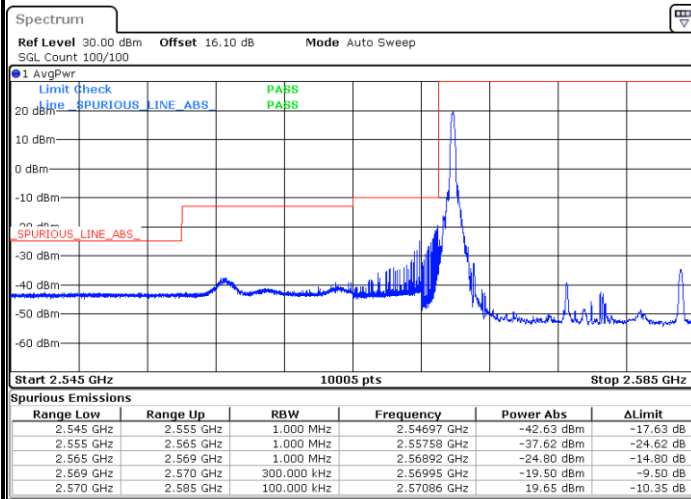


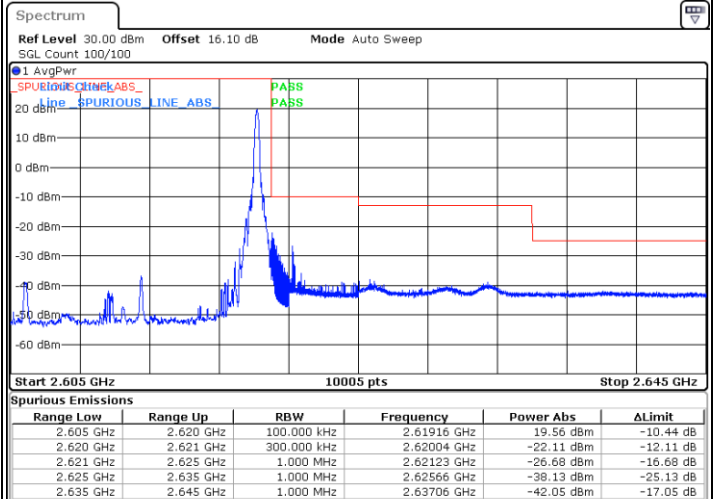


## LTE Band 38 / 15MHz / 16QAM

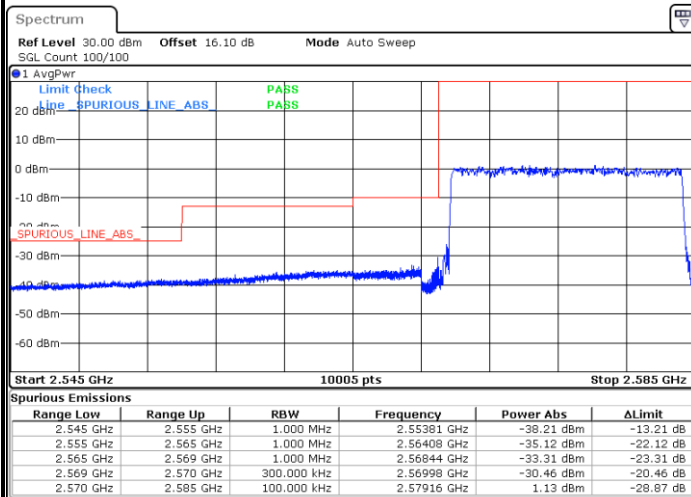
## Lowest Band Edge / 1 RB



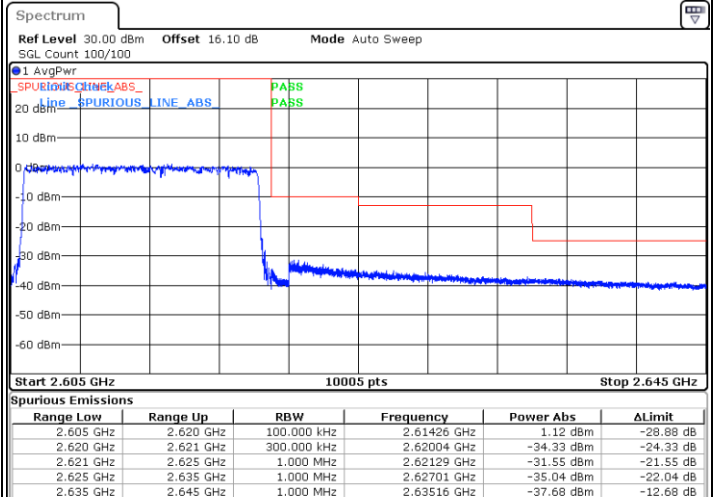
## Highest Band Edge / 1 RB



## Lowest Band Edge / Full RB



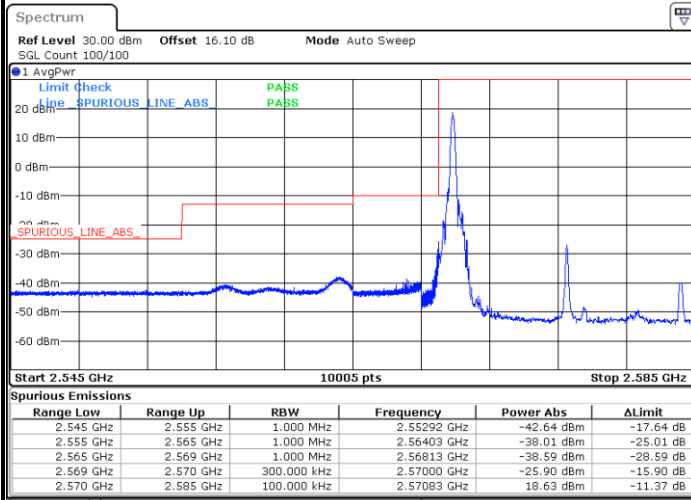
## Highest Band Edge / Full RB



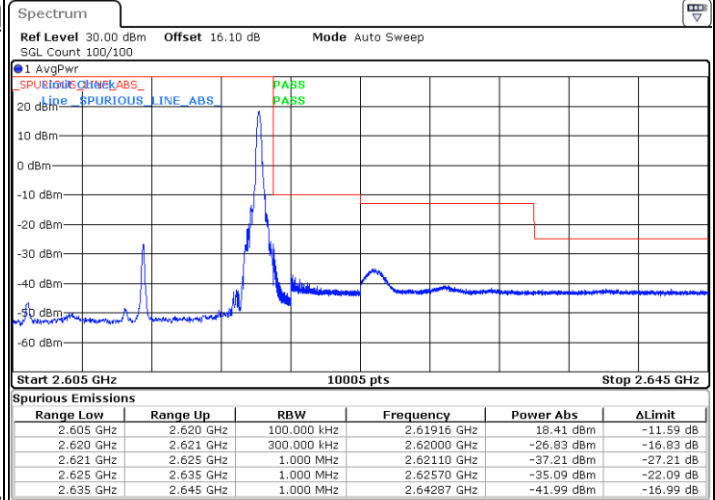


## LTE Band 38 / 15MHz / 64QAM

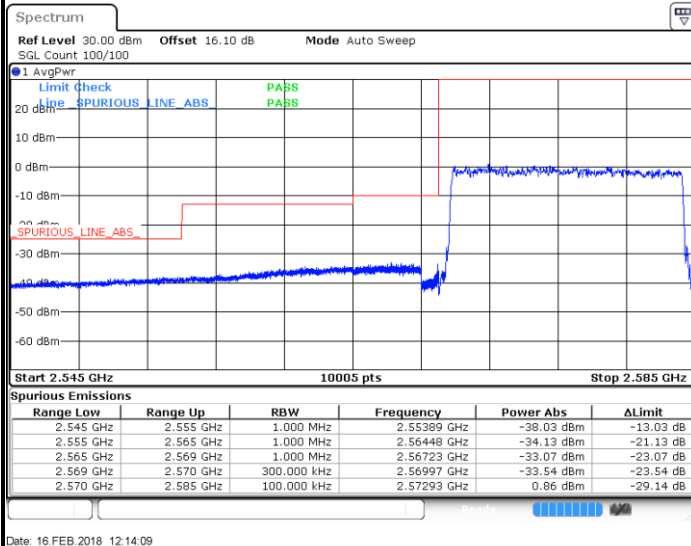
## Lowest Band Edge / 1 RB



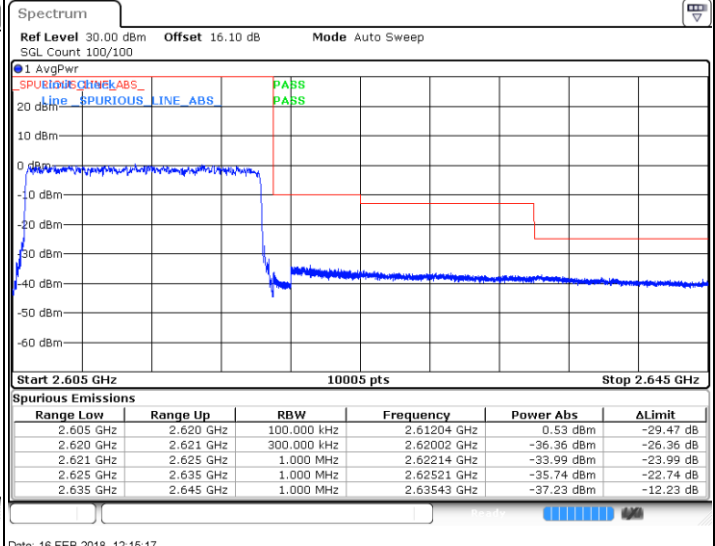
## Highest Band Edge / 1 RB



## Lowest Band Edge / Full RB



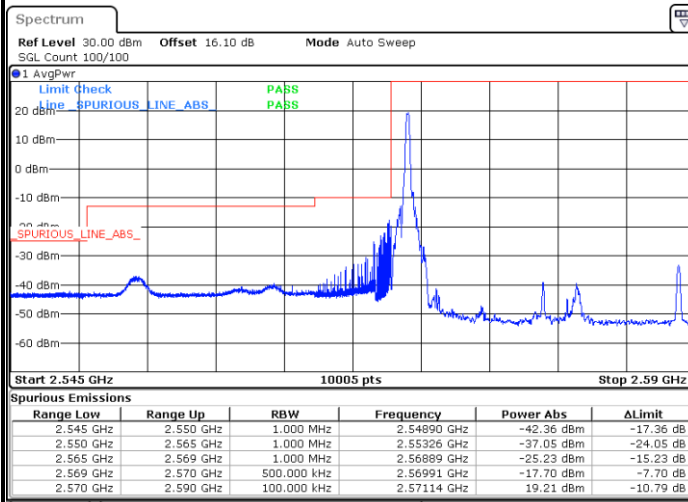
## Highest Band Edge / Full RB



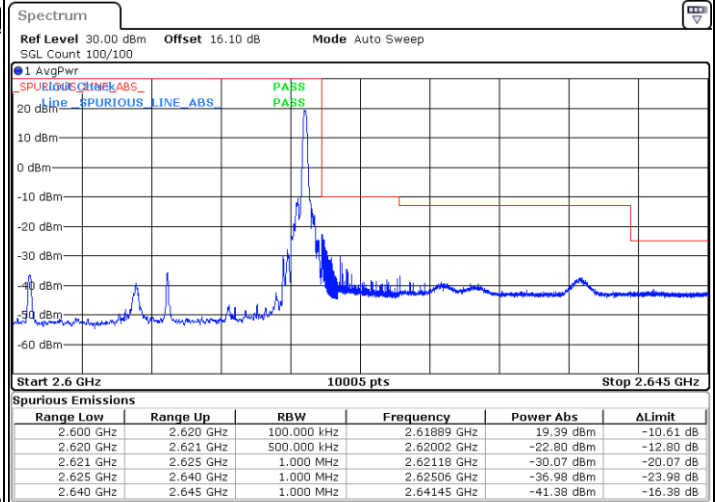


## LTE Band 38 / 20MHz / QPSK

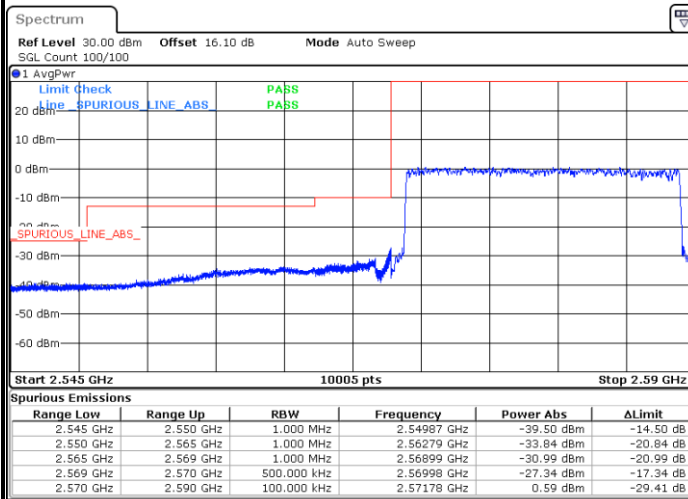
## Lowest Band Edge / 1 RB



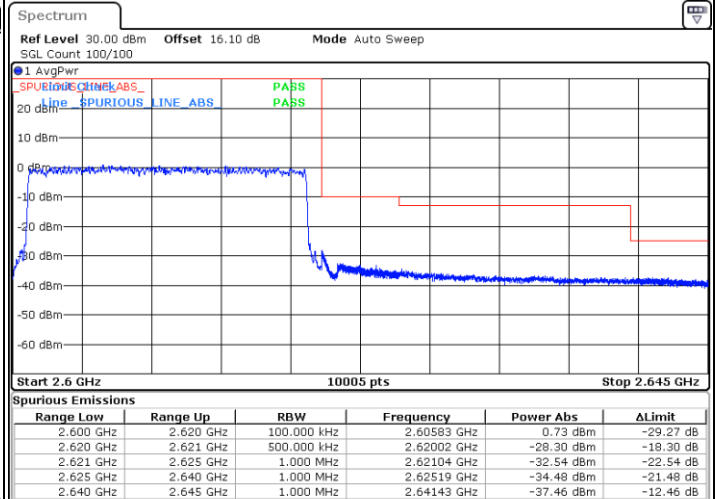
## Highest Band Edge / 1 RB



## Lowest Band Edge / Full RB



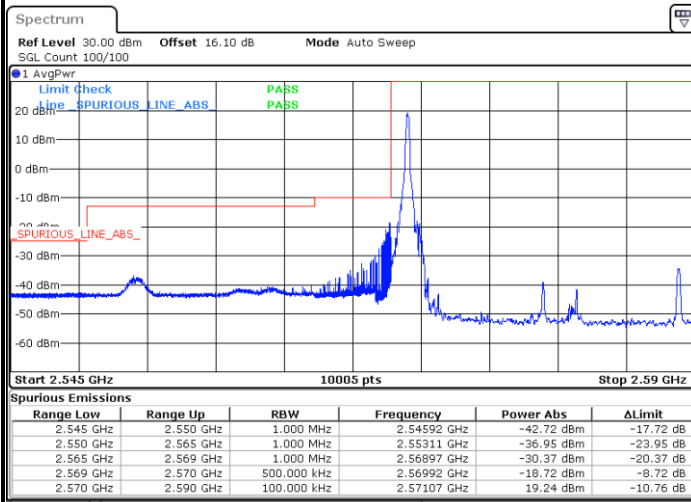
## Highest Band Edge / Full RB



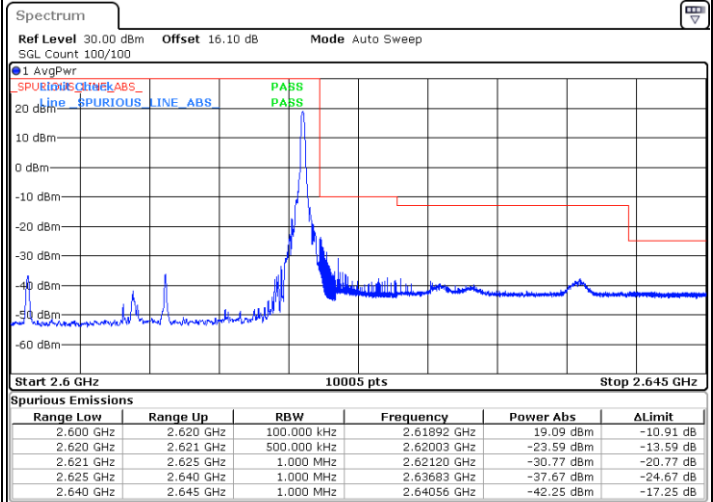


## LTE Band 38 / 20MHz / 16QAM

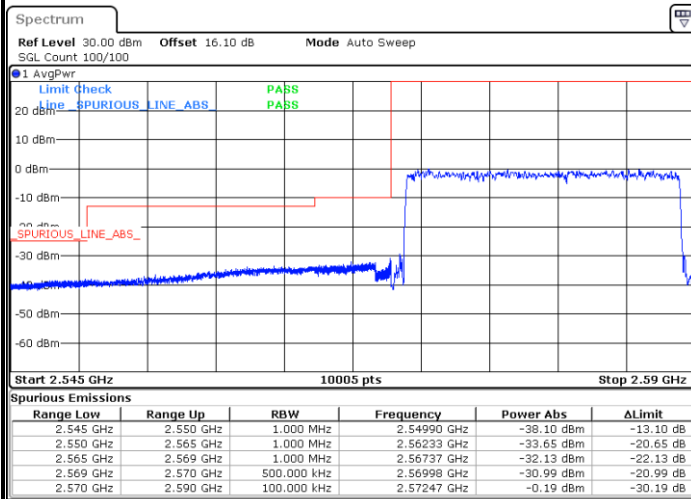
## Lowest Band Edge / 1 RB



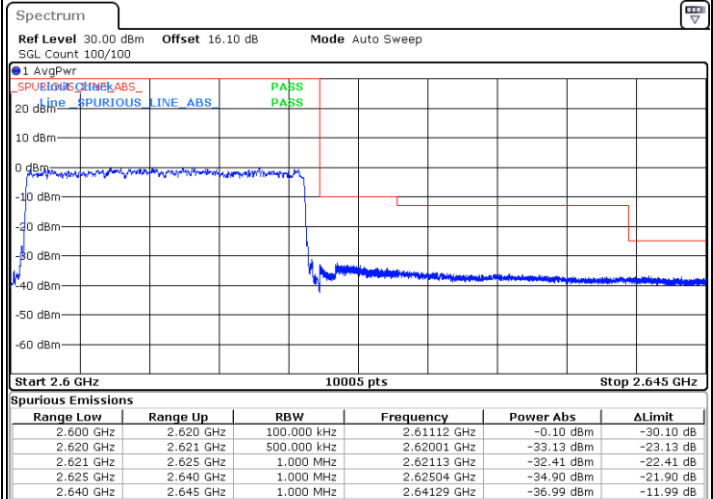
## Highest Band Edge / 1 RB



## Lowest Band Edge / Full RB



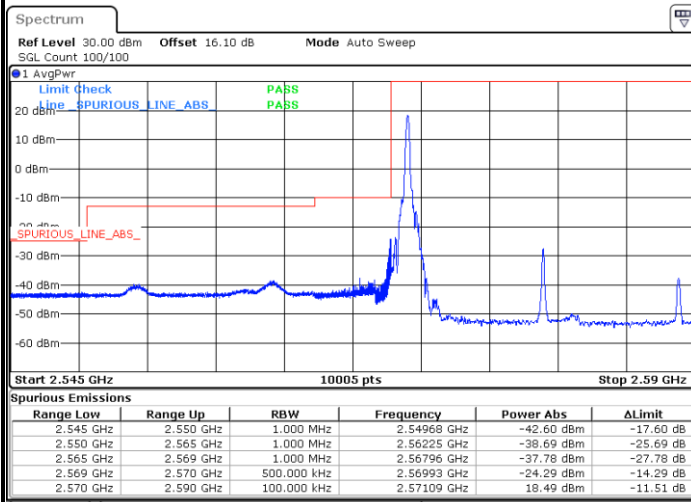
## Highest Band Edge / Full RB



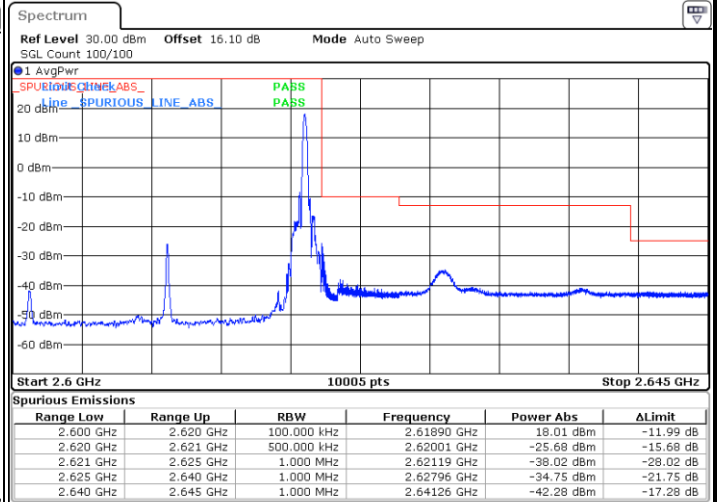


## LTE Band 38 / 20MHz / 64QAM

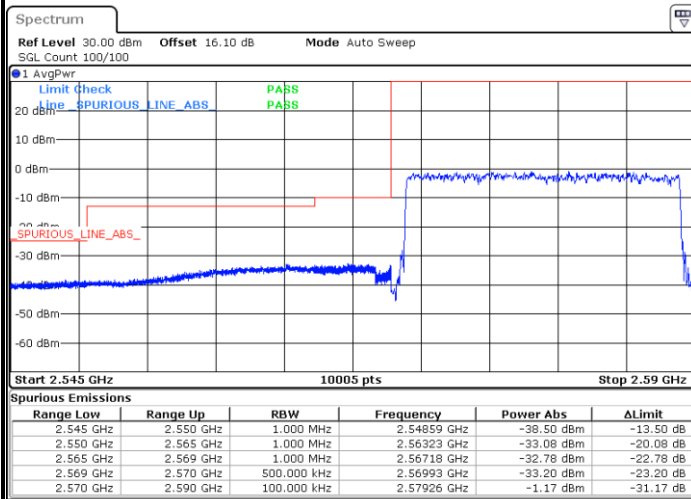
## Lowest Band Edge / 1 RB



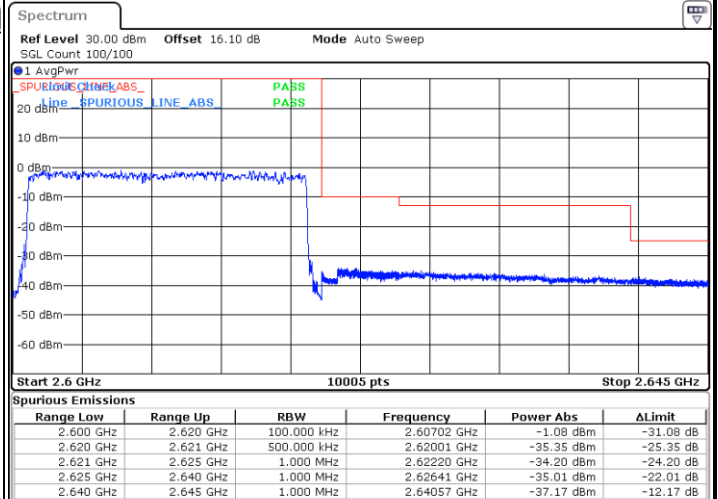
## Highest Band Edge / 1 RB



## Lowest Band Edge / Full RB



## Highest Band Edge / Full RB

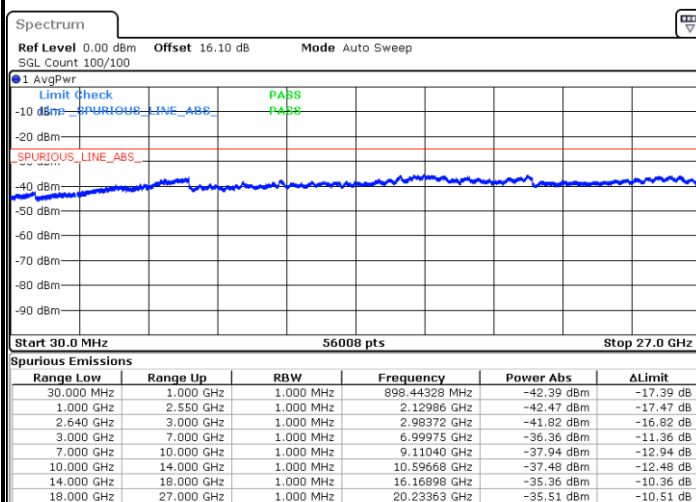




## Conducted Spurious Emission

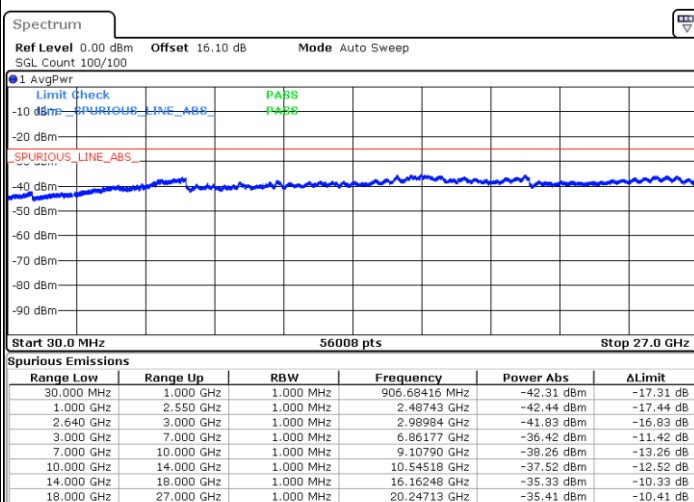
### LTE Band 38 / 5MHz

#### Lowest Channel / QPSK



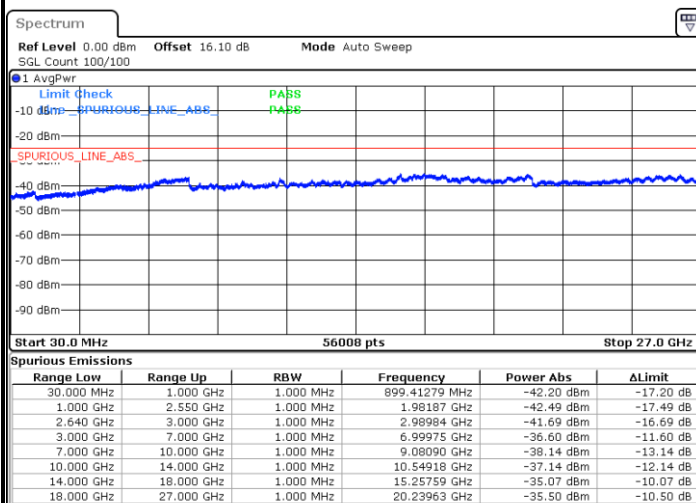
Date: 16.FEB.2018 11:20:06

#### Lowest Channel / 16QAM



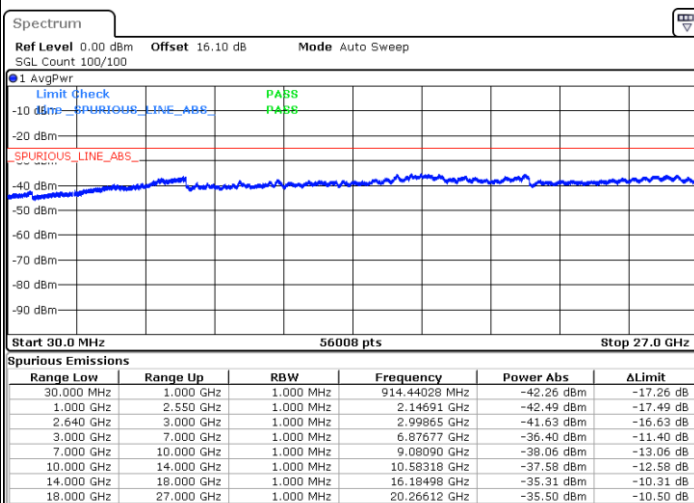
Date: 16.FEB.2018 11:21:00

#### Middle Channel / QPSK



Date: 16.FEB.2018 11:21:53

#### Middle Channel / 16QAM

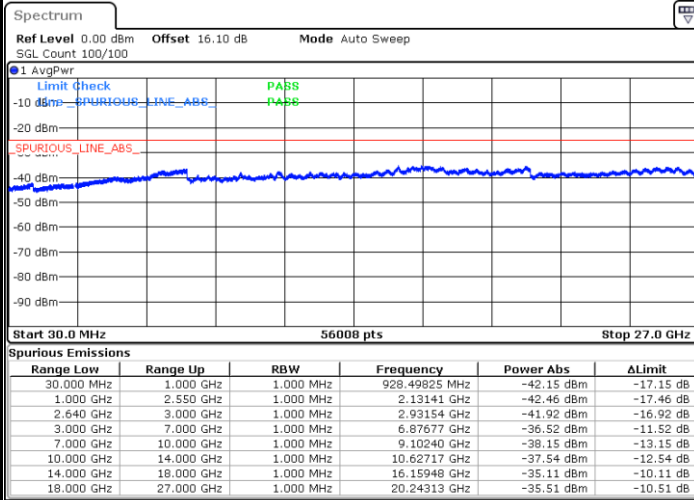


Date: 16.FEB.2018 11:22:47



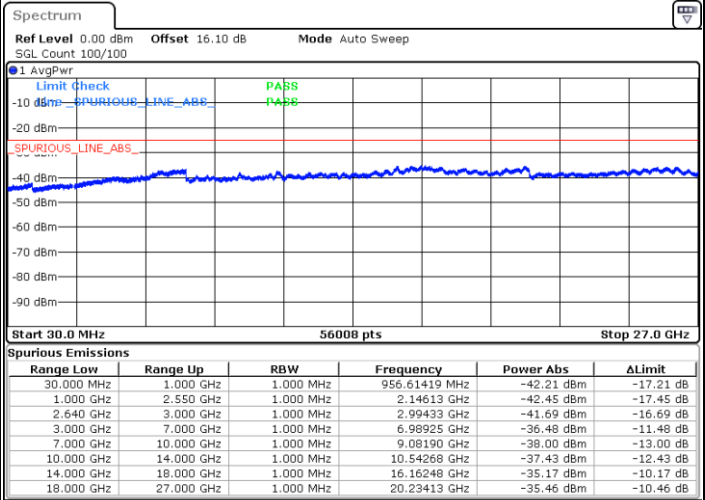
## LTE Band 38 / 5MHz

## Highest Channel / QPSK



Date: 16 FEB 2018 11:23:41

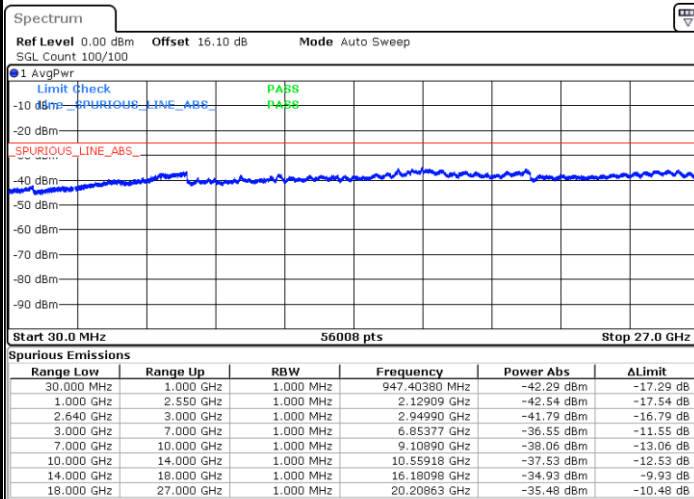
## Highest Channel / 16QAM



Date: 16 FEB 2018 11:24:35

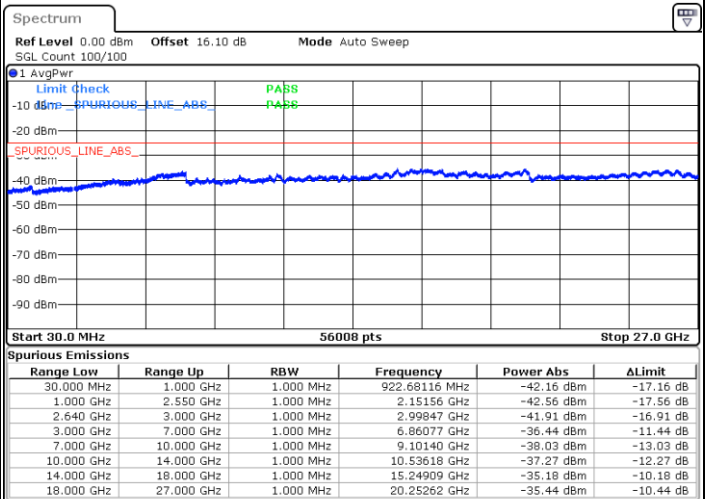
## LTE Band 38 / 10MHz

## Lowest Channel / QPSK



Date: 16 FEB 2018 11:25:29

## Lowest Channel / 16QAM

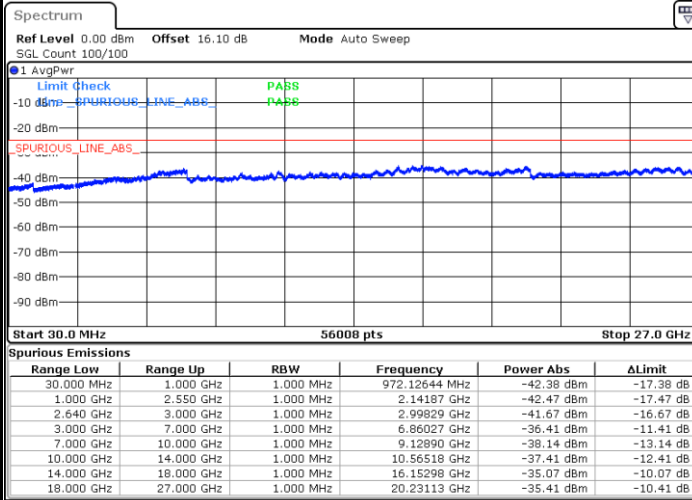


Date: 16 FEB 2018 11:26:22



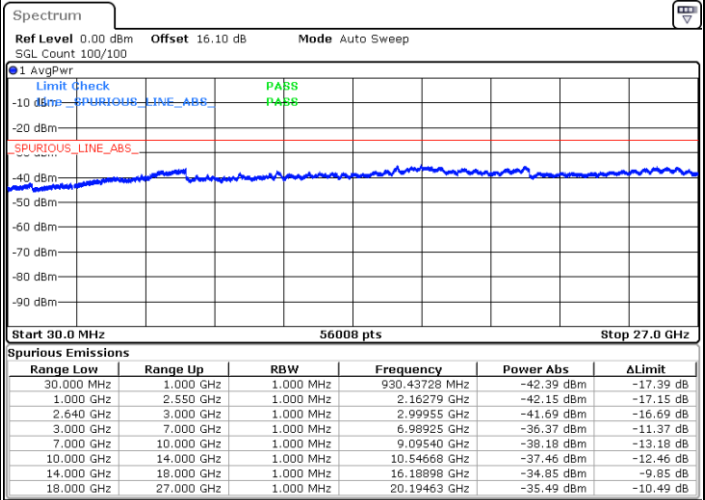
## LTE Band 38 / 10MHz

## Middle Channel / QPSK



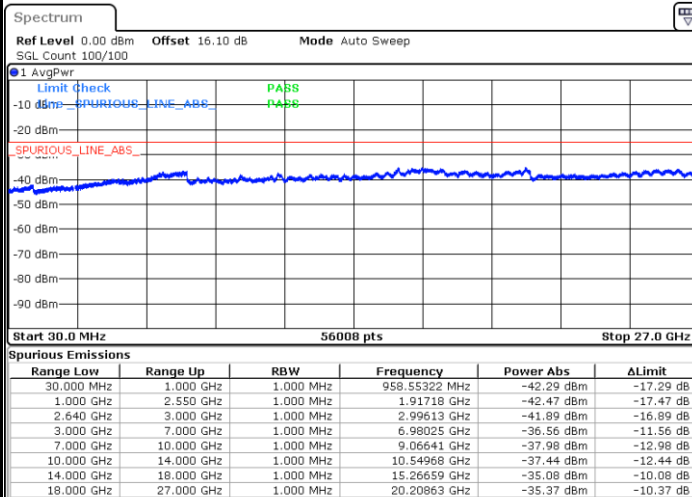
Date: 16.FEB.2018 11:27:16

## Middle Channel / 16QAM



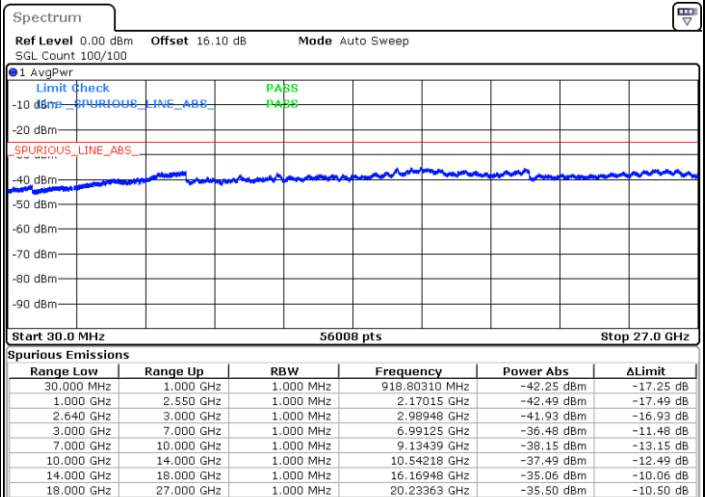
Date: 16.FEB.2018 11:28:10

## Highest Channel / QPSK



Date: 16.FEB.2018 11:29:04

## Highest Channel / 16QAM

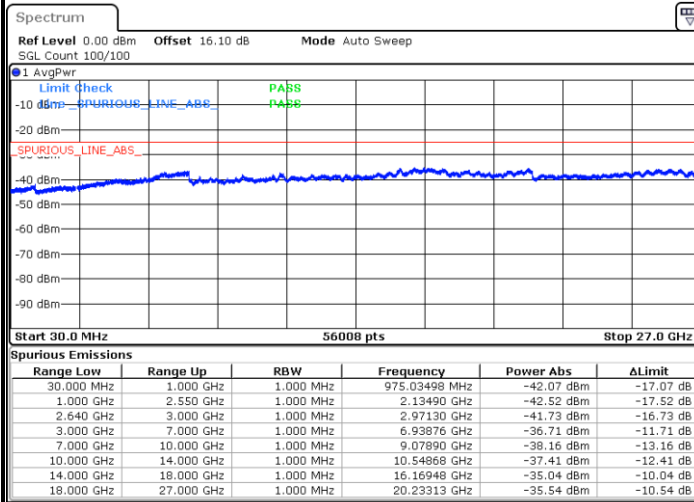


Date: 16.FEB.2018 11:29:57



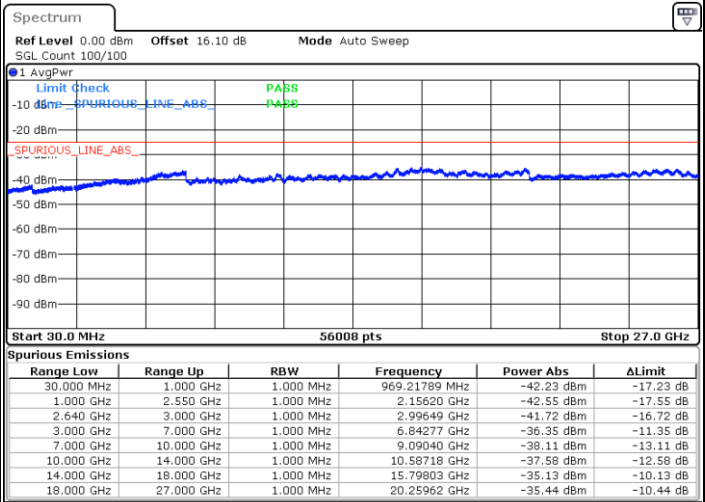
## LTE Band 38 / 15MHz

## Lowest Channel / QPSK



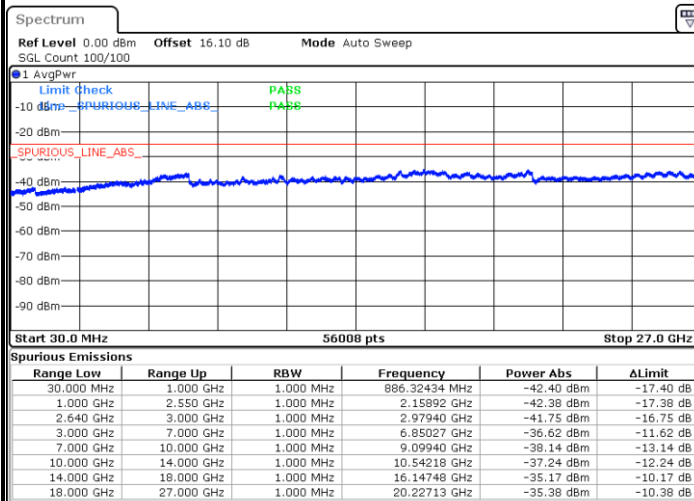
Date: 16 FEB 2018 11:30:51

## Lowest Channel / 16QAM



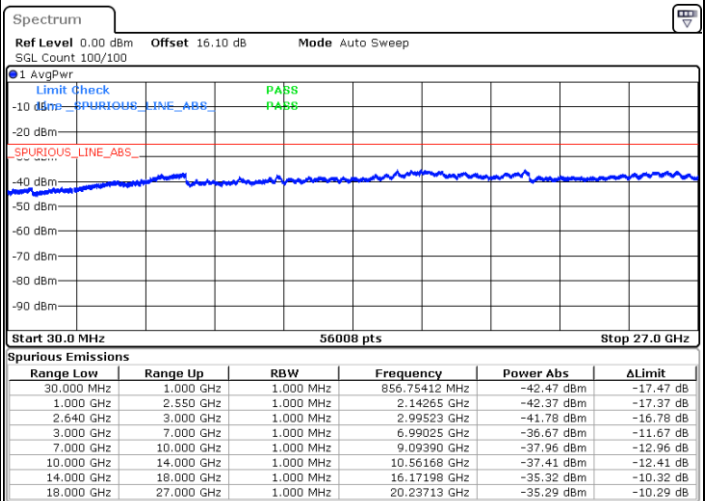
Date: 16 FEB 2018 11:31:45

## Middle Channel / QPSK



Date: 16 FEB 2018 11:32:39

## Middle Channel / 16QAM

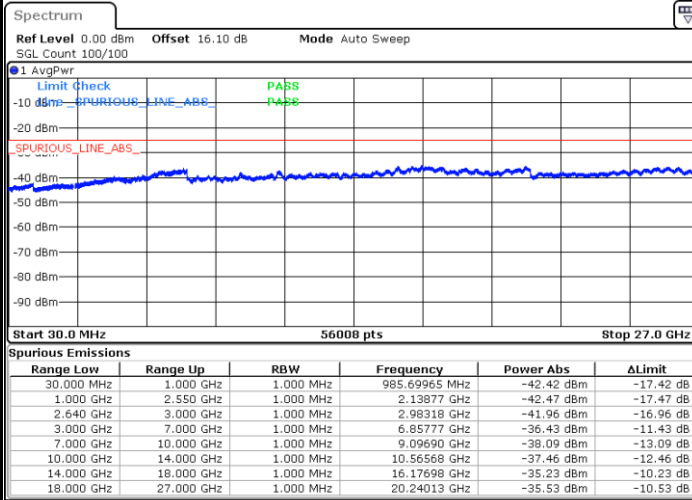


Date: 16 FEB 2018 11:33:32



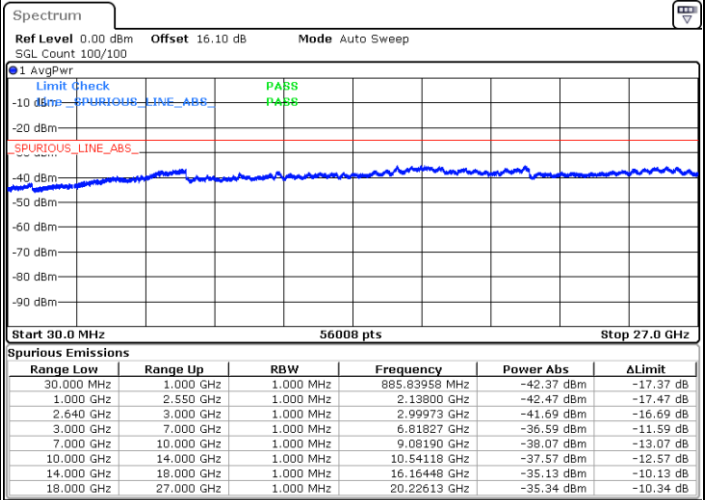
## LTE Band 38 / 15MHz

## Highest Channel / QPSK



Date: 16 FEB 2018 11:34:26

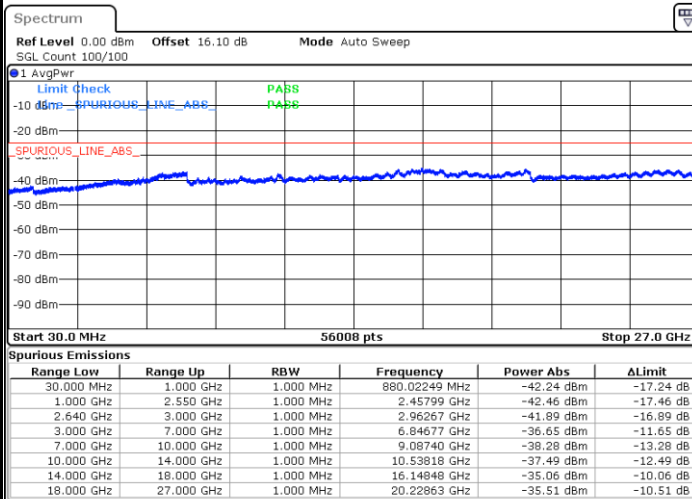
## Highest Channel / 16QAM



Date: 16 FEB 2018 11:35:20

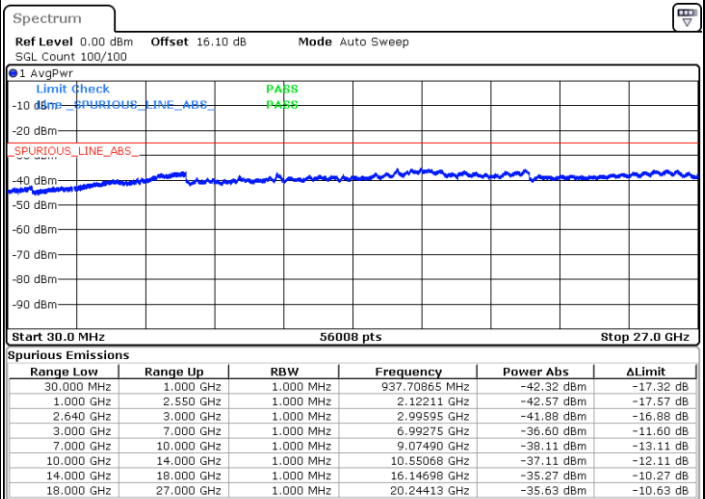
## LTE Band 38 / 20MHz

## Lowest Channel / QPSK



Date: 16 FEB 2018 11:36:14

## Lowest Channel / 16QAM

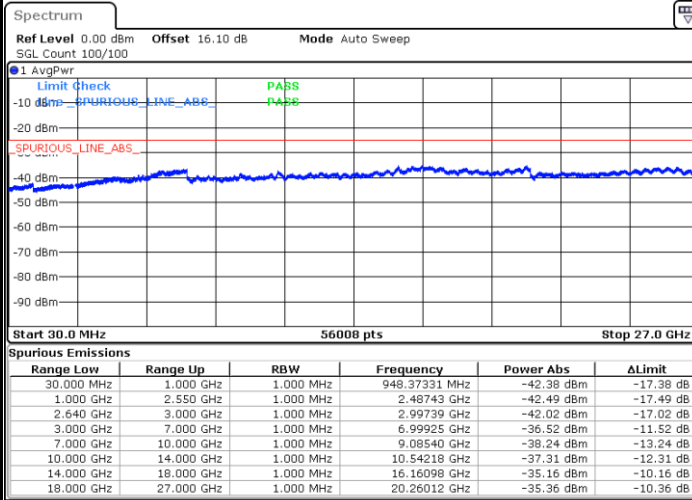


Date: 16 FEB 2018 11:37:08



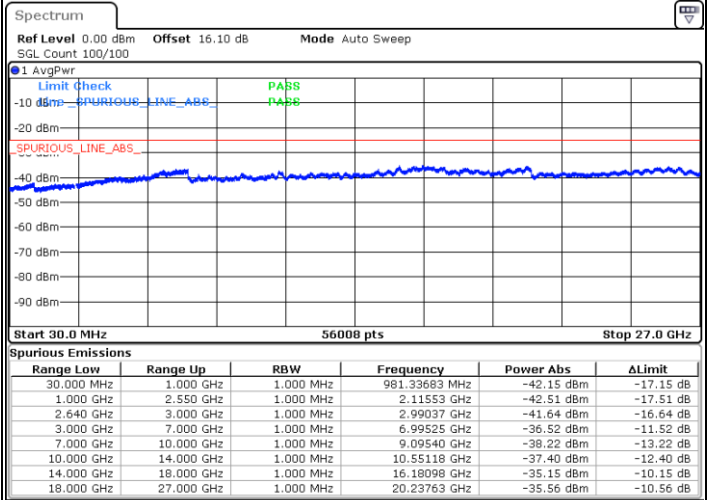
## LTE Band 38 / 20MHz

## Middle Channel / QPSK



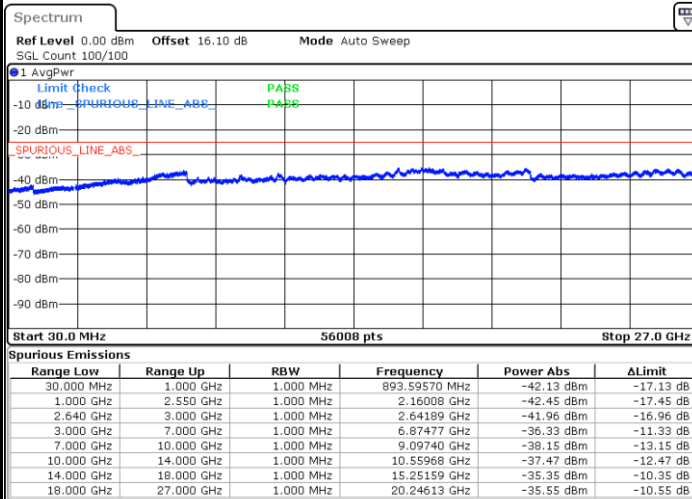
Date: 16 FEB 2018 11:38:01

## Middle Channel / 16QAM



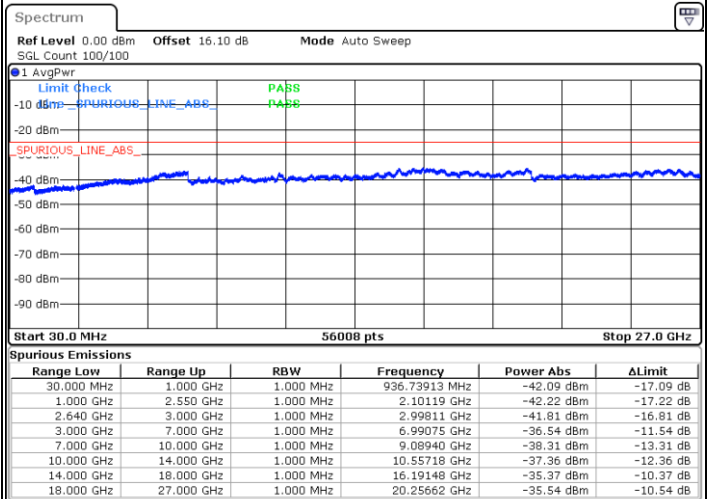
Date: 16 FEB 2018 11:38:55

## Highest Channel / QPSK



Date: 16 FEB 2018 11:39:49

## Highest Channel / 16QAM

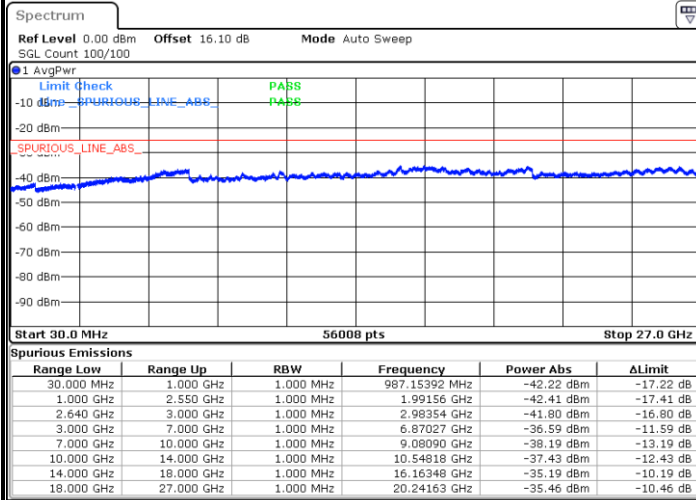


Date: 16 FEB 2018 11:40:43



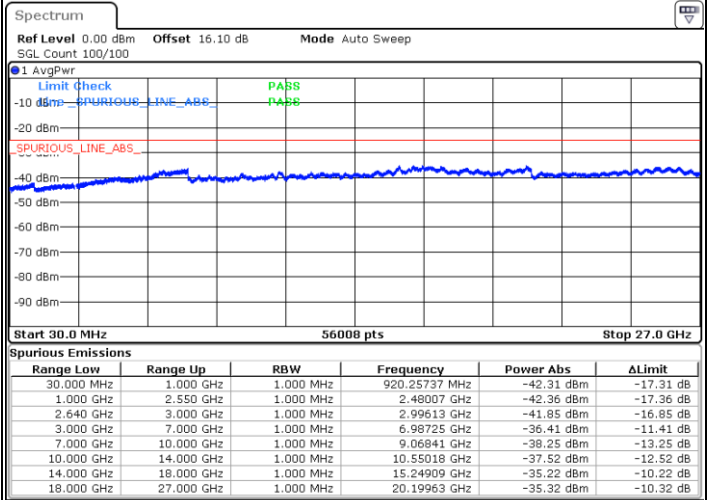
## LTE Band 38 / 5MHz

## Lowest Channel / 64QAM



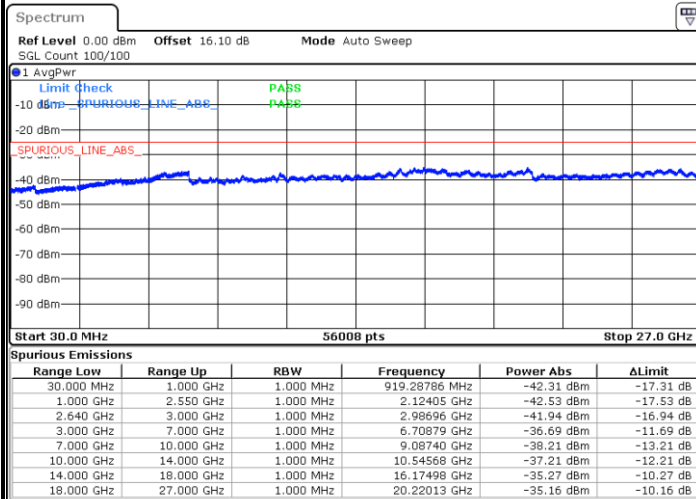
Date: 16.FEB.2018 12:21:48

## Middle Channel / 64QAM



Date: 16.FEB.2018 12:22:42

## Highest Channel / 64QAM

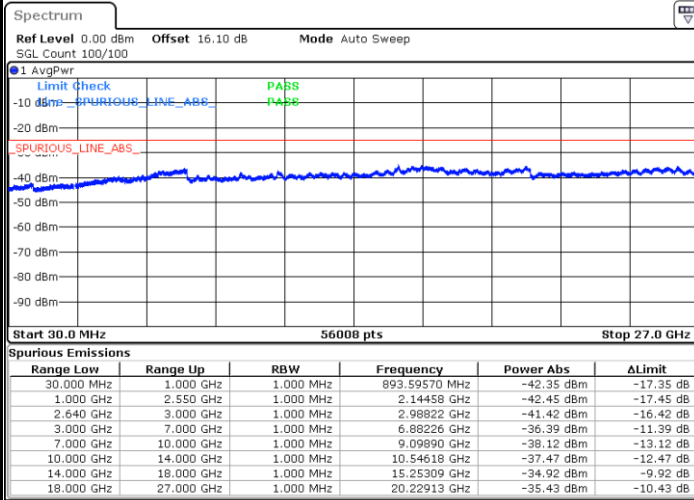


Date: 16.FEB.2018 12:23:36



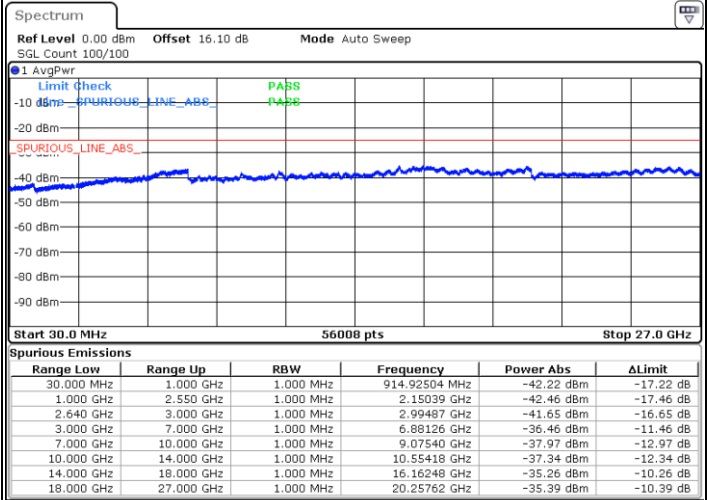
## LTE Band 38 / 10MHz

## Lowest Channel / 64QAM



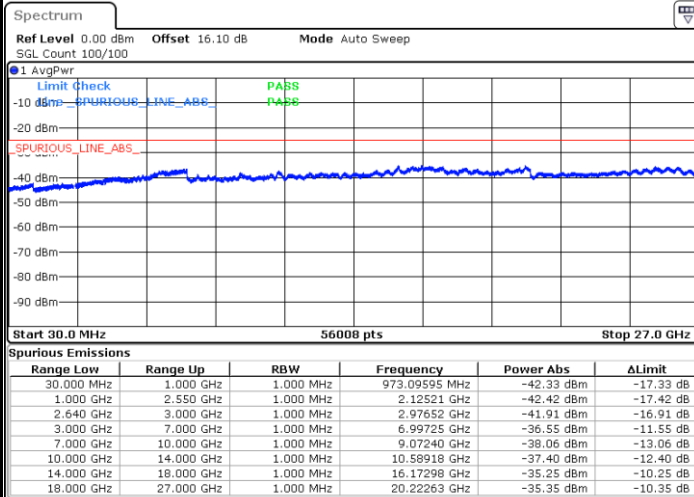
Date: 16.FEB.2018 12:24:29

## Middle Channel / 64QAM



Date: 16.FEB.2018 12:25:23

## Highest Channel / 64QAM

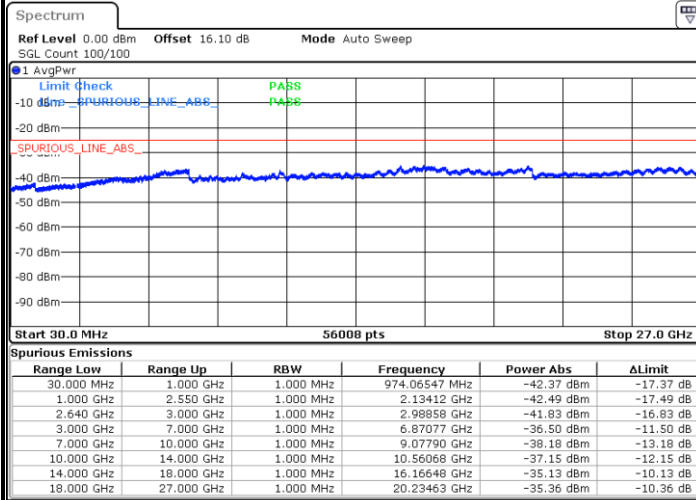


Date: 16.FEB.2018 12:26:17



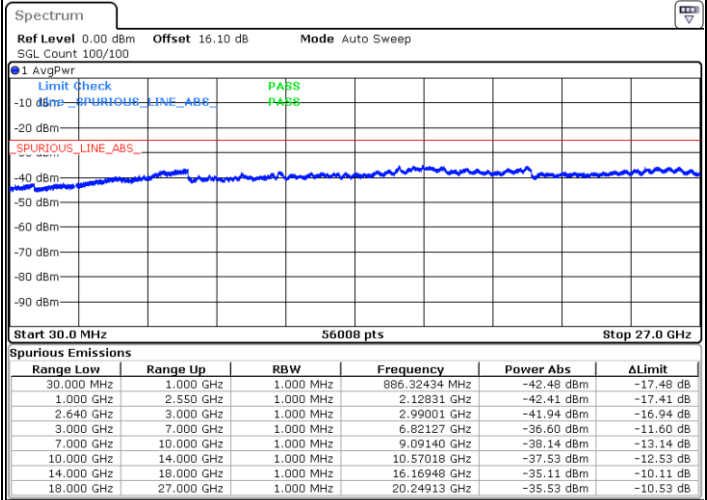
## LTE Band 38 / 15MHz

## Lowest Channel / 64QAM



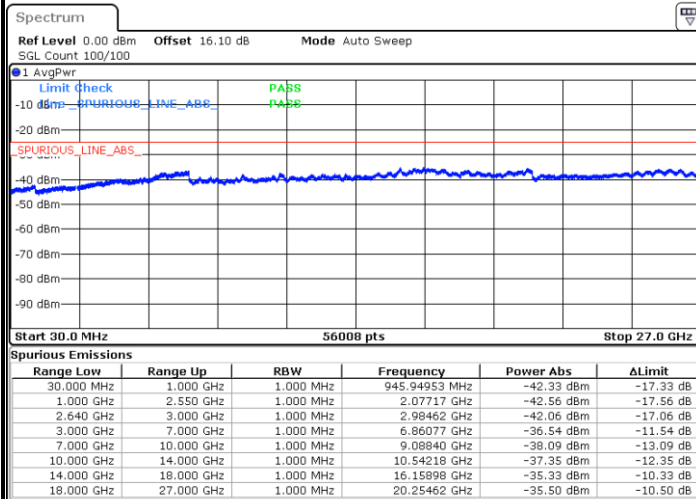
Date: 16.FEB 2018 12:27:11

## Middle Channel / 64QAM



Date: 16.FEB 2018 12:28:05

## Highest Channel / 64QAM

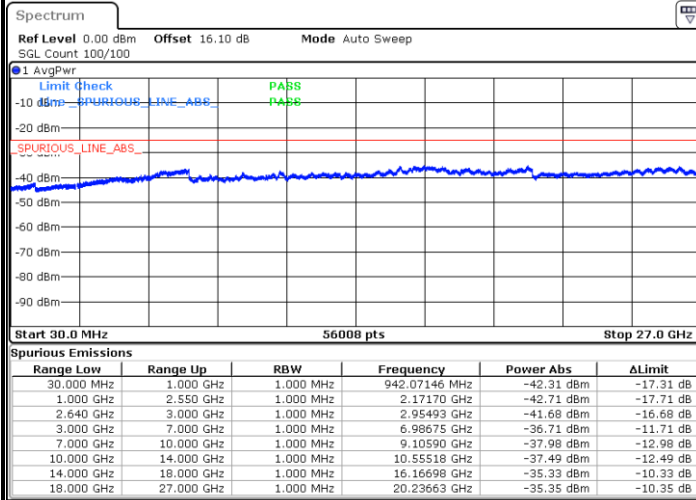


Date: 16.FEB 2018 12:28:58



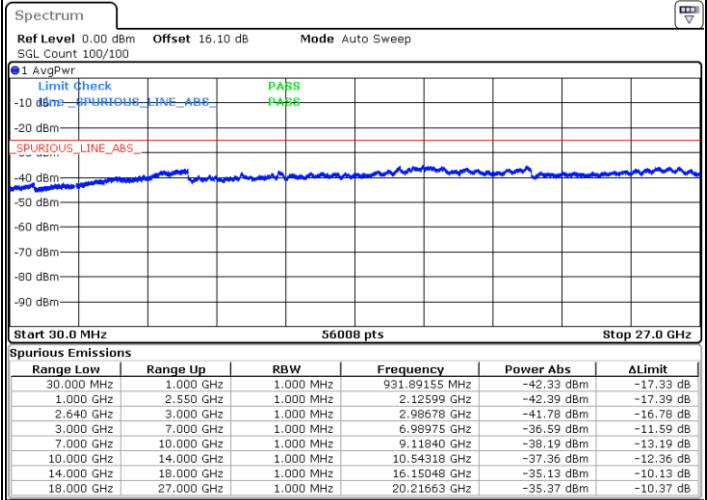
## LTE Band 38 / 20MHz

## Lowest Channel / 64QAM



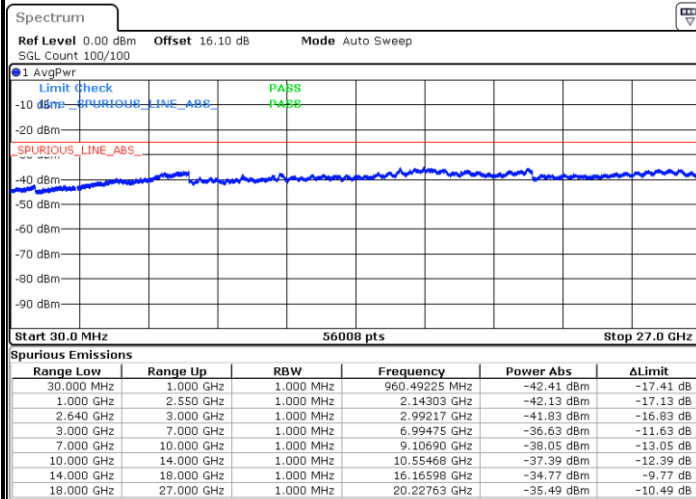
Date: 16.FEB.2018 12:29:52

## Middle Channel / 64QAM



Date: 16.FEB.2018 12:30:46

## Highest Channel / 64QAM



Date: 16.FEB.2018 12:31:40

## Frequency Stability

| Test Conditions  |                   | LTE Band 38 (QPSK) / Middle Channel | Limit   |
|------------------|-------------------|-------------------------------------|---------|
| Temperature (°C) | Voltage (Volt)    | BW 10MHz                            | Note 2. |
|                  |                   | Deviation (ppm)                     | Result  |
| 50               | Normal Voltage    | 0.0013                              | PASS    |
| 40               | Normal Voltage    | 0.0020                              |         |
| 30               | Normal Voltage    | 0.0020                              |         |
| 20(Ref.)         | Normal Voltage    | 0.0000                              |         |
| 10               | Normal Voltage    | 0.0031                              |         |
| 0                | Normal Voltage    | 0.0007                              |         |
| -10              | Normal Voltage    | 0.0012                              |         |
| -20              | Normal Voltage    | 0.0013                              |         |
| -30              | Normal Voltage    | 0.0028                              |         |
| 20               | Maximum Voltage   | 0.0029                              |         |
| 20               | Normal Voltage    | 0.0000                              |         |
| 20               | Battery End Point | 0.0017                              |         |

**Note:**

1. Normal Voltage =3.8 V. ; Battery End Point (BEP) =3.6 V. ; Maximum Voltage =4.4 V.
2. The frequency fundamental emissions stay within the authorized frequency block.

## LTE Band 41

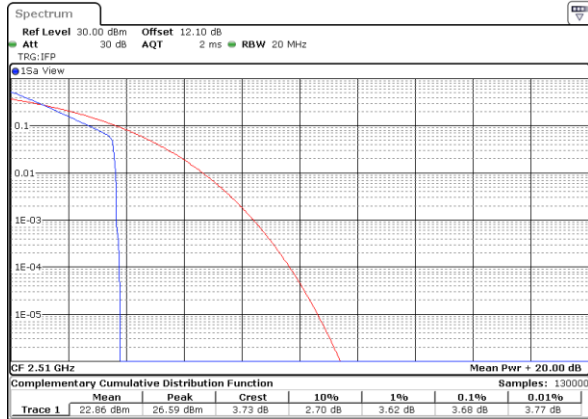
### Peak-to-Average Ratio

| Mode       | LTE Band 41 / 20MHz |         |       |         |             |
|------------|---------------------|---------|-------|---------|-------------|
| Mod.       | QPSK                |         | 16QAM |         | Limit: 13dB |
| RB Size    | 1RB                 | Full RB | 1RB   | Full RB | Result      |
| Lowest CH  | 3.74                | 4.38    | 5.07  | 5.74    | PASS        |
| Middle CH  | 3.65                | 4.32    | 5.71  | 5.74    |             |
| Highest CH | 3.68                | 4.35    | 5.16  | 5.65    |             |
| Mode       | LTE Band 41 / 20MHz |         |       |         |             |
| Mod.       | 64QAM               |         |       |         | Limit: 13dB |
| RB Size    | 1RB                 | Full RB |       |         | Result      |
| Lowest CH  | 6.17                | 6.26    | -     | -       | PASS        |
| Middle CH  | 6.61                | 6.23    | -     | -       |             |
| Highest CH | 5.86                | 6.20    | -     | -       |             |

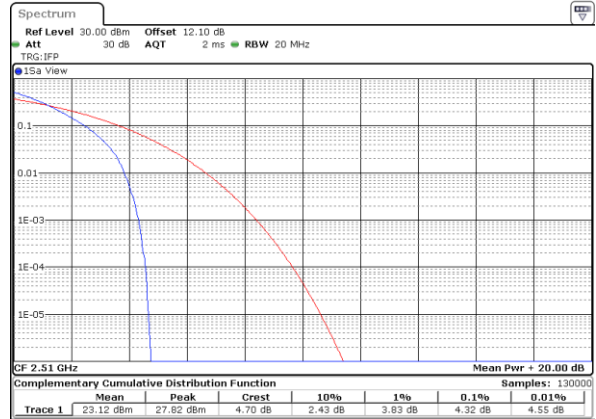


## LTE Band 41 / 20MHz / QPSK

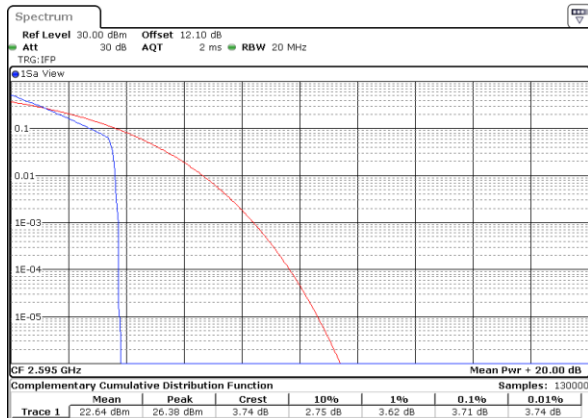
## Lowest Channel / 1RB



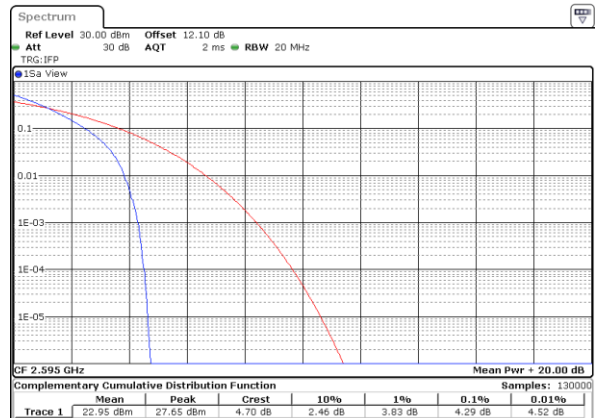
## Lowest Channel / Full RB



## Middle Channel / 1RB



## Middle Channel / Full RB



## Highest Channel / 1RB



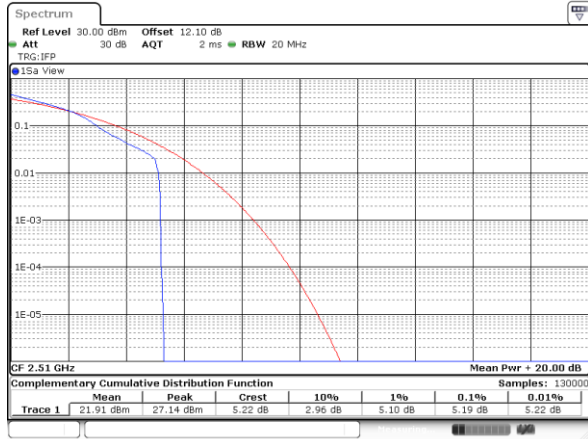
## Highest Channel / Full RB



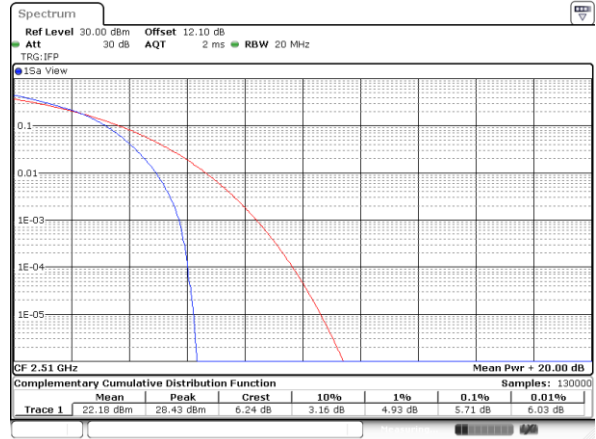


## LTE Band 41 / 20MHz / 16QAM

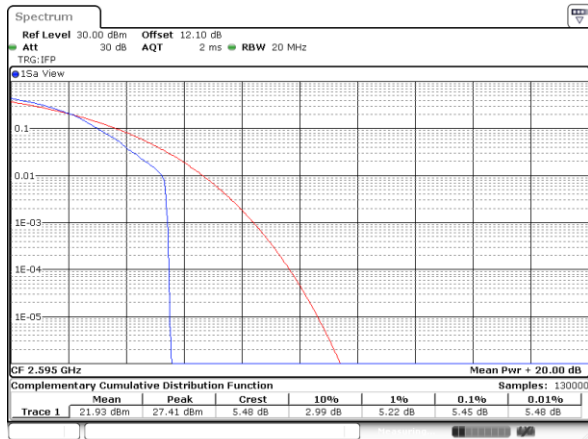
## Lowest Channel / 1RB



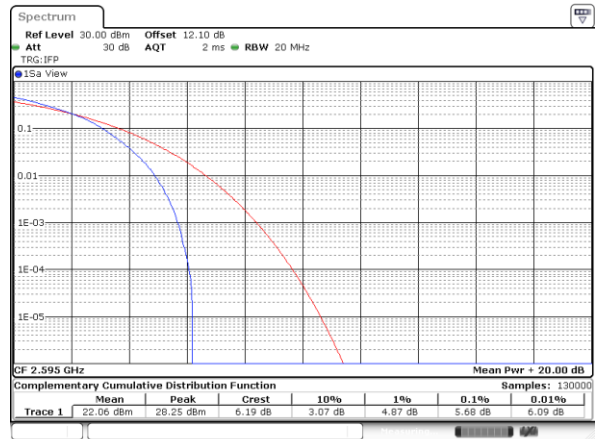
## Lowest Channel / Full RB



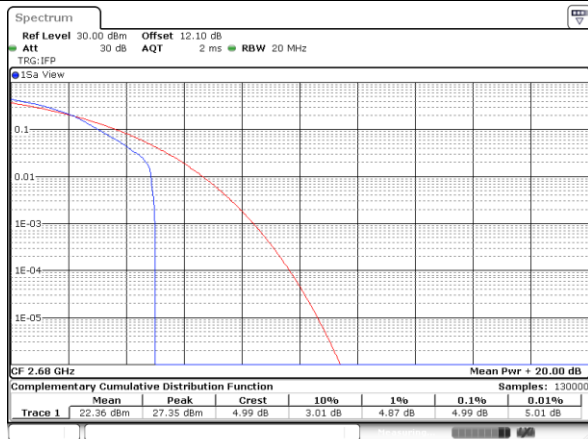
## Middle Channel / 1RB



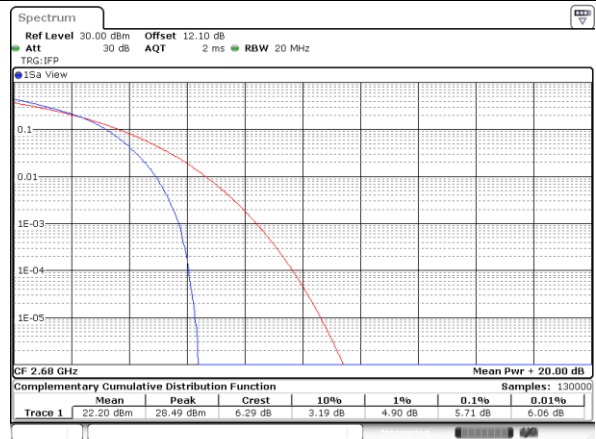
## Middle Channel / Full RB



## Highest Channel / 1RB



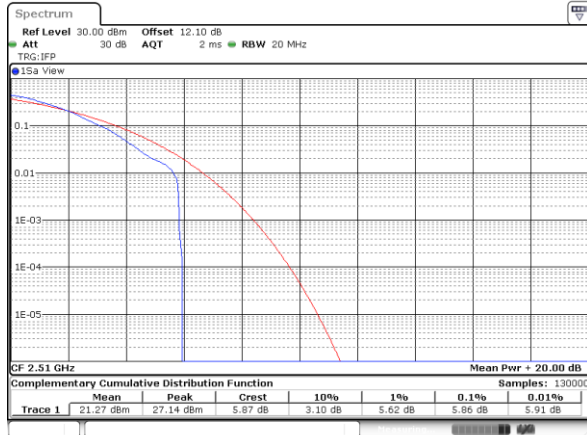
## Highest Channel / Full RB



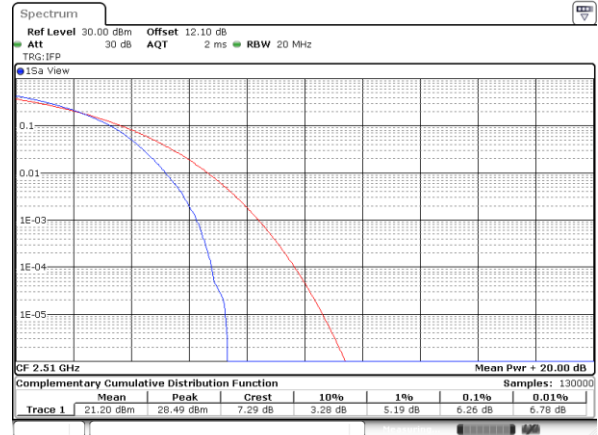


## LTE Band 41 / 20MHz / 64QAM

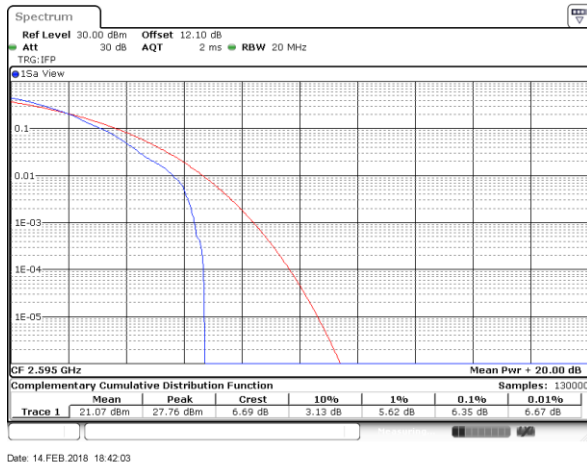
## Lowest Channel / 1RB



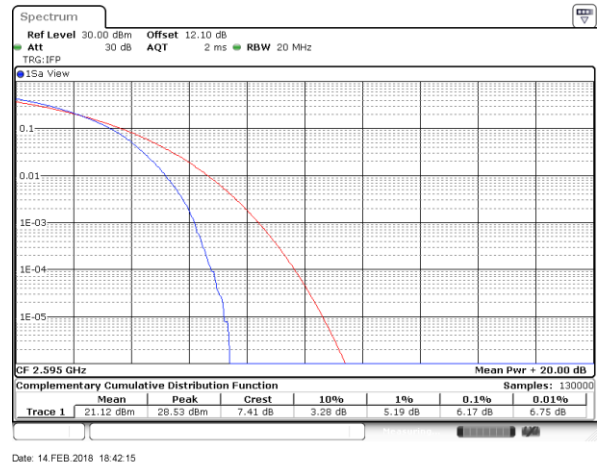
## Lowest Channel / Full RB



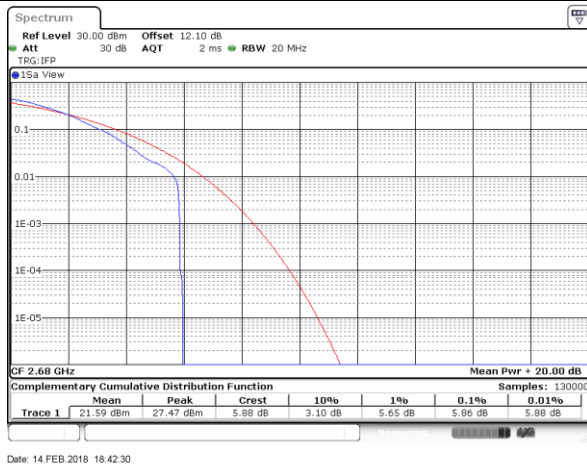
## Middle Channel / 1RB



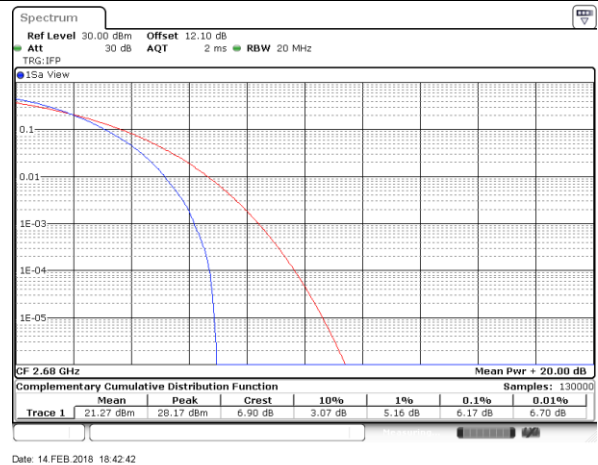
## Middle Channel / Full RB



## Highest Channel / 1RB



## Highest Channel / Full RB



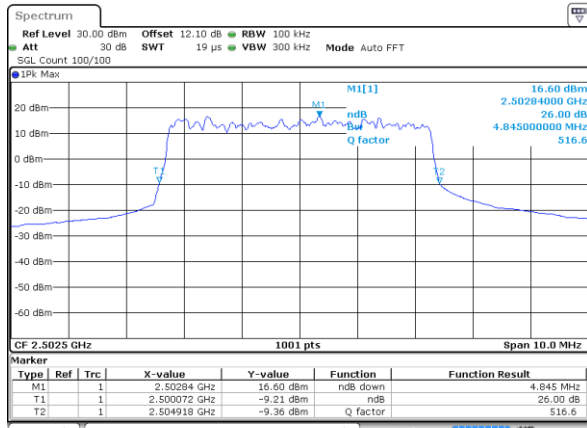
**26dB Bandwidth**

| Mode       | LTE Band 41 : 26dB BW(MHz) |       |       |       |       |       |       |       |       |       |       |       |
|------------|----------------------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|
| BW         | 1.4MHz                     |       | 3MHz  |       | 5MHz  |       | 10MHz |       | 15MHz |       | 20MHz |       |
| Mod.       | QPSK                       | 16QAM | QPSK  | 16QAM | QPSK  | 16QAM | QPSK  | 16QAM | QPSK  | 16QAM | QPSK  | 16QAM |
| Lowest CH  | -                          | -     | -     | -     | 4.94  | 4.85  | 9.65  | 9.65  | 14.39 | 14.15 | 20.06 | 20.14 |
| Middle CH  | -                          | -     | -     | -     | 4.90  | 4.78  | 9.87  | 9.61  | 14.33 | 14.15 | 19.98 | 20.02 |
| Highest CH | -                          | -     | -     | -     | 4.91  | 4.80  | 9.79  | 9.69  | 14.36 | 14.12 | 20.06 | 20.02 |
| Mode       | LTE Band 41 : 26dB BW(MHz) |       |       |       |       |       |       |       |       |       |       |       |
| BW         | 1.4MHz                     |       | 3MHz  |       | 5MHz  |       | 10MHz |       | 15MHz |       | 20MHz |       |
| Mod.       | 64QAM                      |       | 64QAM |       | 64QAM |       | 64QAM |       | 64QAM |       | 64QAM |       |
| Lowest CH  | -                          | -     | -     | -     | 4.81  | -     | 9.91  | -     | 14.24 | -     | 20.10 | -     |
| Middle CH  | -                          | -     | -     | -     | 4.84  | -     | 9.83  | -     | 14.18 | -     | 20.18 | -     |
| Highest CH | -                          | -     | -     | -     | 4.89  | -     | 9.89  | -     | 14.21 | -     | 20.06 | -     |



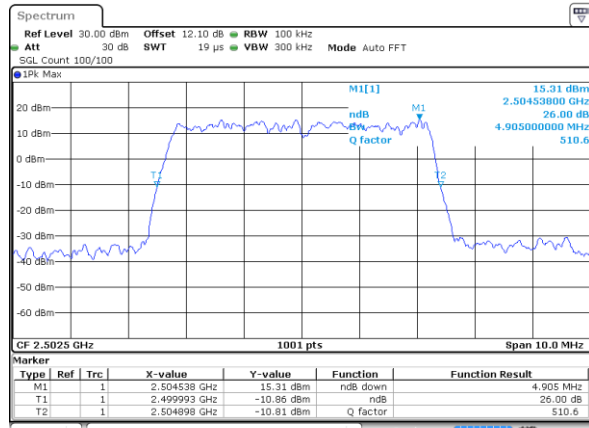
## LTE Band 41

## Lowest Channel / 5MHz / QPSK



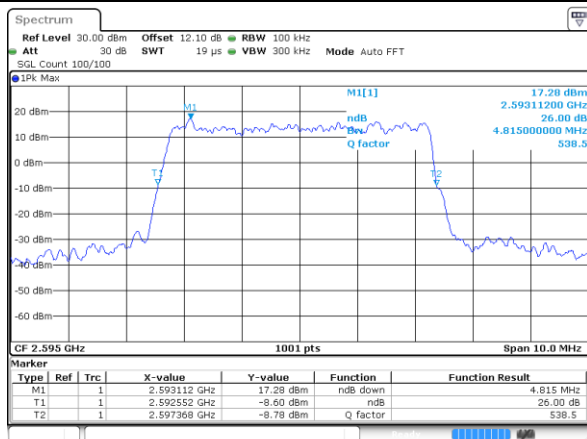
Date: 14 FEB 2018 18:18:31

## Lowest Channel / 5MHz / 16QAM



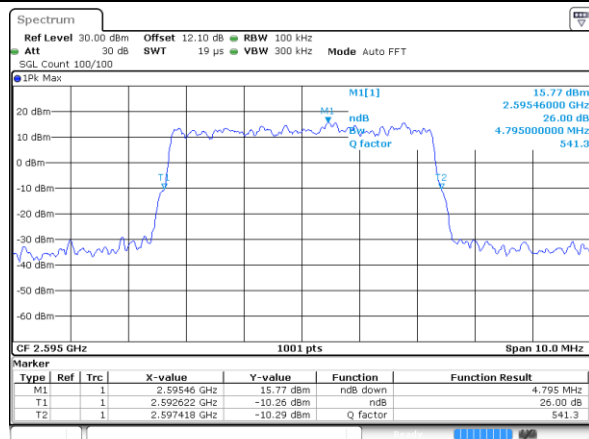
Date: 14 FEB 2018 18:18:41

## Middle Channel / 5MHz / QPSK



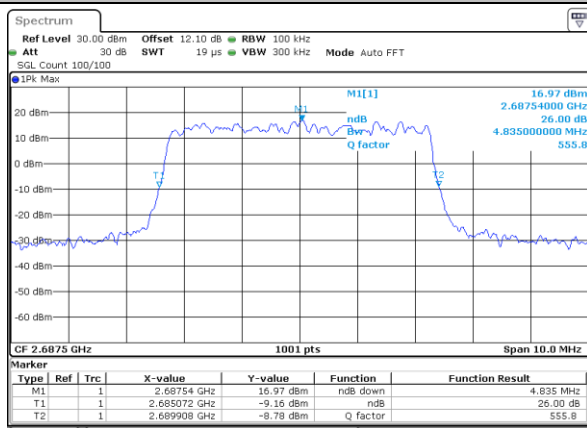
Date: 14 FEB 2018 18:19:11

## Middle Channel / 5MHz / 16QAM



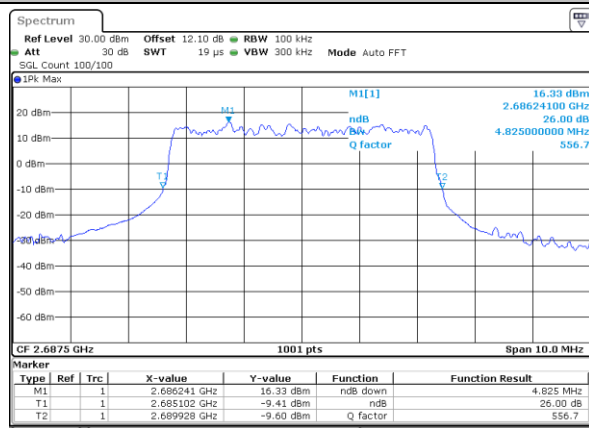
Date: 14 FEB 2018 18:19:21

## Highest Channel / 5MHz / QPSK



Date: 14 FEB 2018 18:19:50

## Highest Channel / 5MHz / 16QAM

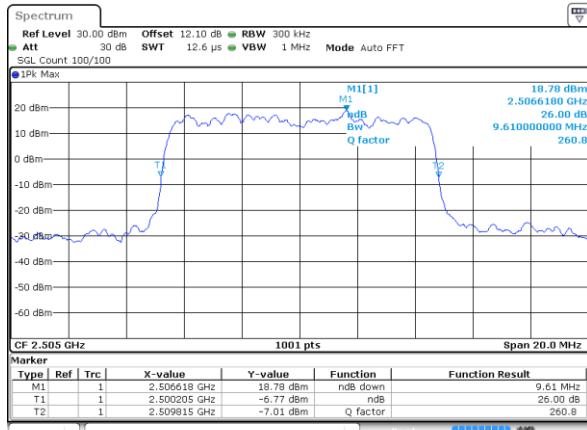


Date: 14 FEB 2018 18:20:00



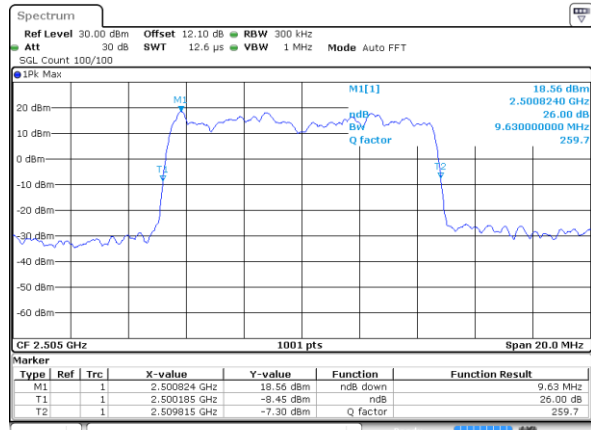
## LTE Band 41

## Lowest Channel / 10MHz / QPSK



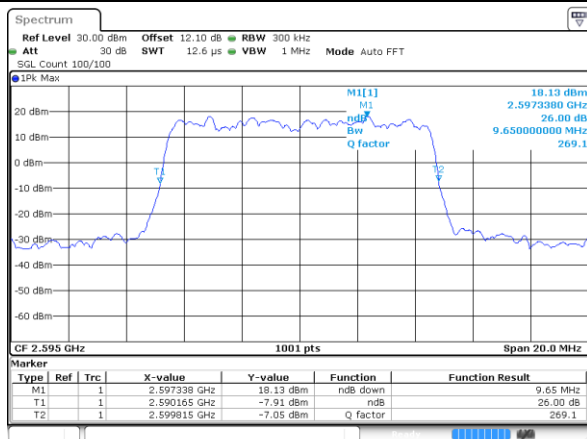
Date: 14 FEB 2018 18:20:30

## Lowest Channel / 10MHz / 16QAM



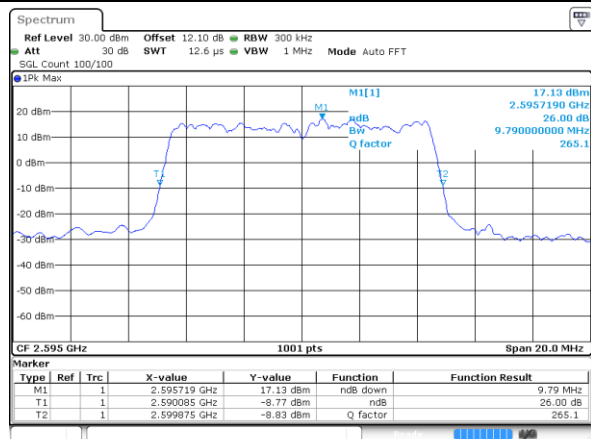
Date: 14 FEB 2018 18:20:40

## Middle Channel / 10MHz / QPSK



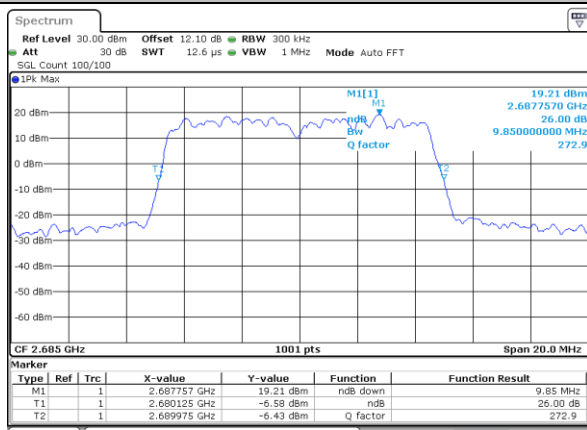
Date: 14 FEB 2018 18:21:09

## Middle Channel / 10MHz / 16QAM



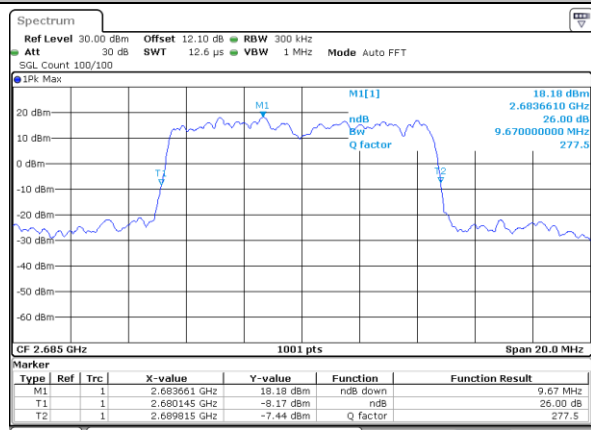
Date: 14 FEB 2018 18:21:19

## Highest Channel / 10MHz / QPSK



Date: 14 FEB 2018 18:21:49

## Highest Channel / 10MHz / 16QAM

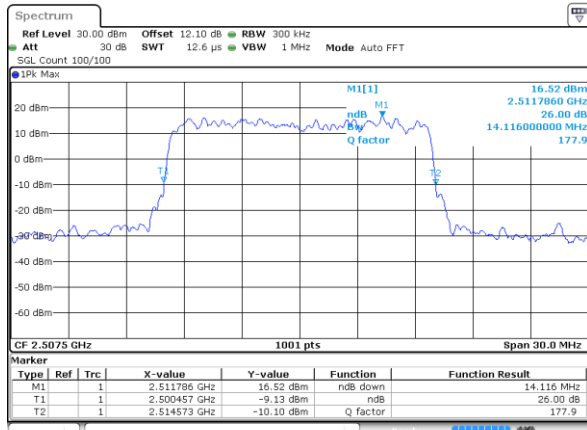


Date: 14 FEB 2018 18:21:59



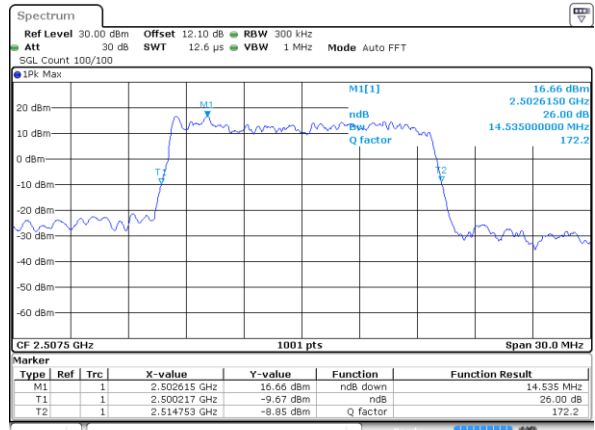
## LTE Band 41

## Lowest Channel / 15MHz / QPSK



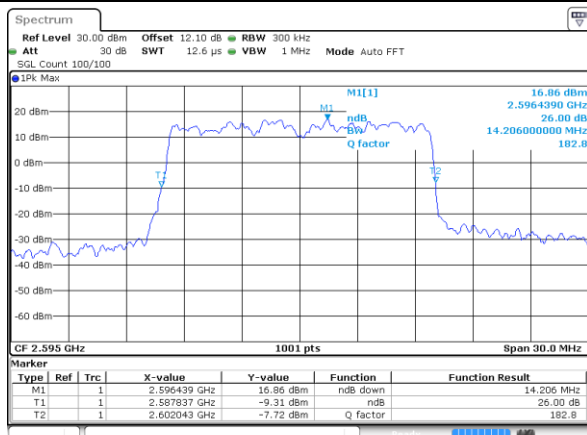
Date: 14 FEB 2018 18:22:28

## Lowest Channel / 15MHz / 16QAM



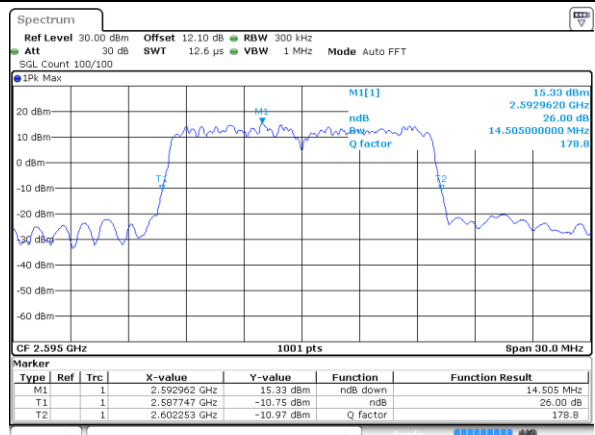
Date: 14 FEB 2018 18:22:38

## Middle Channel / 15MHz / QPSK



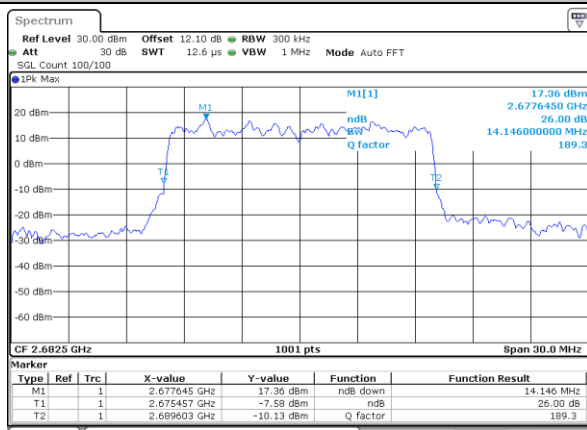
Date: 14 FEB 2018 18:23:08

## Middle Channel / 15MHz / 16QAM



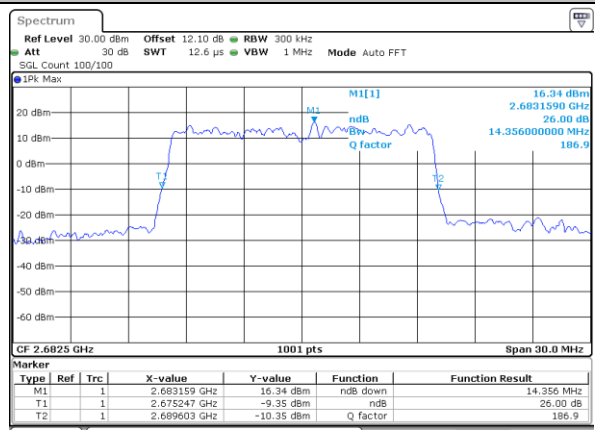
Date: 14 FEB 2018 18:23:18

## Highest Channel / 15MHz / QPSK



Date: 14 FEB 2018 18:23:47

## Highest Channel / 15MHz / 16QAM

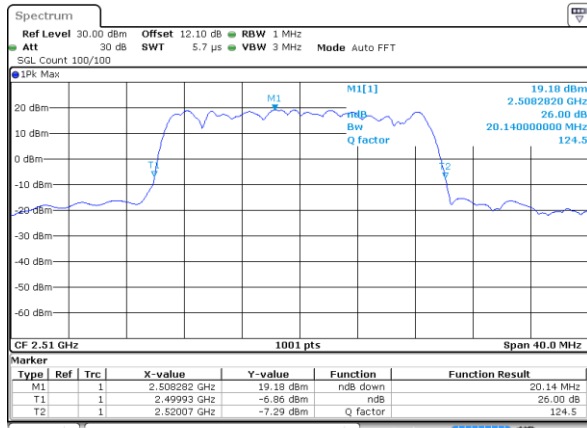


Date: 14 FEB 2018 18:23:57



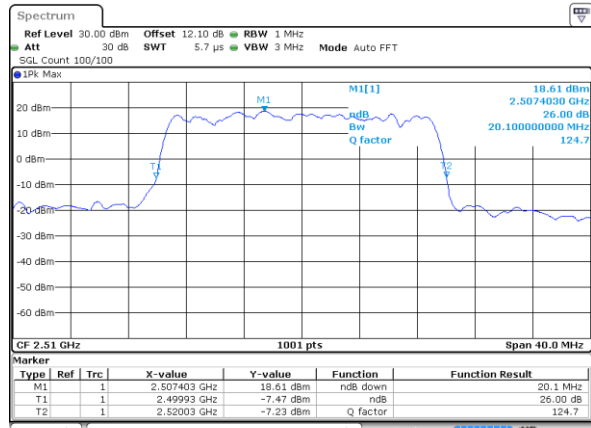
## LTE Band 41

## Lowest Channel / 20MHz / QPSK



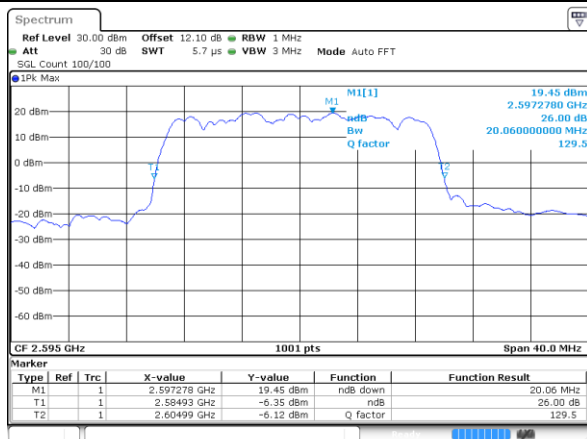
Date: 14 FEB 2018 18:34:14

## Lowest Channel / 20MHz / 16QAM



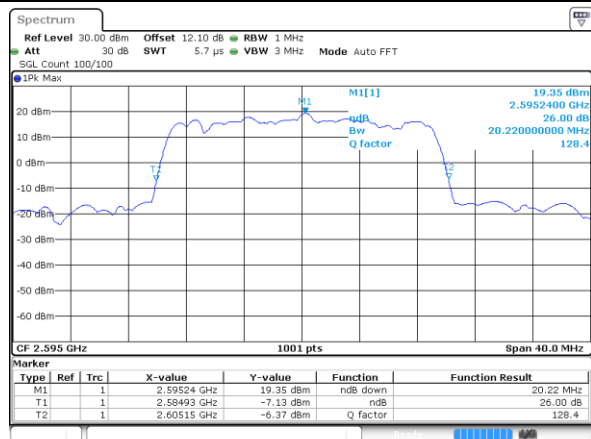
Date: 14 FEB 2018 18:34:24

## Middle Channel / 20MHz / QPSK



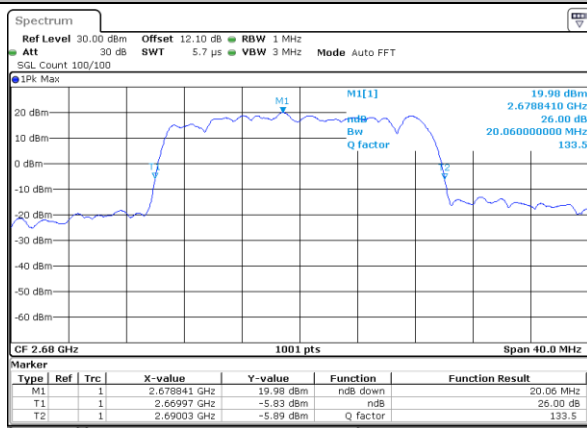
Date: 14 FEB 2018 18:34:54

## Middle Channel / 20MHz / 16QAM



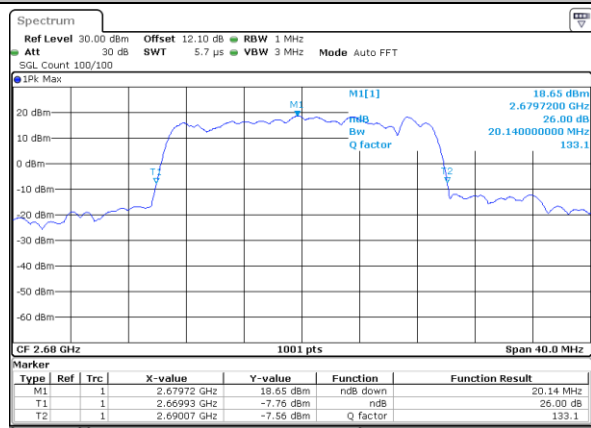
Date: 14 FEB 2018 18:35:03

## Highest Channel / 20MHz / QPSK



Date: 14 FEB 2018 18:35:33

## Highest Channel / 20MHz / 16QAM



Date: 14 FEB 2018 18:35:43