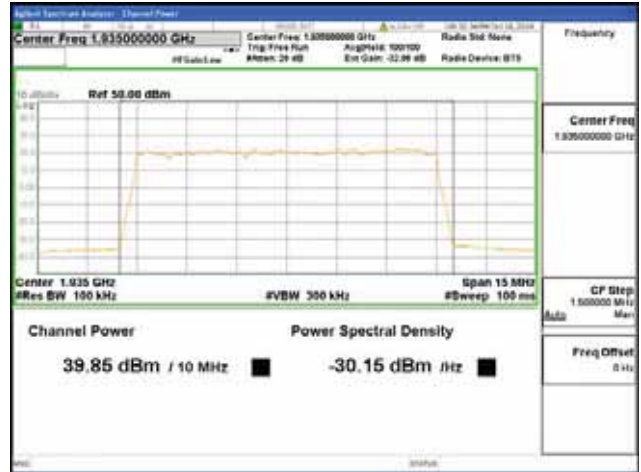
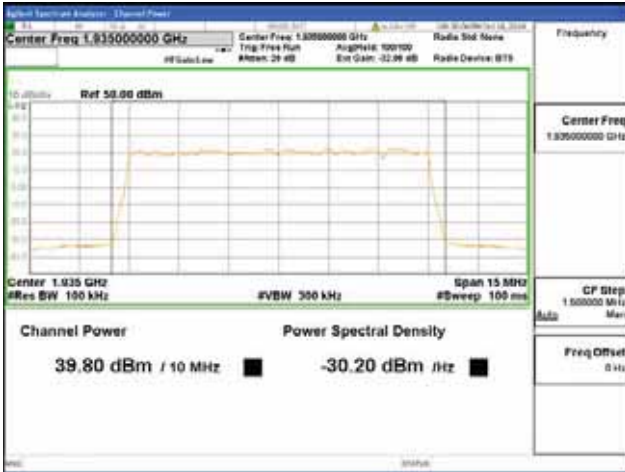
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ANT 1

Band 2, BW 10MHz + BW 5MHz, Multi carrier(Non-Contiguous), 4TX, Bottom

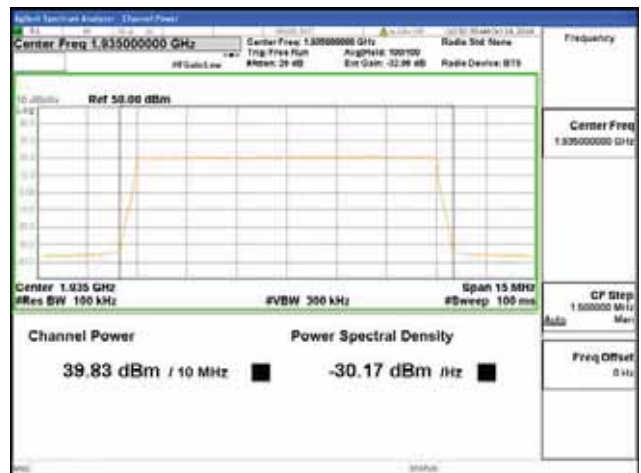
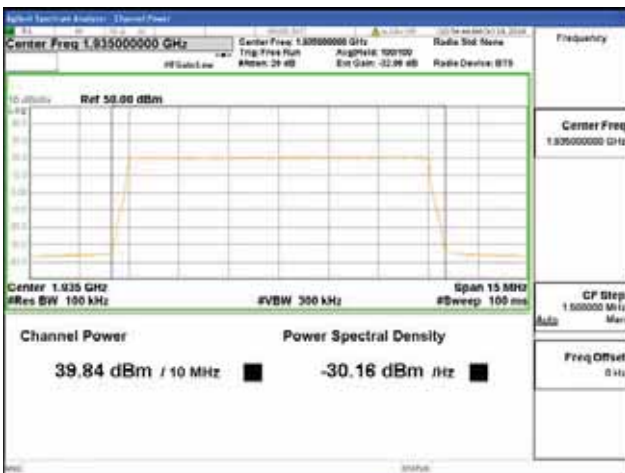
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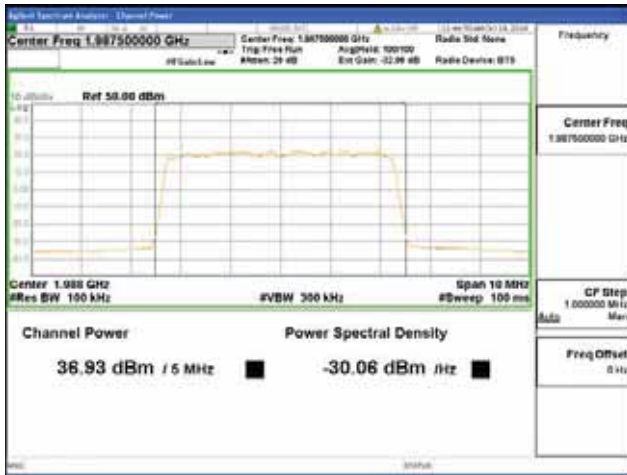
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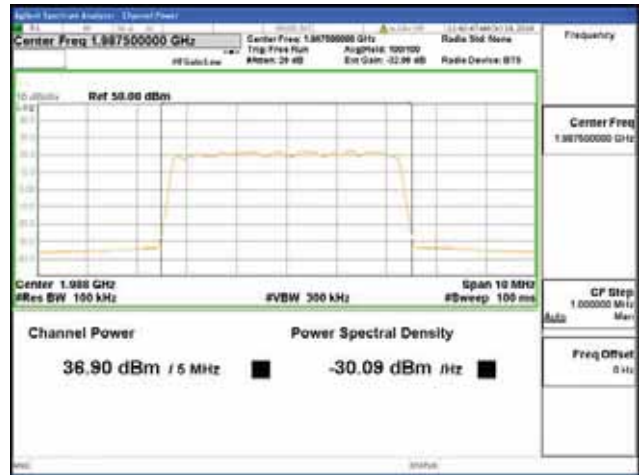


Band 2, BW 10MHz + BW 5MHz, Multi carrier(Non-Contiguous), 4TX, Top

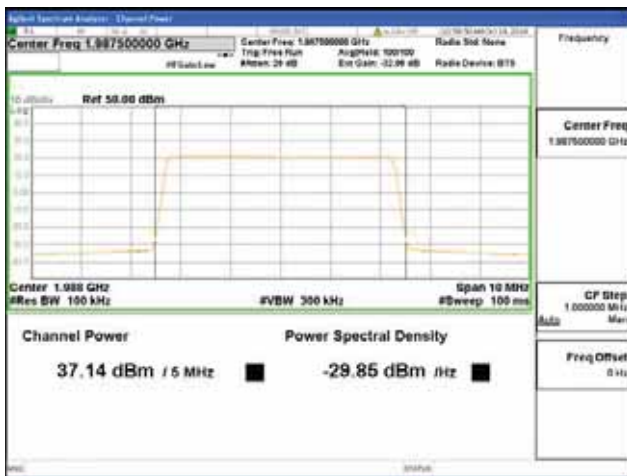
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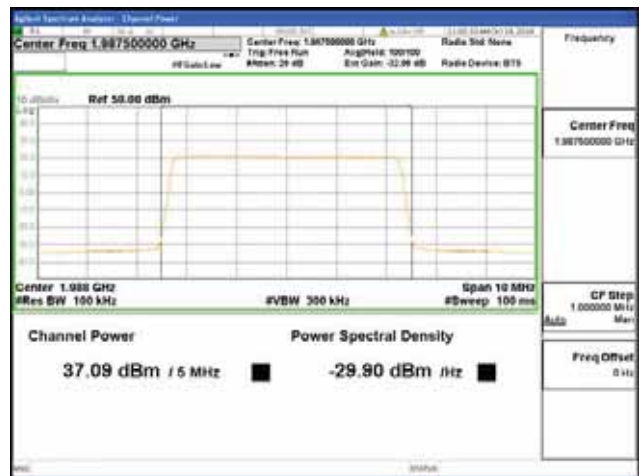
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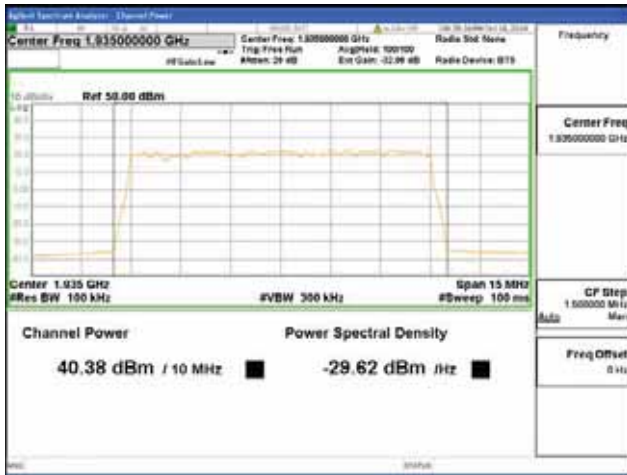
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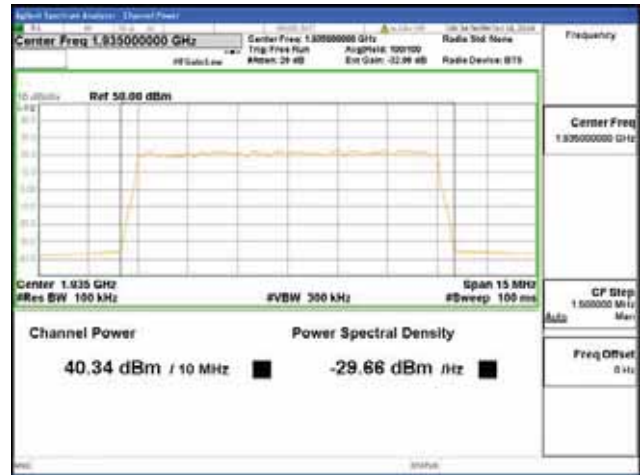
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Band 2, BW 10MHz + BW 5MHz, Multi carrier(Non-Contiguous), 4TX, Bottom

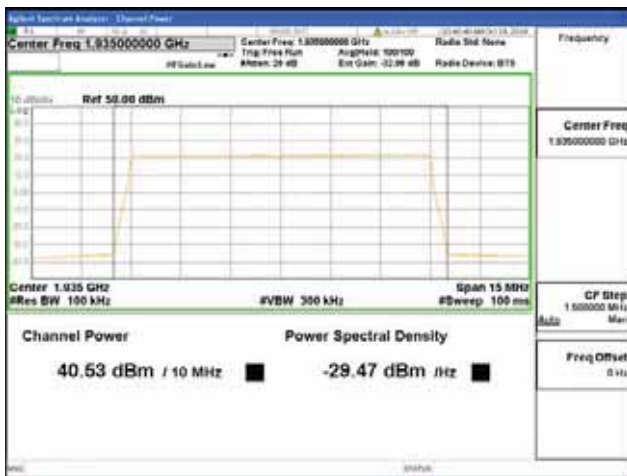
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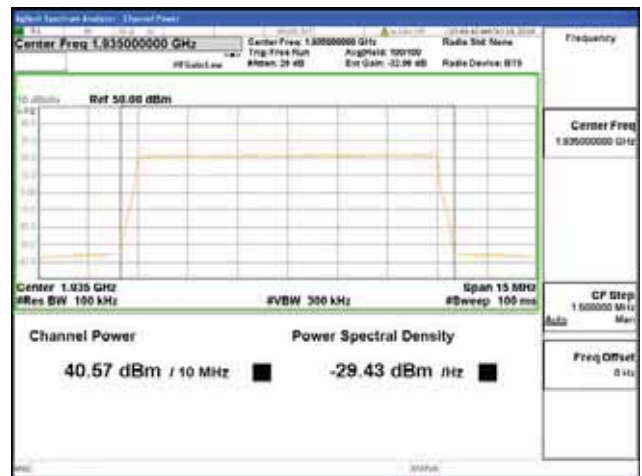
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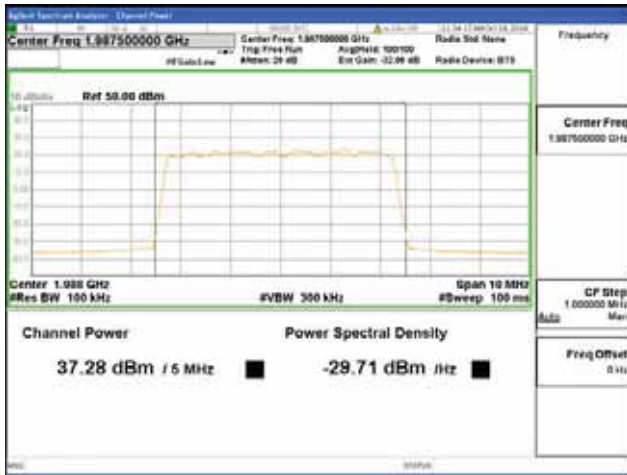
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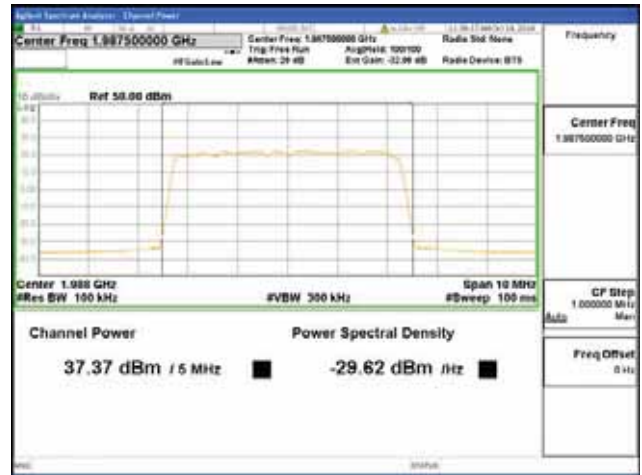


Band 2, BW 10MHz + BW 5MHz, Multi carrier(Non-Contiguous), 4TX, Top

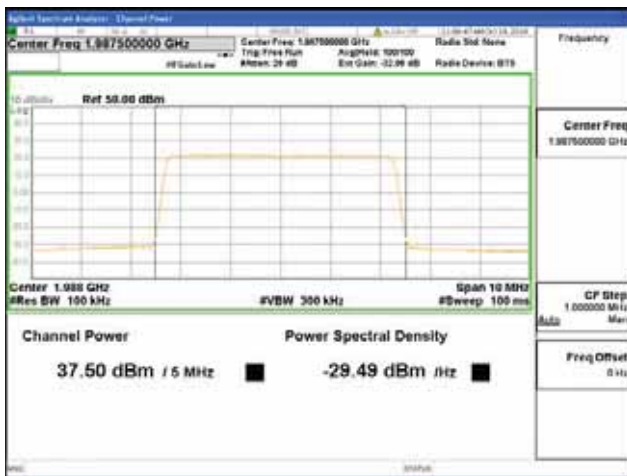
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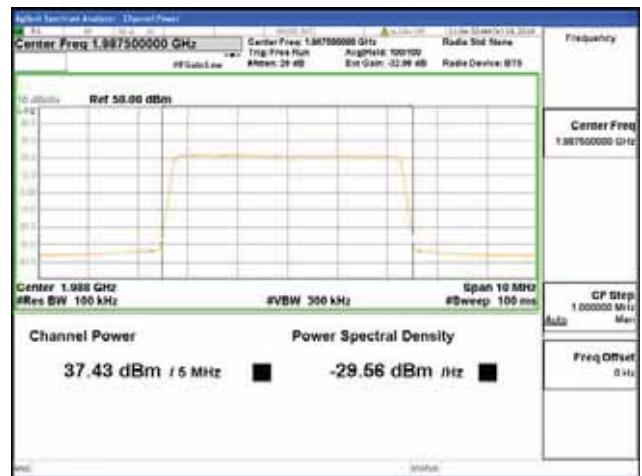
16QAM



64QAM



256QAM





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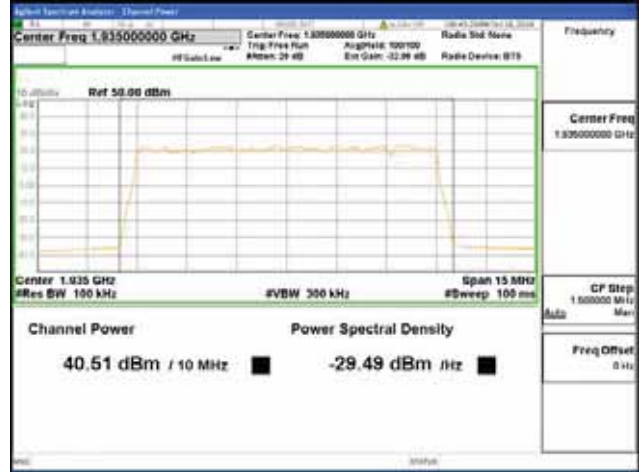
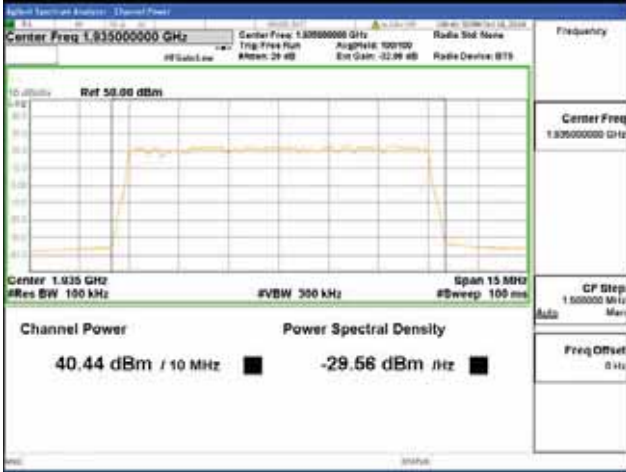
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ANT 3

Band 2, BW 10MHz + BW 5MHz, Multi carrier(Non-Contiguous), 4TX, Bottom

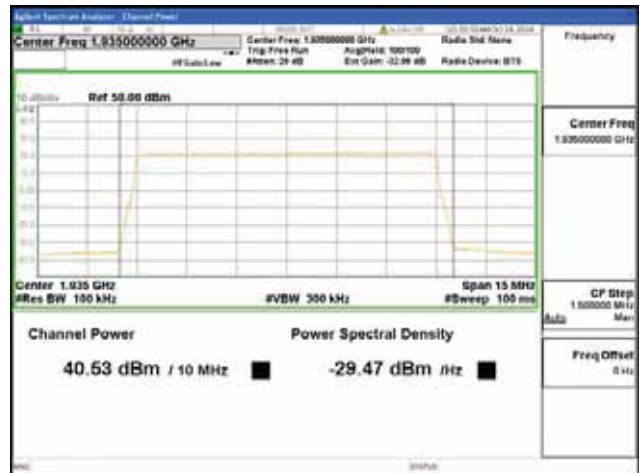
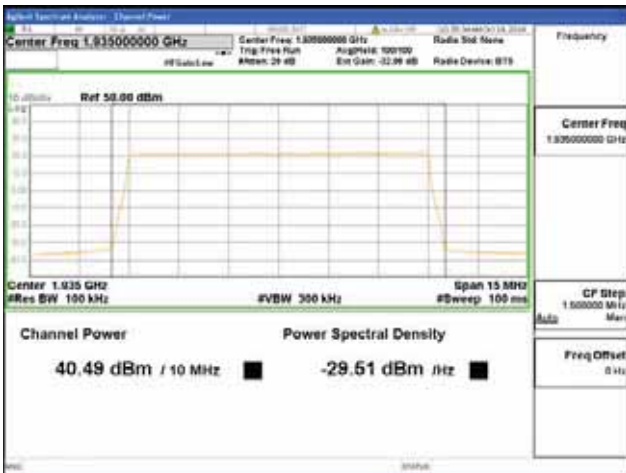
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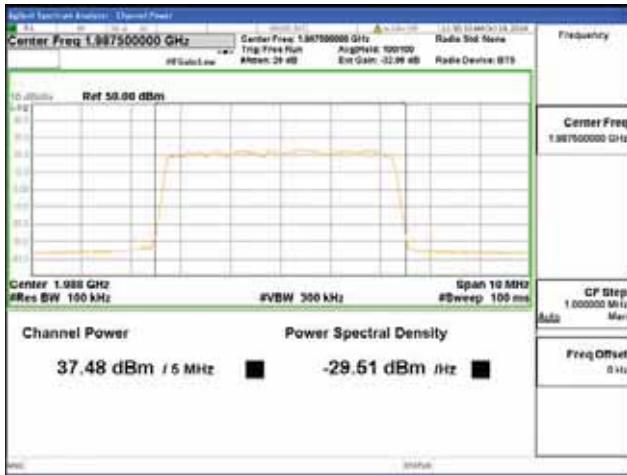


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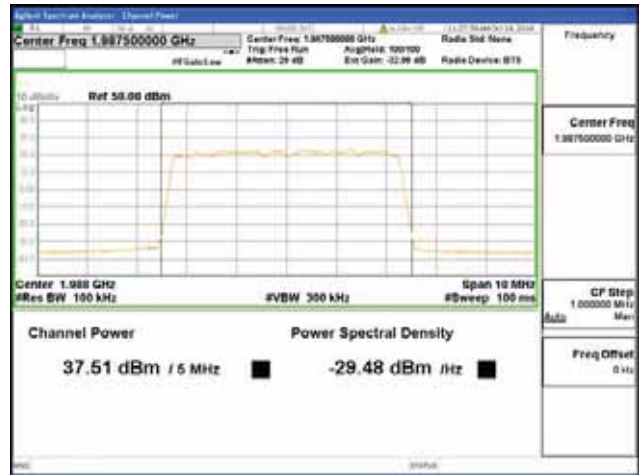
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Band 2, BW 10MHz + BW 5MHz, Multi carrier(Non-Contiguous), 4TX, Top

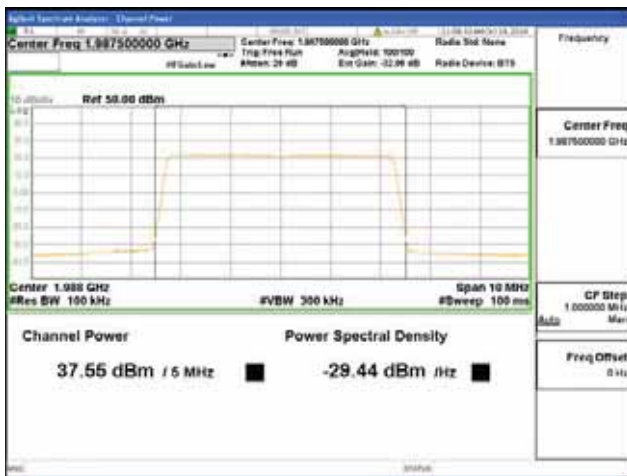
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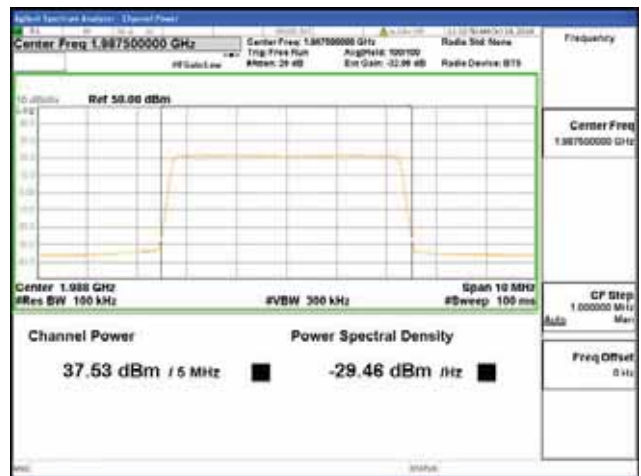
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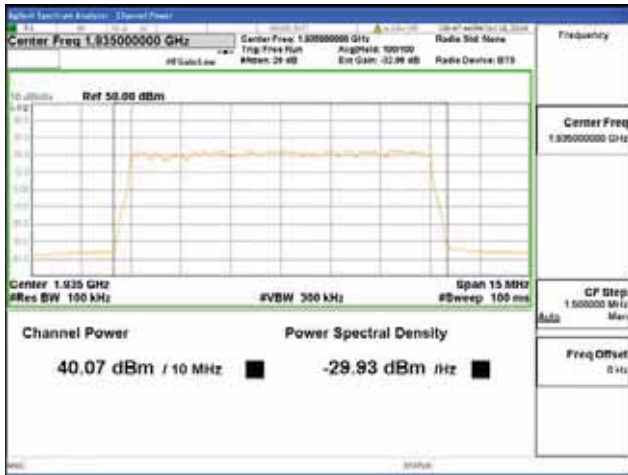
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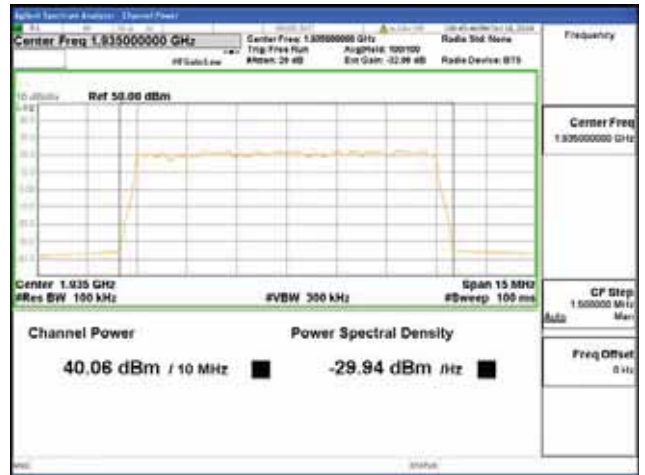
ANT 4

Band 2, BW 10MHz + BW 5MHz, Multi carrier(Non-Contiguous), 4TX, Bottom

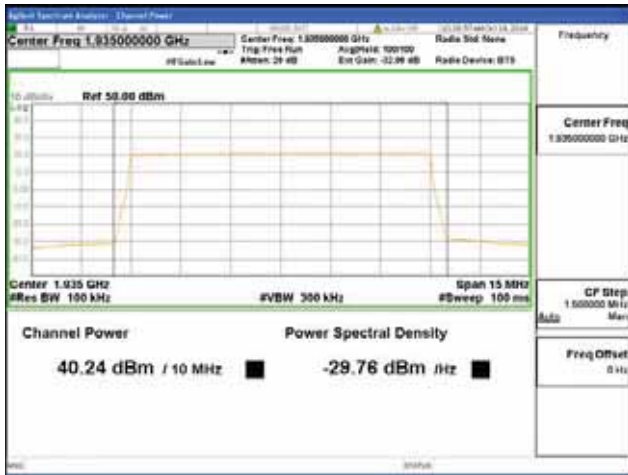
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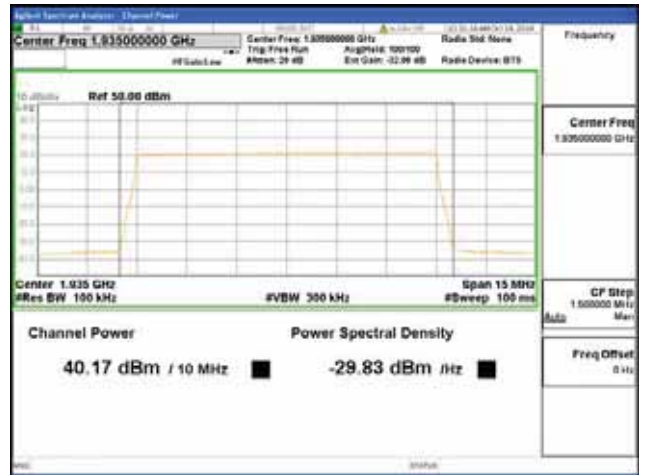
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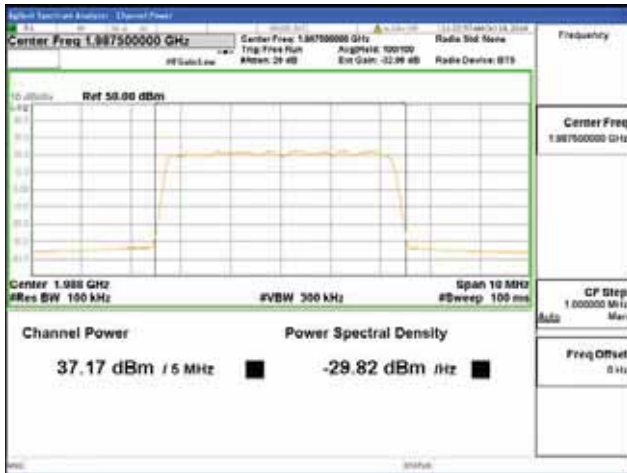
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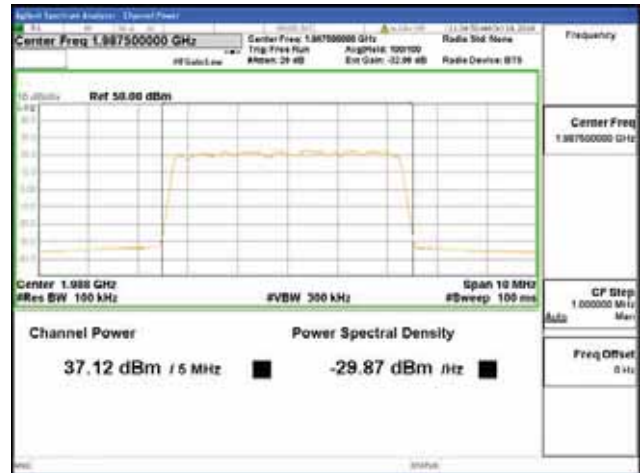


Band 2, BW 10MHz + BW 5MHz, Multi carrier(Non-Contiguous), 4TX, Top

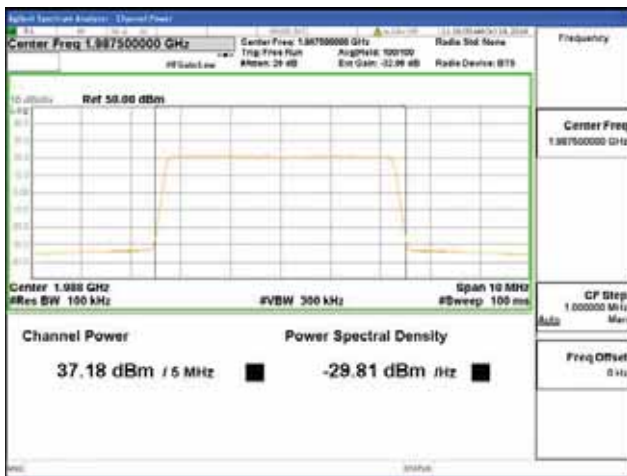
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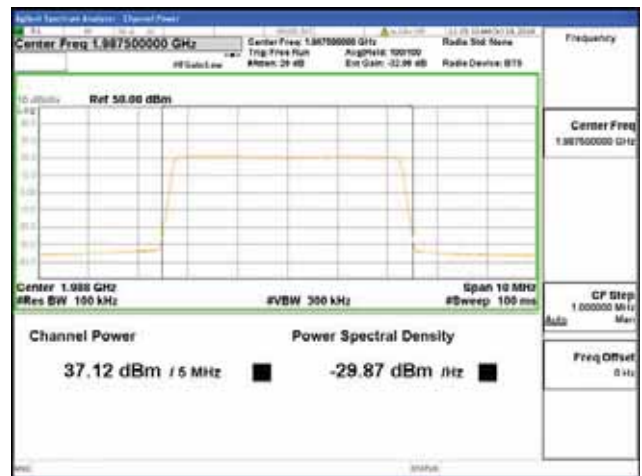
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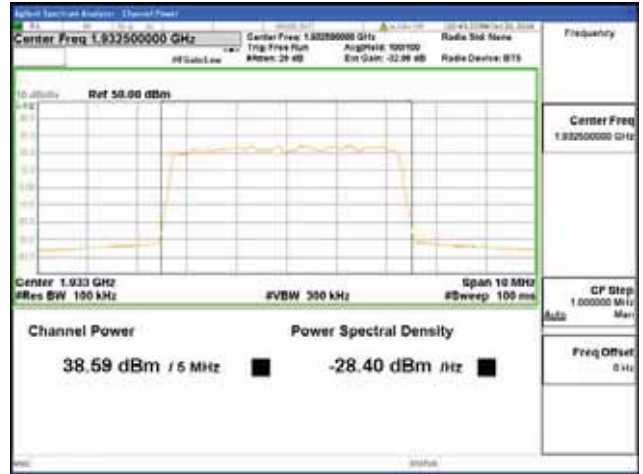
ANT 1

Band 2, BW 5MHz + BW 5MHz, Multi carrier(Non-Contiguous), 4TX, Bottom

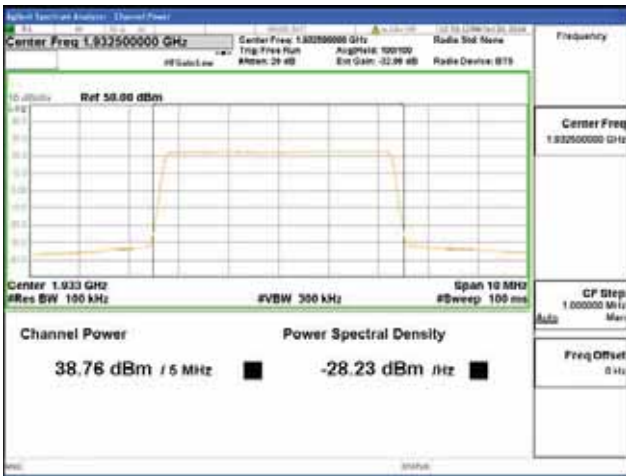
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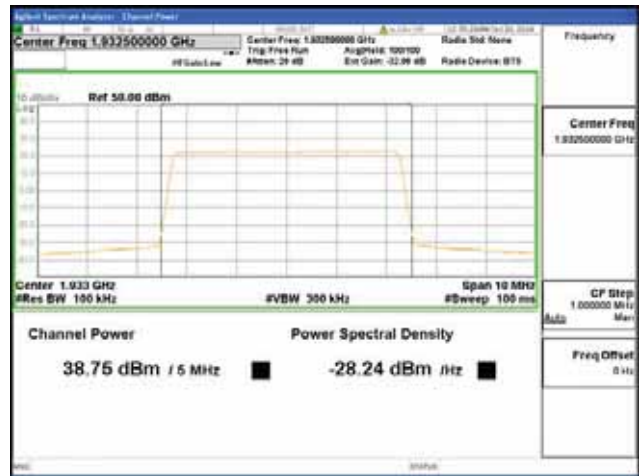
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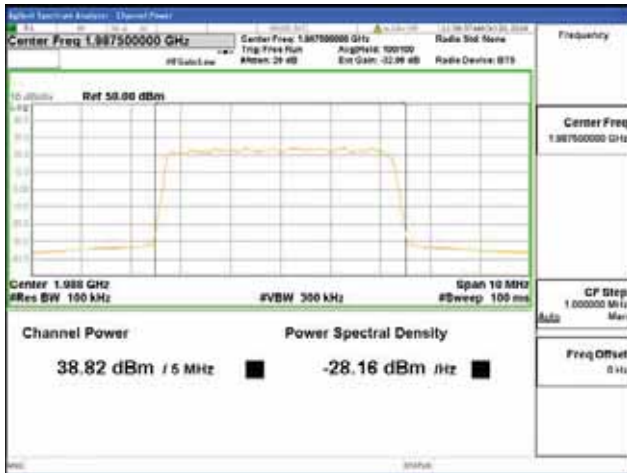
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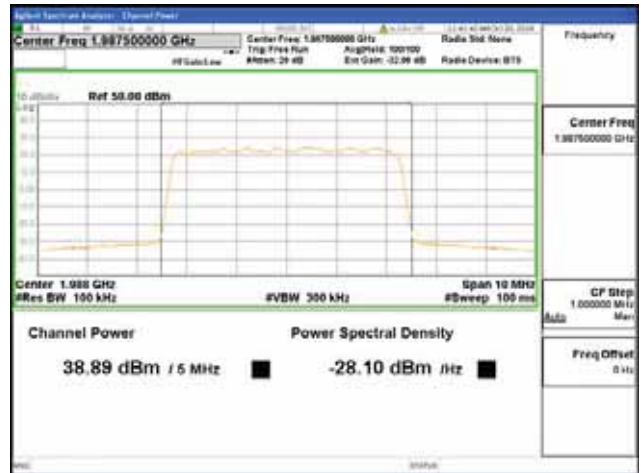


Band 2, BW 5MHz + BW 5MHz, Multi carrier(Non-Contiguous), 4TX, Top

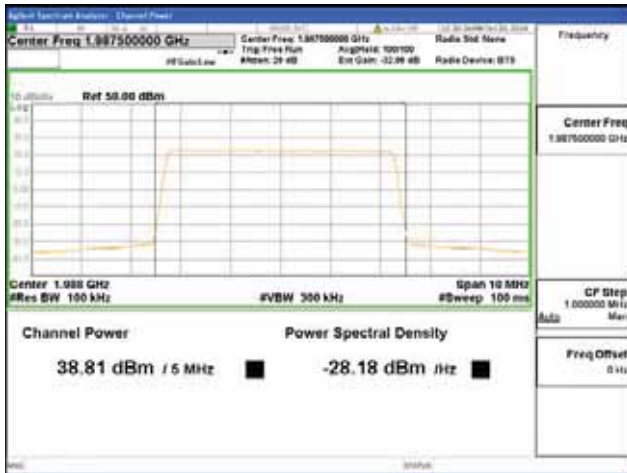
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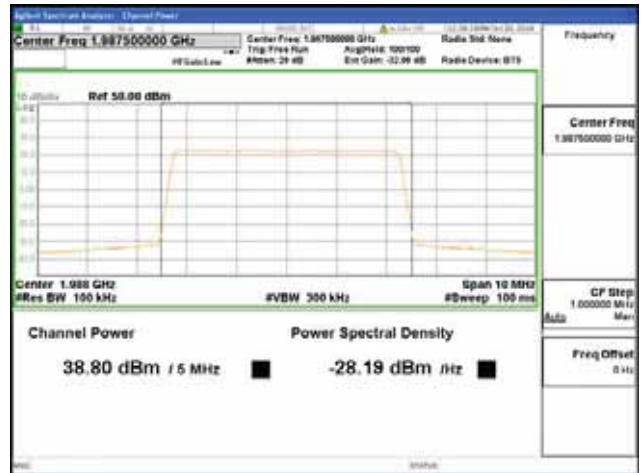
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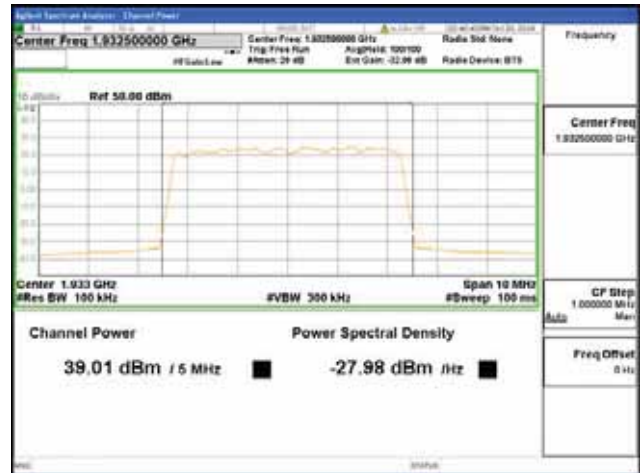
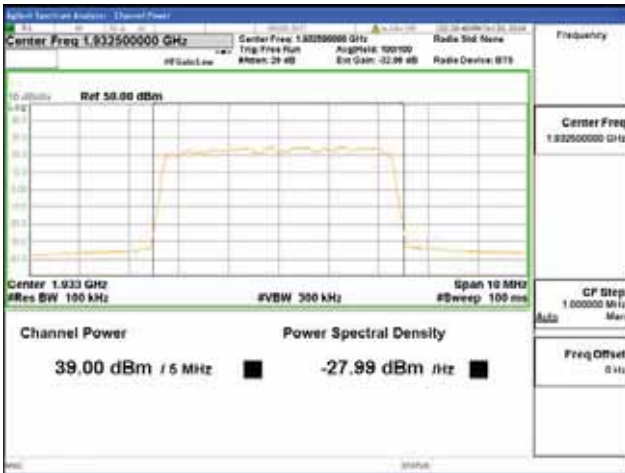


ANT 2

Band 2, BW 5MHz + BW 5MHz, Multi carrier(Non-Contiguous), 4TX, Bottom

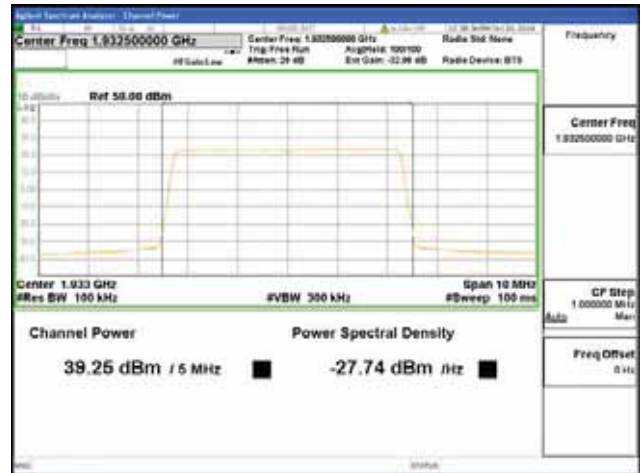
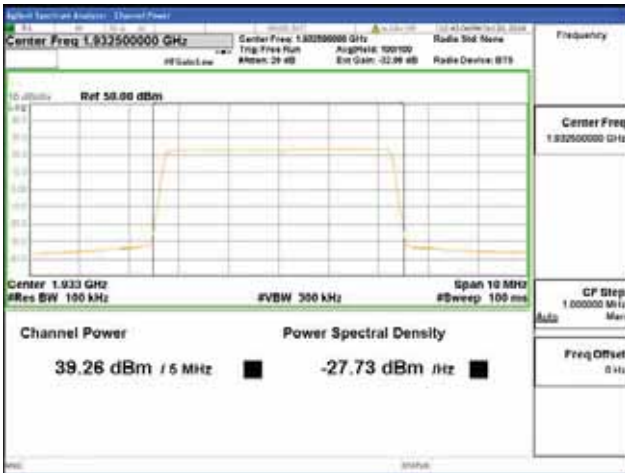
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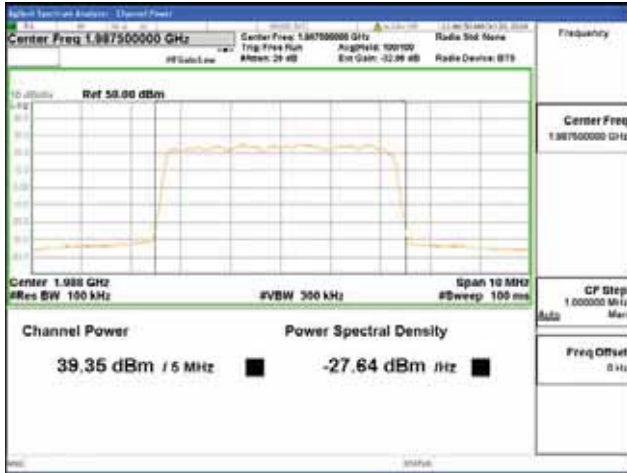
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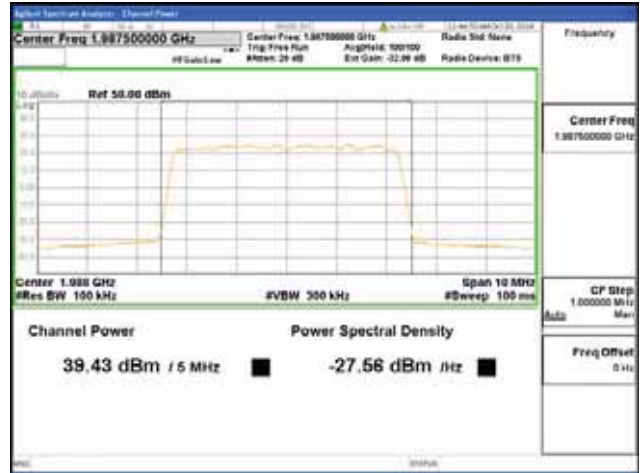


Band 2, BW 5MHz + BW 5MHz, Multi carrier(Non-Contiguous), 4TX, Top

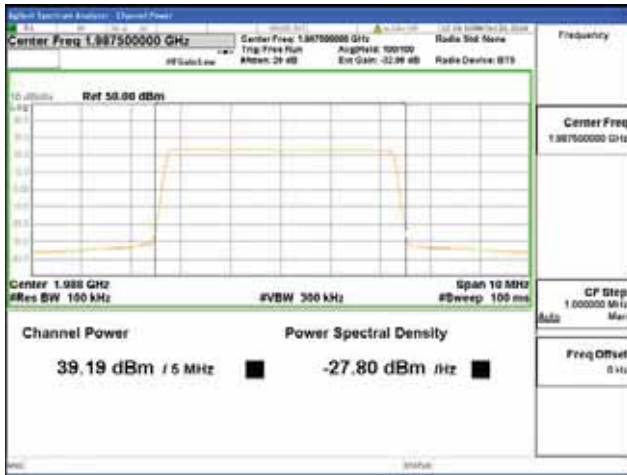
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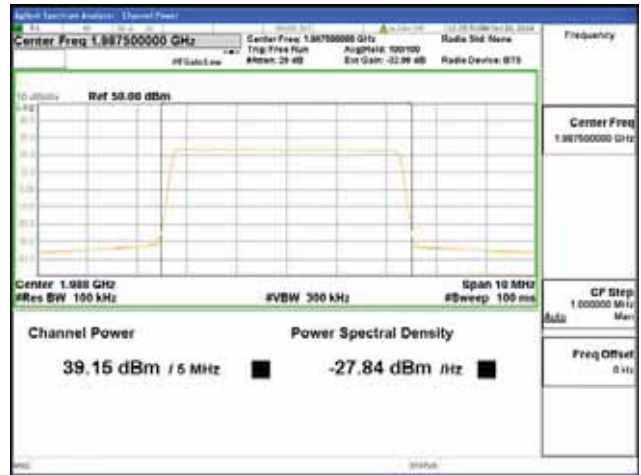
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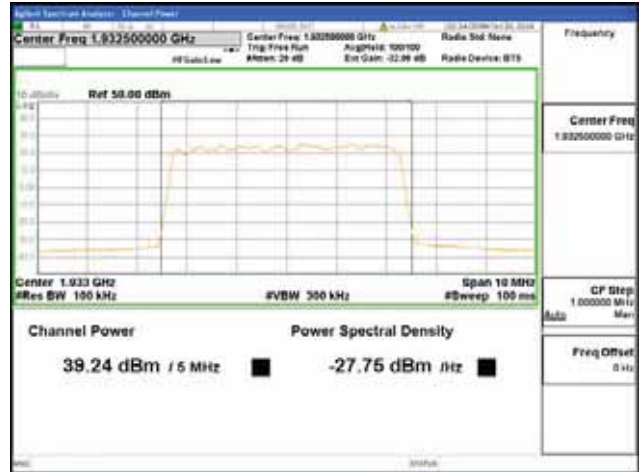
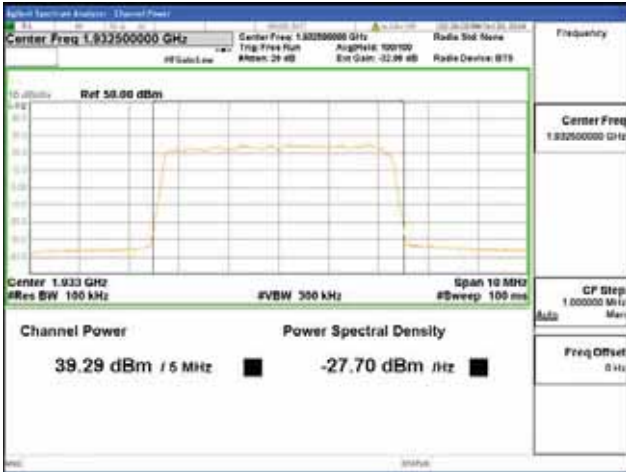


ANT 3

Band 2, BW 5MHz + BW 5MHz, Multi carrier(Non-Contiguous), 4TX, Bottom

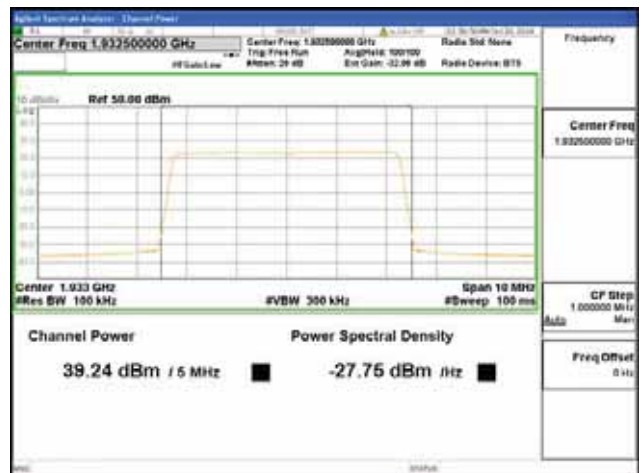
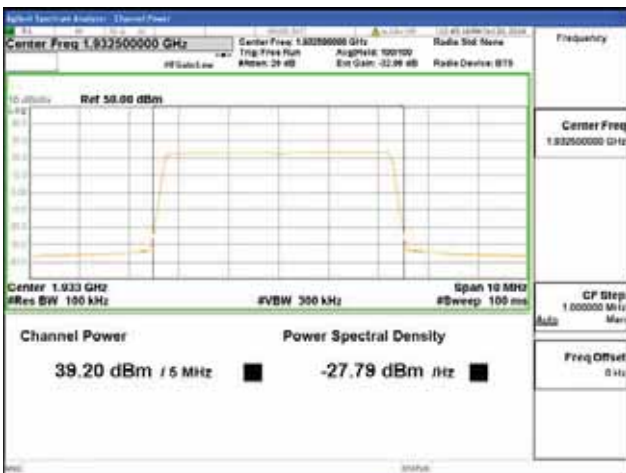
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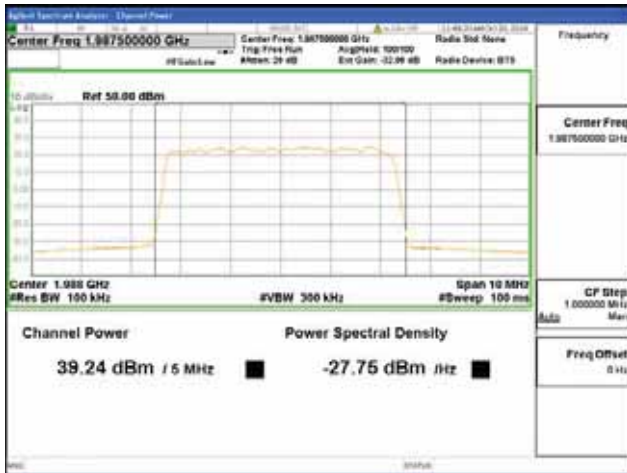
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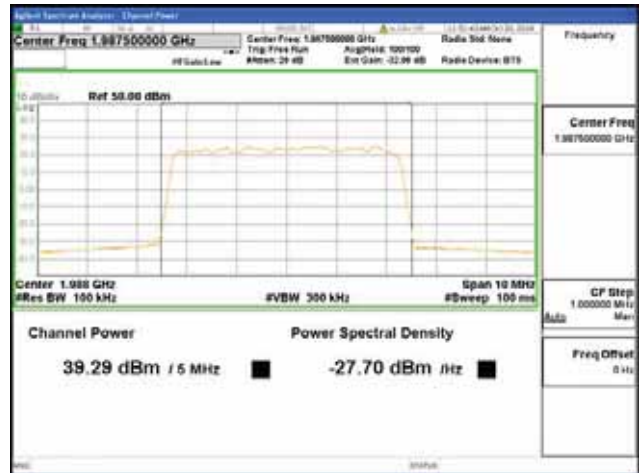


Band 2, BW 5MHz + BW 5MHz, Multi carrier(Non-Contiguous), 4TX, Top

QPSK



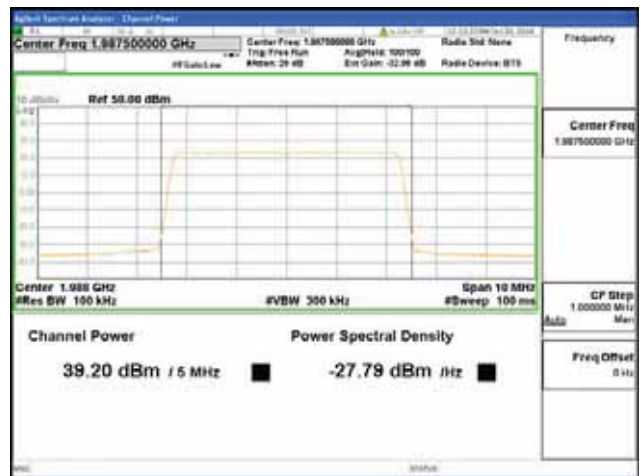
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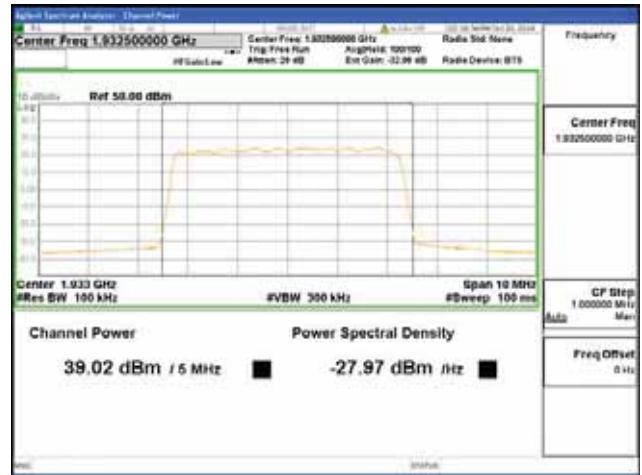
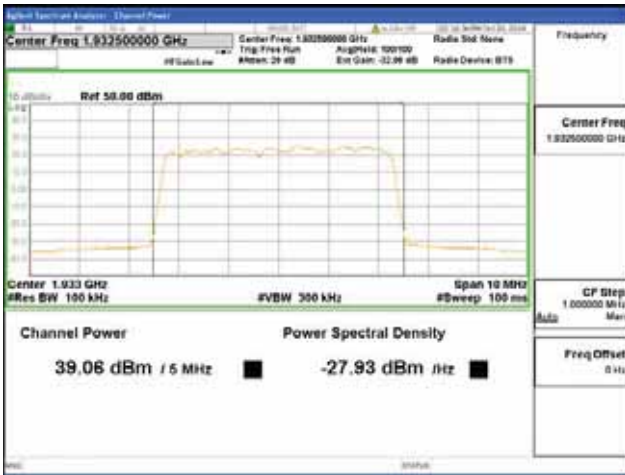


ANT 4

Band 2, BW 5MHz + BW 5MHz, Multi carrier(Non-Contiguous), 4TX, Bottom

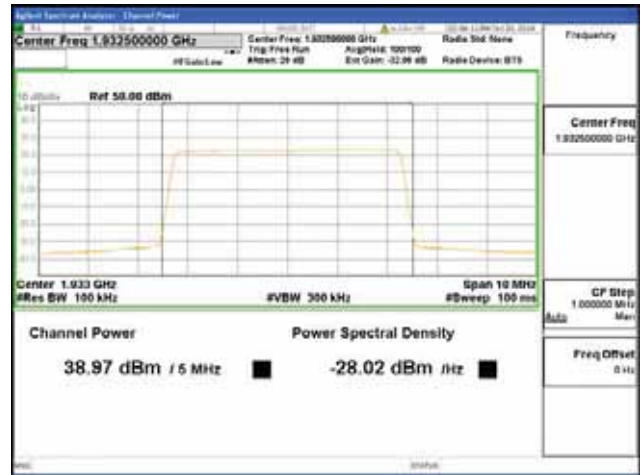
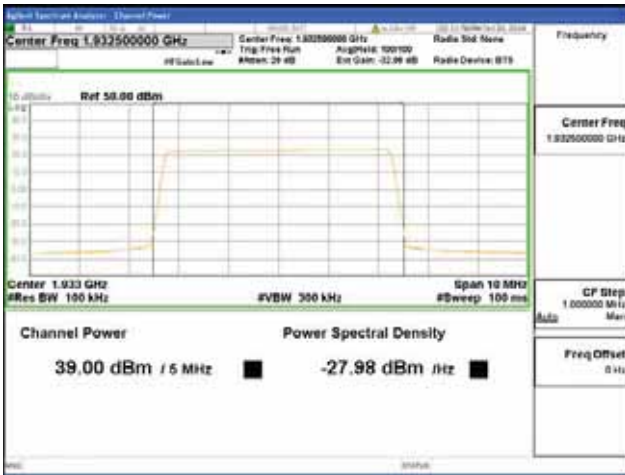
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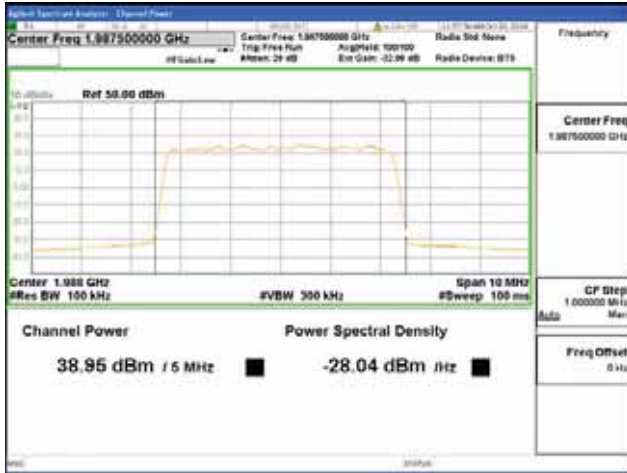


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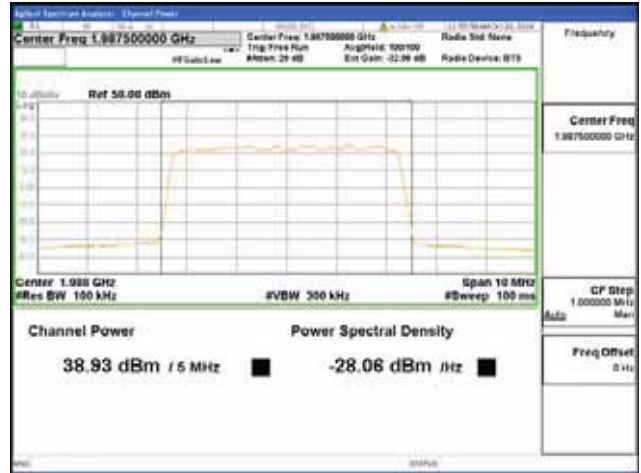
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Band 2, BW 5MHz + BW 5MHz, Multi carrier(Non-Contiguous), 4TX, Top

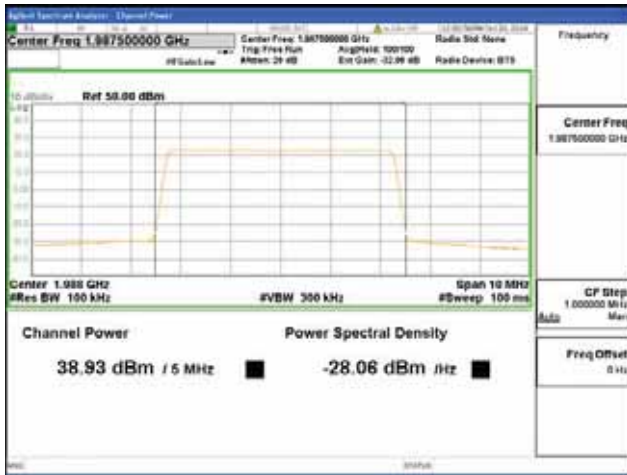
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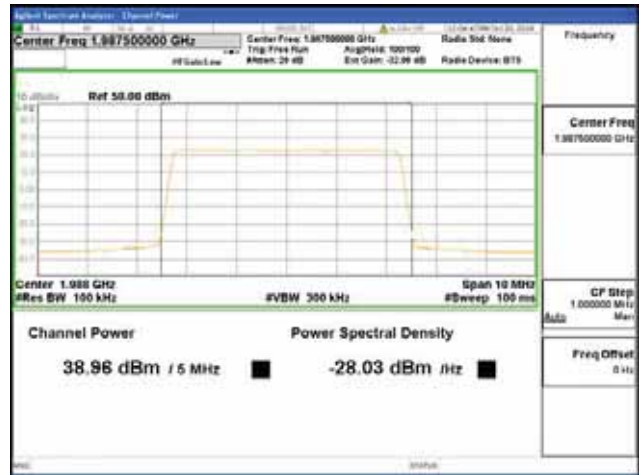
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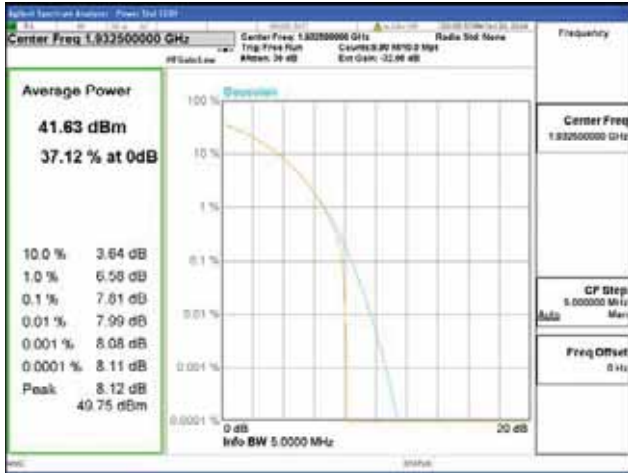
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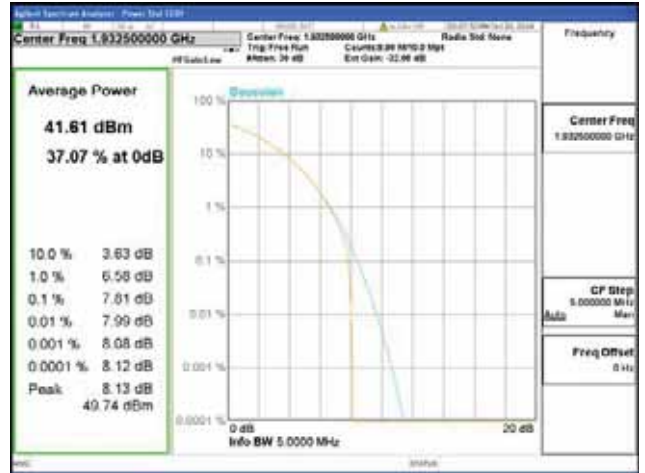


ANT 1
Band 2, BW 5MHz, Single carrier, 4TX, Bottom

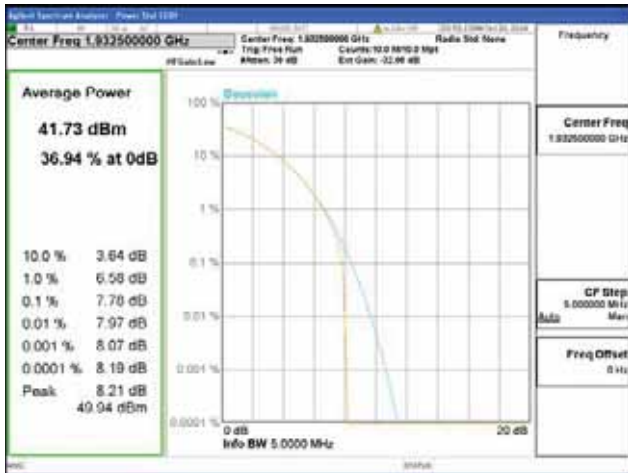
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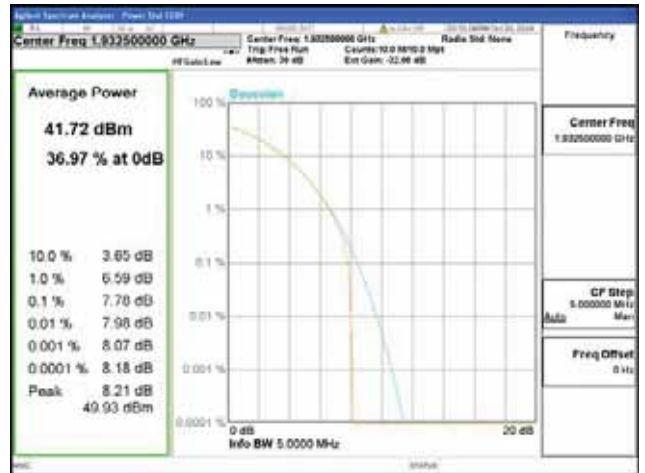
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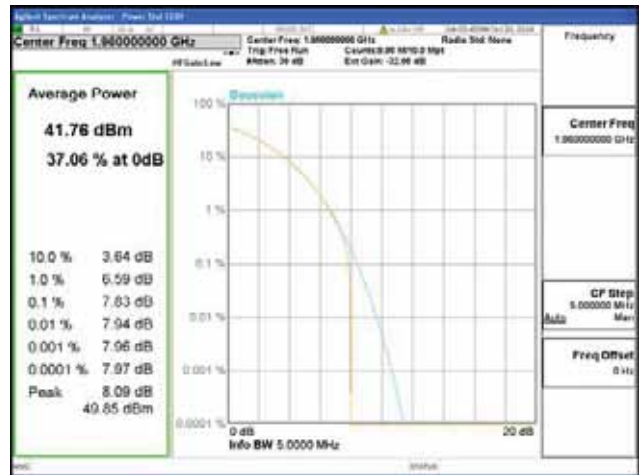
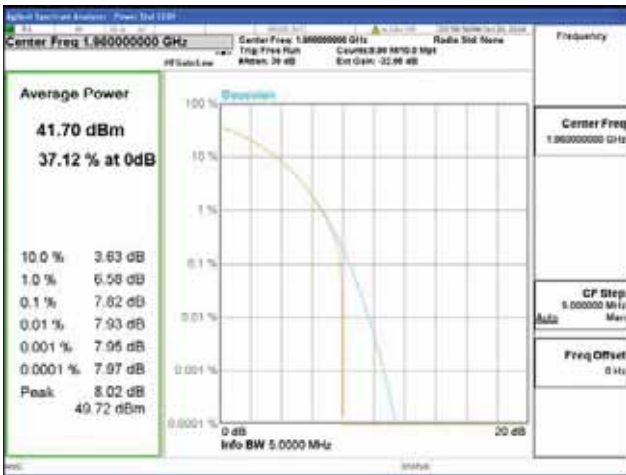
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Band 2, BW 5MHz, Single carrier, 4TX, Middle

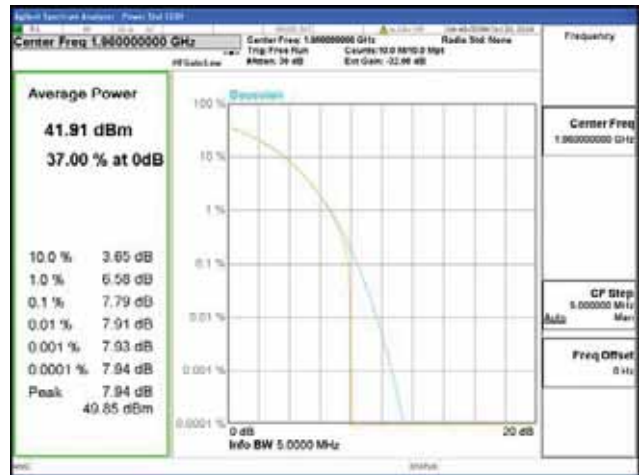
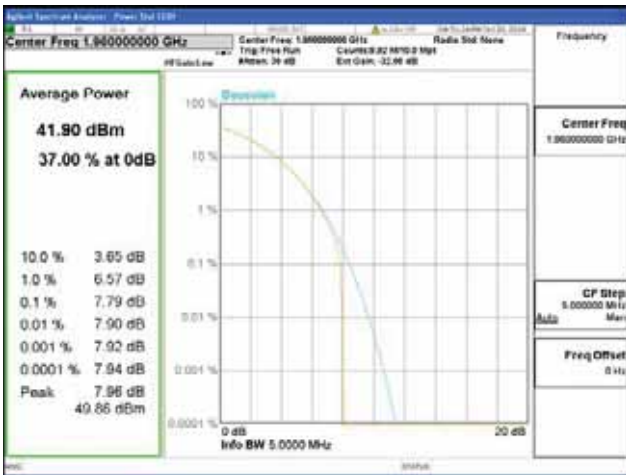
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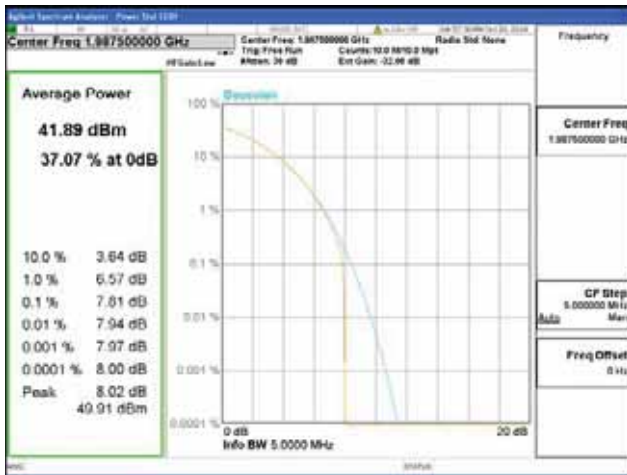


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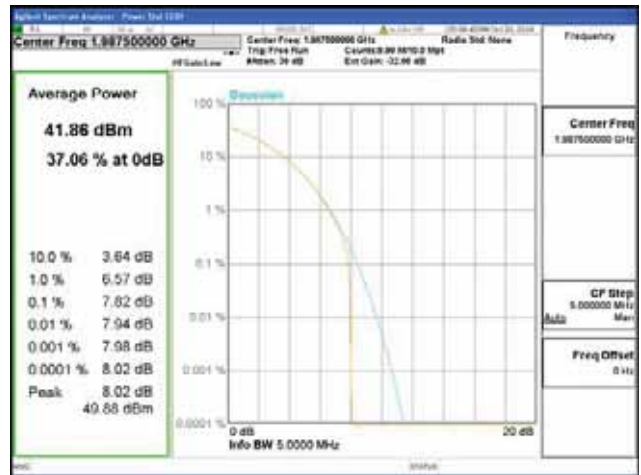
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Band 2, BW 5MHz, Single carrier, 4TX, Top

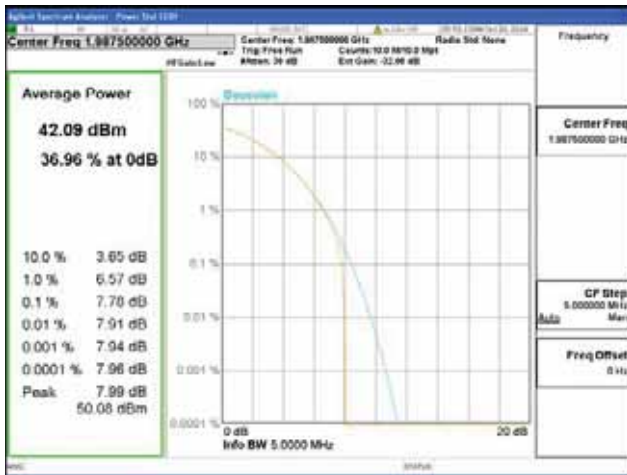
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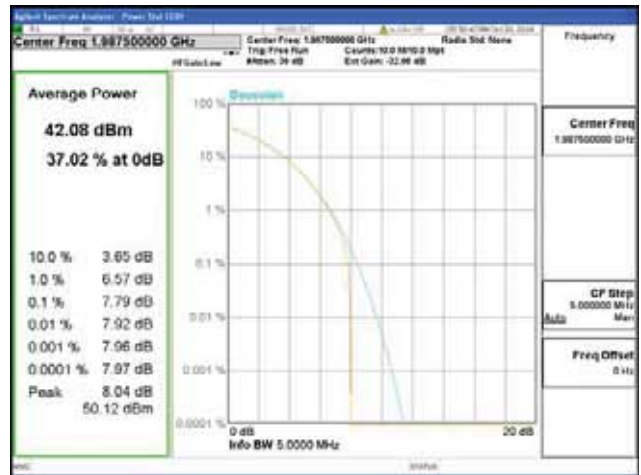
16QAM



64QAM



256QAM



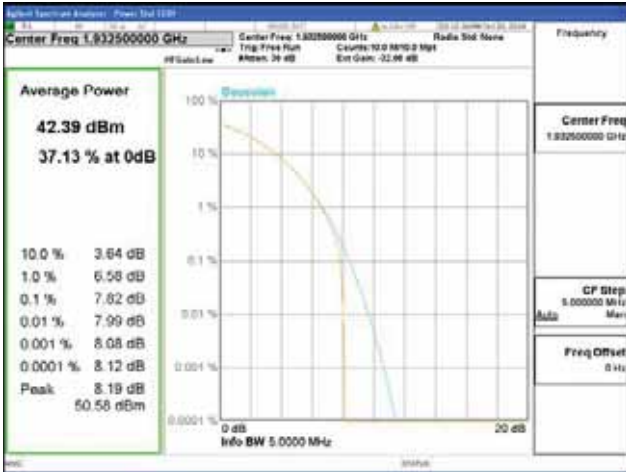


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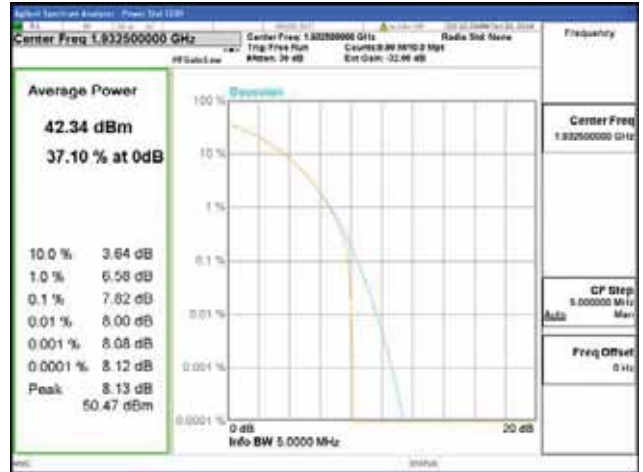
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ANT 2
Band 2, BW 5MHz, Single carrier, 4TX, Bottom

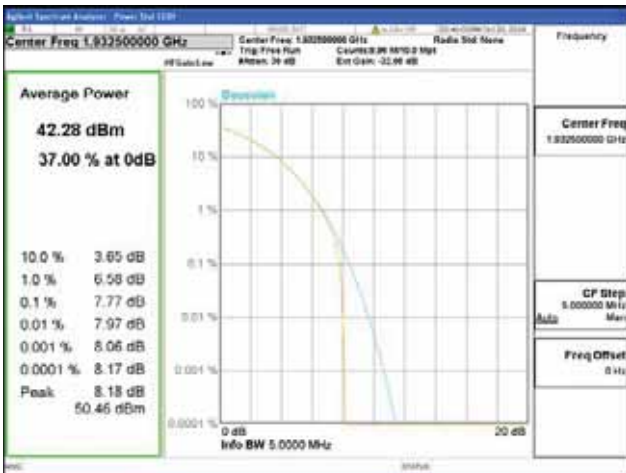
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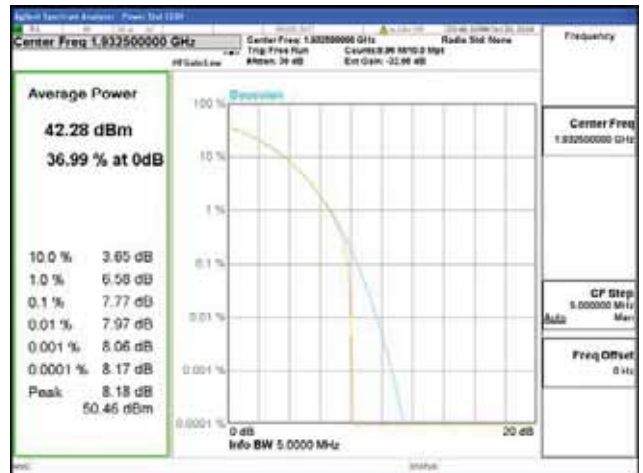
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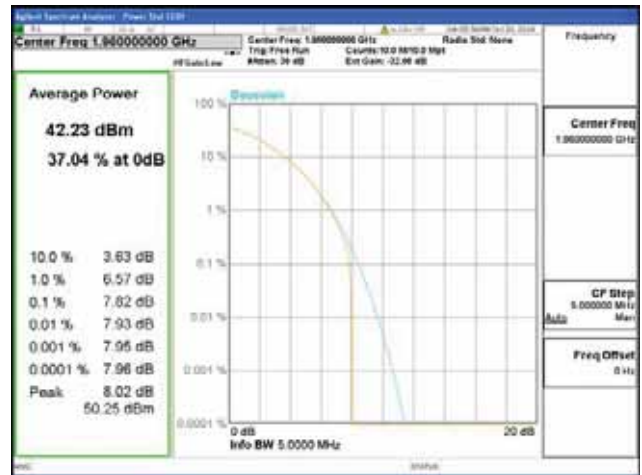
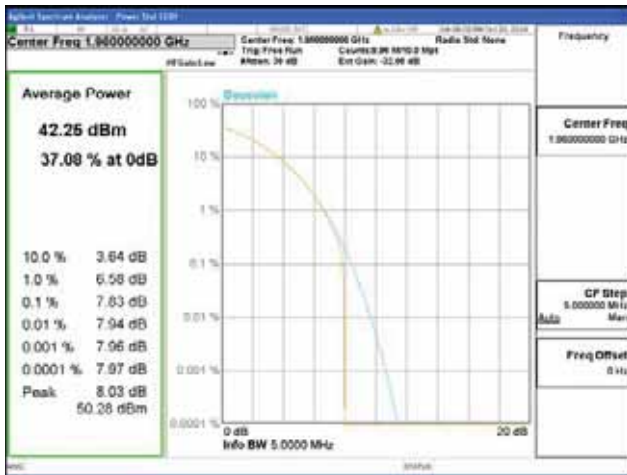
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Band 2, BW 5MHz, Single carrier, 4TX, Middle

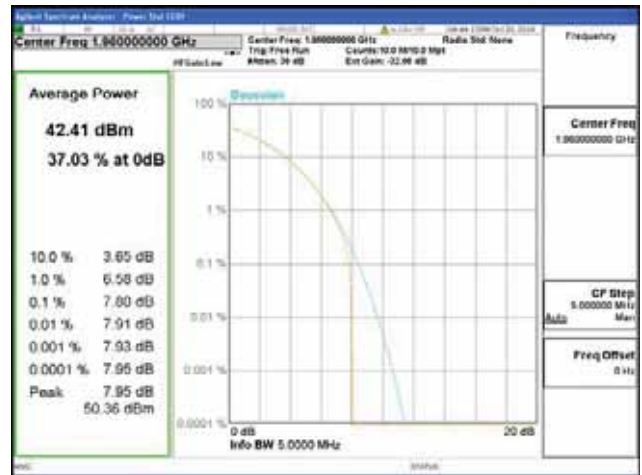
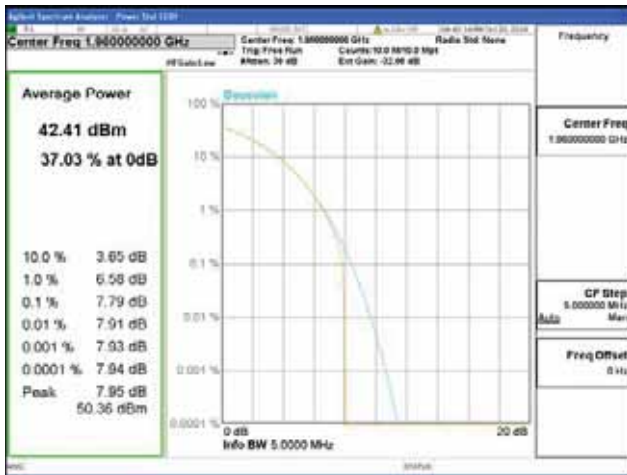
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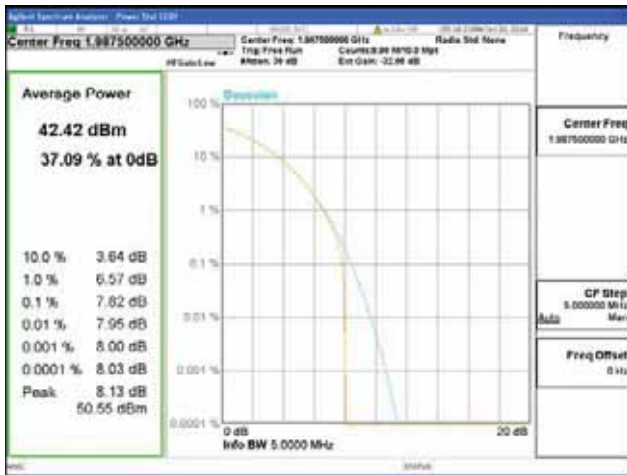


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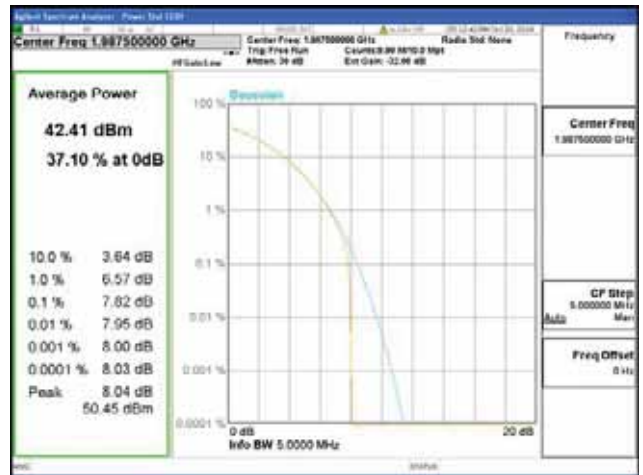
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Band 2, BW 5MHz, Single carrier, 4TX, Top

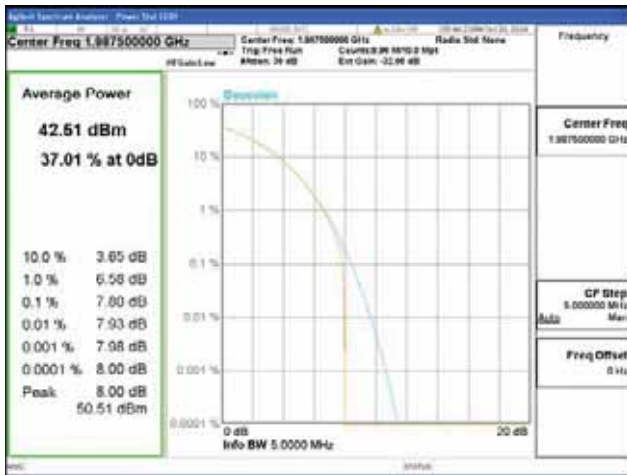
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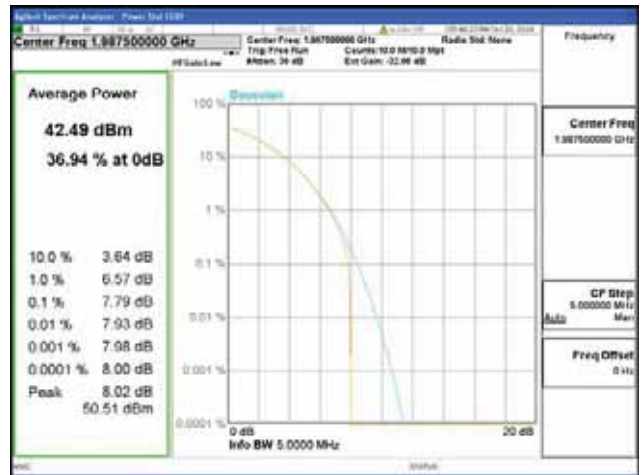
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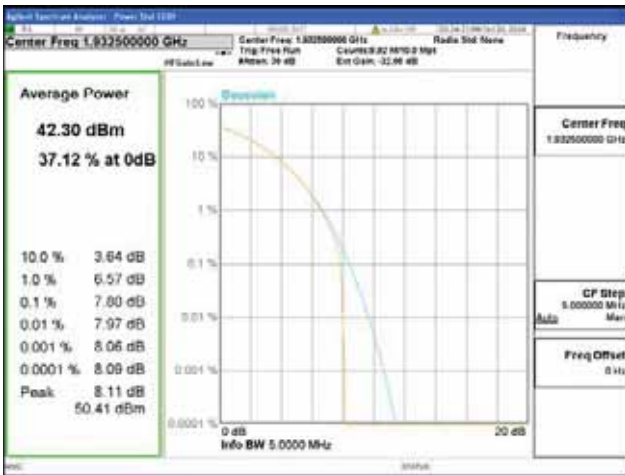


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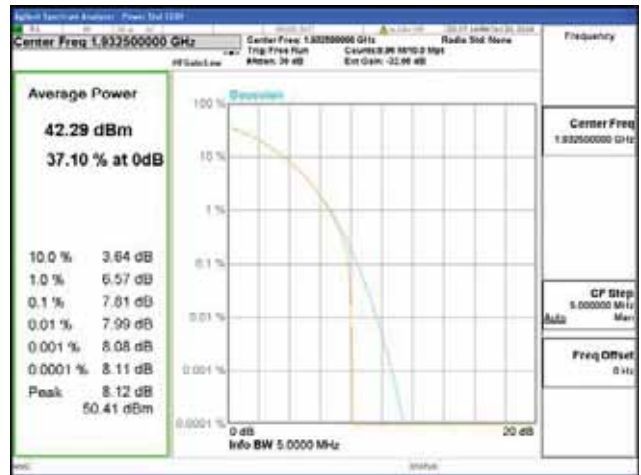
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ANT 3
Band 2, BW 5MHz, Single carrier, 4TX, Bottom

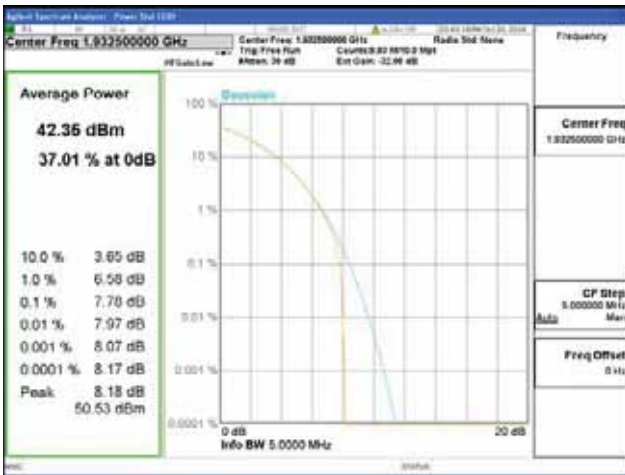
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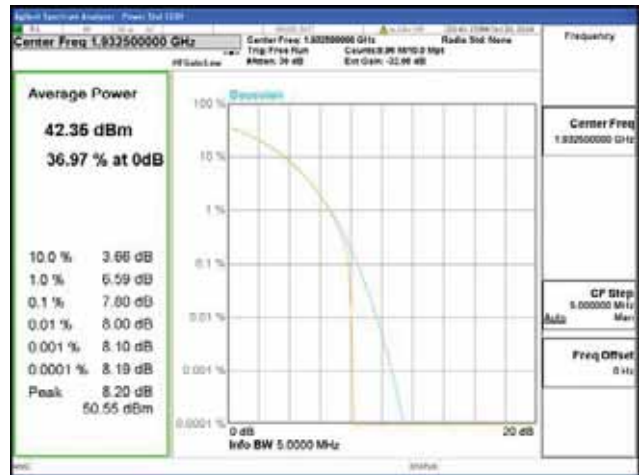
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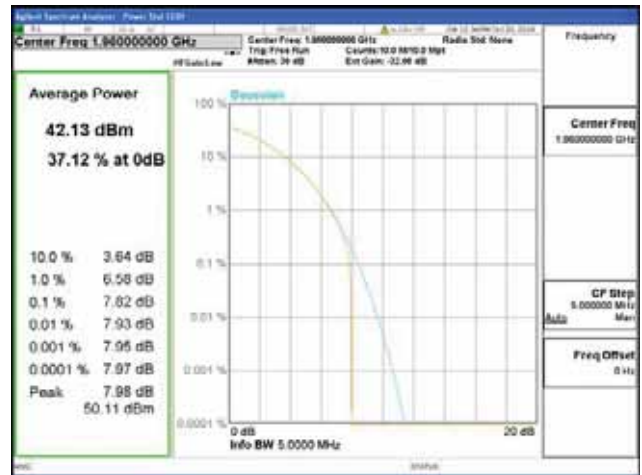
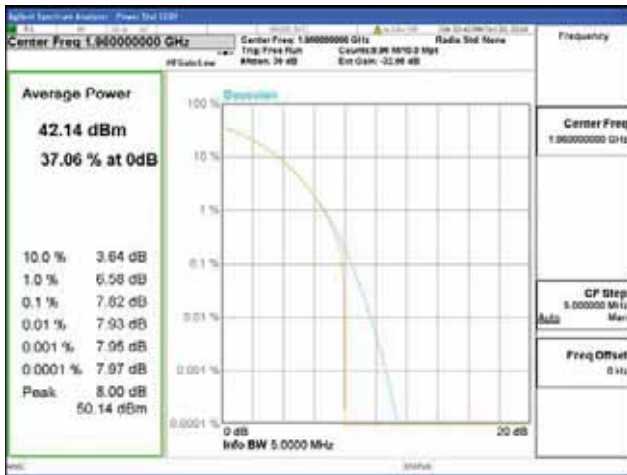
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Band 2, BW 5MHz, Single carrier, 4TX, Middle

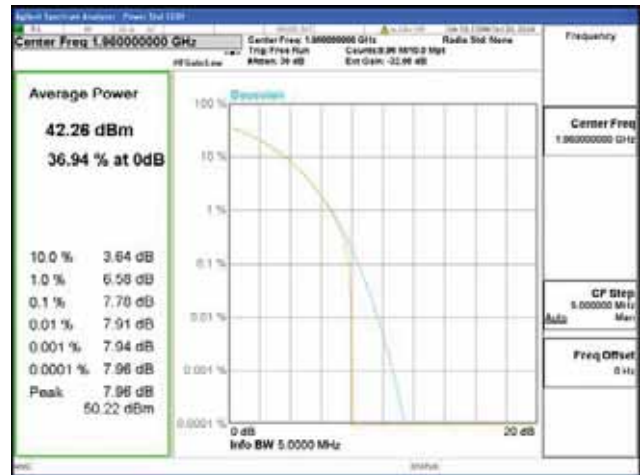
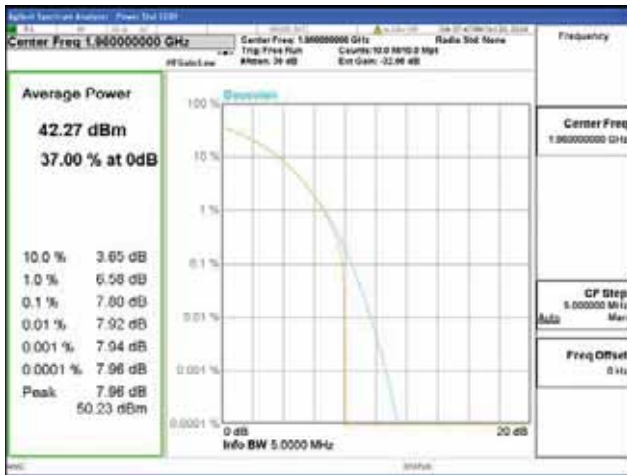
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256QAM



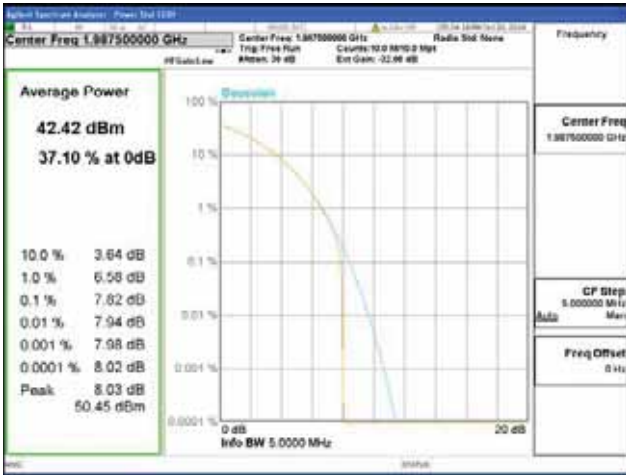


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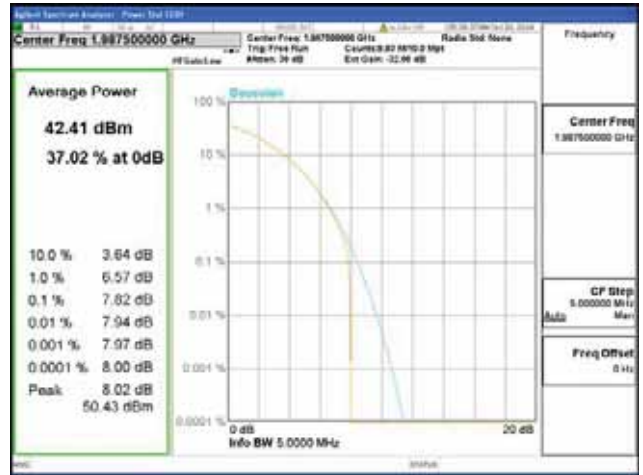
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Band 2, BW 5MHz, Single carrier, 4TX, Top

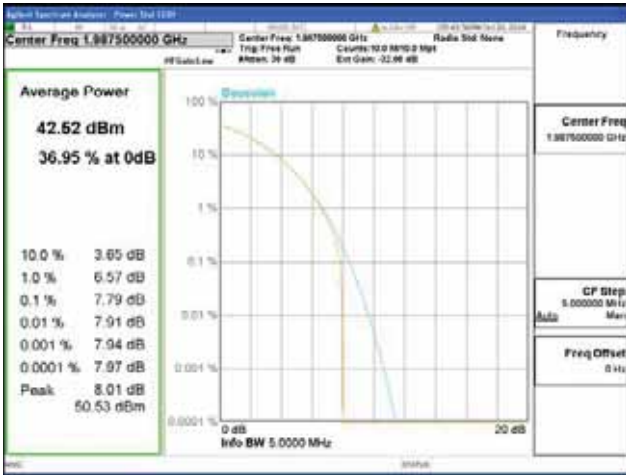
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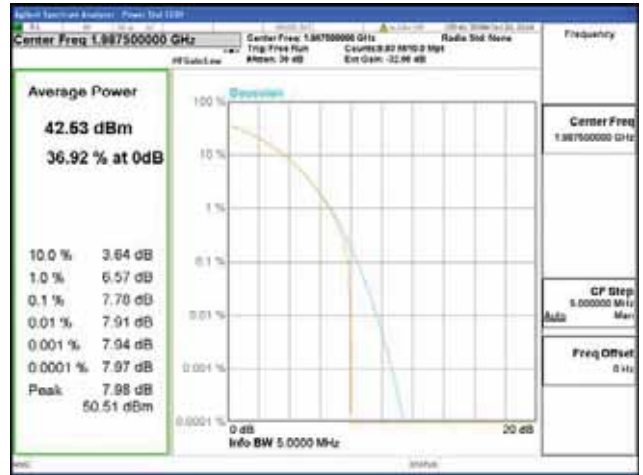
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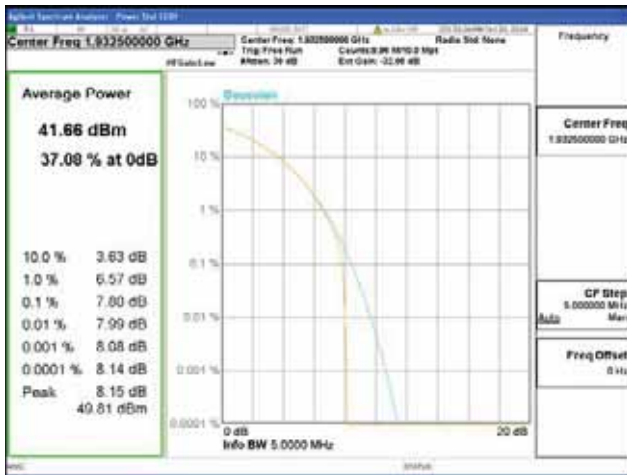


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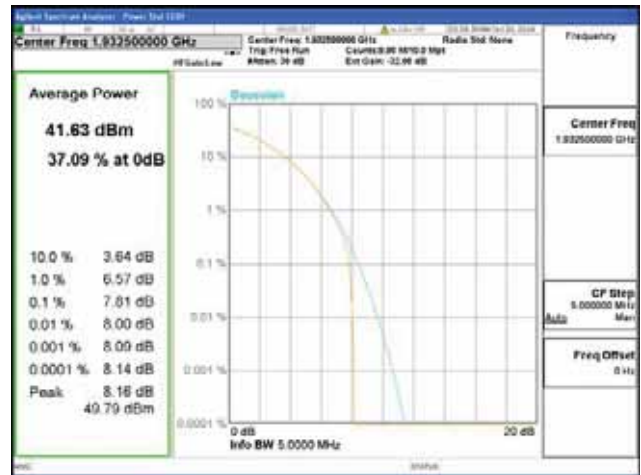
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ANT 4
Band 2, BW 5MHz, Single carrier, 4TX, Bottom

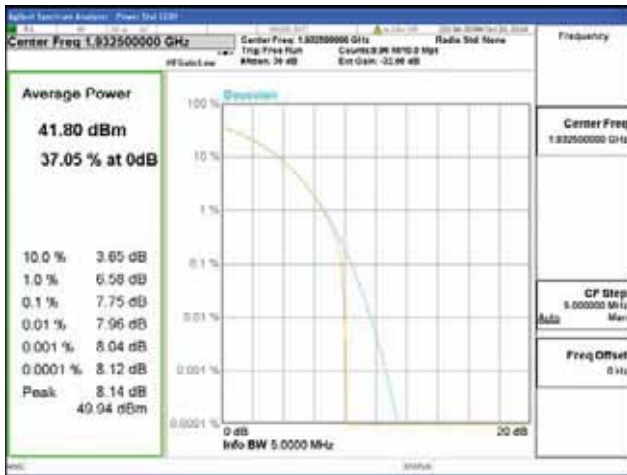
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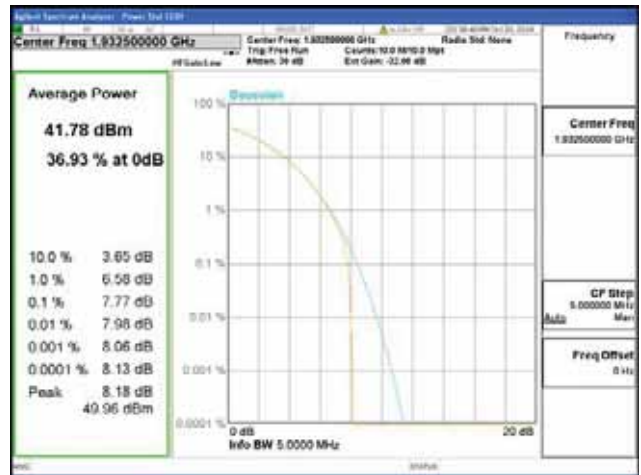
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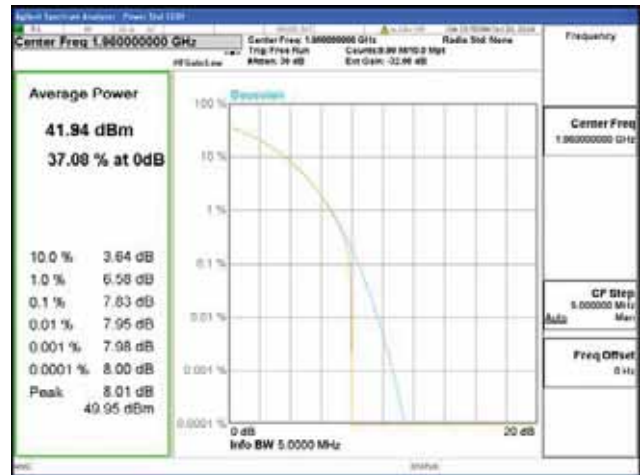
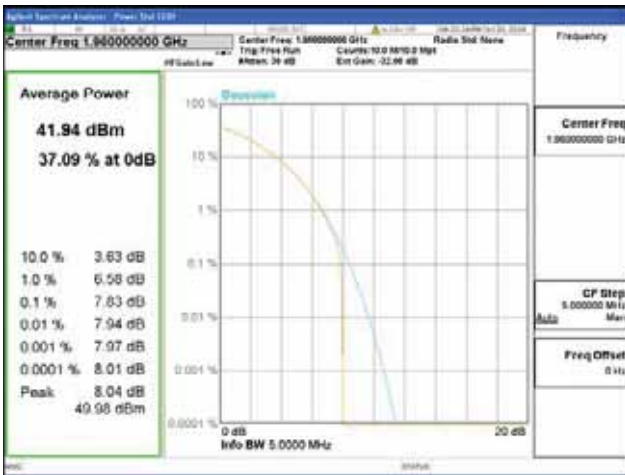
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Band 2, BW 5MHz, Single carrier, 4TX, Middle

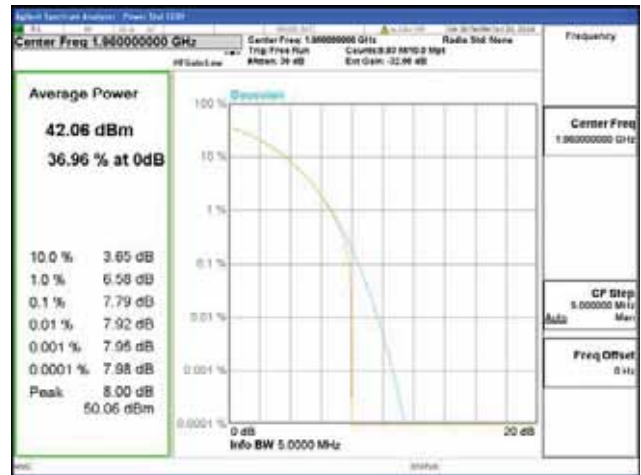
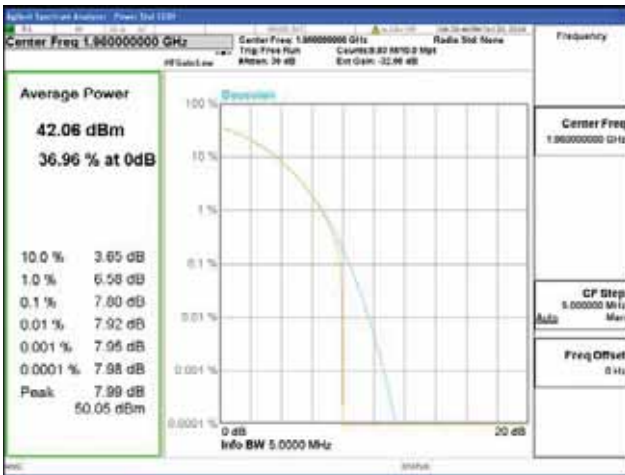
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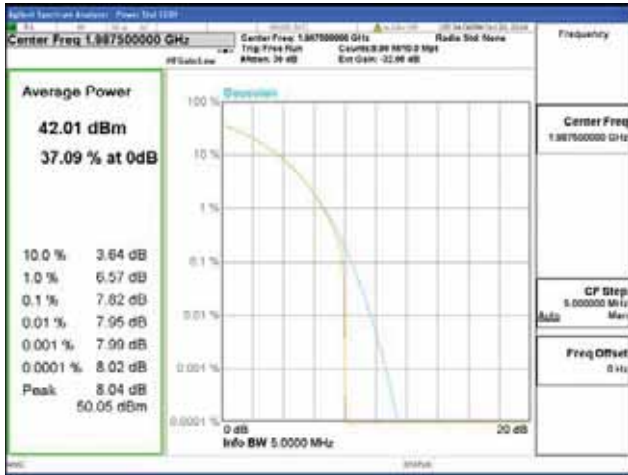


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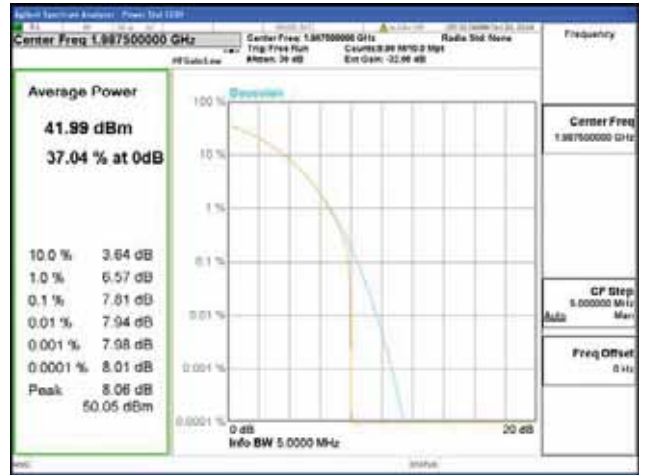
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Band 2, BW 5MHz, Single carrier, 4TX, Top

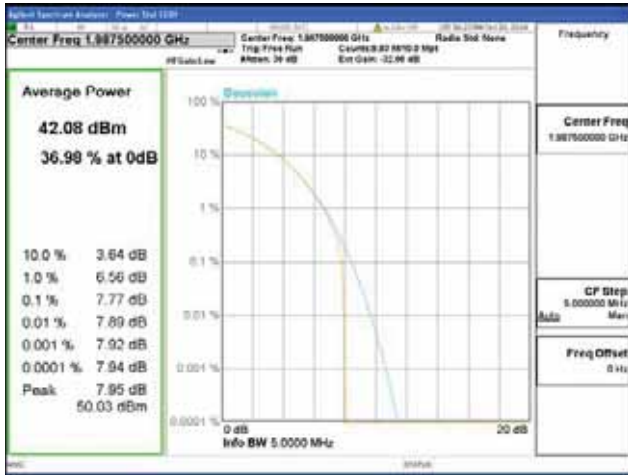
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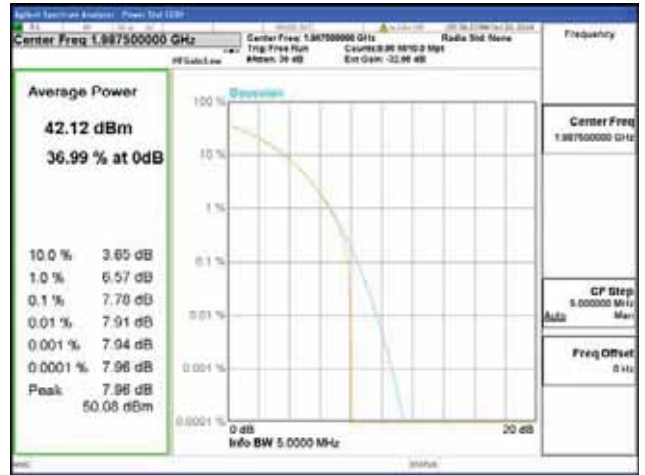
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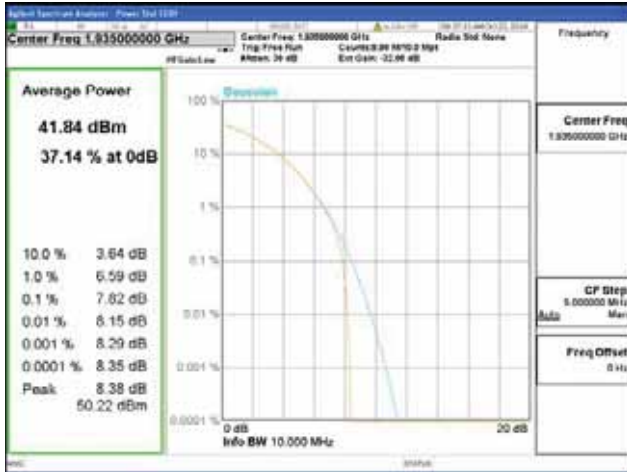


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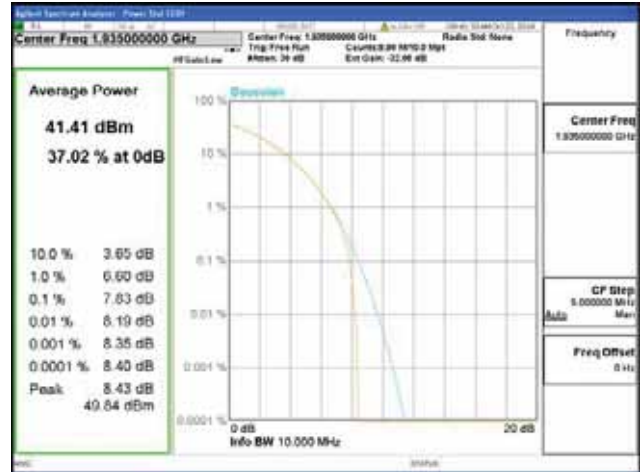
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ANT 1
Band 2, BW 10MHz, Single carrier, 4TX, Bottom

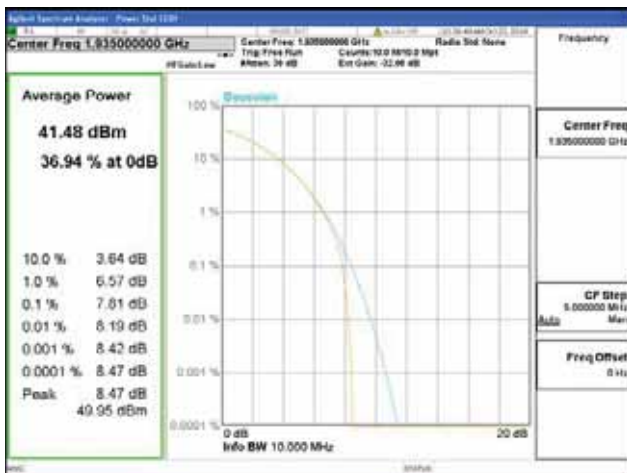
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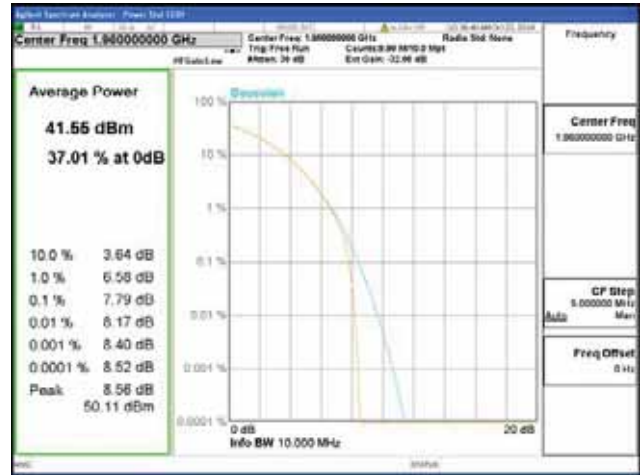
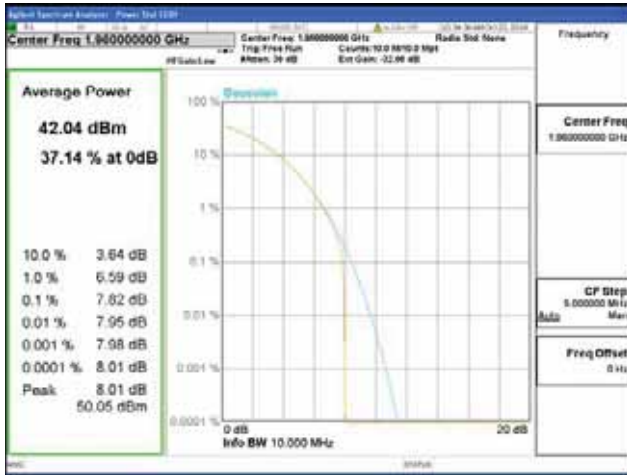
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Band 2, BW 10MHz, Single carrier, 4TX, Middle

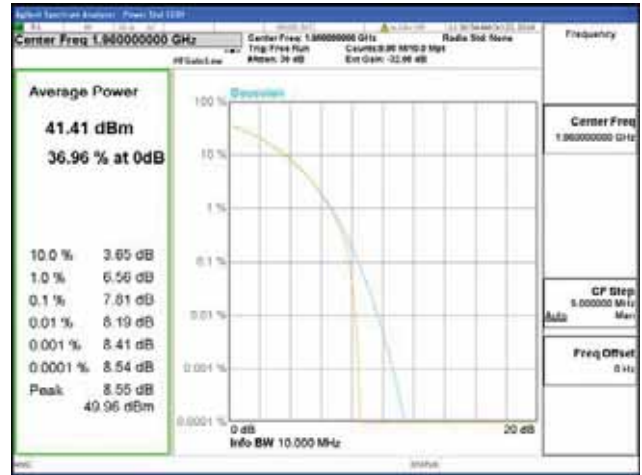
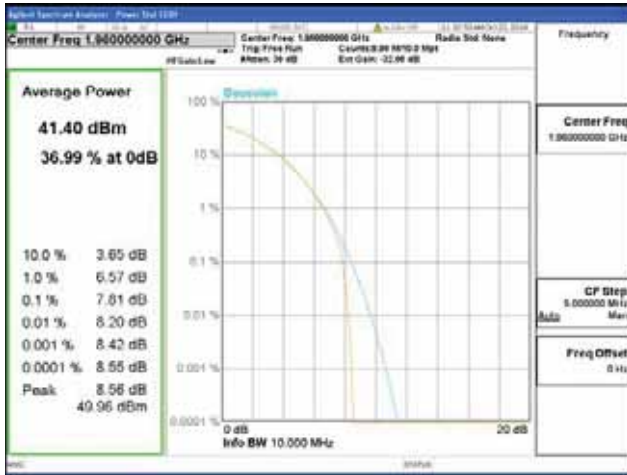
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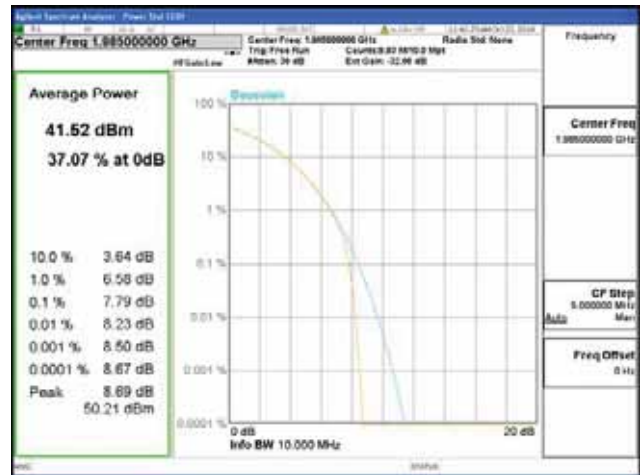
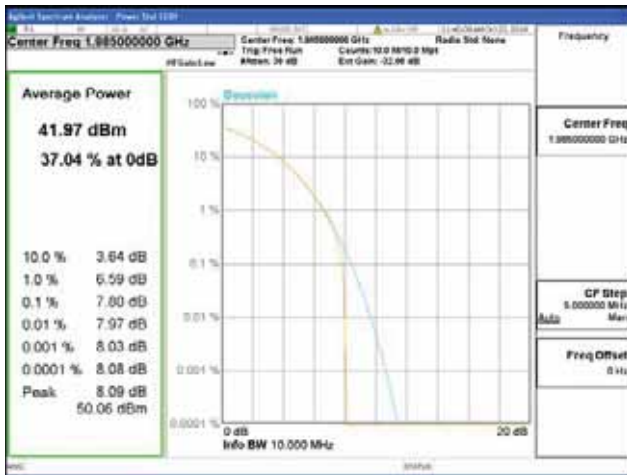
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Band 2, BW 10MHz, Single carrier, 4TX, Top

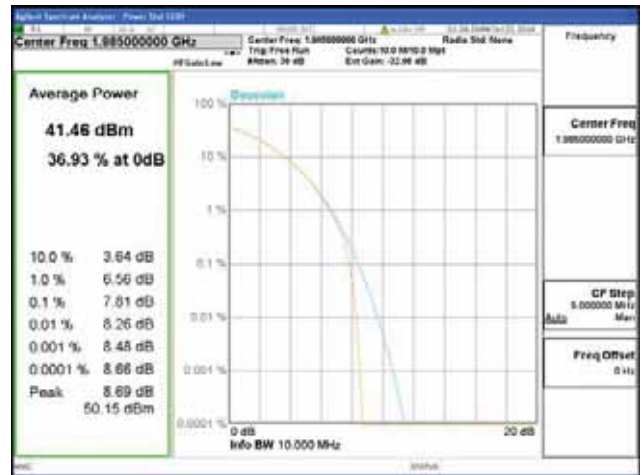
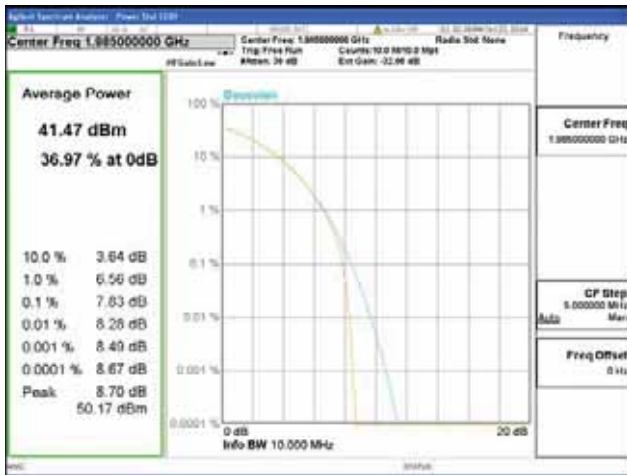
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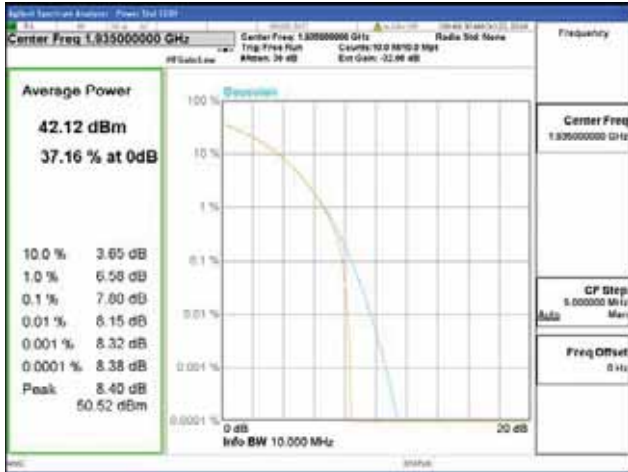


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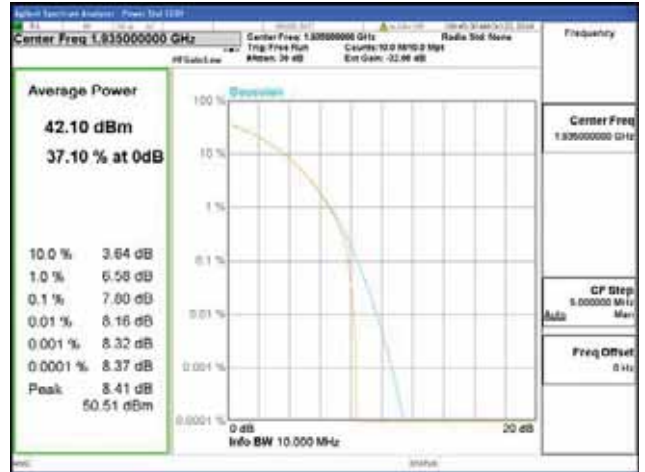
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ANT 2
Band 2, BW 10MHz, Single carrier, 4TX, Bottom

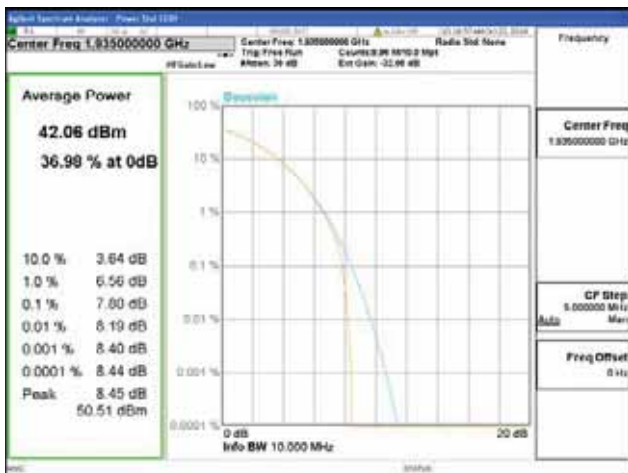
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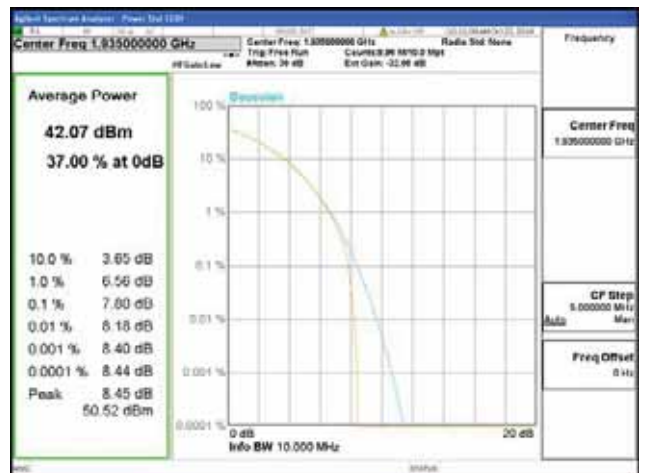
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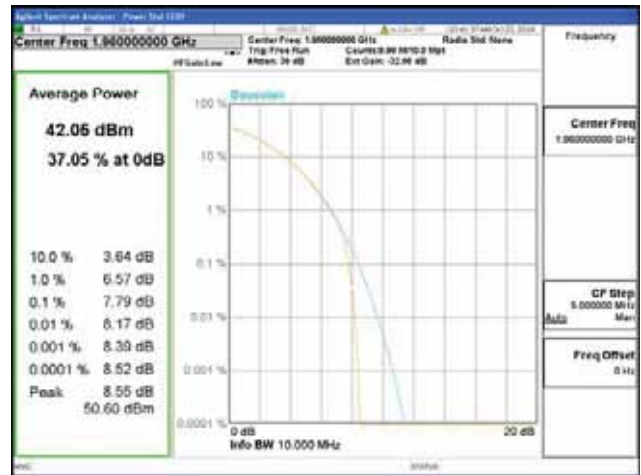
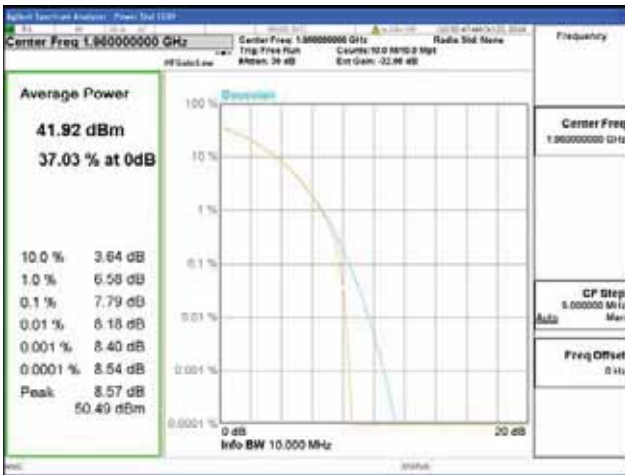
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Band 2, BW 10MHz, Single carrier, 4TX, Middle

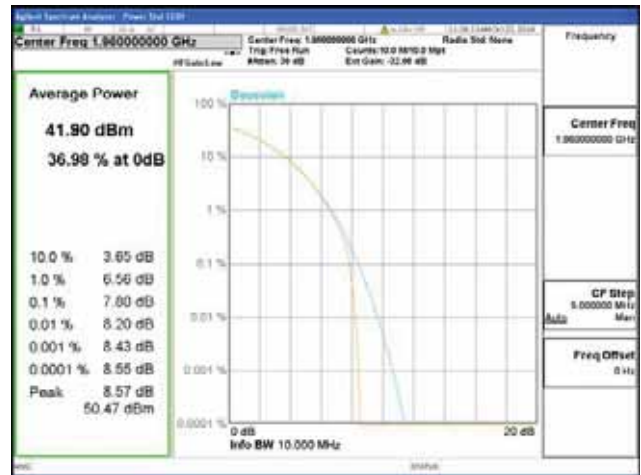
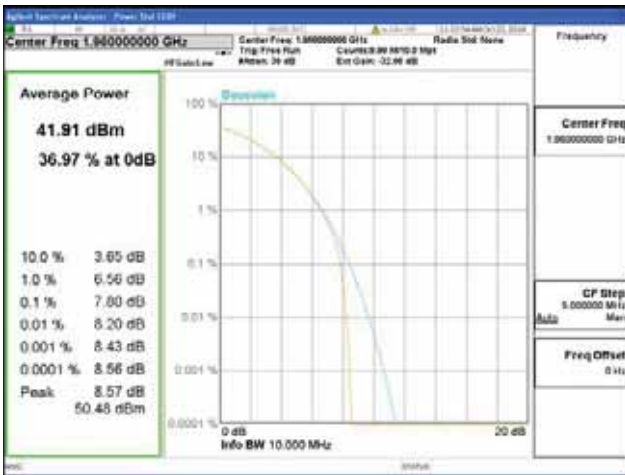
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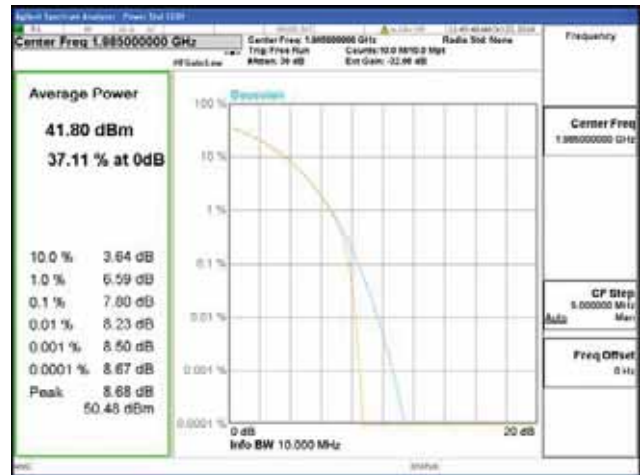
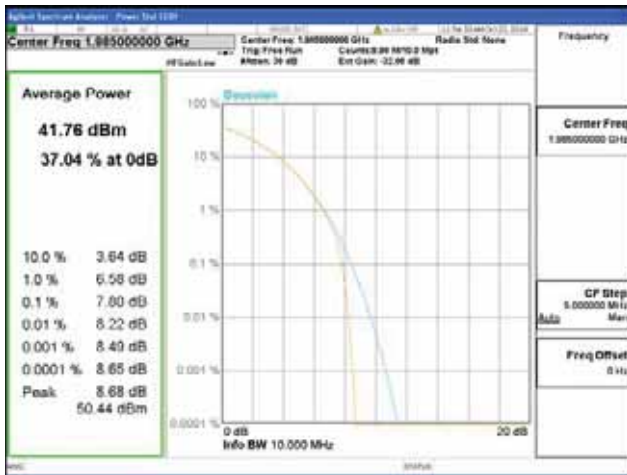
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Band 2, BW 10MHz, Single carrier, 4TX, Top

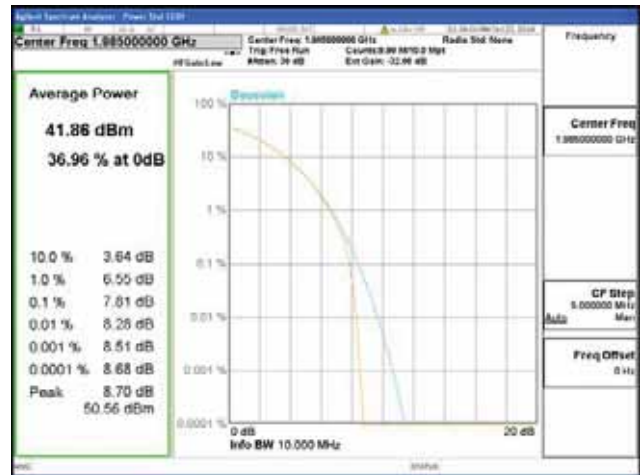
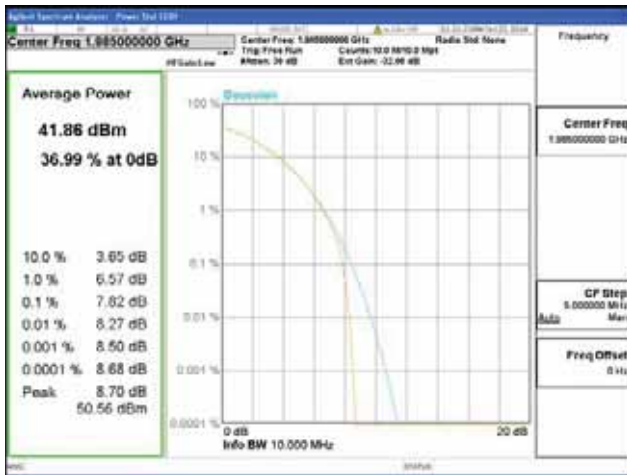
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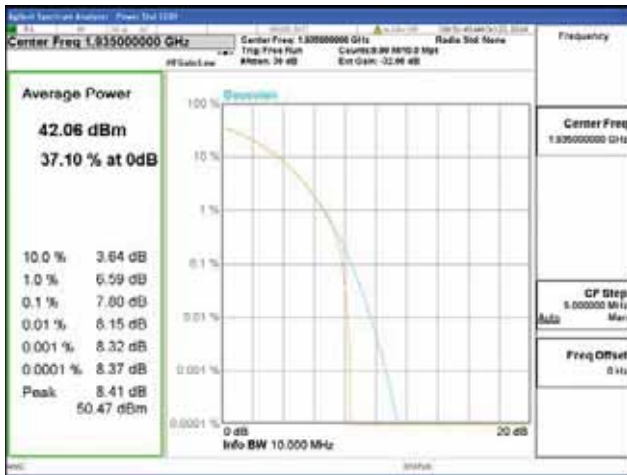


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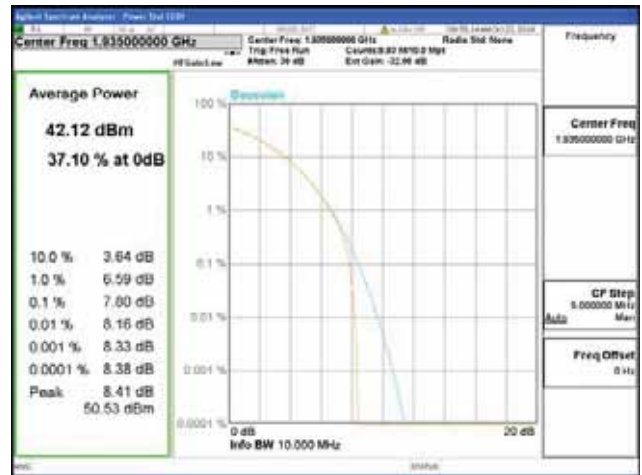
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ANT 3
Band 2, BW 10MHz, Single carrier, 4TX, Bottom

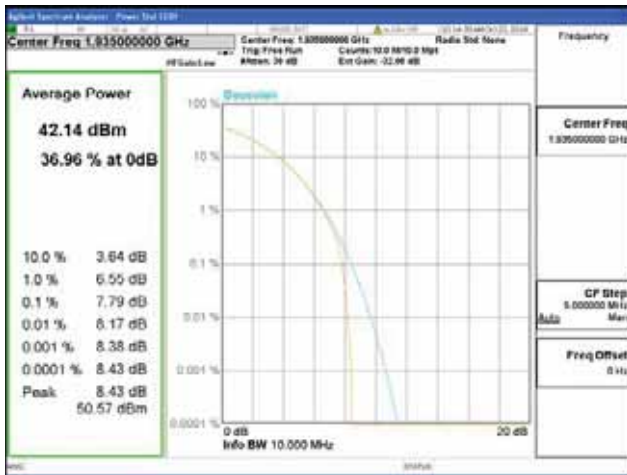
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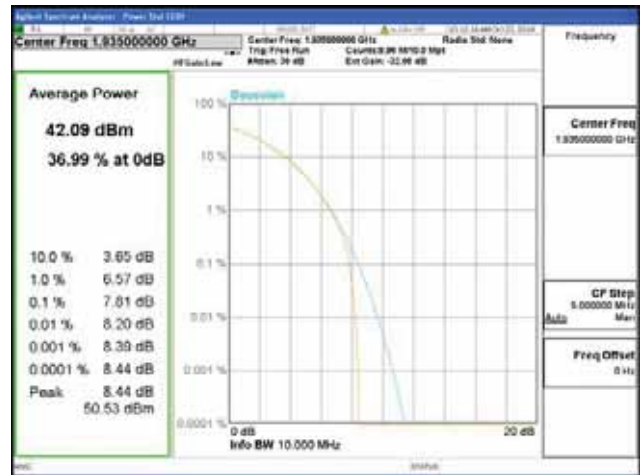
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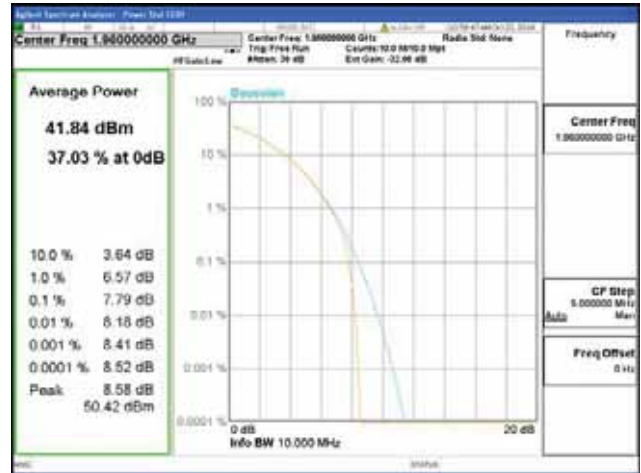
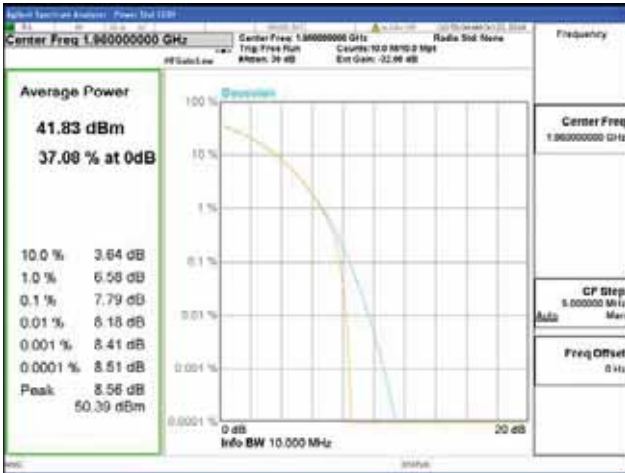
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Band 2, BW 10MHz, Single carrier, 4TX, Middle

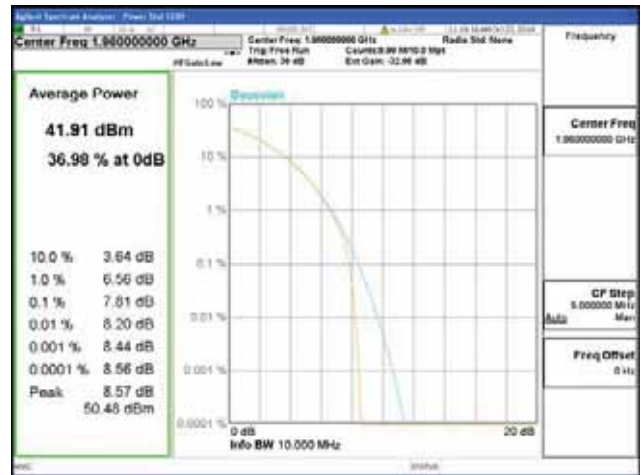
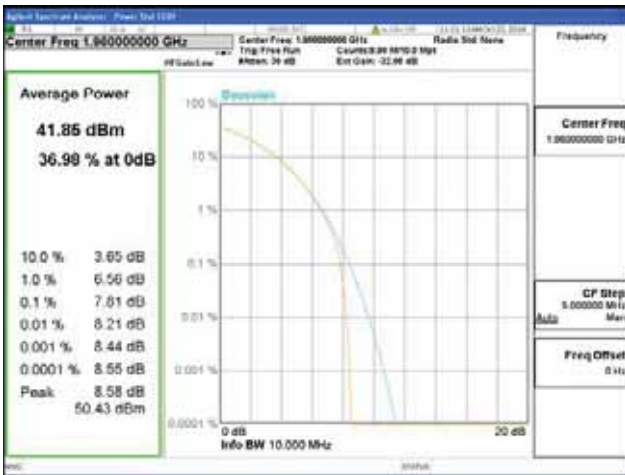
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16QAM



64QAM

256QAM





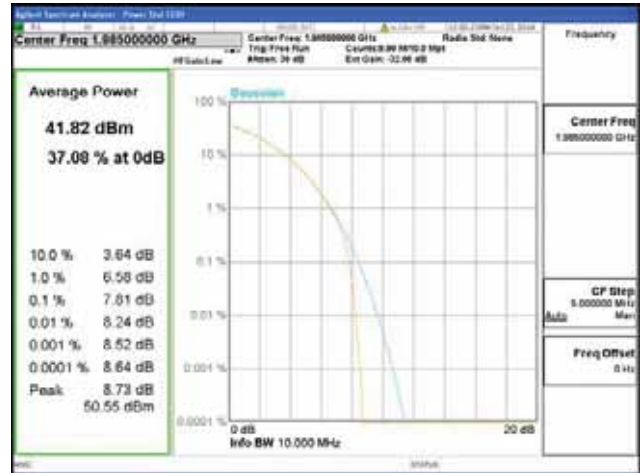
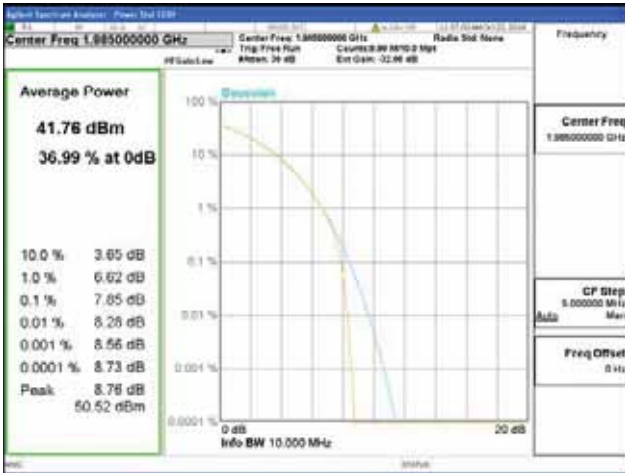
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Band 2, BW 10MHz, Single carrier, 4TX, Top

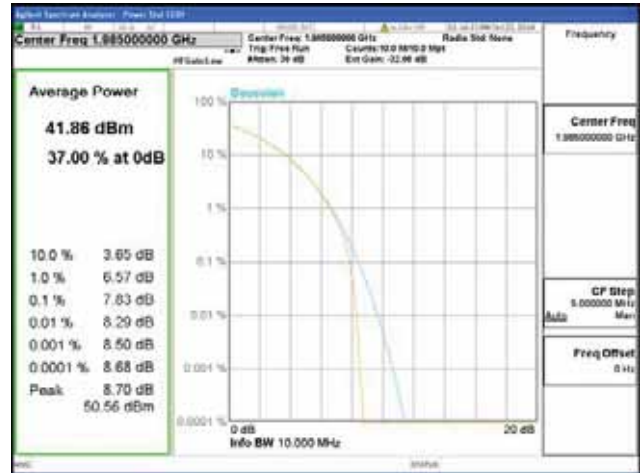
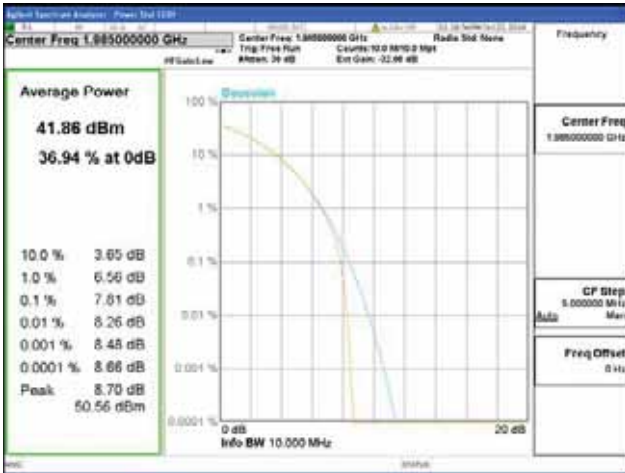
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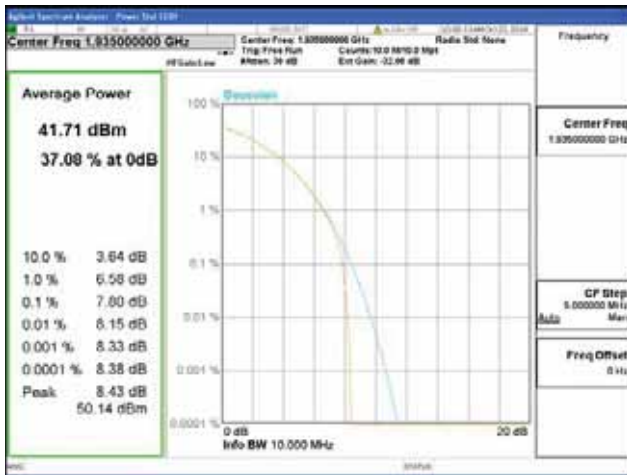


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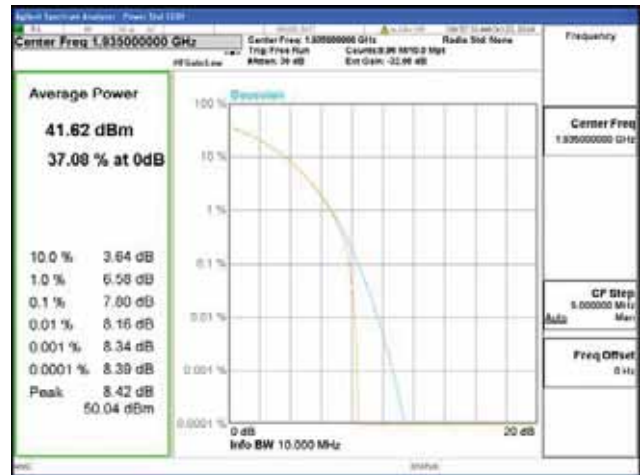
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ANT 4
Band 2, BW 10MHz, Single carrier, 4TX, Bottom

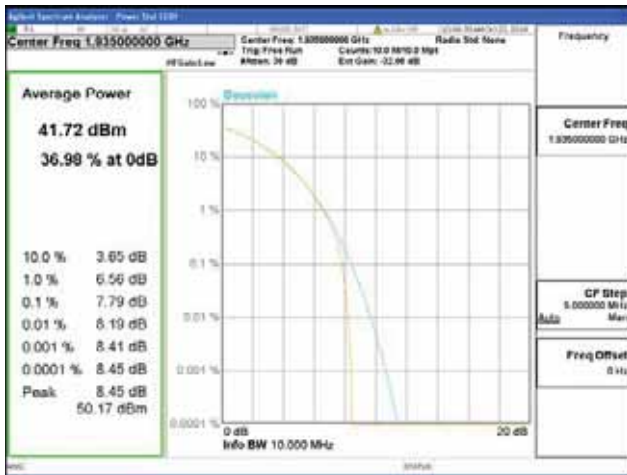
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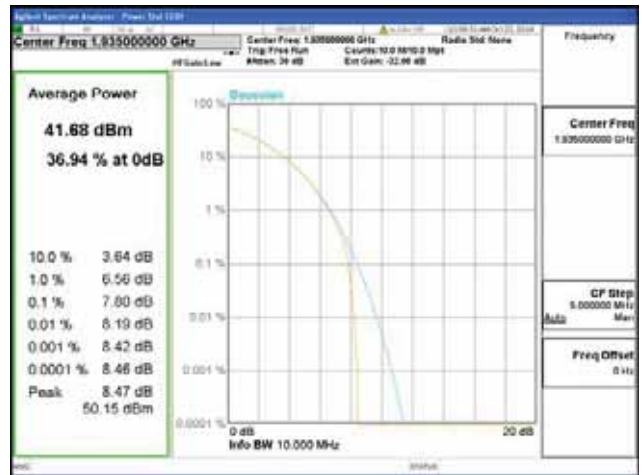
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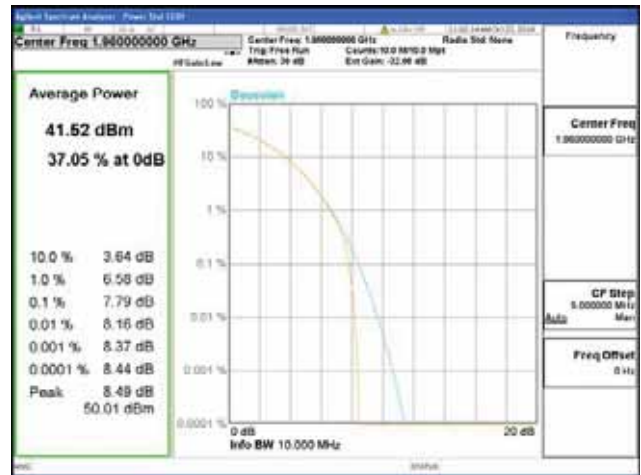
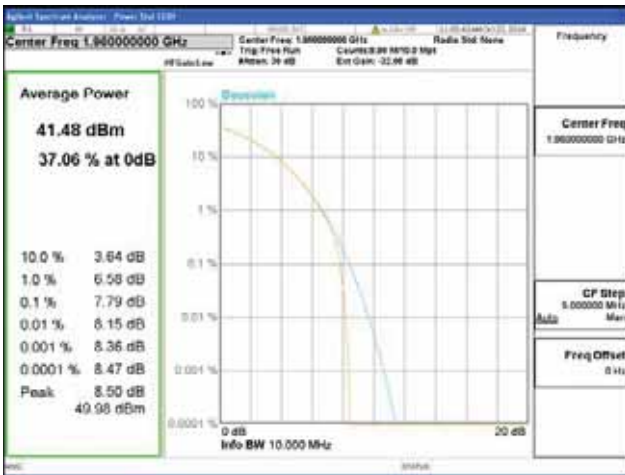
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Band 2, BW 10MHz, Single carrier, 4TX, Middle

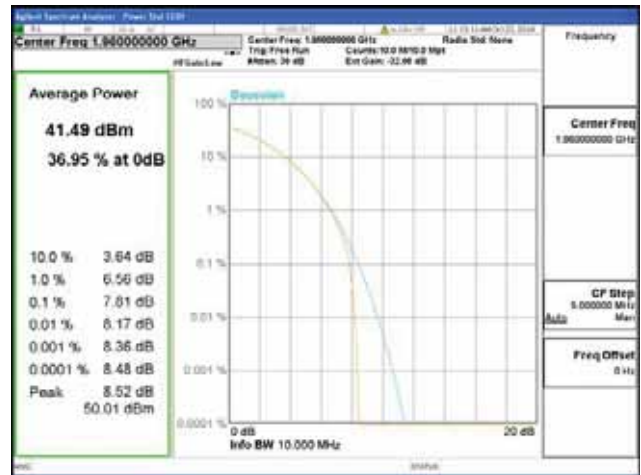
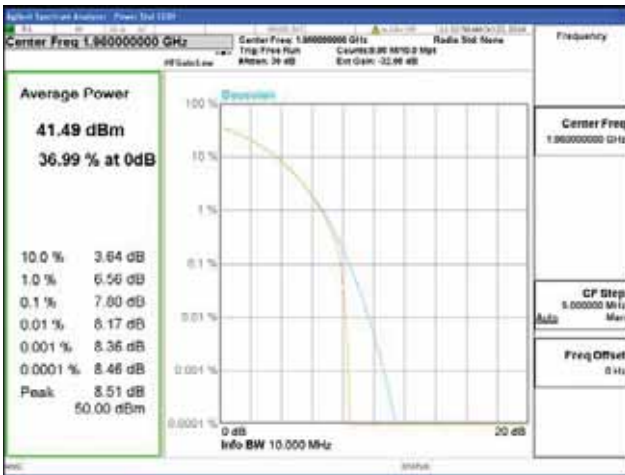
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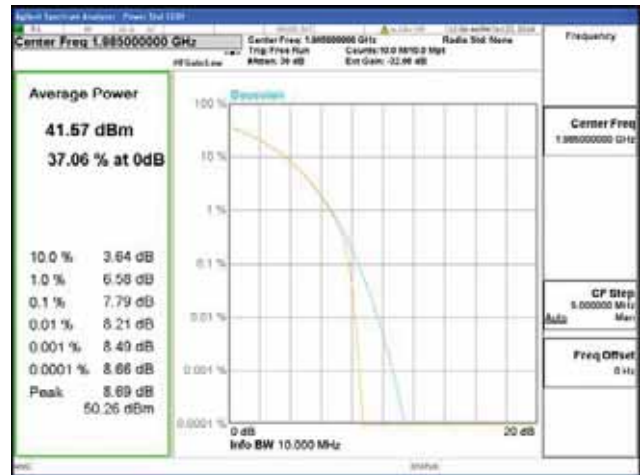
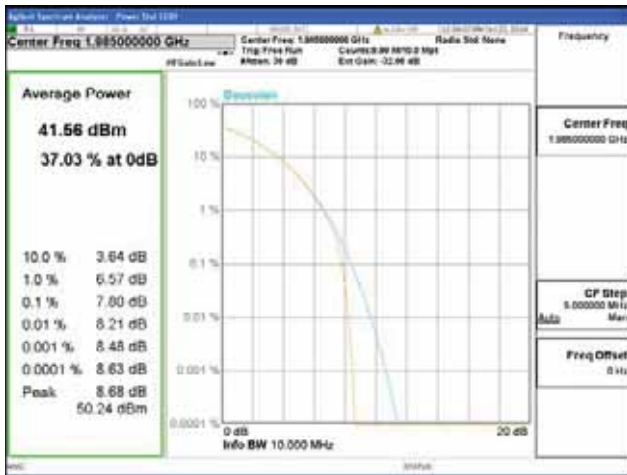
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Band 2, BW 10MHz, Single carrier, 4TX, Top

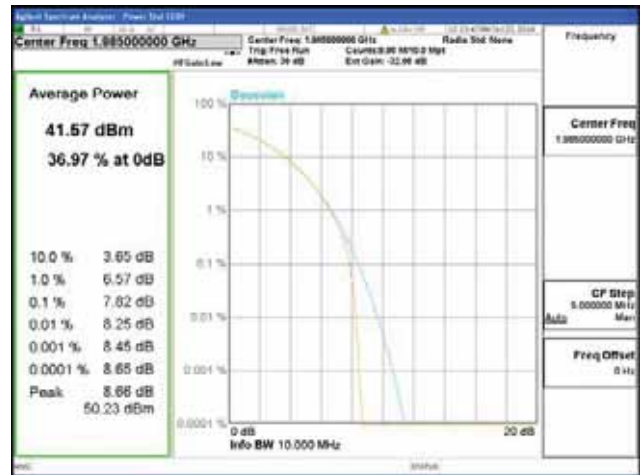
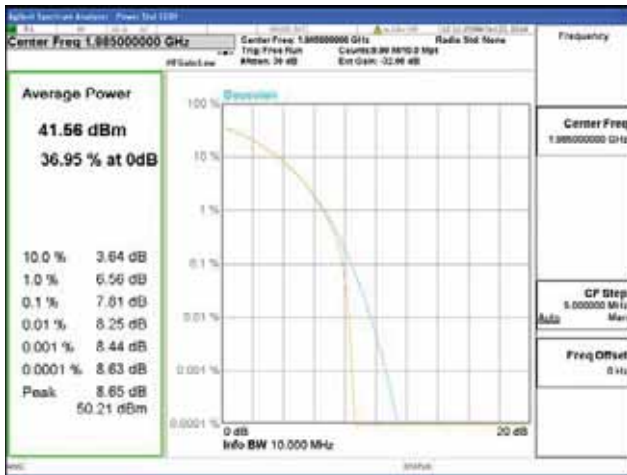
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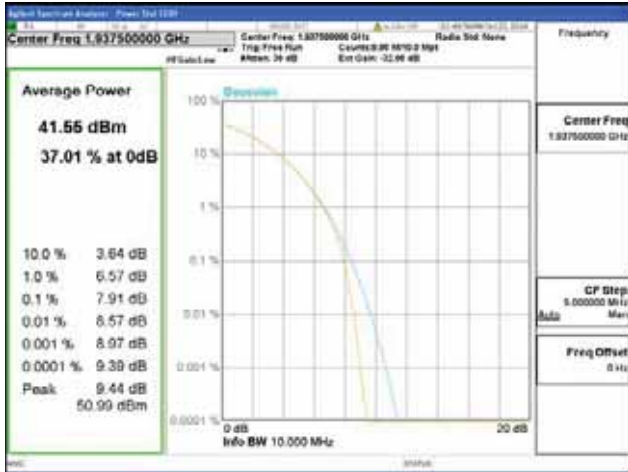


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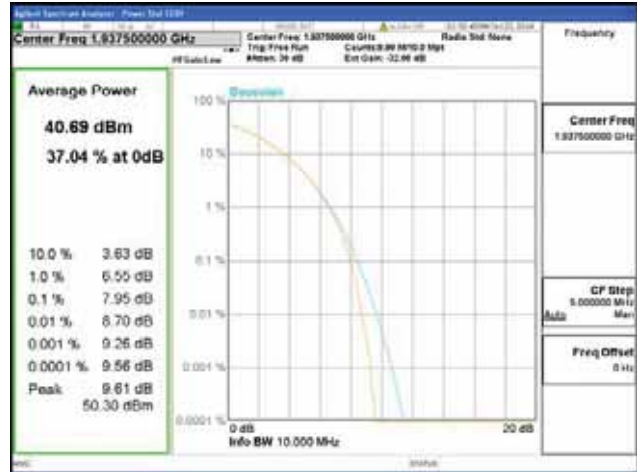
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ANT 1
Band 2, BW 15MHz, Single carrier, 4TX, Bottom

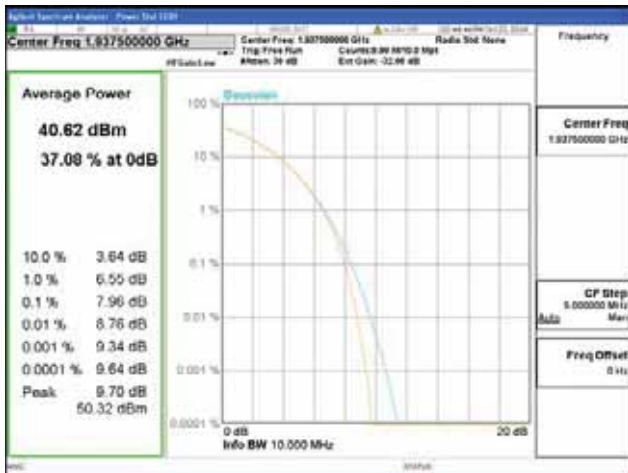
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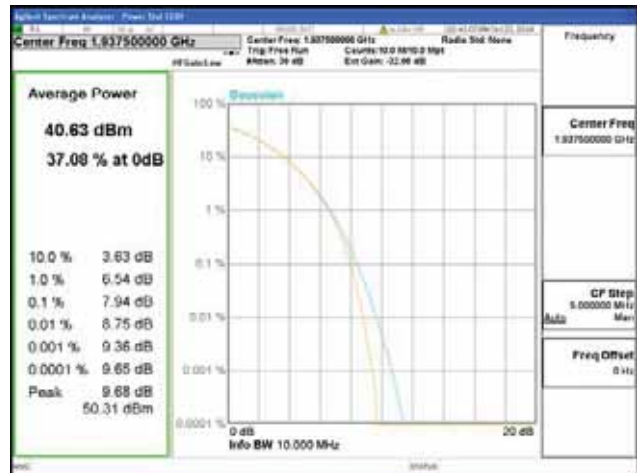
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256QAM





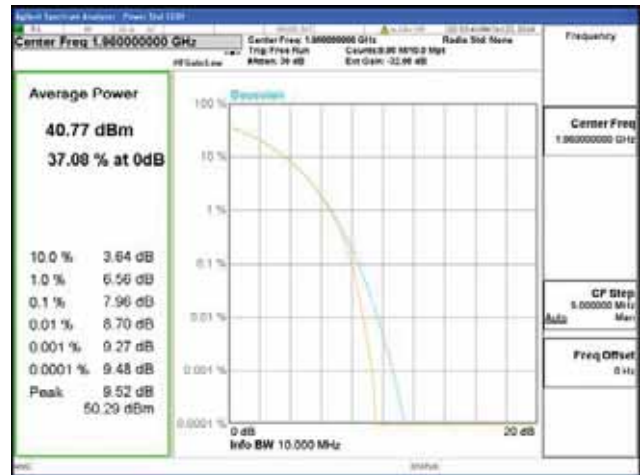
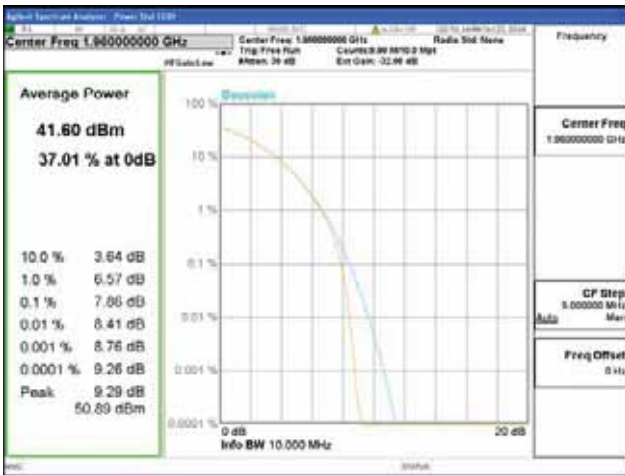
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Band 2, BW 15MHz, Single carrier, 4TX, Middle

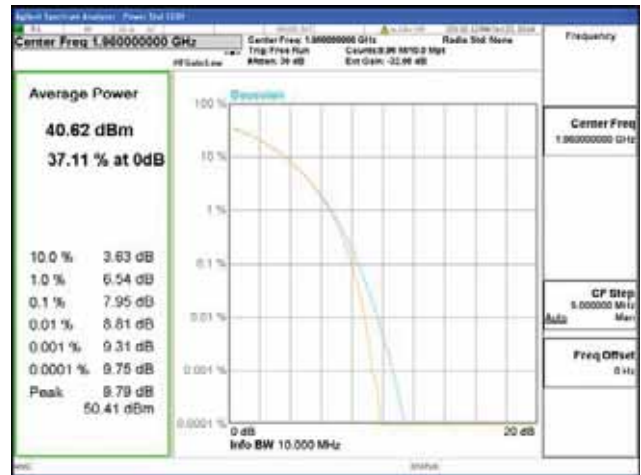
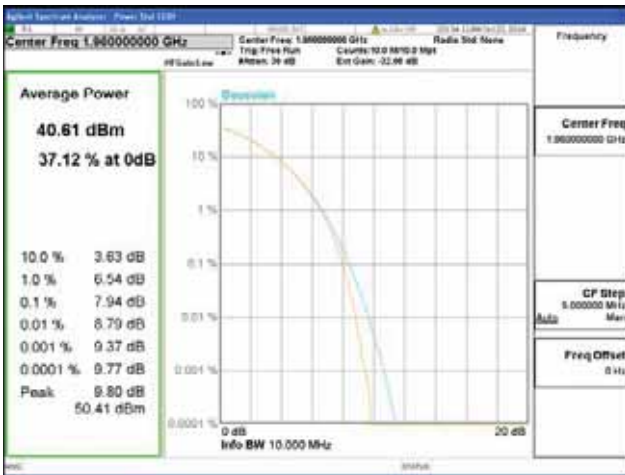
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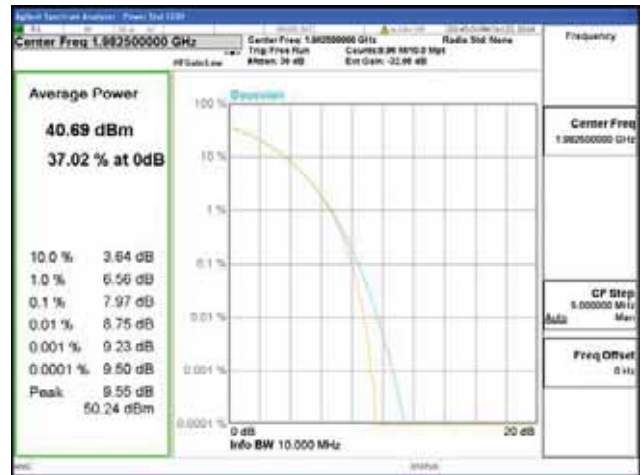
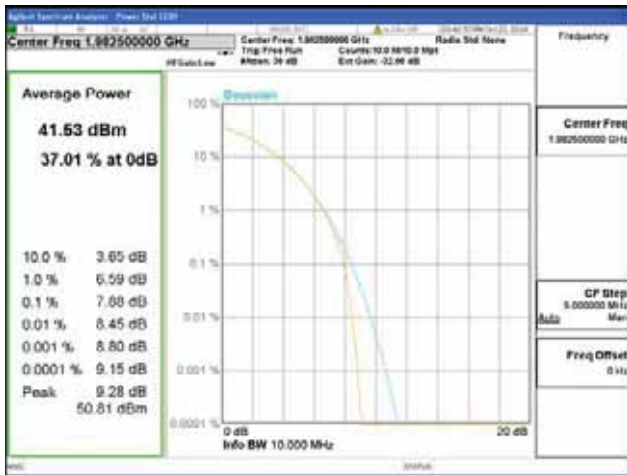
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Band 2, BW 15MHz, Single carrier, 4TX, Top

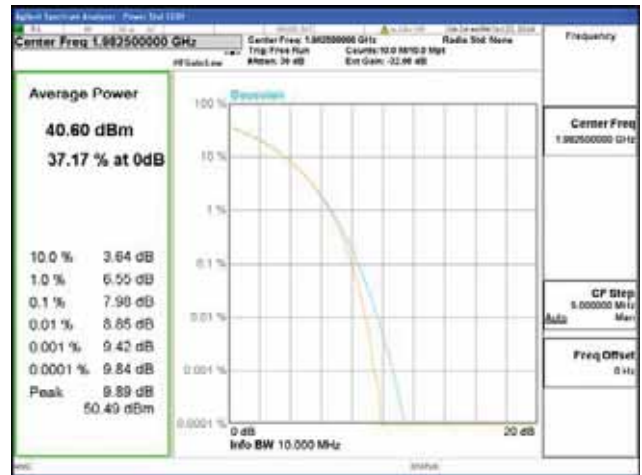
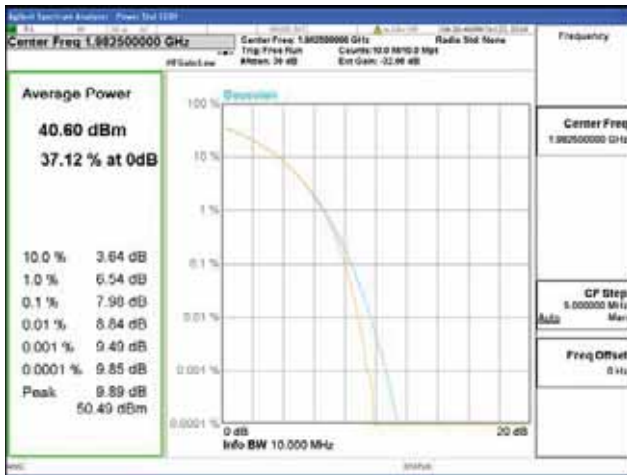
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16QAM



64QAM

256QAM



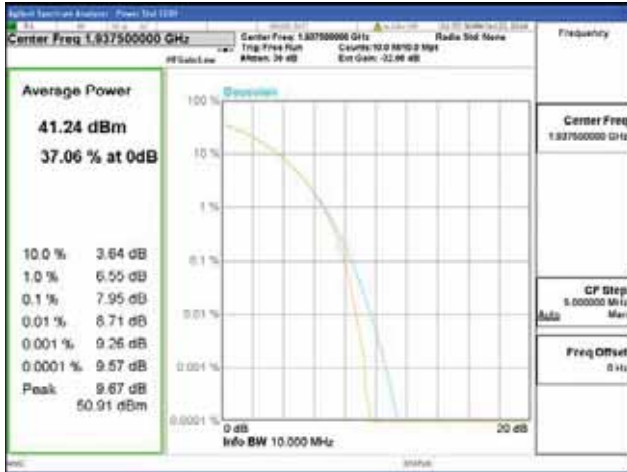


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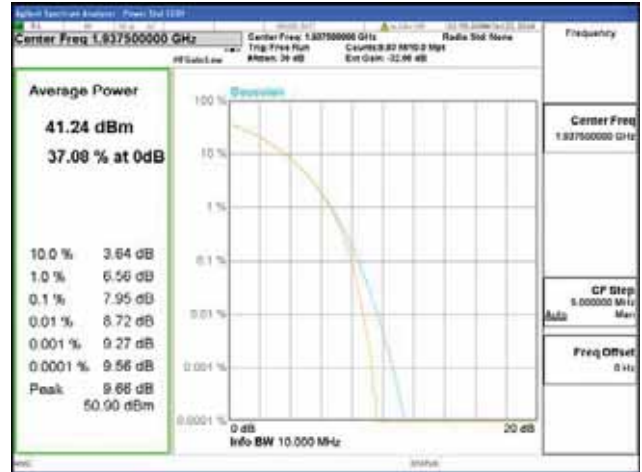
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ANT 2
Band 2, BW 15MHz, Single carrier, 4TX, Bottom

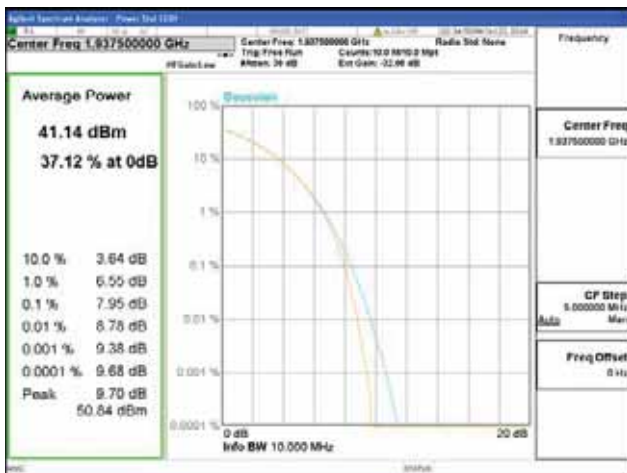
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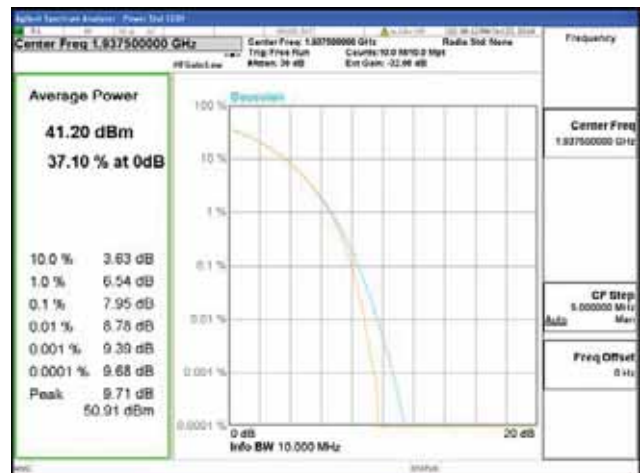
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256QAM





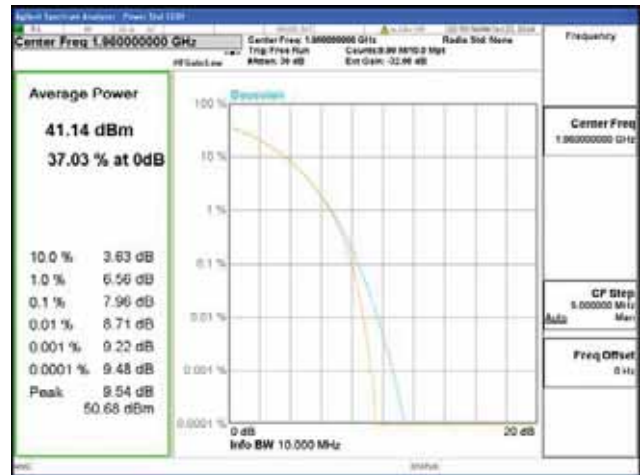
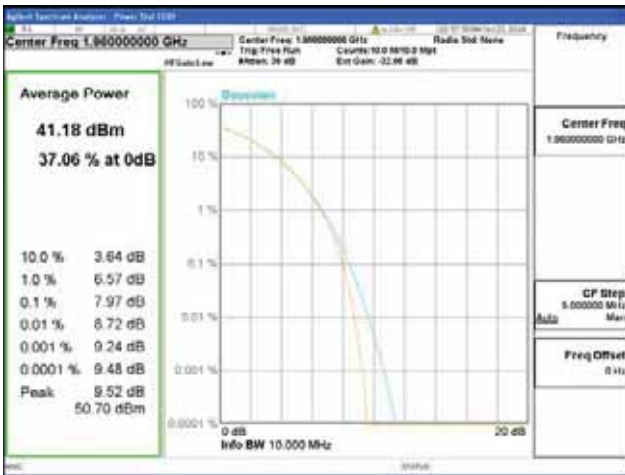
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Band 2, BW 15MHz, Single carrier, 4TX, Middle

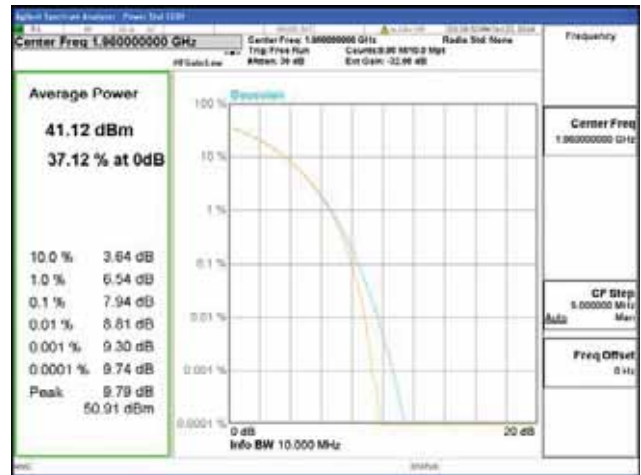
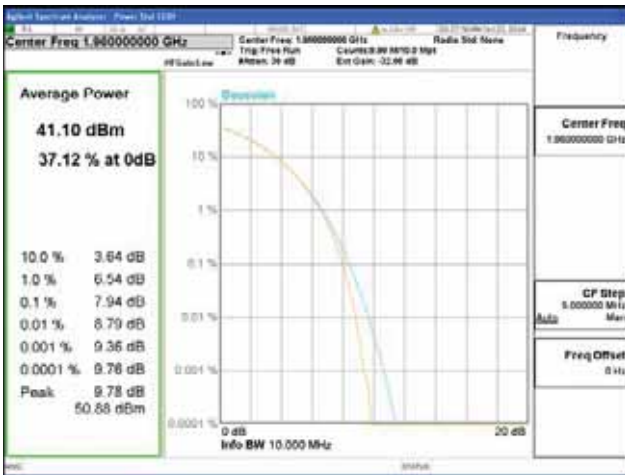
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256QAM





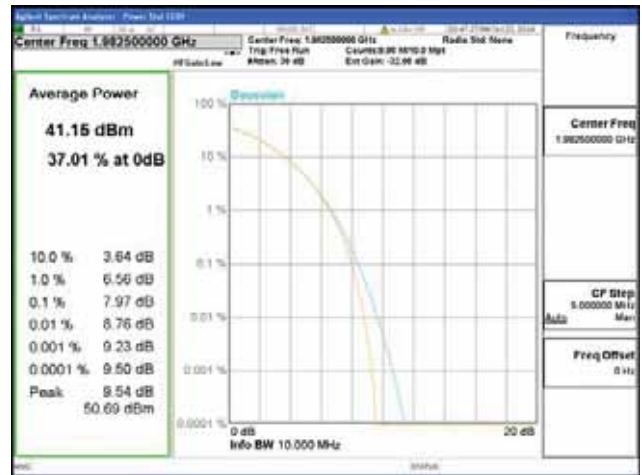
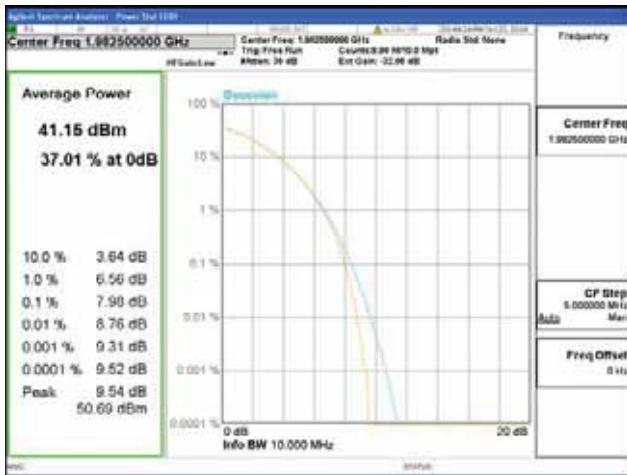
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Band 2, BW 15MHz, Single carrier, 4TX, Top

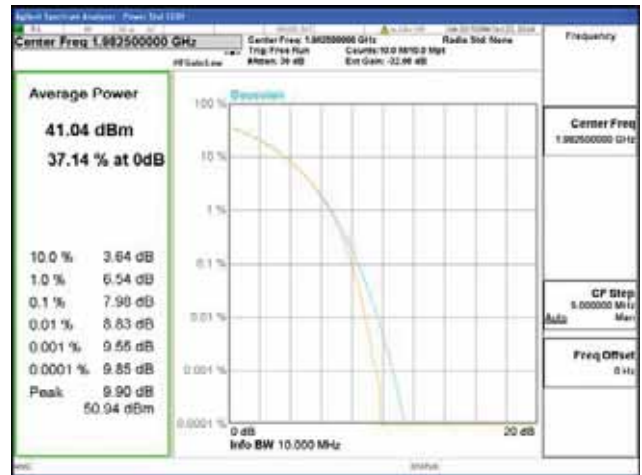
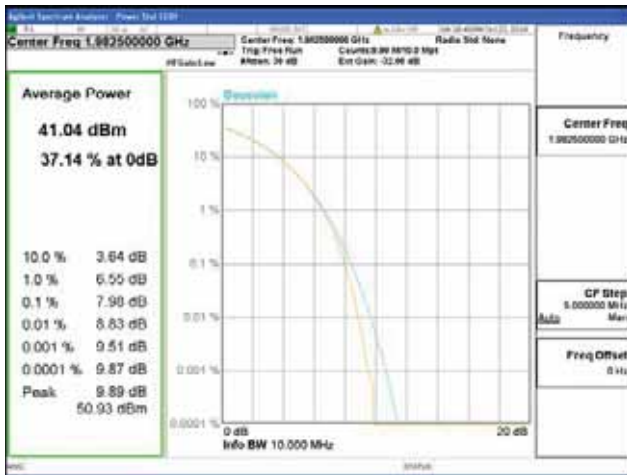
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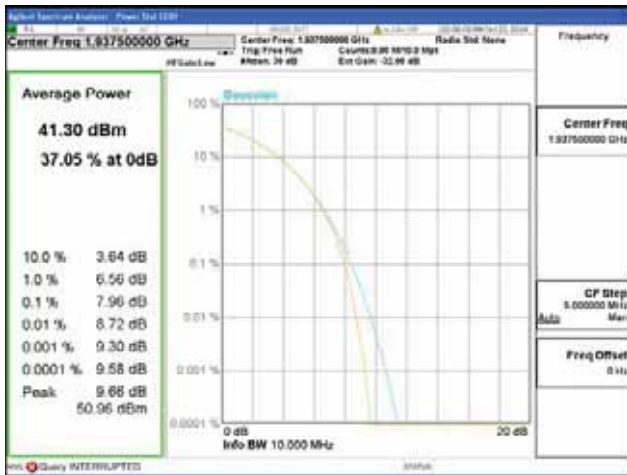


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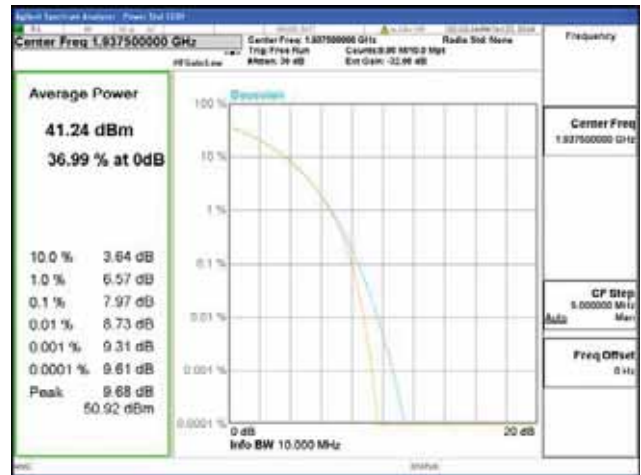
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ANT 3
Band 2, BW 15MHz, Single carrier, 4TX, Bottom

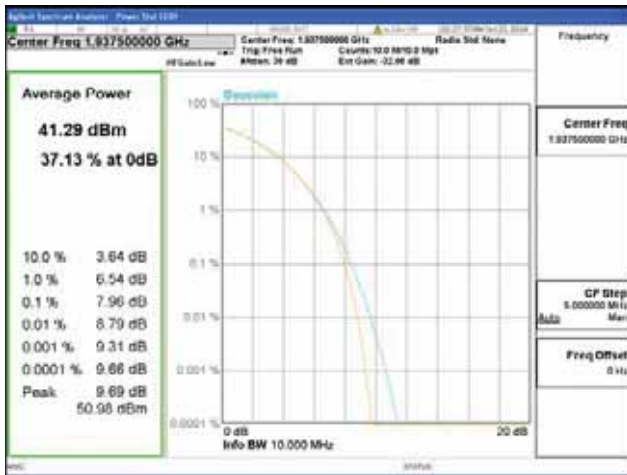
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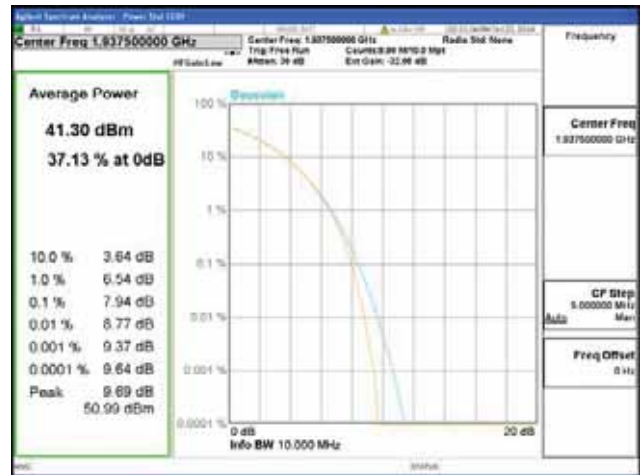
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64QAM



256QAM





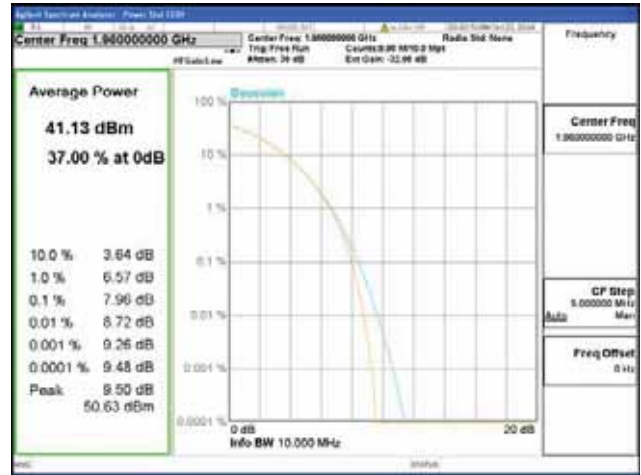
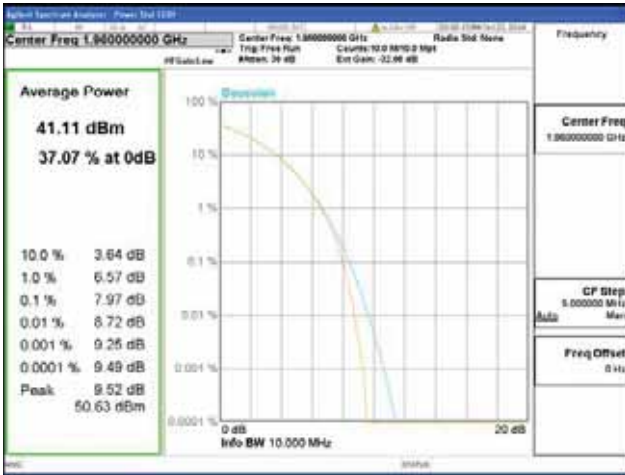
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Band 2, BW 15MHz, Single carrier, 4TX, Middle

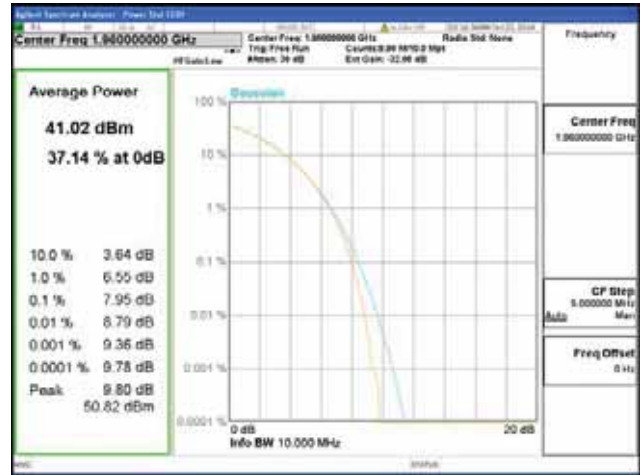
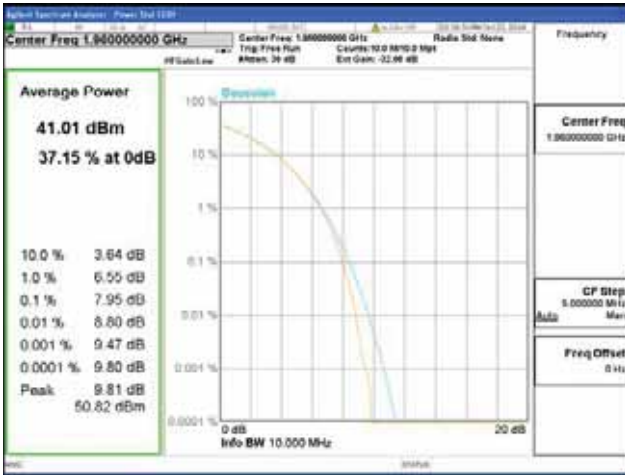
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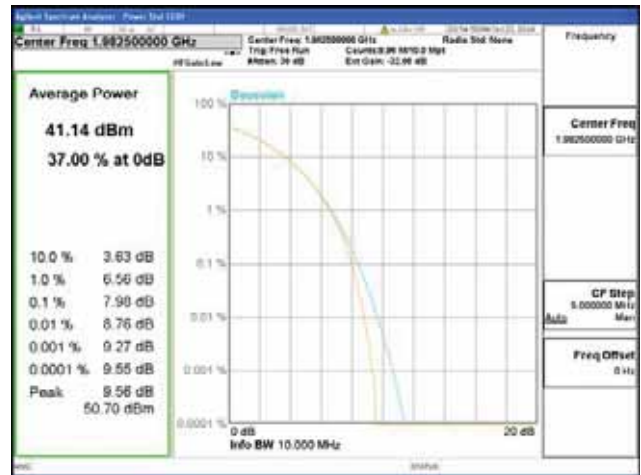
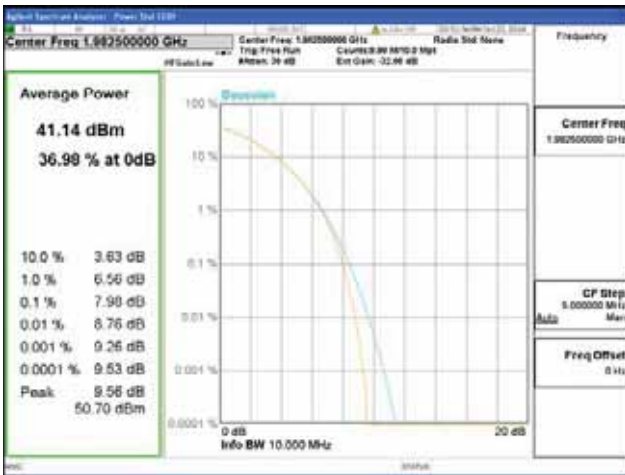
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Band 2, BW 15MHz, Single carrier, 4TX, Top

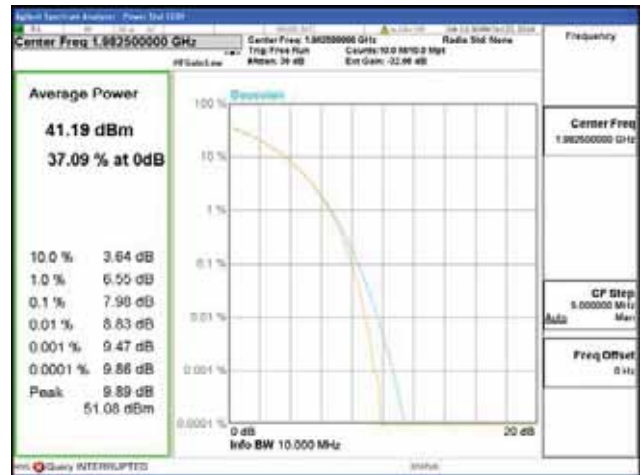
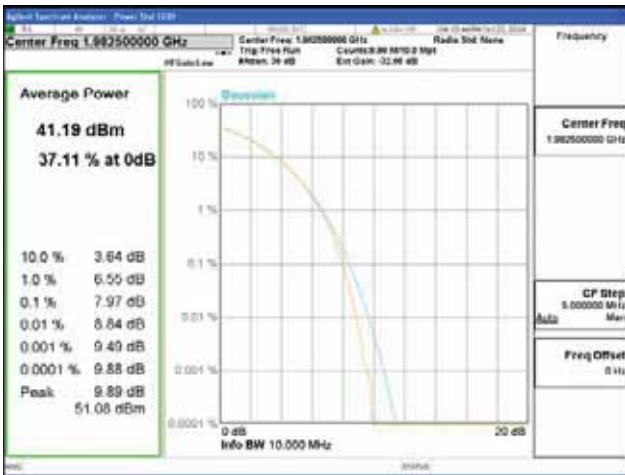
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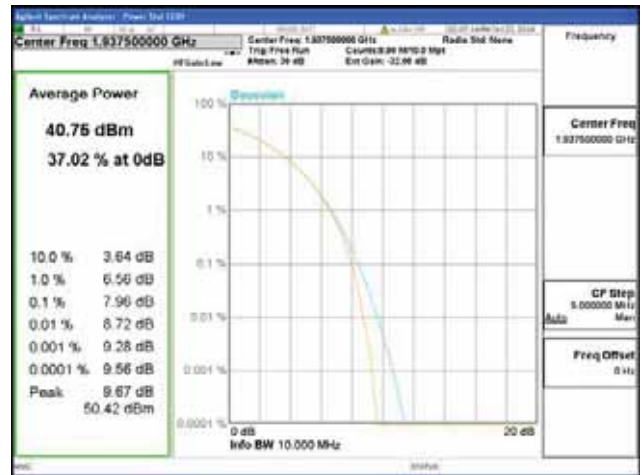
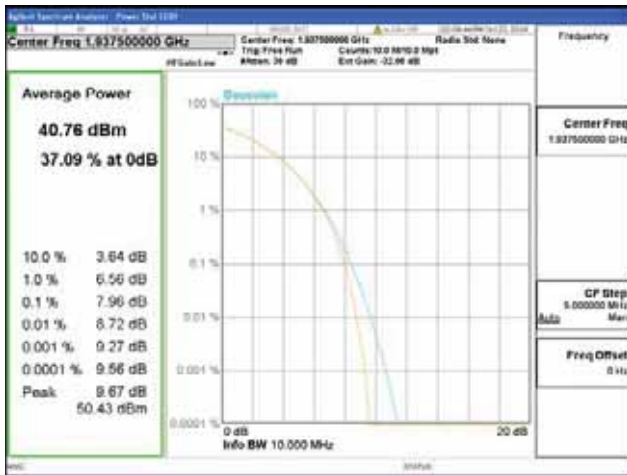
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ANT 4
Band 2, BW 15MHz, Single carrier, 4TX, Bottom

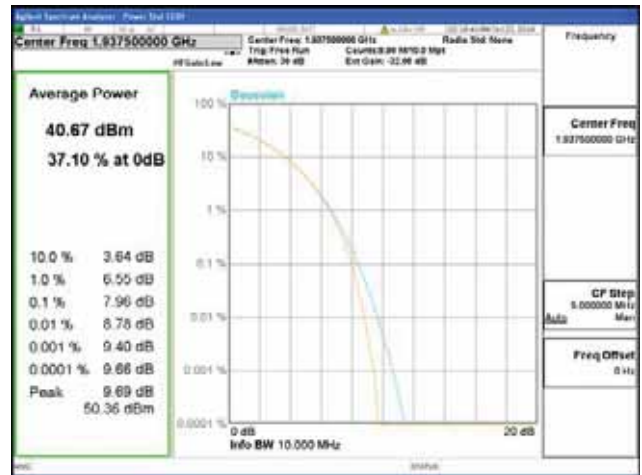
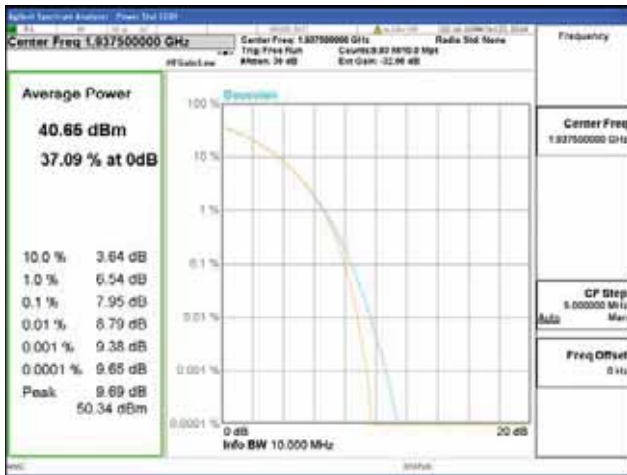
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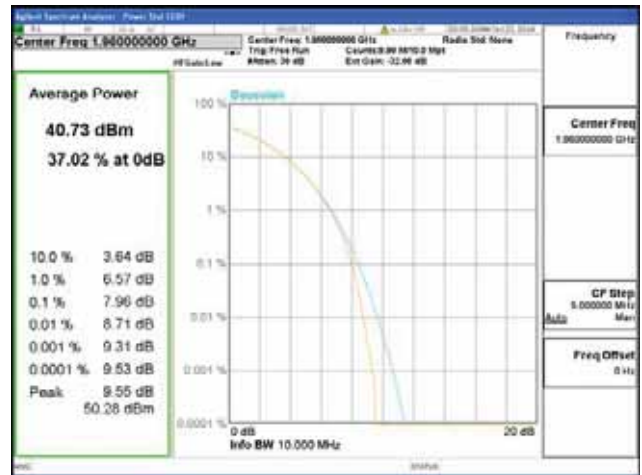
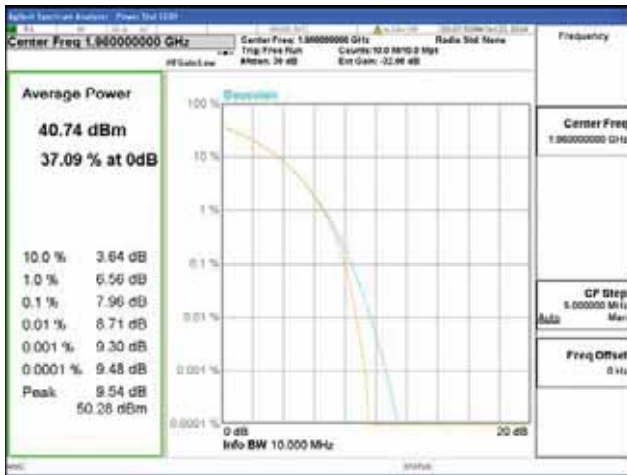
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Band 2, BW 15MHz, Single carrier, 4TX, Middle

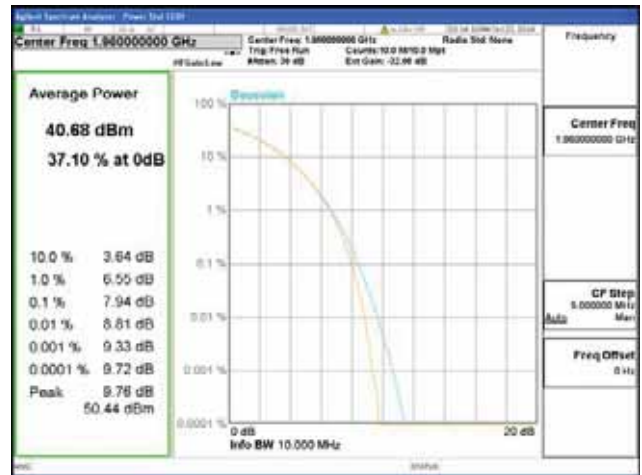
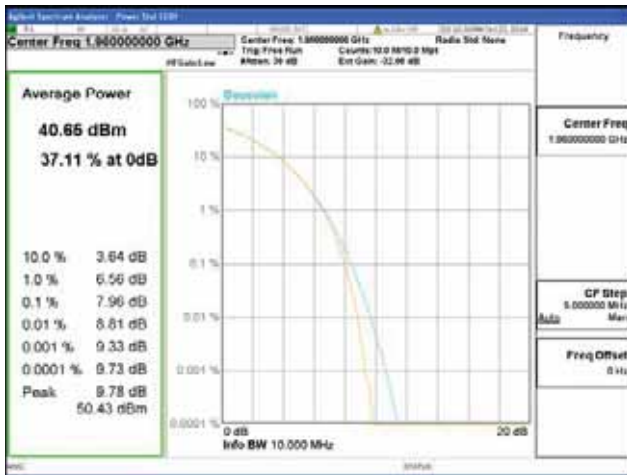
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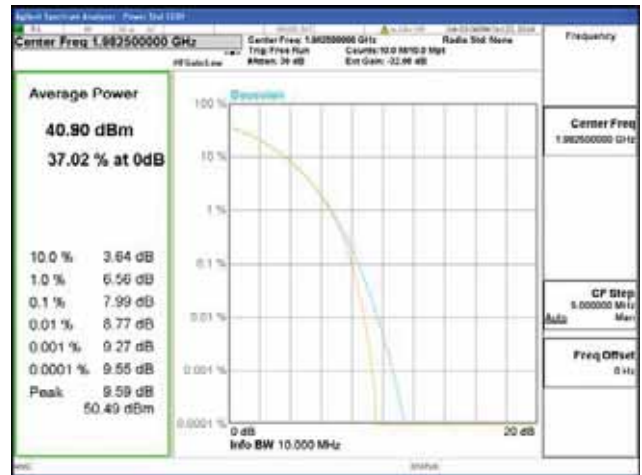
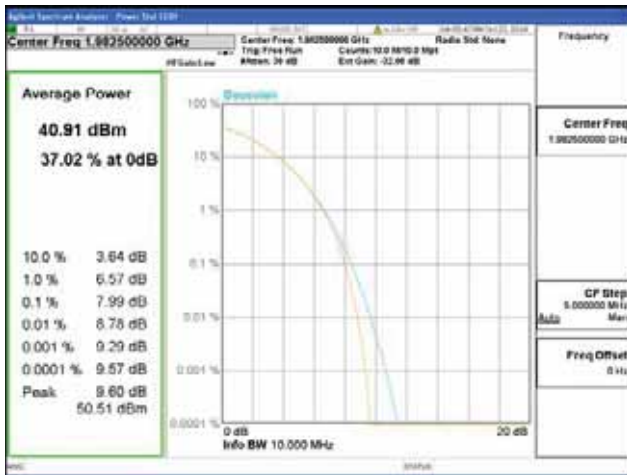
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Band 2, BW 15MHz, Single carrier, 4TX, Top

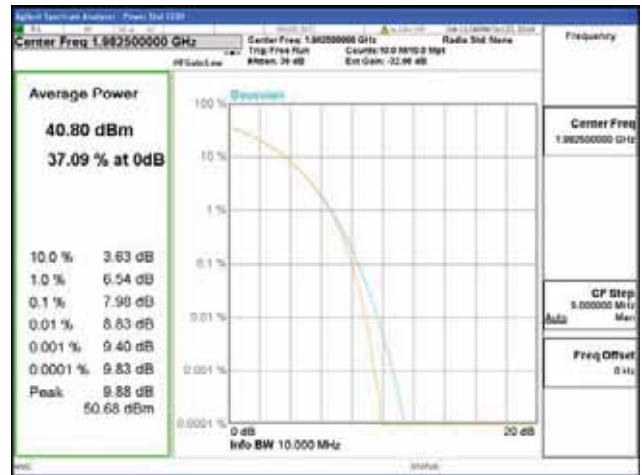
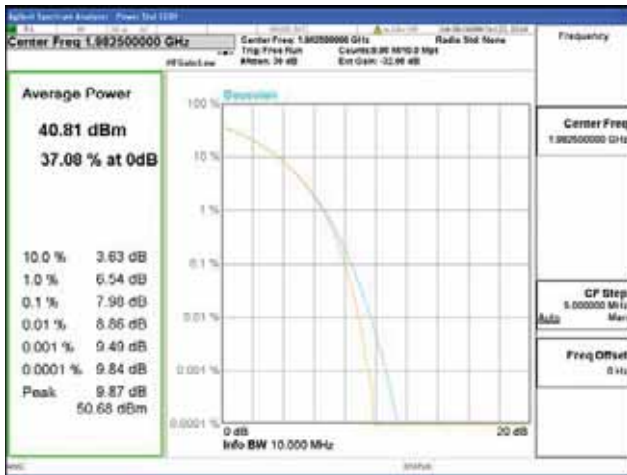
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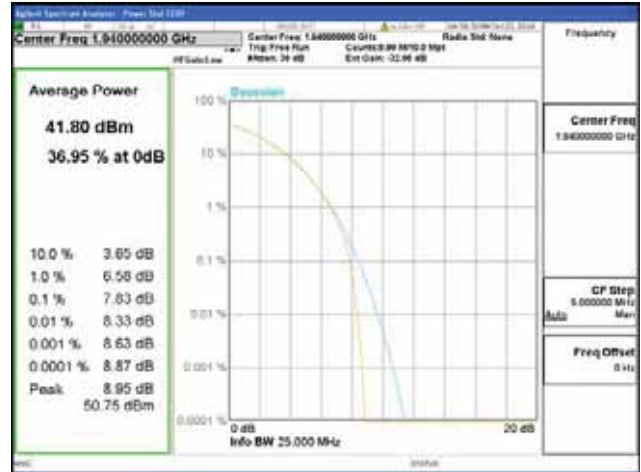
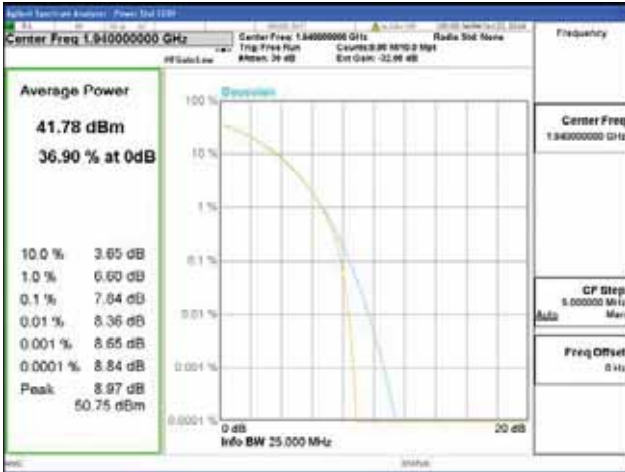
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ANT 1
Band 2, BW 20MHz, Single carrier, 4TX, Bottom

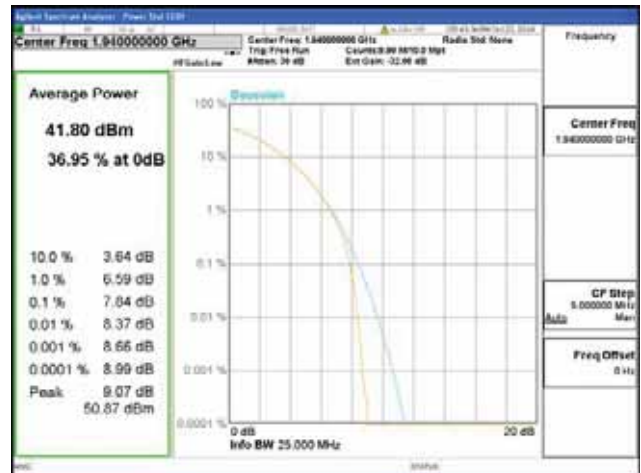
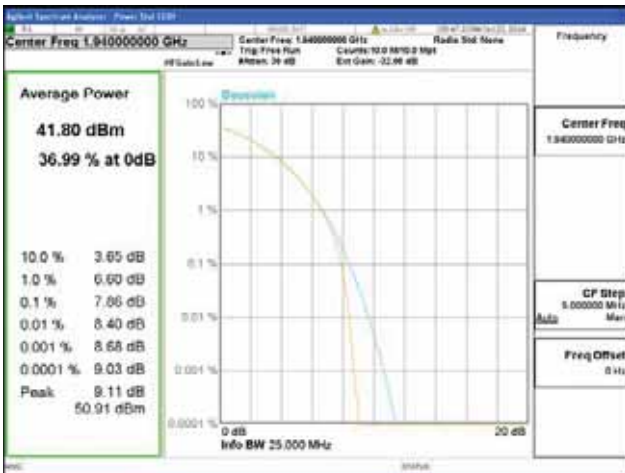
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16QAM



64QAM

256QAM





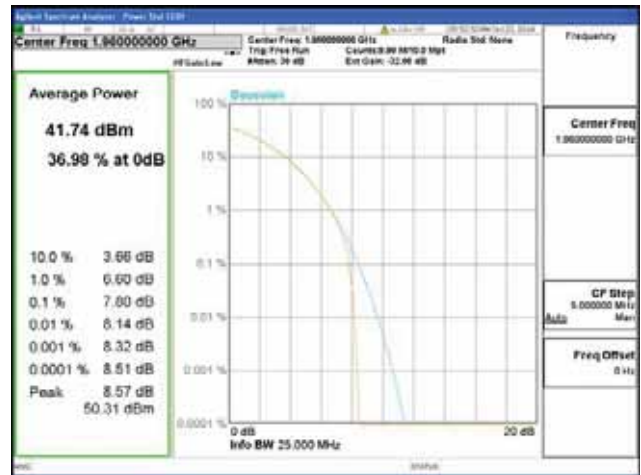
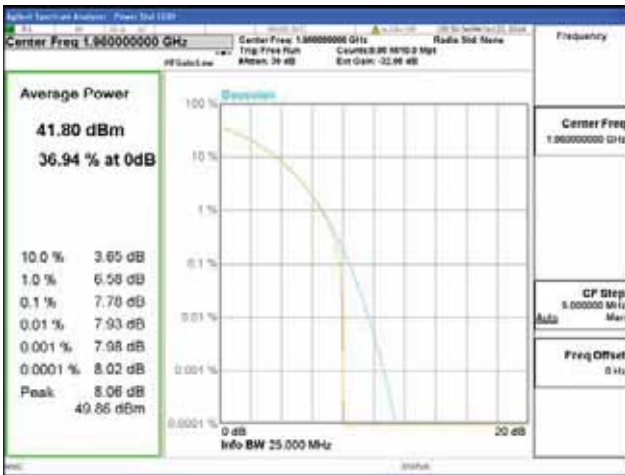
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Band 2, BW 20MHz, Single carrier, 4TX, Middle

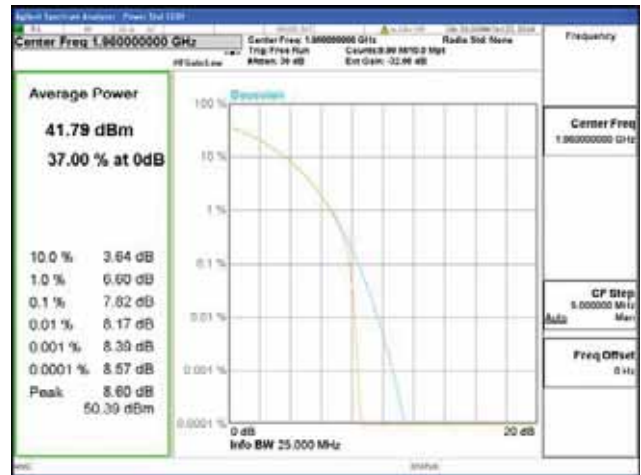
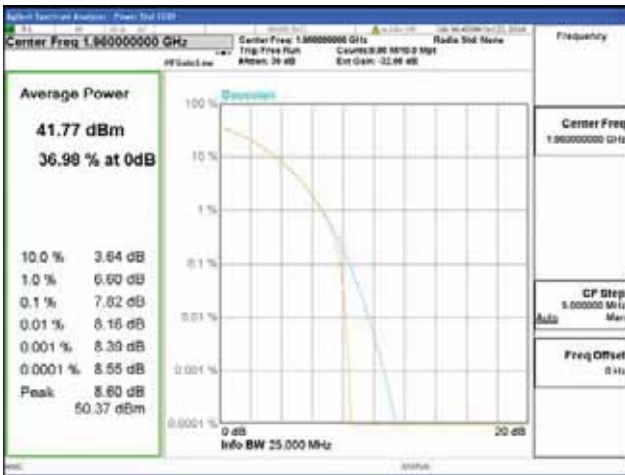
QPSK

16QAM



64QAM

256QAM





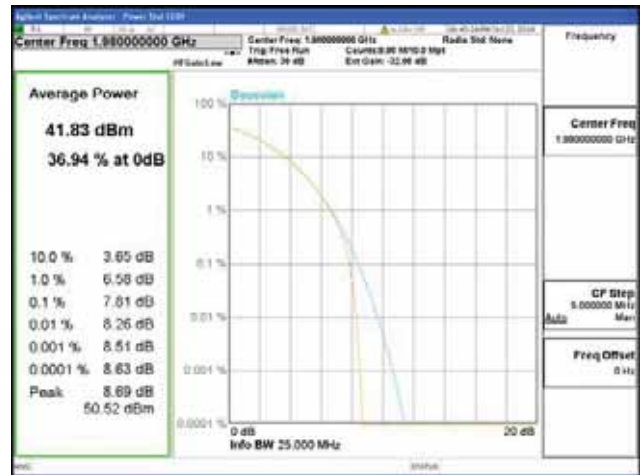
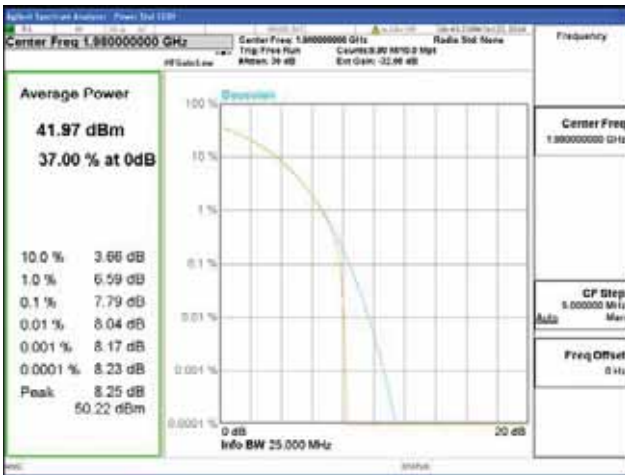
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Band 2, BW 20MHz, Single carrier, 4TX, Top

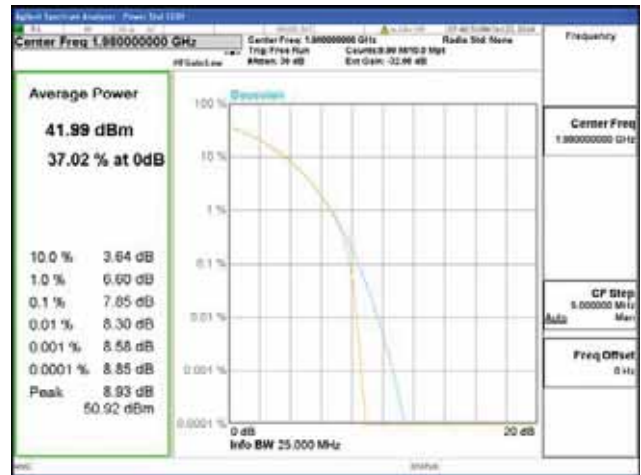
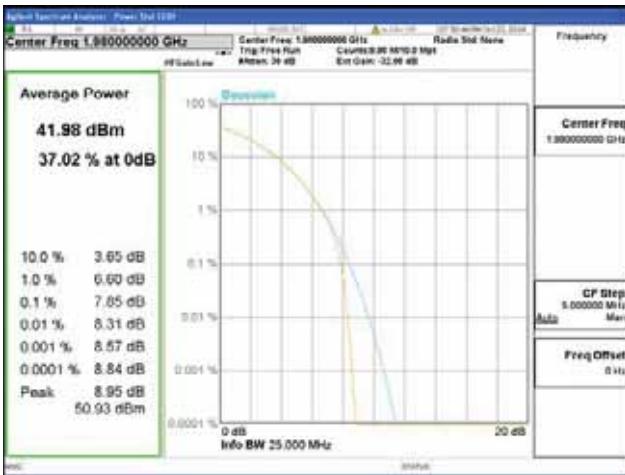
QPSK

16QAM



64QAM

256QAM





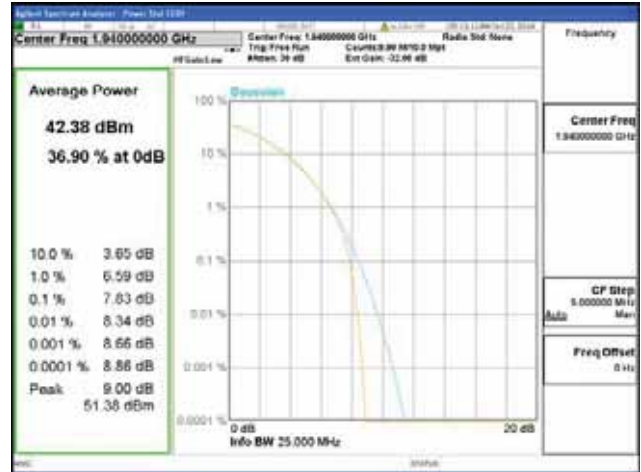
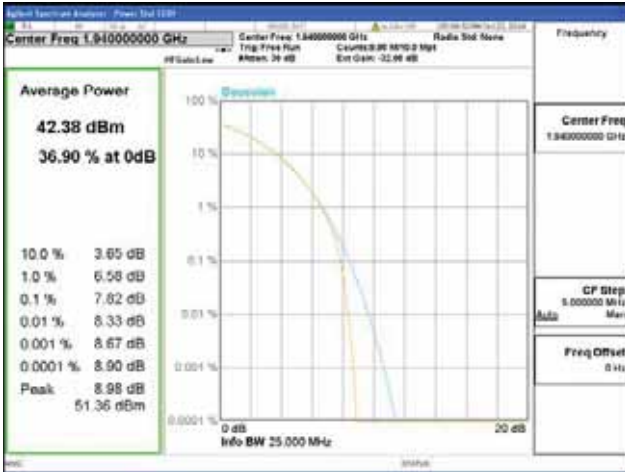
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ANT 2
Band 2, BW 20MHz, Single carrier, 4TX, Bottom

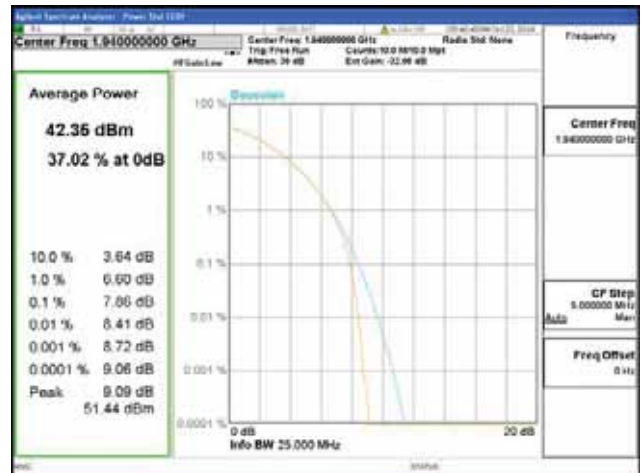
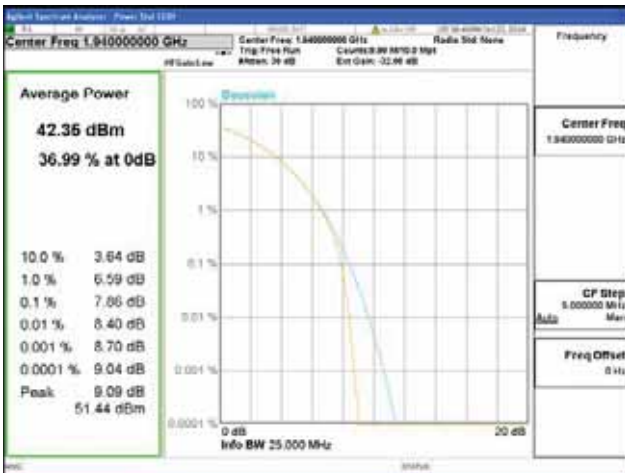
QPSK

16QAM



64QAM

256QAM





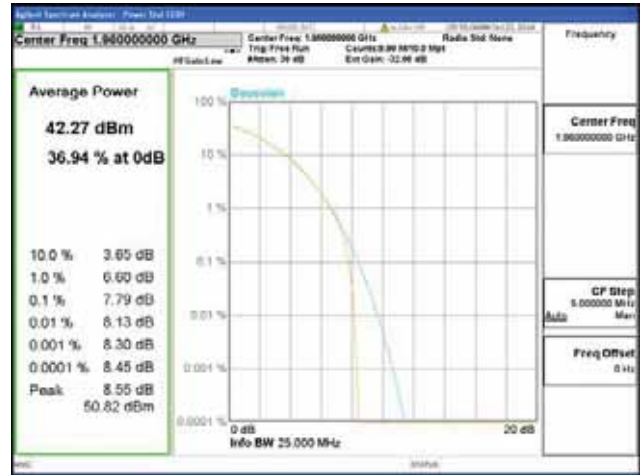
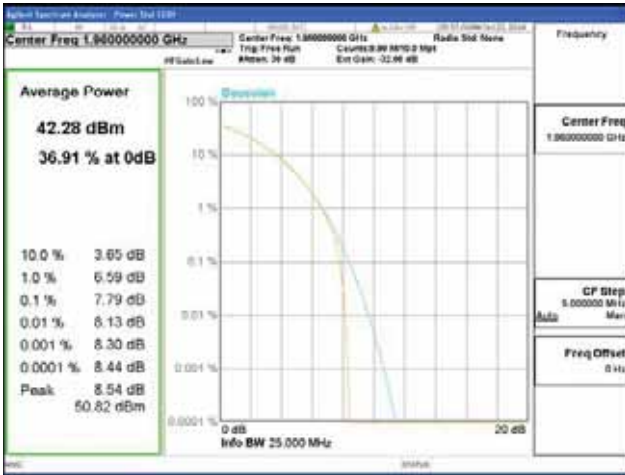
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Band 2, BW 20MHz, Single carrier, 4TX, Middle

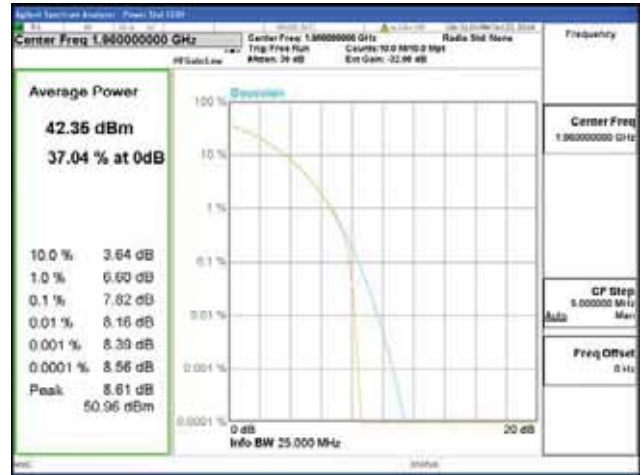
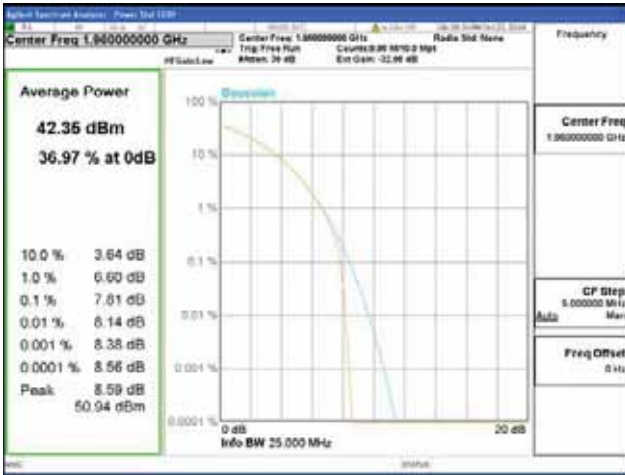
QPSK

16QAM



64QAM

256QAM





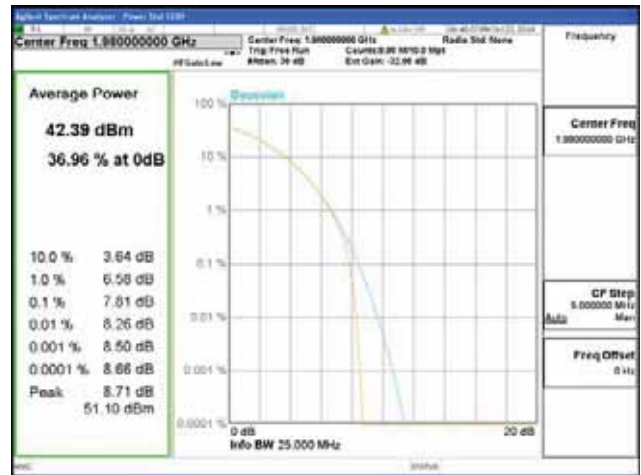
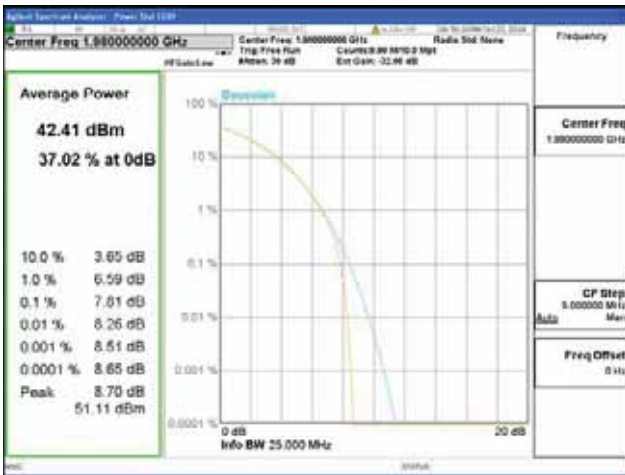
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Band 2, BW 20MHz, Single carrier, 4TX, Top

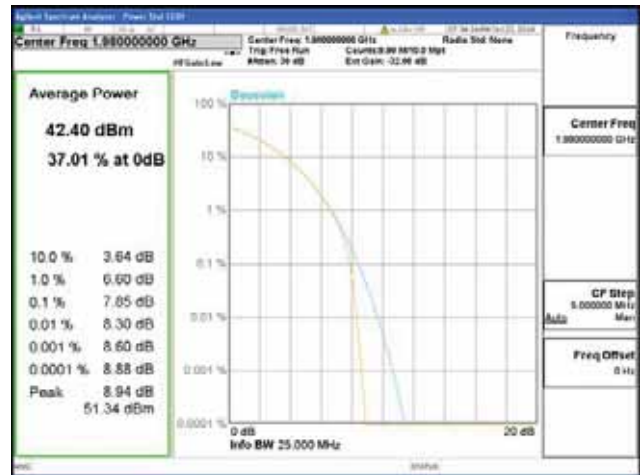
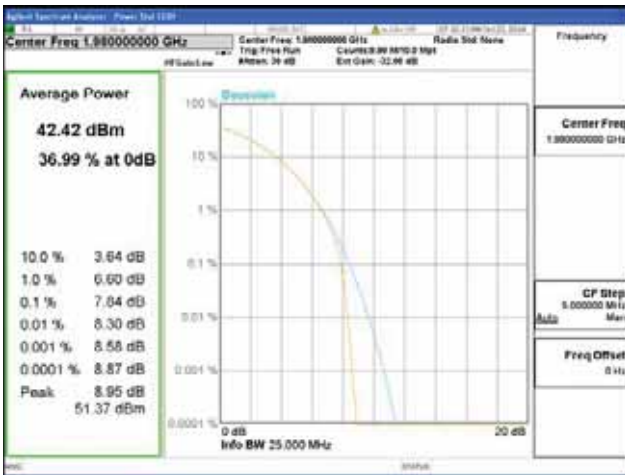
QPSK

16QAM



64QAM

256QAM



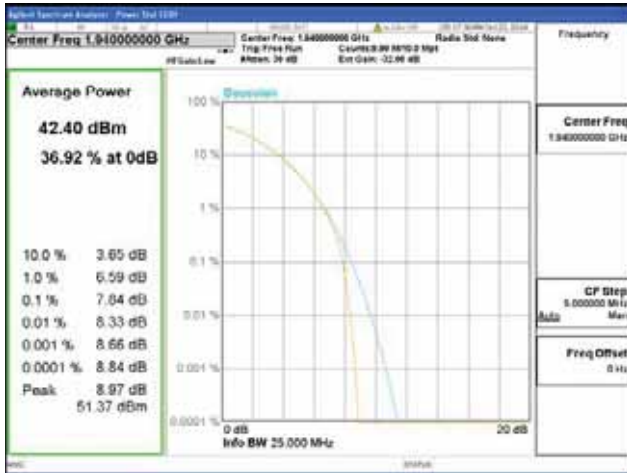


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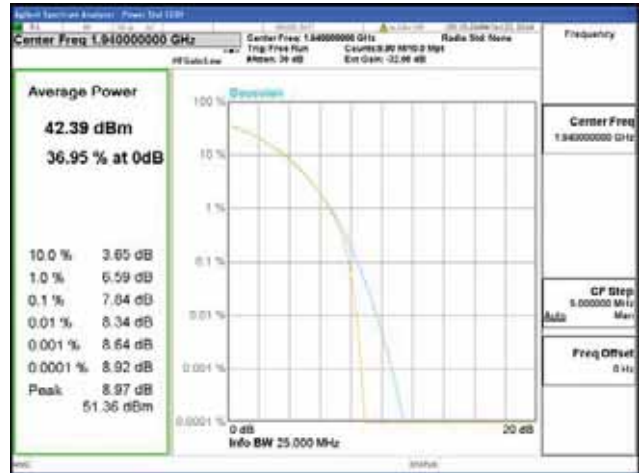
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ANT 3
Band 2, BW 20MHz, Single carrier, 4TX, Bottom

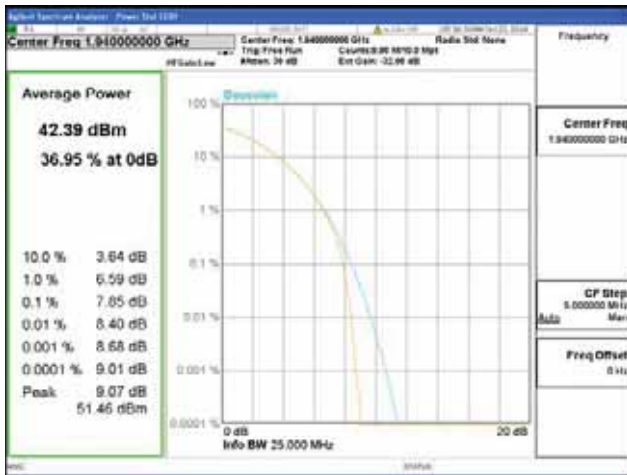
QPSK



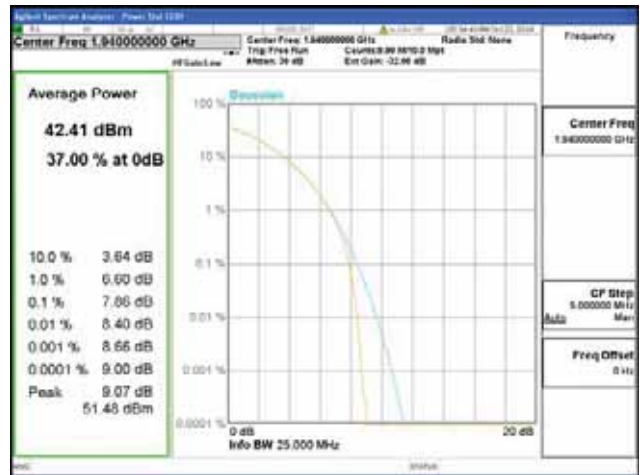
16QAM



64QAM



256QAM





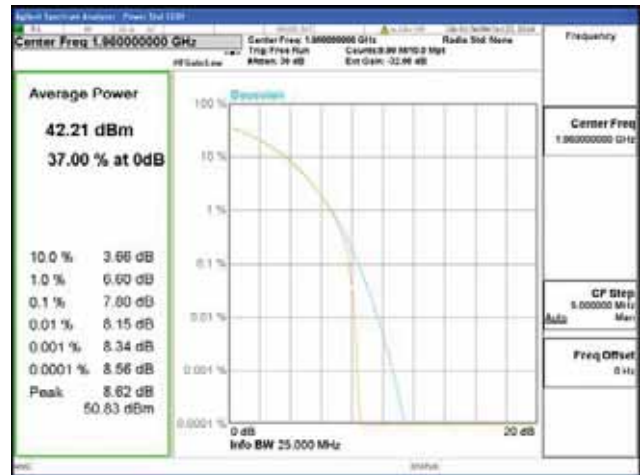
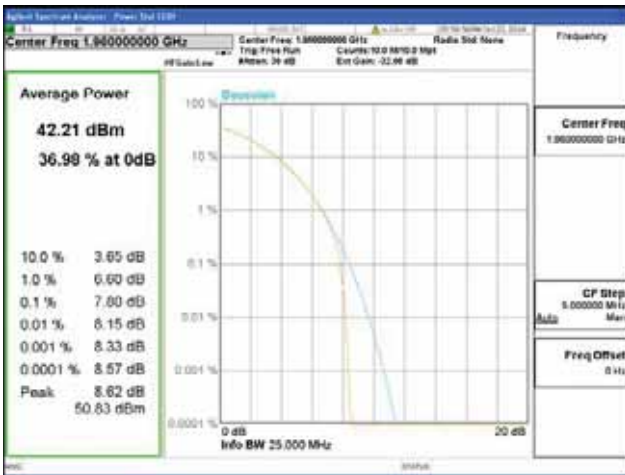
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Band 2, BW 20MHz, Single carrier, 4TX, Middle

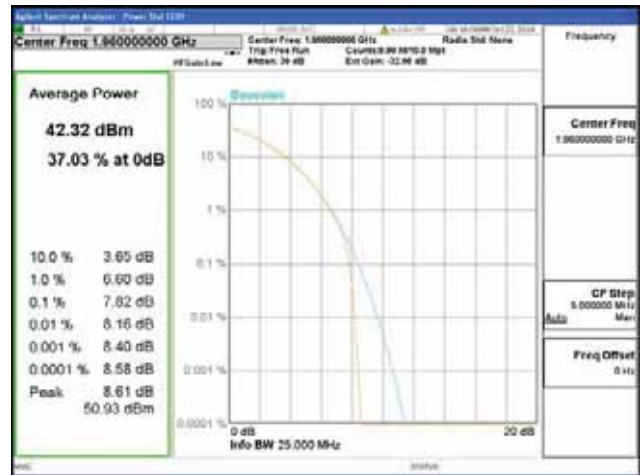
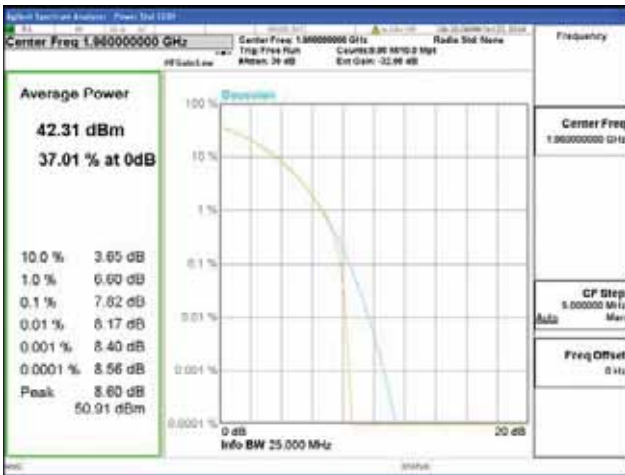
QPSK

16QAM



64QAM

256QAM





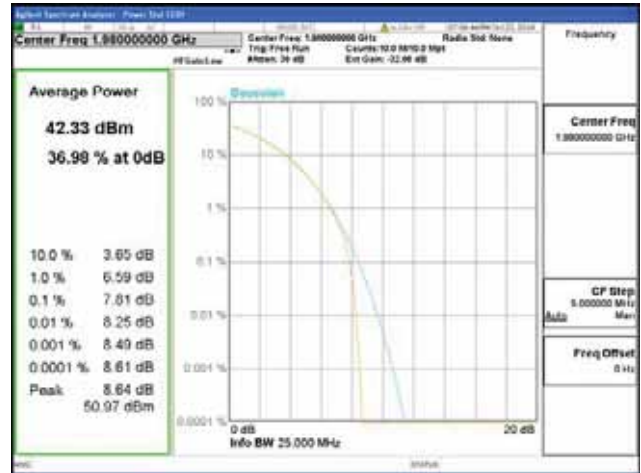
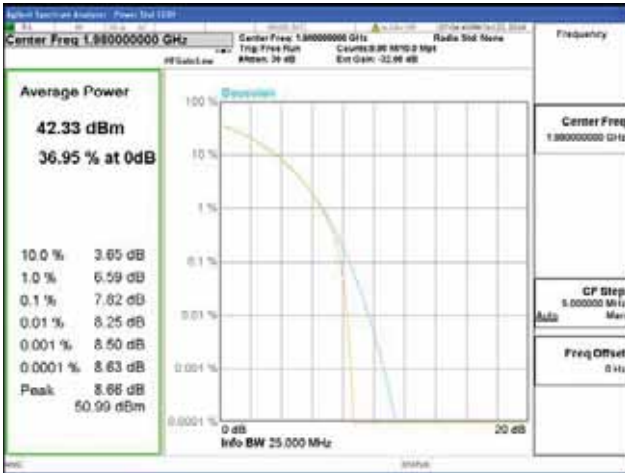
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Band 2, BW 20MHz, Single carrier, 4TX, Top

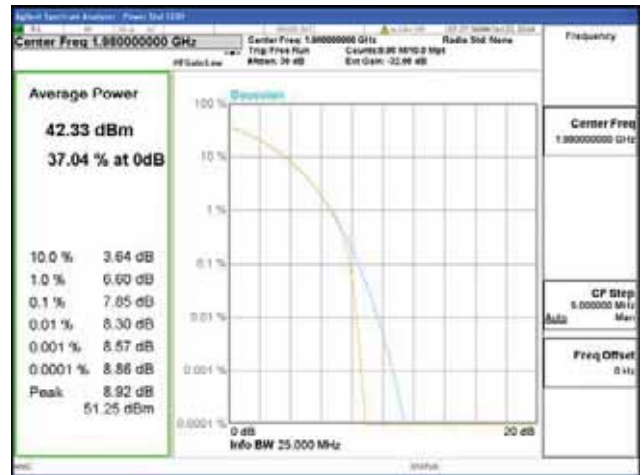
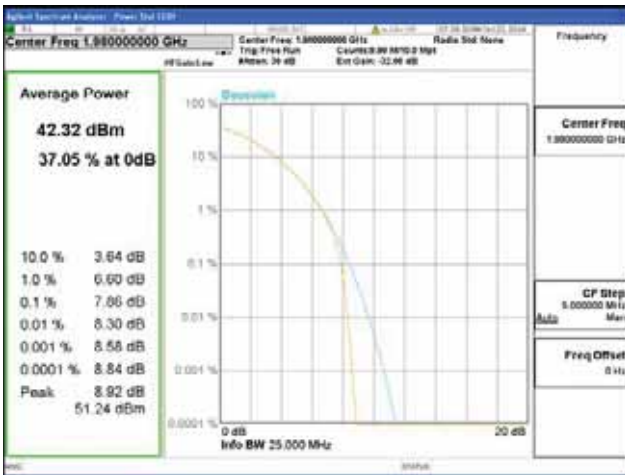
QPSK

16QAM



64QAM

256QAM



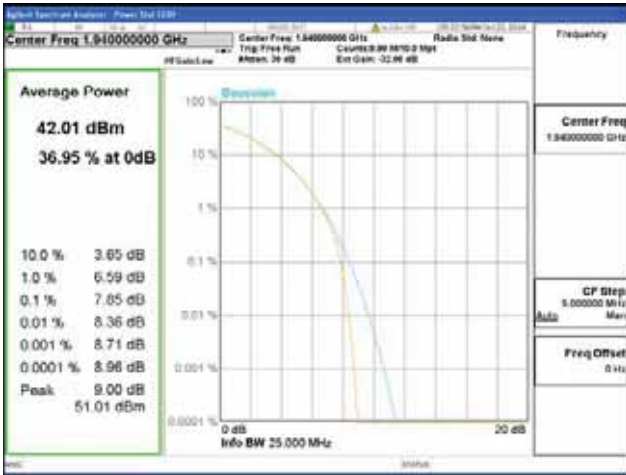


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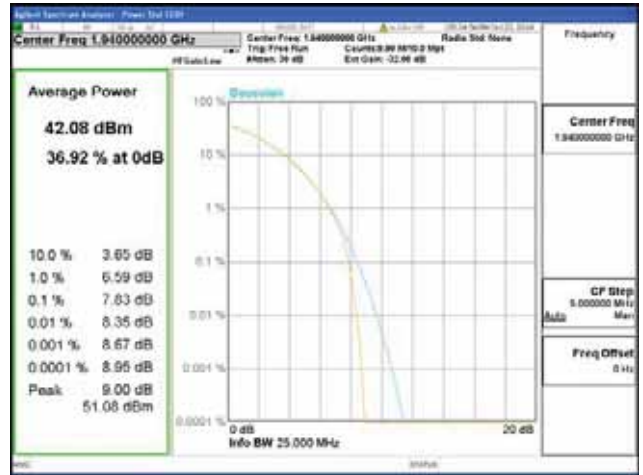
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ANT 4
Band 2, BW 20MHz, Single carrier, 4TX, Bottom

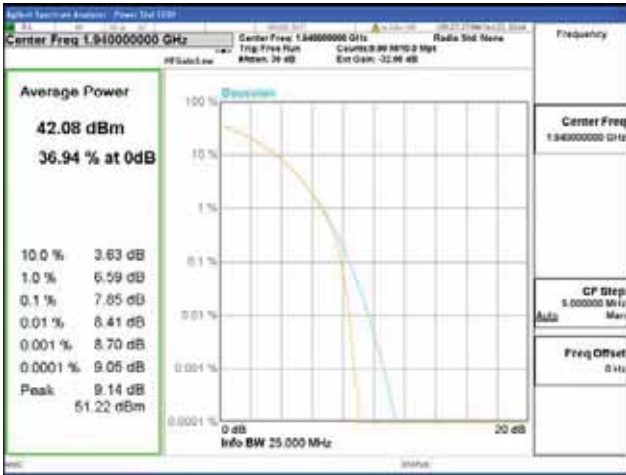
QPSK



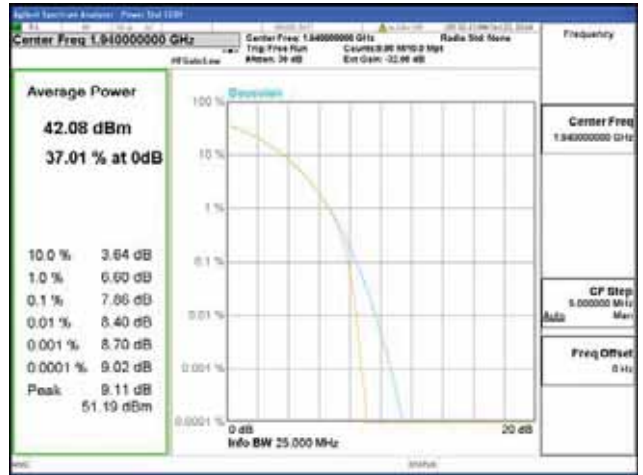
16QAM



64QAM



256QAM





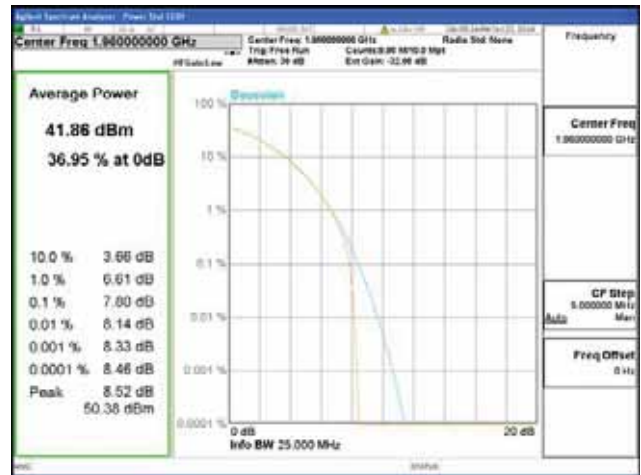
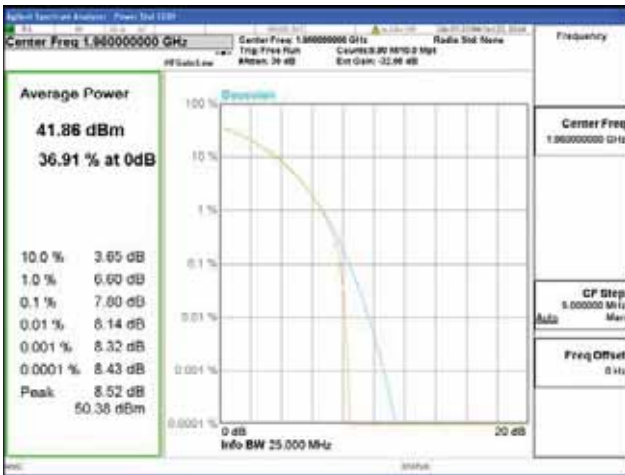
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Band 2, BW 20MHz, Single carrier, 4TX, Middle

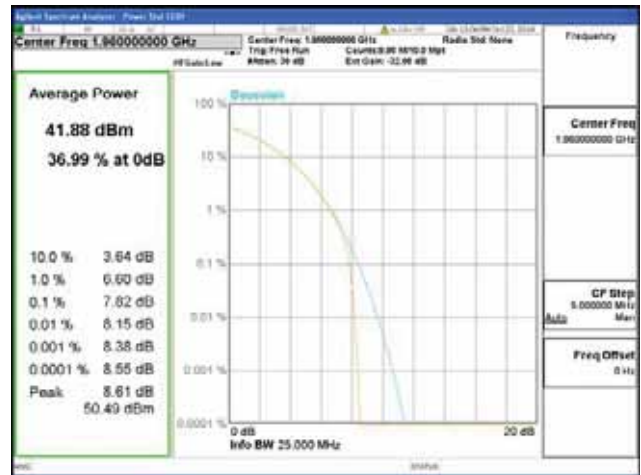
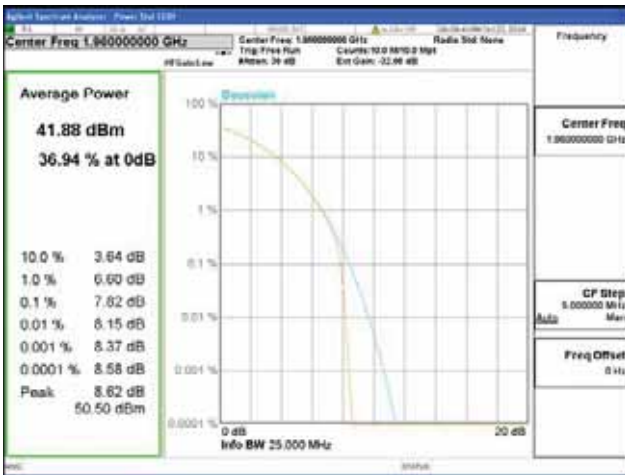
QPSK

16QAM



64QAM

256QAM

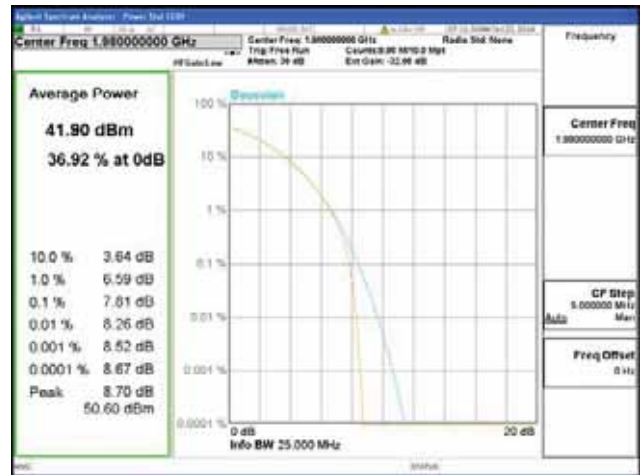
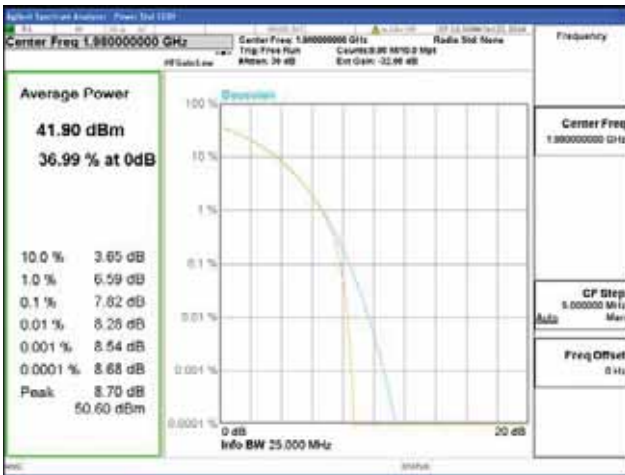




Band 2, BW 20MHz, Single carrier, 4TX, Top

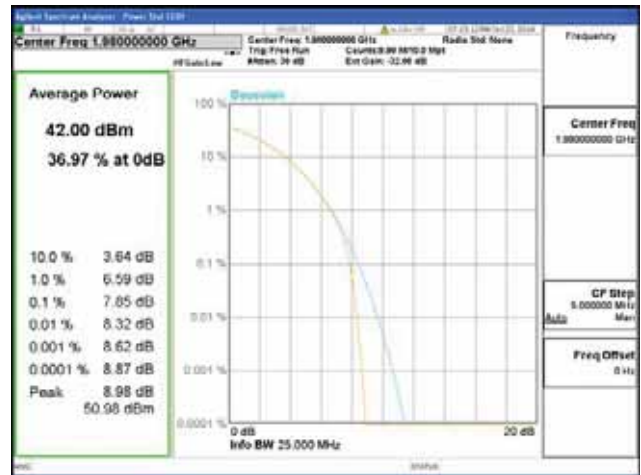
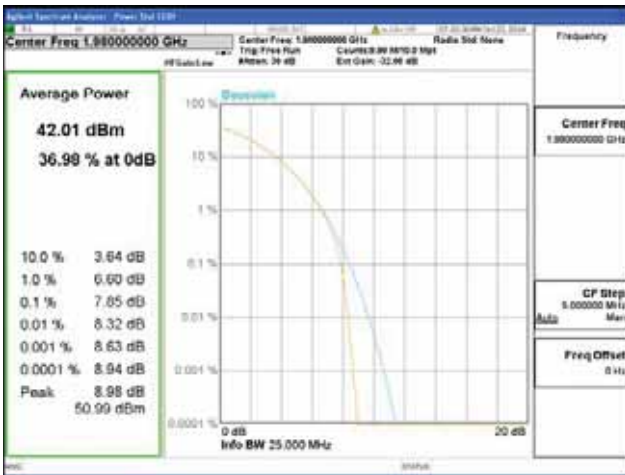
QPSK

16QAM



64QAM

256QAM



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5. Occupied Bandwidth

Test Requirements :

§ 2.1049 Measurements required : Occupied bandwidth

The occupied bandwidth, that is the frequency bandwidth such that, below its lower and above its upper frequency limits, the mean powers radiated are each equal to 0.5 percent of the total mean power radiated by a given emission shall be measured under the specified conditions of § 2.1049(a) through (i) as applicable.

Test Procedures :

The RF output of the transmitter was connected to the input of the spectrum analyzer through sufficient attenuation. The EUT was connected to a spectrum analyzer enabled with an occupied bandwidth in accordance with FCC Part 2.1049. The occupied bandwidth was measured from the fundamental emission at the bottom, middle and top channels. The occupied bandwidth was measured using the built in occupied bandwidth function of the spectrum analyzer. It was set to measure the bandwidth where 99% of the signal power was contained. The analyzer automatically configures the measurement bandwidths to make an accurate measurement based on the channel bandwidth and channel spacing of the EUT.



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Test Results :

Test Data : Band 2, BW 5MHz, Single carrier, 4TX

Type	Carrier	Test Ant. port	Channel	Modulation	Occupied Bandwidth(MHz)
Band 2 BW 5MHz	Single	1	Bottom	QPSK	4.47
				16QAM	4.47
				64QAM	4.50
				256QAM	4.50
			Middle	QPSK	4.46
				16QAM	4.46
				64QAM	4.50
				256QAM	4.50
			Top	QPSK	4.47
				16QAM	4.46
				64QAM	4.50
				256QAM	4.50
		2	Bottom	QPSK	4.46
				16QAM	4.46
				64QAM	4.50
				256QAM	4.50
			Middle	QPSK	4.46
				16QAM	4.46
				64QAM	4.50
				256QAM	4.50
			Top	QPSK	4.47
				16QAM	4.45
				64QAM	4.50
				256QAM	4.50
		3	Bottom	QPSK	4.47
				16QAM	4.46
				64QAM	4.50
				256QAM	4.50
			Middle	QPSK	4.47
				16QAM	4.46
				64QAM	4.50
				256QAM	4.50
			Top	QPSK	4.47
				16QAM	4.46
				64QAM	4.50
				256QAM	4.50
		4	Bottom	QPSK	4.46
				16QAM	4.47
				64QAM	4.50
				256QAM	4.50
			Middle	QPSK	4.45
				16QAM	4.47
				64QAM	4.50
				256QAM	4.50
			Top	QPSK	4.47
				16QAM	4.47
				64QAM	4.50
				256QAM	4.50



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Test Data : Band 2, BW 10MHz, Single carrier, 4TX

Type	Carrier	Test Ant. port	Channel	Modulation	Occupied Bandwidth(MHz)
Band 2 BW 10MHz	Single	1	Bottom	QPSK	8.91
				16QAM	8.91
				64QAM	8.93
				256QAM	8.93
			Middle	QPSK	8.91
				16QAM	8.91
				64QAM	8.93
				256QAM	8.94
			Top	QPSK	8.92
				16QAM	8.92
				64QAM	8.93
				256QAM	8.93
		2	Bottom	QPSK	8.92
				16QAM	8.91
				64QAM	8.94
				256QAM	8.93
			Middle	QPSK	8.92
				16QAM	8.91
				64QAM	8.94
				256QAM	8.94
			Top	QPSK	8.92
				16QAM	8.91
				64QAM	8.93
				256QAM	8.93
		3	Bottom	QPSK	8.91
				16QAM	8.92
				64QAM	8.94
				256QAM	8.93
			Middle	QPSK	8.92
				16QAM	8.91
				64QAM	8.94
				256QAM	8.94
			Top	QPSK	8.92
				16QAM	8.92
				64QAM	8.94
				256QAM	8.94
4	Bottom	QPSK	8.91		
		16QAM	8.92		
		64QAM	8.93		
		256QAM	8.93		
	Middle	QPSK	8.92		
		16QAM	8.91		
		64QAM	8.94		
		256QAM	8.94		
	Top	QPSK	8.91		
		16QAM	8.92		
		64QAM	8.94		
		256QAM	8.94		



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Test Data : Band 2, BW 15MHz, Single carrier, 4TX

Type	Carrier	Test Ant. port	Channel	Modulation	Occupied Bandwidth(MHz)
Band 2 BW 15MHz	Single	1	Bottom	QPSK	13.38
				16QAM	13.38
				64QAM	13.38
				256QAM	13.39
			Middle	QPSK	13.38
				16QAM	13.37
				64QAM	13.39
				256QAM	13.39
			Top	QPSK	13.38
				16QAM	13.39
				64QAM	13.39
				256QAM	13.39
		2	Bottom	QPSK	13.37
				16QAM	13.39
				64QAM	13.39
				256QAM	13.38
			Middle	QPSK	13.40
				16QAM	13.39
				64QAM	13.39
				256QAM	13.39
			Top	QPSK	13.38
				16QAM	13.39
				64QAM	13.39
				256QAM	13.39
		3	Bottom	QPSK	13.39
				16QAM	13.38
				64QAM	13.38
				256QAM	13.38
			Middle	QPSK	13.40
				16QAM	13.39
				64QAM	13.39
				256QAM	13.39
			Top	QPSK	13.38
				16QAM	13.38
				64QAM	13.39
				256QAM	13.39
		4	Bottom	QPSK	13.39
				16QAM	13.38
				64QAM	13.39
				256QAM	13.38
			Middle	QPSK	13.38
				16QAM	13.38
				64QAM	13.39
				256QAM	13.39
			Top	QPSK	13.39
				16QAM	13.39
				64QAM	13.39
				256QAM	13.39



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Test Data : Band 2, BW 20MHz, Single carrier, 4TX

Type	Carrier	Test Ant. port	Channel	Modulation	Occupied Bandwidth(MHz)
Band 2 BW 20MHz	Single	1	Bottom	QPSK	17.78
				16QAM	17.79
				64QAM	17.84
				256QAM	17.83
			Middle	QPSK	17.81
				16QAM	17.81
				64QAM	17.84
				256QAM	17.84
			Top	QPSK	17.79
				16QAM	17.76
				64QAM	17.83
				256QAM	17.83
		2	Bottom	QPSK	17.81
				16QAM	17.78
				64QAM	17.83
				256QAM	17.84
			Middle	QPSK	17.80
				16QAM	17.79
				64QAM	17.84
				256QAM	17.84
			Top	QPSK	17.80
				16QAM	17.80
				64QAM	17.83
				256QAM	17.83
		3	Bottom	QPSK	17.80
				16QAM	17.78
				64QAM	17.84
				256QAM	17.84
			Middle	QPSK	17.82
				16QAM	17.81
				64QAM	17.84
				256QAM	17.84
			Top	QPSK	17.79
				16QAM	17.81
				64QAM	17.84
				256QAM	17.84
		4	Bottom	QPSK	17.78
				16QAM	17.79
				64QAM	17.83
				256QAM	17.83
			Middle	QPSK	17.82
				16QAM	17.79
				64QAM	17.84
				256QAM	17.84
			Top	QPSK	17.78
				16QAM	17.79
				64QAM	17.84
				256QAM	17.84



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Test Data : Band 2, BW 5MHz + BW 5MHz, Multi carrier, 4TX

Type	Carrier	Test Ant. port	Channel	Modulation	Occupied Bandwidth(MHz)
Band 2 BW 5MHz + BW 5MHz	Contiguous	1	Bottom	QPSK	9.38
				16QAM	9.38
				64QAM	9.43
				256QAM	9.43
			Top	QPSK	9.37
				16QAM	9.37
				64QAM	9.43
				256QAM	9.43
		2	Bottom	QPSK	9.39
				16QAM	9.37
				64QAM	9.43
				256QAM	9.43
			Top	QPSK	9.39
				16QAM	9.39
				64QAM	9.43
				256QAM	9.43
		3	Bottom	QPSK	9.39
				16QAM	9.39
				64QAM	9.43
				256QAM	9.43
Top	QPSK		9.38		
	16QAM		9.38		
	64QAM		9.43		
	256QAM		9.43		
4	Bottom	QPSK	9.38		
		16QAM	9.37		
		64QAM	9.43		
		256QAM	9.43		
	Top	QPSK	9.40		
		16QAM	9.37		
		64QAM	9.43		
		256QAM	9.43		



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Test Data : Band 2, BW 5MHz + BW 10MHz, Multi carrier, 4TX

Type	Carrier	Test Ant. port	Channel	Modulation	Occupied Bandwidth(MHz)
Band 2 BW 5MHz + BW 10MHz	Contiguous	1	Bottom	QPSK	14.10
				16QAM	14.10
				64QAM	14.13
				256QAM	14.13
			Top	QPSK	14.10
				16QAM	14.08
				64QAM	14.13
				256QAM	14.13
		2	Bottom	QPSK	14.10
				16QAM	14.09
				64QAM	14.13
				256QAM	14.13
			Top	QPSK	14.10
				16QAM	14.10
				64QAM	14.13
				256QAM	14.13
		3	Bottom	QPSK	14.09
				16QAM	14.10
				64QAM	14.13
				256QAM	14.13
Top	QPSK		14.10		
	16QAM		14.10		
	64QAM		14.14		
	256QAM		14.13		
4	Bottom	QPSK	14.09		
		16QAM	14.10		
		64QAM	14.13		
		256QAM	14.13		
	Top	QPSK	14.11		
		16QAM	14.10		
		64QAM	14.13		
		256QAM	14.14		



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Test Data : Band 2, BW 5MHz + BW 15MHz, Multi carrier, 4TX

Type	Carrier	Test Ant. port	Channel	Modulation	Occupied Bandwidth(MHz)
Band 2 BW 5MHz + BW 15MHz	Contiguous	1	Bottom	QPSK	18.80
				16QAM	18.80
				64QAM	18.84
				256QAM	18.84
			Top	QPSK	18.78
				16QAM	18.79
				64QAM	18.84
				256QAM	18.83
		2	Bottom	QPSK	18.82
				16QAM	18.80
				64QAM	18.84
				256QAM	18.84
			Top	QPSK	18.80
				16QAM	18.80
				64QAM	18.83
				256QAM	18.83
		3	Bottom	QPSK	18.81
				16QAM	18.82
				64QAM	18.84
				256QAM	18.84
Top	QPSK		18.81		
	16QAM		18.80		
	64QAM		18.84		
	256QAM		18.84		
4	Bottom	QPSK	18.81		
		16QAM	18.82		
		64QAM	18.84		
		256QAM	18.83		
	Top	QPSK	18.79		
		16QAM	18.79		
		64QAM	18.84		
		256QAM	18.85		



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Test Data : Band 2, BW 10MHz + BW 10MHz, Multi carrier, 4TX

Type	Carrier	Test Ant. port	Channel	Modulation	Occupied Bandwidth(MHz)
Band 2 BW 10MHz + BW 10MHz	Contiguous	1	Bottom	QPSK	18.80
				16QAM	18.79
				64QAM	18.83
				256QAM	18.83
			Top	QPSK	18.81
				16QAM	18.81
				64QAM	18.83
				256QAM	18.83
		2	Bottom	QPSK	18.79
				16QAM	18.78
				64QAM	18.83
				256QAM	18.83
			Top	QPSK	18.81
				16QAM	18.80
				64QAM	18.83
				256QAM	18.83
		3	Bottom	QPSK	18.81
				16QAM	18.81
				64QAM	18.84
				256QAM	18.83
Top	QPSK		18.80		
	16QAM		18.81		
	64QAM		18.83		
	256QAM		18.83		
4	Bottom	QPSK	18.77		
		16QAM	18.81		
		64QAM	18.83		
		256QAM	18.83		
	Top	QPSK	18.80		
		16QAM	18.80		
		64QAM	18.84		
		256QAM	18.84		



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Test Data : Band 2, BW 5MHz + BW 5MHz, Multi carrier, 4TX

Type	Carrier	Test Ant. port	Channel	Modulation	Occupied Bandwidth(MHz)
Band 2 BW 5MHz + BW 5MHz	Non- Contiguous	1	Bottom	QPSK	4.48
				16QAM	4.46
				64QAM	4.50
				256QAM	4.50
			Top	QPSK	4.47
				16QAM	4.47
				64QAM	4.50
				256QAM	4.50
		2	Bottom	QPSK	4.46
				16QAM	4.46
				64QAM	4.50
				256QAM	4.50
			Top	QPSK	4.47
				16QAM	4.46
				64QAM	4.50
				256QAM	4.50
		3	Bottom	QPSK	4.47
				16QAM	4.46
				64QAM	4.50
				256QAM	4.50
Top	QPSK		4.45		
	16QAM		4.46		
	64QAM		4.49		
	256QAM		4.49		
4	Bottom	QPSK	4.46		
		16QAM	4.47		
		64QAM	4.50		
		256QAM	4.50		
	Top	QPSK	4.46		
		16QAM	4.47		
		64QAM	4.47		
		256QAM	4.50		



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Test Data : Band 2, BW 10MHz + BW 5MHz, Multi carrier, 4TX

Type	Carrier	Test Ant. port	Channel	Modulation	Occupied Bandwidth(MHz)
Band 2 BW 10MHz + BW 5MHz	Non- Contiguous	1	Bottom	QPSK	8.91
				16QAM	8.92
				64QAM	8.93
				256QAM	8.93
			Top	QPSK	4.47
				16QAM	4.46
				64QAM	4.50
				256QAM	4.50
		2	Bottom	QPSK	8.91
				16QAM	8.91
				64QAM	8.93
				256QAM	8.93
			Top	QPSK	4.46
				16QAM	4.47
				64QAM	4.50
				256QAM	4.50
		3	Bottom	QPSK	8.91
				16QAM	8.92
				64QAM	8.93
				256QAM	8.93
Top	QPSK		4.46		
	16QAM		4.47		
	64QAM		4.50		
	256QAM		4.50		
4	Bottom	QPSK	8.92		
		16QAM	8.91		
		64QAM	8.93		
		256QAM	8.93		
	Top	QPSK	4.47		
		16QAM	4.47		
		64QAM	4.50		
		256QAM	4.50		



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Test Data : Band 2, BW 10MHz + BW 10MHz, Multi carrier, 4TX

Type	Carrier	Test Ant. port	Channel	Modulation	Occupied Bandwidth(MHz)
Band 2 BW 10MHz + BW 10MHz	Non- Contiguous	1	Bottom	QPSK	8.91
				16QAM	8.92
				64QAM	8.94
				256QAM	8.94
			Top	QPSK	8.92
				16QAM	8.91
				64QAM	8.93
				256QAM	8.93
		2	Bottom	QPSK	8.92
				16QAM	8.92
				64QAM	8.94
				256QAM	8.94
			Top	QPSK	8.92
				16QAM	8.91
				64QAM	8.93
				256QAM	8.93
		3	Bottom	QPSK	8.92
				16QAM	8.92
				64QAM	8.94
				256QAM	8.93
Top	QPSK		8.92		
	16QAM		8.91		
	64QAM		8.93		
	256QAM		8.93		
4	Bottom	QPSK	8.91		
		16QAM	8.92		
		64QAM	8.94		
		256QAM	8.93		
	Top	QPSK	8.92		
		16QAM	8.91		
		64QAM	8.93		
		256QAM	8.93		



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Test Data : Band 2, BW 15MHz + BW 5MHz, Multi carrier, 4TX

Type	Carrier	Test Ant. port	Channel	Modulation	Occupied Bandwidth(MHz)
Band 2 BW 15MHz + BW 5MHz	Non- Contiguous	1	Bottom	QPSK	13.37
				16QAM	13.39
				64QAM	13.38
				256QAM	13.38
			Top	QPSK	4.46
				16QAM	4.46
				64QAM	4.50
				256QAM	4.50
		2	Bottom	QPSK	13.37
				16QAM	13.37
				64QAM	13.38
				256QAM	13.38
			Top	QPSK	4.46
				16QAM	4.46
				64QAM	4.50
				256QAM	4.50
		3	Bottom	QPSK	13.38
				16QAM	13.38
				64QAM	13.38
				256QAM	13.38
Top	QPSK		4.46		
	16QAM		4.47		
	64QAM		4.50		
	256QAM		4.50		
4	Bottom	QPSK	13.39		
		16QAM	13.39		
		64QAM	13.38		
		256QAM	13.38		
	Top	QPSK	4.47		
		16QAM	4.47		
		64QAM	4.50		
		256QAM	4.50		



**Test Plot at Occupied Bandwidth
 ANT 1
 Band 2, BW 5MHz, Single carrier, 4TX, Bottom**

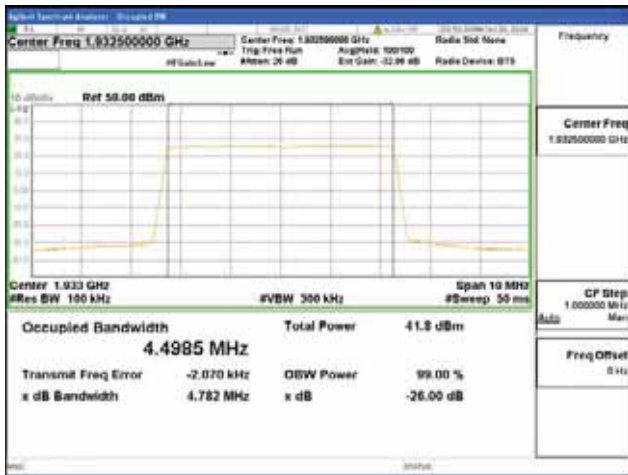
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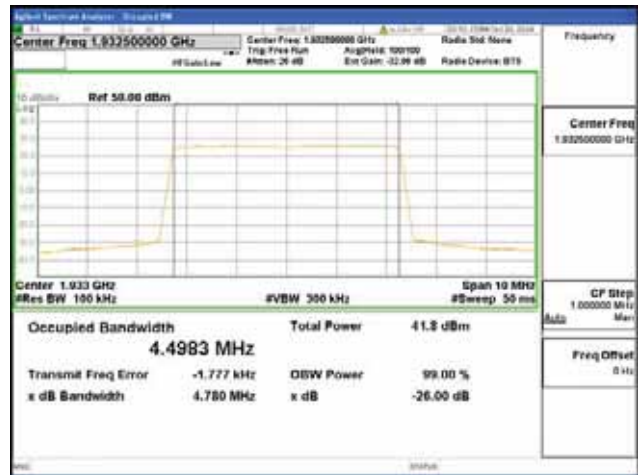
16QAM



64QAM



256QAM





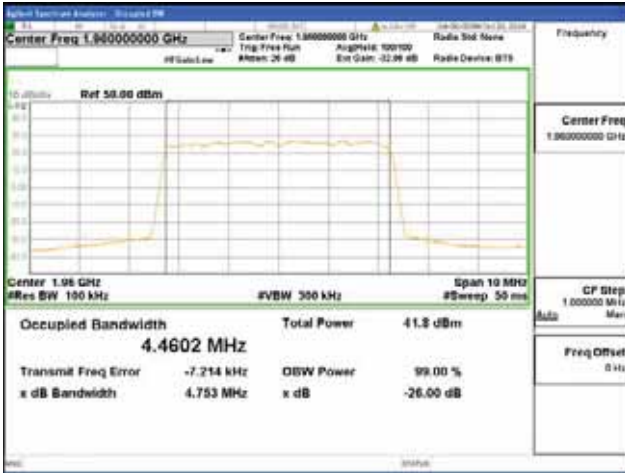
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Band 2, BW 5MHz, Single carrier, 4TX, Middle

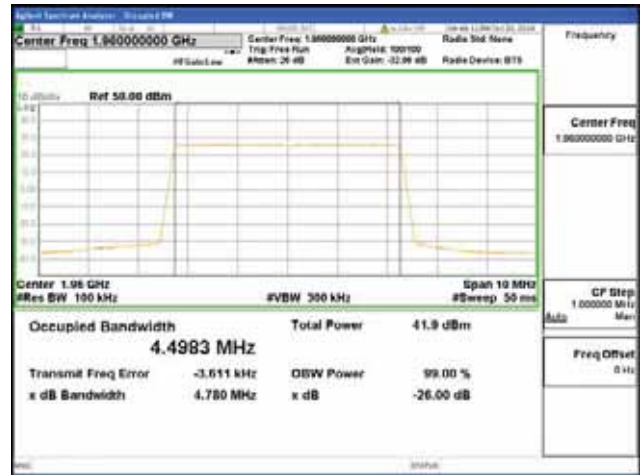
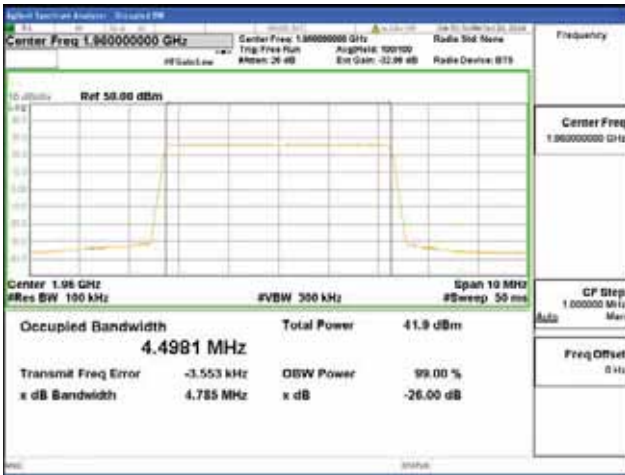
QPSK

16QAM



64QAM

256QAM



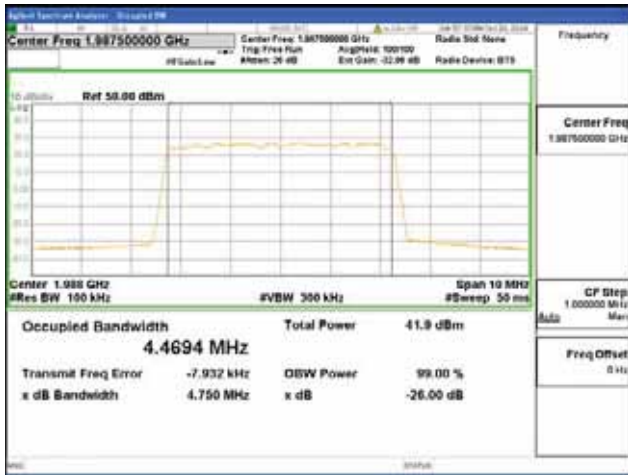


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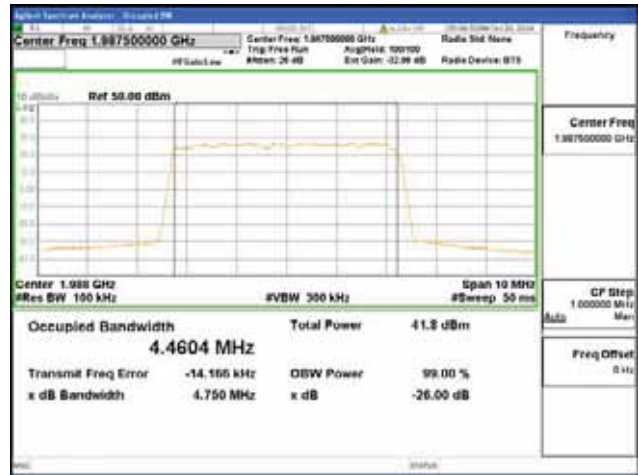
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Band 2, BW 5MHz, Single carrier, 4TX, Top

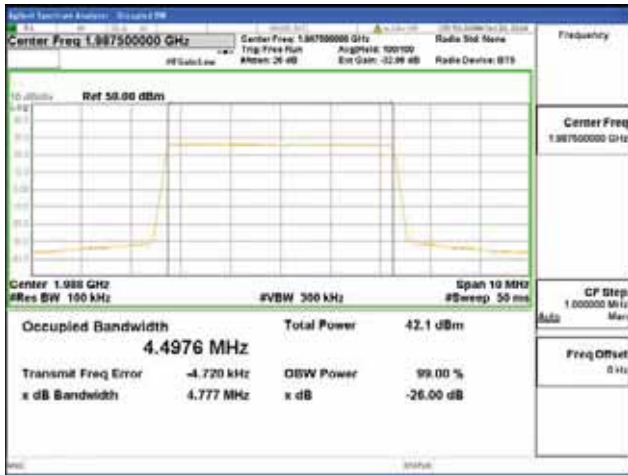
QPSK



16QAM



64QAM



256QAM

