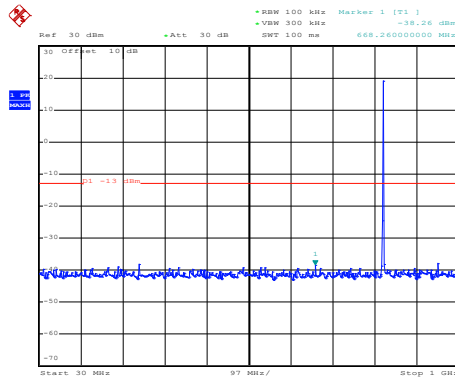


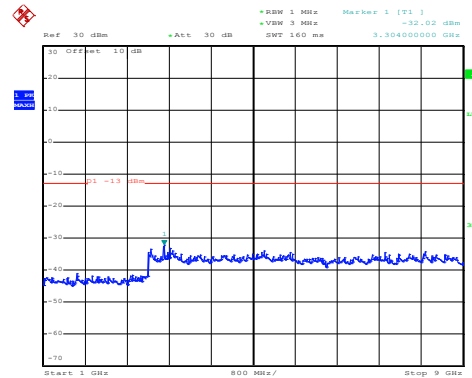
## LTE Band 5 part:

### LTE Band 5: 16 QAM & RB Size 1 BW: 1.4MHz Lowest channel



Date: 8.OCT.2019 17:28:27

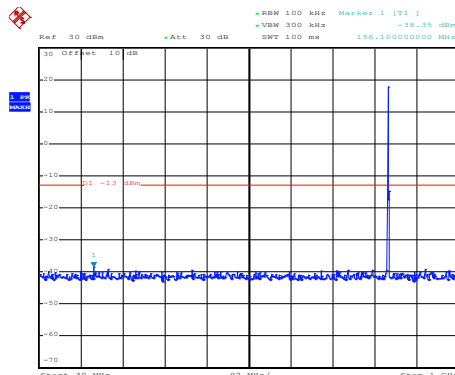
30MHz~1GHz



Date: 9.OCT.2019 19:21:15

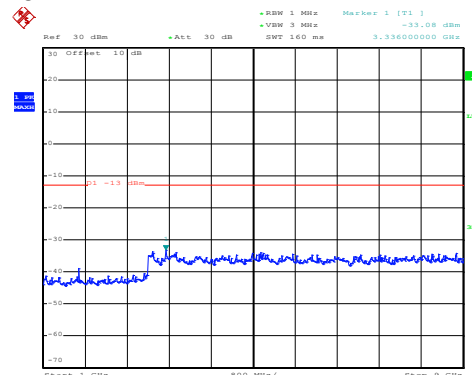
1GHz~9GHz

### Middle channel



Date: 8.OCT.2019 17:29:34

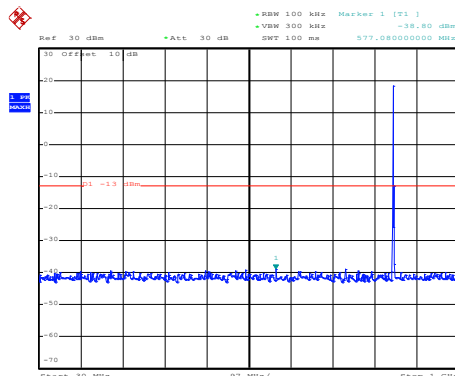
30MHz~1GHz



Date: 9.OCT.2019 19:21:53

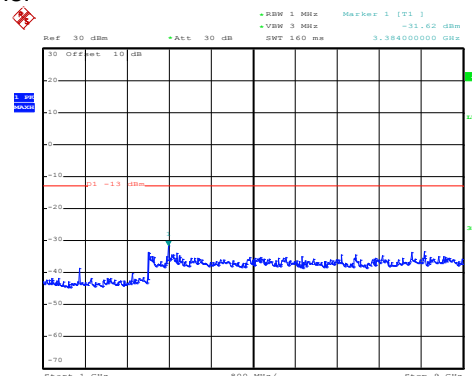
1GHz~9GHz

### High channel



Date: 8.OCT.2019 17:29:57

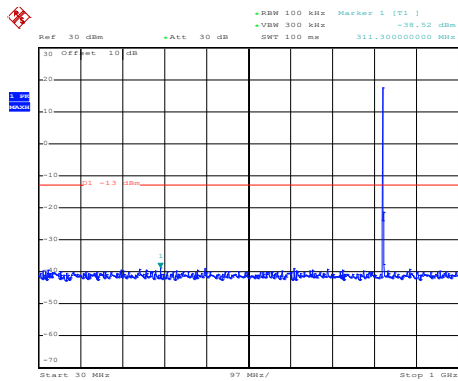
30MHz~1GHz



Date: 9.OCT.2019 19:22:07

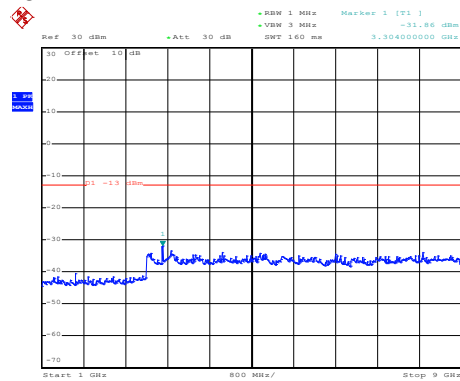
1GHz~9GHz

LTE Band 5: 16 QAM & RB Size 6  
BW: 1.4MHz  
Lowest channel



Date: 8.OCT.2019 17:28:49

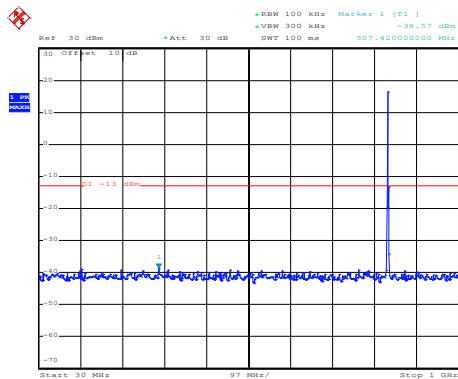
30MHz~1GHz



Date: 9.OCT.2019 19:21:26

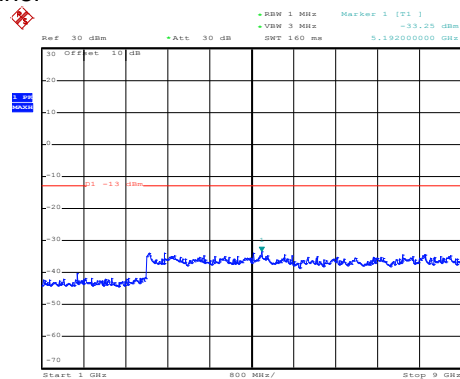
1GHz~9GHz

Middle channel



Date: 8.OCT.2019 17:29:13

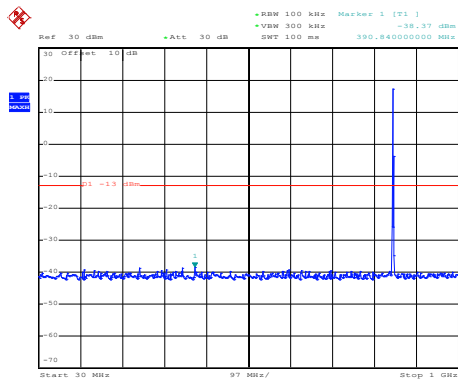
30MHz~1GHz



Date: 9.OCT.2019 19:21:40

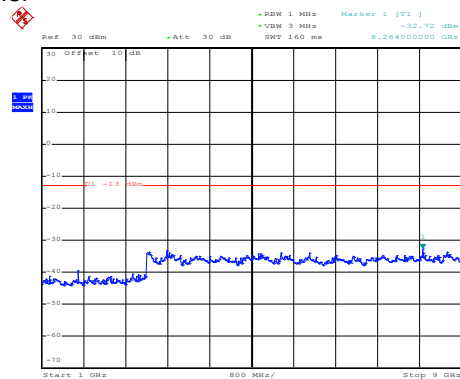
1GHz~9GHz

High channel



Date: 8.OCT.2019 17:30:21

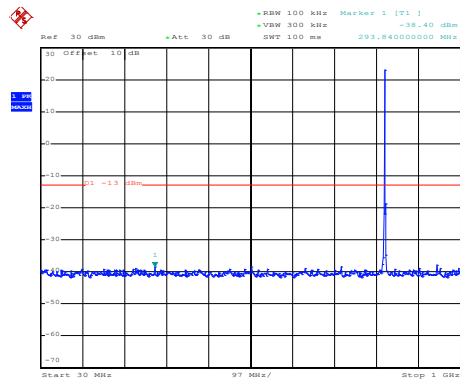
30MHz~1GHz



Date: 9.OCT.2019 19:22:21

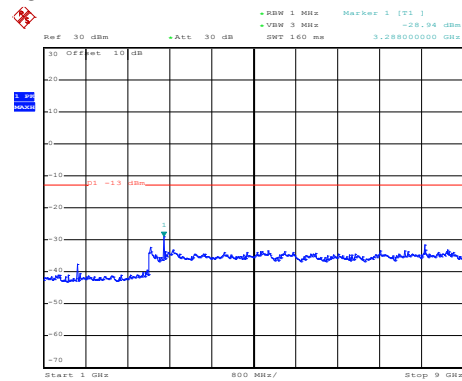
1GHz~9GHz

LTE Band 5: QPSK & RB Size 1  
BW: 1.4MHz  
Lowest channel



Date: 8.OCT.2019 17:28:18

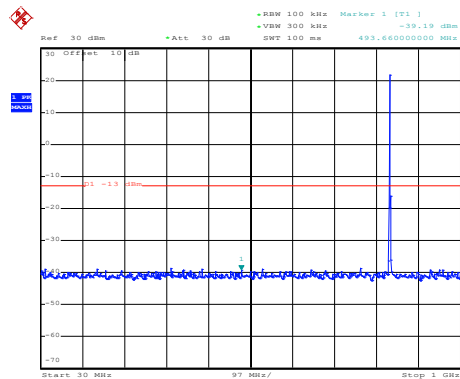
30MHz~1GHz



Date: 9.OCT.2019 19:21:10

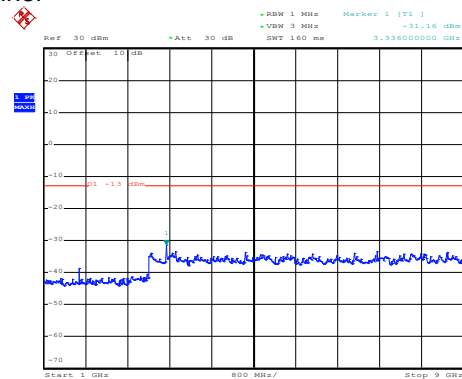
1GHz~9GHz

Middle channel



Date: 8.OCT.2019 17:29:25

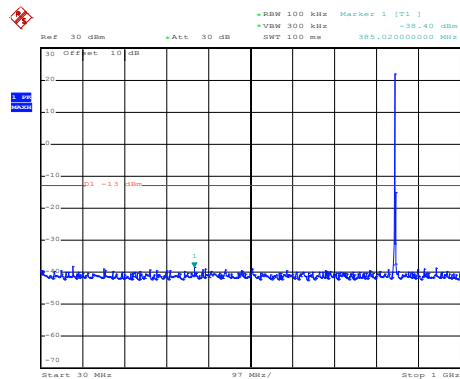
30MHz~1GHz



Date: 9.OCT.2019 19:21:47

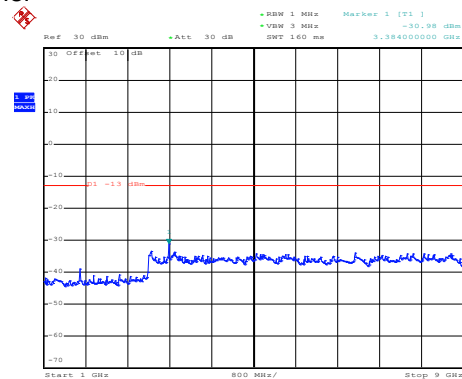
1GHz~9GHz

High channel



Date: 8.OCT.2019 17:29:48

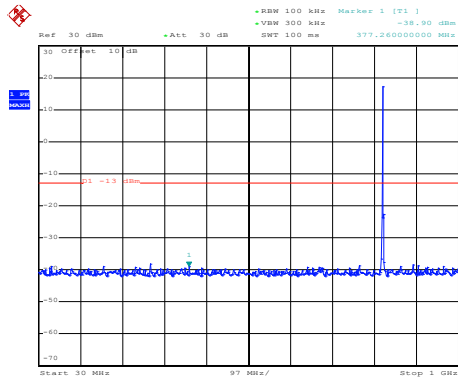
30MHz~1GHz



Date: 9.OCT.2019 19:22:03

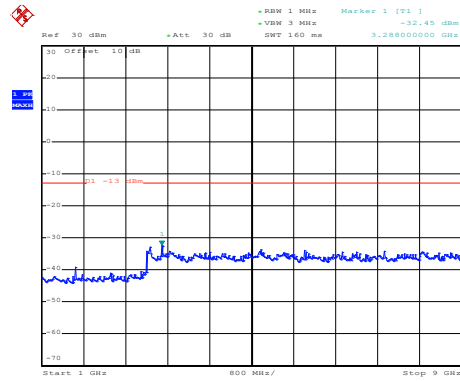
1GHz~9GHz

## LTE Band 5: QPSK & RB Size 6 BW: 1.4MHz Lowest channel



Date: 8.OCT.2019 17:28:39

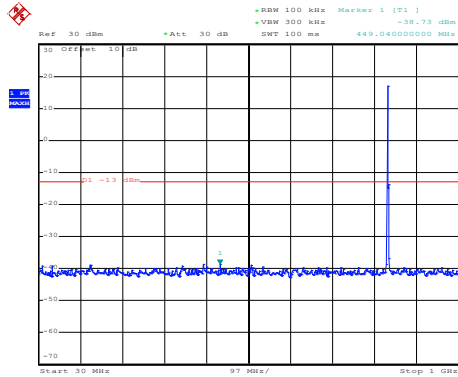
30MHz~1GHz



Date: 9.OCT.2019 19:21:22

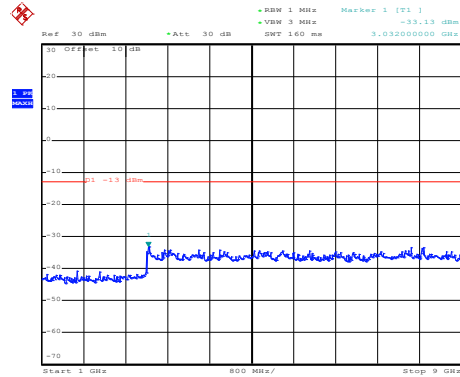
1GHz~9GHz

## Middle channel



Date: 8.OCT.2019 17:29:04

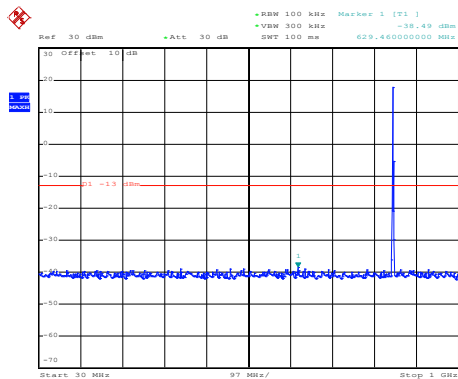
30MHz~1GHz



Date: 9.OCT.2019 19:21:35

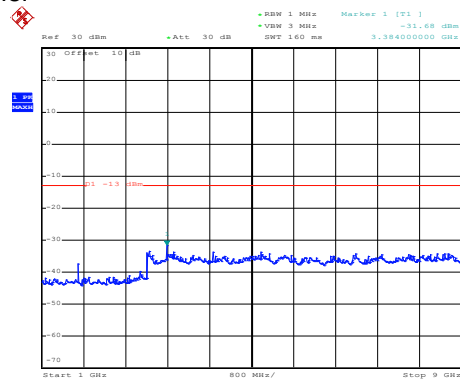
1GHz~9GHz

## High channel



Date: 8.OCT.2019 17:30:10

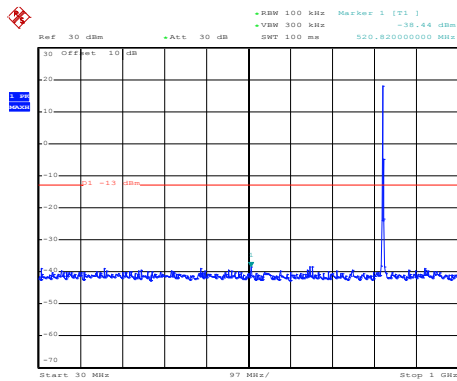
30MHz~1GHz



Date: 9.OCT.2019 19:22:14

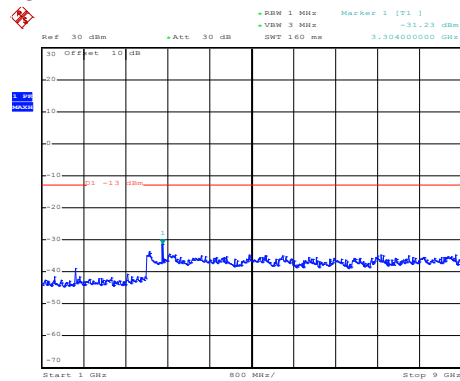
1GHz~9GHz

LTE Band 5: 16 QAM & RB Size 1  
BW: 3MHz  
Lowest channel



Date: 8.OCT.2019 17:31:01

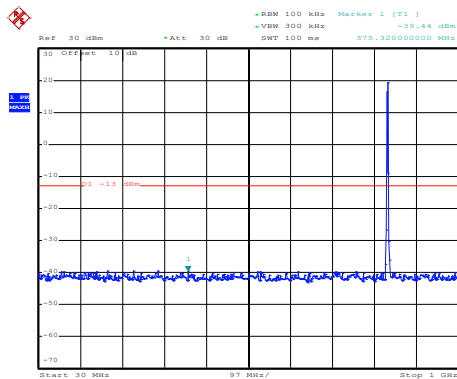
30MHz~1GHz



Date: 9.OCT.2019 19:22:46

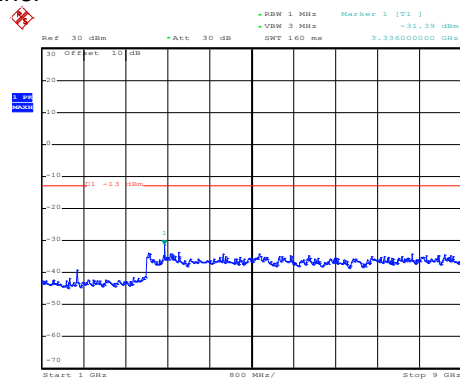
1GHz~9GHz

Middle channel



Date: 8.OCT.2019 17:32:09

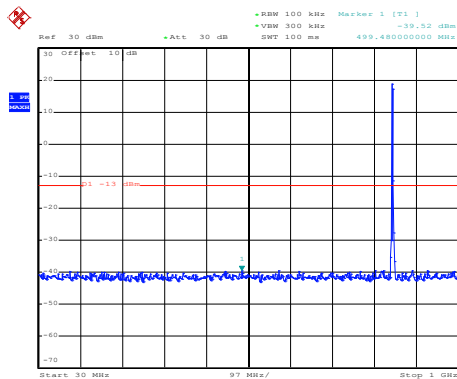
30MHz~1GHz



Date: 9.OCT.2019 19:23:30

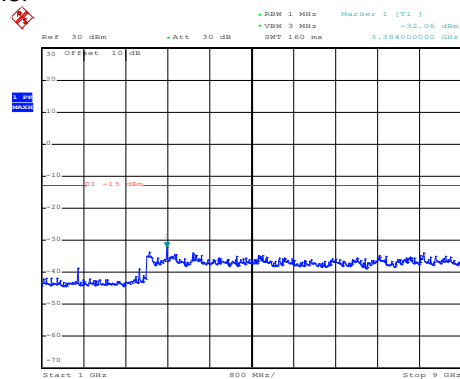
1GHz~9GHz

High channel



Date: 8.OCT.2019 17:32:35

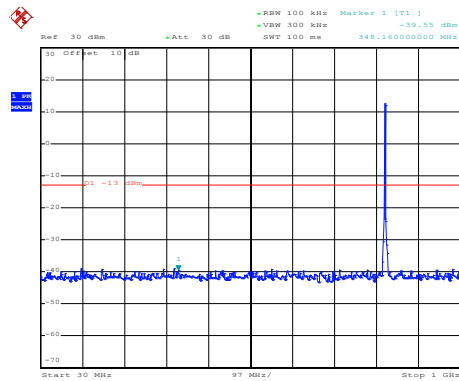
30MHz~1GHz



Date: 9.OCT.2019 19:23:45

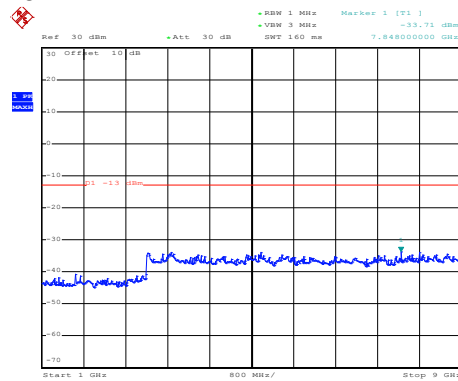
1GHz~9GHz

## LTE Band 5: 16 QAM & RB Size 15 BW: 3MHz Lowest channel



Date: 8.OCT.2019 17:31:23

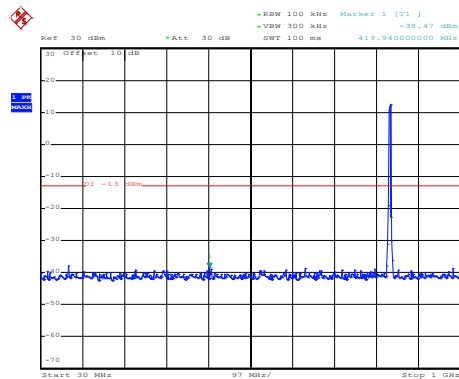
30MHz~1GHz



Date: 9.OCT.2019 19:23:01

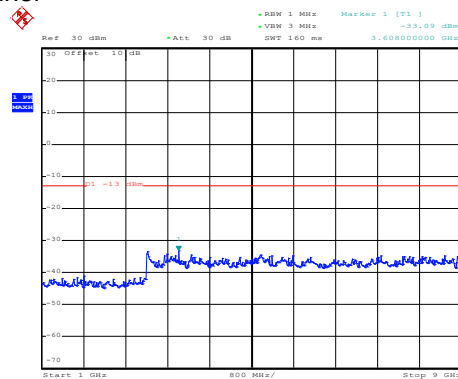
1GHz~9GHz

## Middle channel



Date: 8.OCT.2019 17:31:51

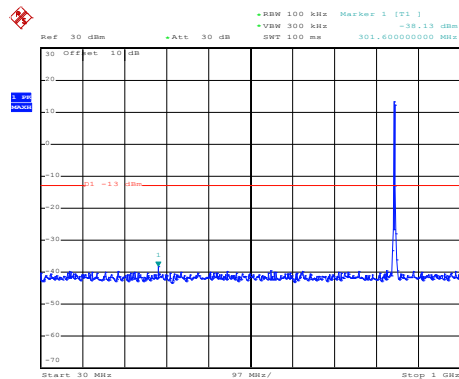
30MHz~1GHz



Date: 9.OCT.2019 19:23:19

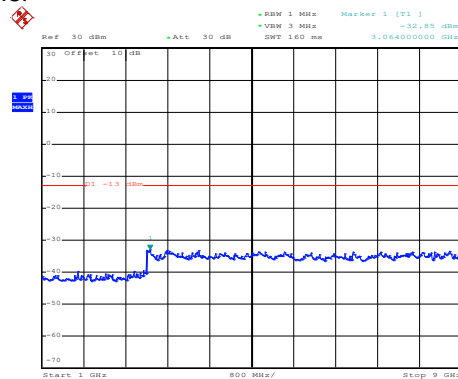
1GHz~9GHz

## High channel



Date: 8.OCT.2019 17:32:56

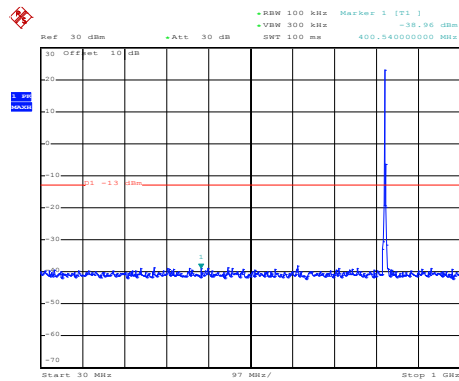
30MHz~1GHz



Date: 9.OCT.2019 19:24:36

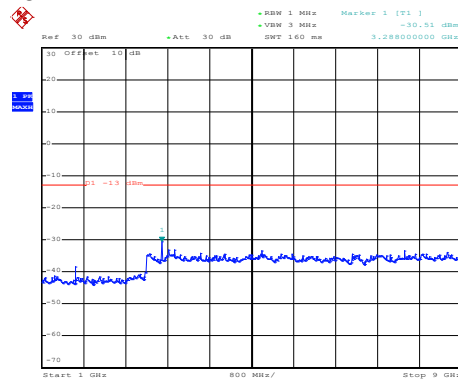
1GHz~9GHz

## LTE Band 5: QPSK & RB Size 1 BW: 3MHz Lowest channel



Date: 8.OCT.2019 17:30:52

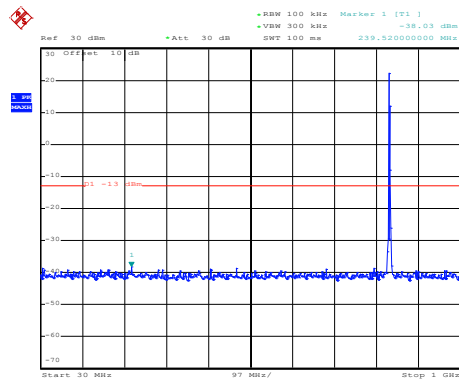
30MHz~1GHz



Date: 9.OCT.2019 19:22:42

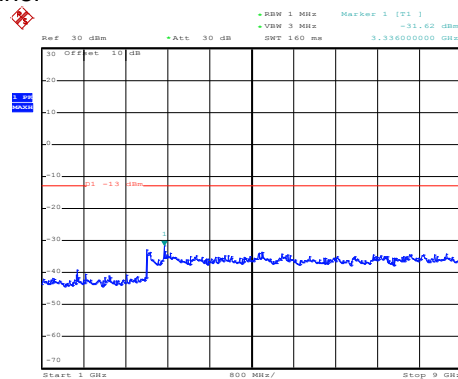
1GHz~9GHz

## Middle channel



Date: 8.OCT.2019 17:32:01

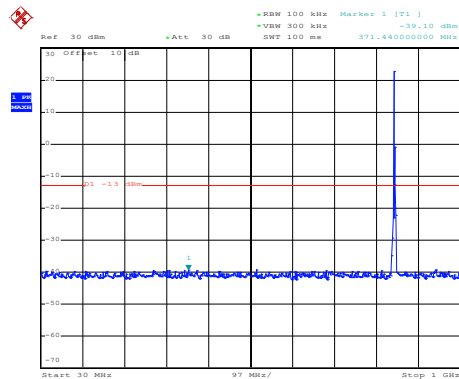
30MHz~1GHz



Date: 9.OCT.2019 19:23:25

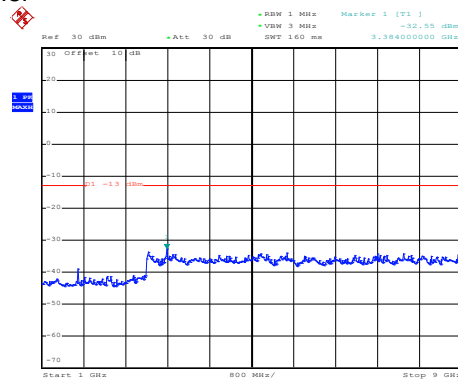
1GHz~9GHz

## High channel



Date: 8.OCT.2019 17:32:26

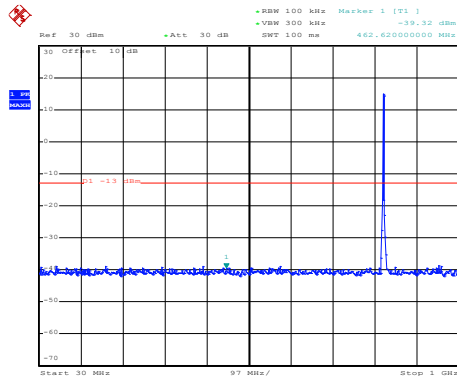
30MHz~1GHz



Date: 9.OCT.2019 19:23:41

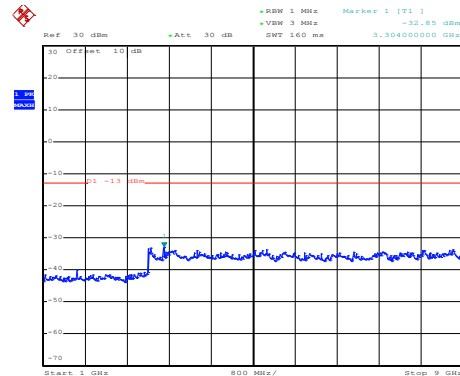
1GHz~9GHz

LTE Band 5: QPSK & RB Size 15  
BW: 3MHz  
Lowest channel



Date: 8.OCT.2019 17:31:16

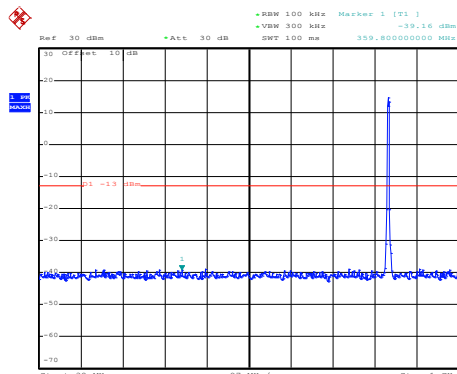
30MHz~1GHz



Date: 9.OCT.2019 19:22:56

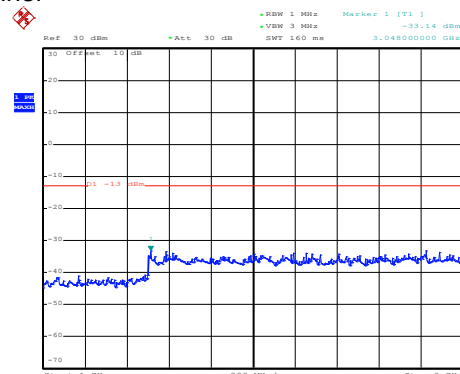
1GHz~9GHz

Middle channel



Date: 8.OCT.2019 17:31:38

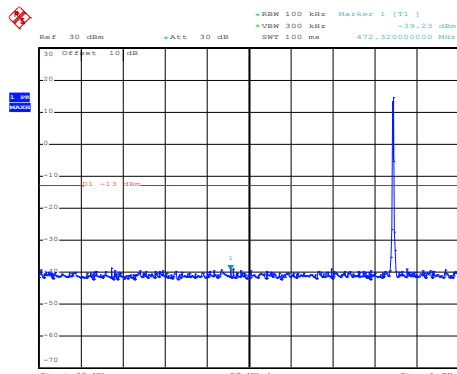
30MHz~1GHz



Date: 9.OCT.2019 19:23:15

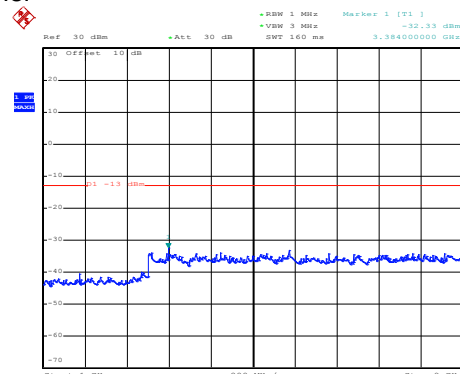
1GHz~9GHz

High channel



Date: 8.OCT.2019 17:32:48

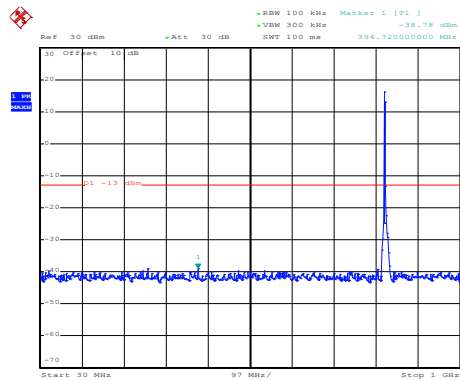
30MHz~1GHz



Date: 9.OCT.2019 19:23:52

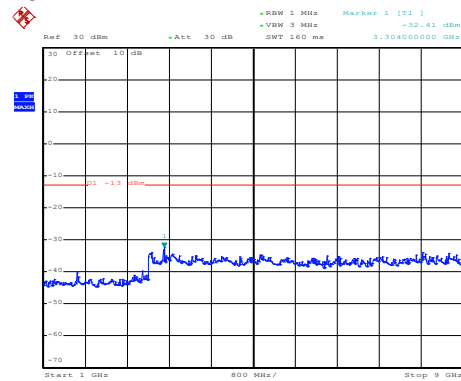
1GHz~9GHz

LTE Band 5: 16 QAM & RB Size 1  
BW: 5MHz  
Lowest channel



Date: 8.OCT.2019 17:33:30

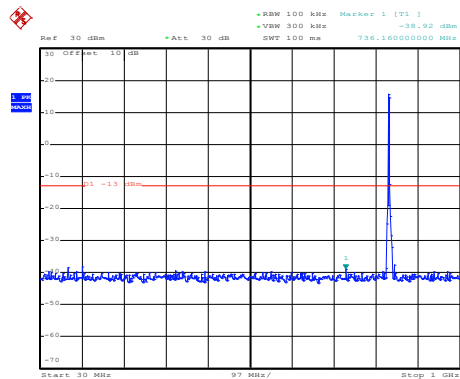
30MHz~1GHz



Date: 9.OCT.2019 19:26:45

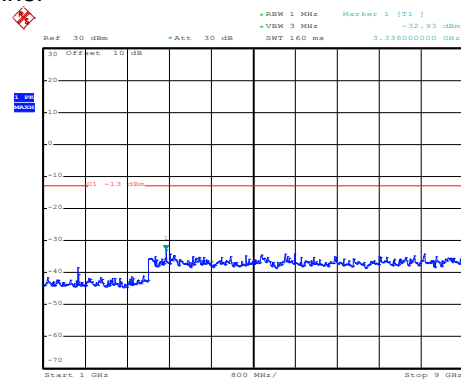
1GHz~9GHz

Middle channel



Date: 8.OCT.2019 17:34:33

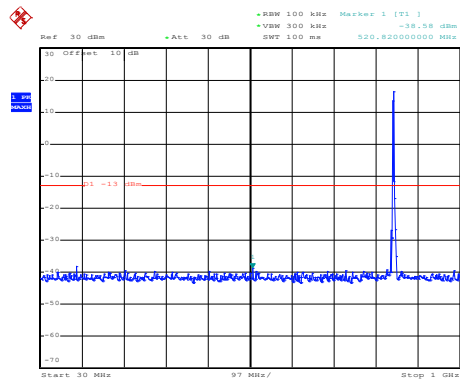
30MHz~1GHz



Date: 9.OCT.2019 19:27:25

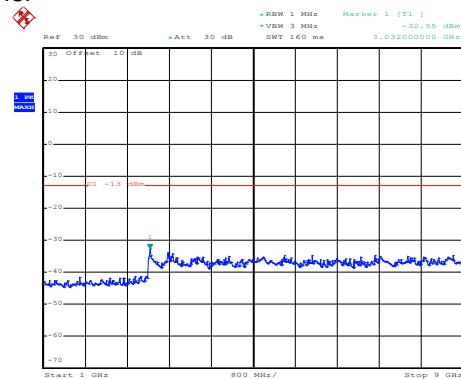
1GHz~9GHz

High channel



Date: 8.OCT.2019 17:35:02

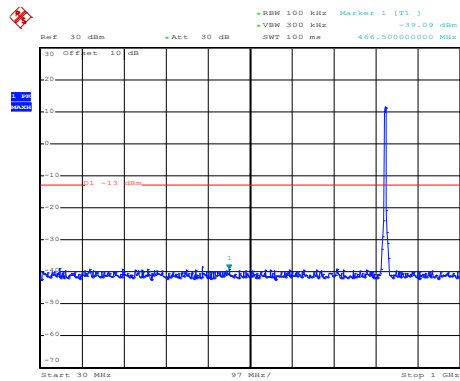
30MHz~1GHz



Date: 9.OCT.2019 19:27:41

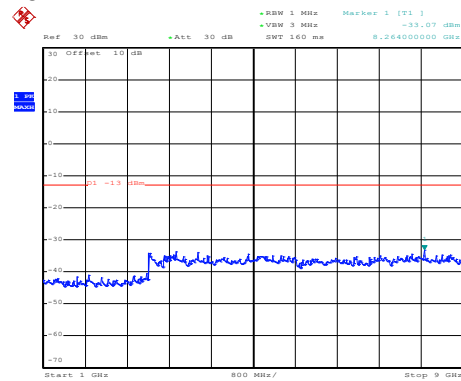
1GHz~9GHz

LTE Band 5: 16 QAM & RB Size 25  
BW: 5MHz  
Lowest channel



Date: 8.OCT.2019 17:33:52

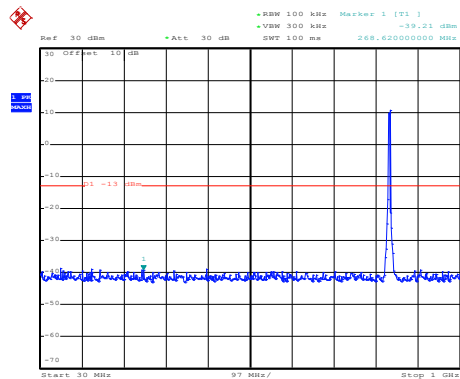
30MHz~1GHz



Date: 9.OCT.2019 19:26:59

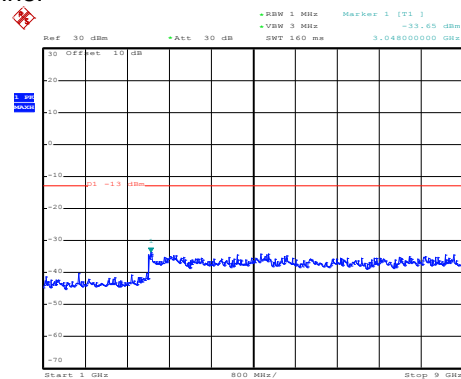
1GHz~9GHz

Middle channel



Date: 8.OCT.2019 17:34:12

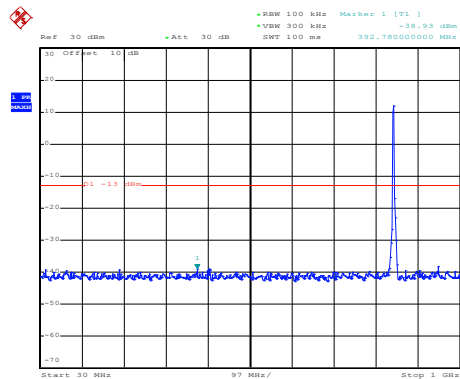
30MHz~1GHz



Date: 9.OCT.2019 19:27:13

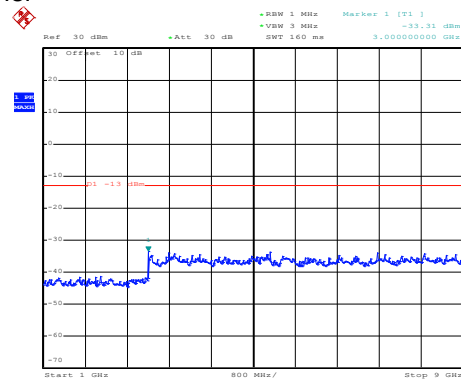
1GHz~9GHz

High channel



Date: 8.OCT.2019 17:35:28

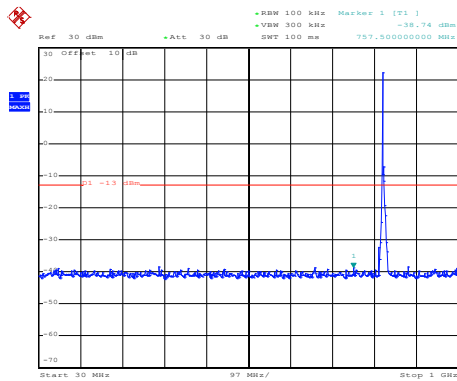
30MHz~1GHz



Date: 9.OCT.2019 19:27:55

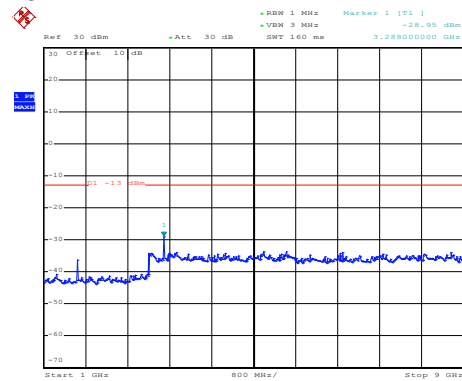
1GHz~9GHz

LTE Band 5: QPSK & RB Size 1  
BW: 5MHz  
Lowest channel



Date: 8.OCT.2019 17:33:23

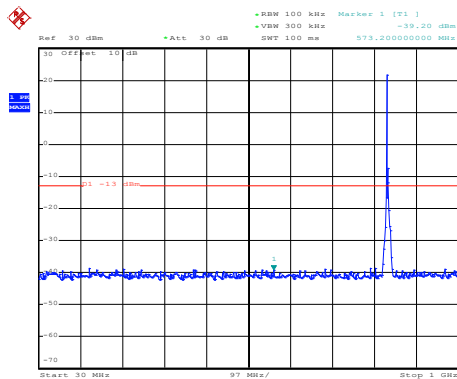
30MHz~1GHz



Date: 9.OCT.2019 19:26:41

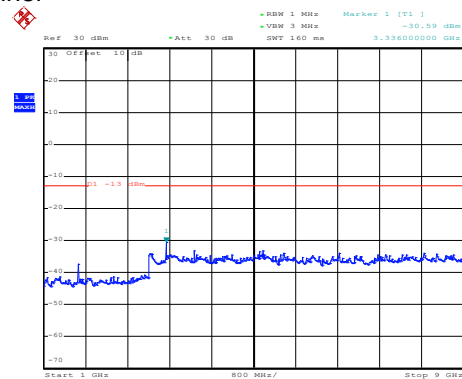
1GHz~9GHz

Middle channel



Date: 8.OCT.2019 17:34:25

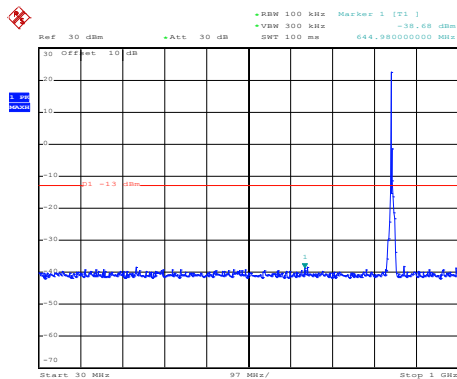
30MHz~1GHz



Date: 9.OCT.2019 19:27:21

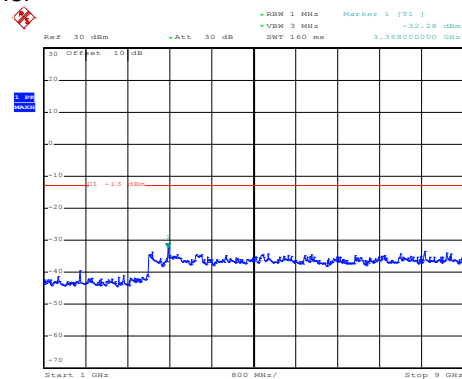
1GHz~9GHz

High channel



Date: 8.OCT.2019 17:34:55

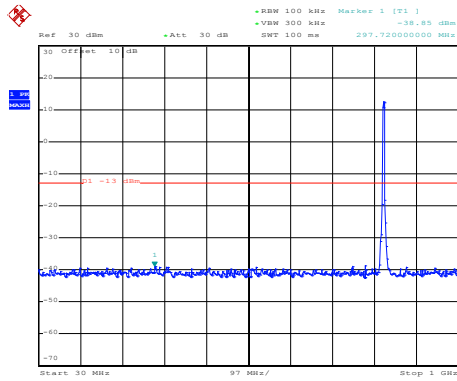
30MHz~1GHz



Date: 9.OCT.2019 19:27:37

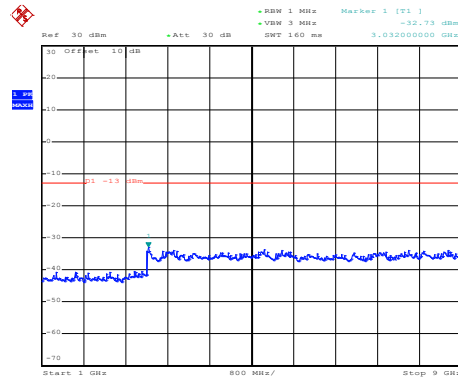
1GHz~9GHz

## LTE Band 5: QPSK & RB Size 25 BW: 5MHz Lowest channel



Date: 8.OCT.2019 17:33:41

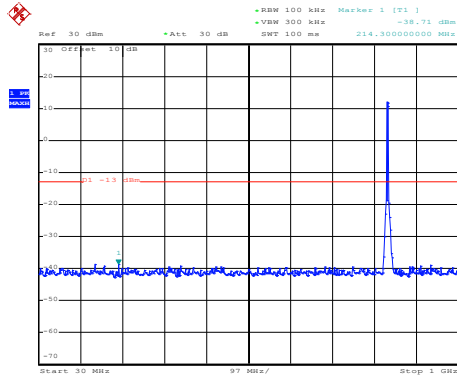
30MHz~1GHz



Date: 9.OCT.2019 19:26:54

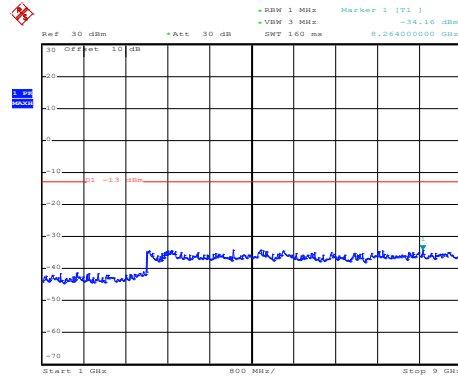
1GHz~9GHz

## Middle channel



Date: 8.OCT.2019 17:34:04

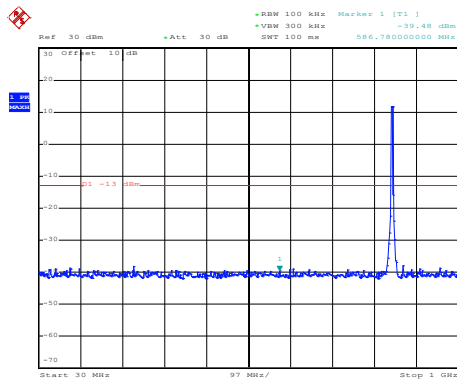
30MHz~1GHz



Date: 9.OCT.2019 19:27:09

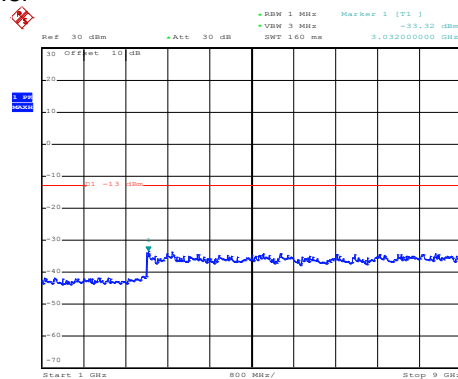
1GHz~9GHz

## High channel



Date: 8.OCT.2019 17:35:18

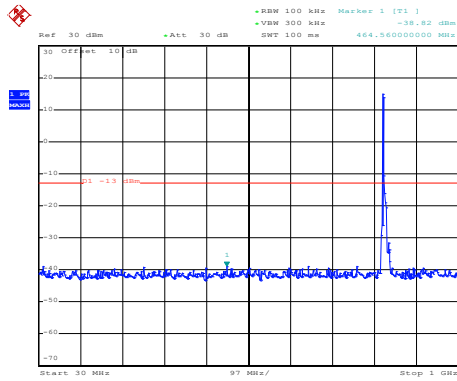
30MHz~1GHz



Date: 9.OCT.2019 19:27:49

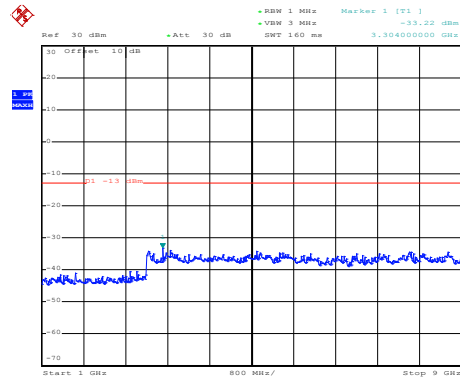
1GHz~9GHz

## LTE Band 5: 16 QAM & RB Size 1 BW: 10MHz Lowest channel



Date: 8.OCT.2019 17:36:09

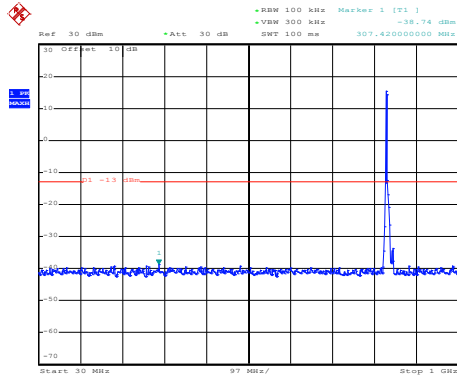
30MHz~1GHz



Date: 9.OCT.2019 19:28:22

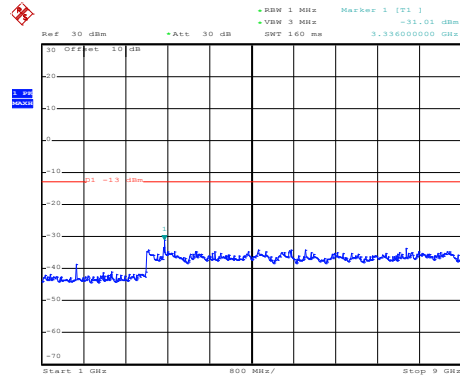
1GHz~9GHz

## Middle channel



Date: 8.OCT.2019 17:37:17

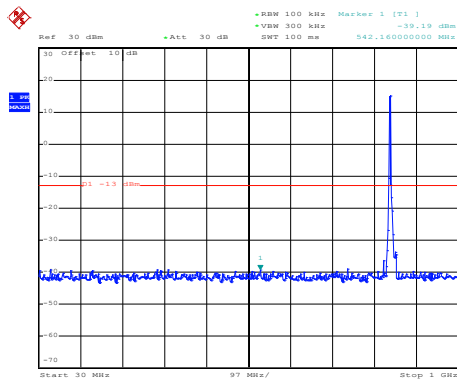
30MHz~1GHz



Date: 9.OCT.2019 19:29:11

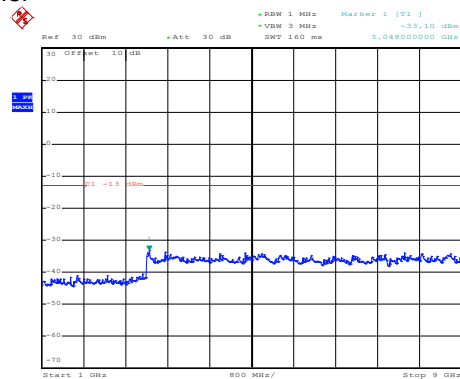
1GHz~9GHz

## High channel



Date: 8.OCT.2019 17:37:41

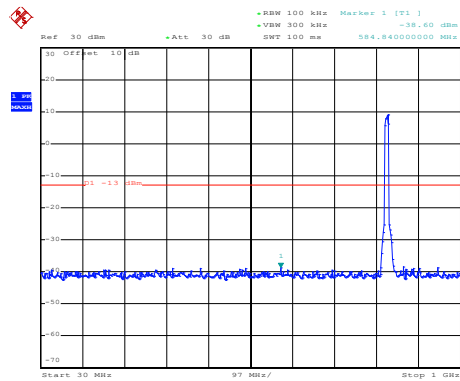
30MHz~1GHz



Date: 9.OCT.2019 19:29:31

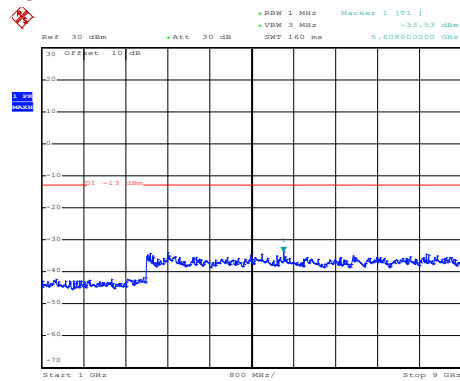
1GHz~9GHz

LTE Band 5: 16 QAM & RB Size 50  
BW: 10MHz  
Lowest channel



Date: 8.OCT.2019 17:36:33

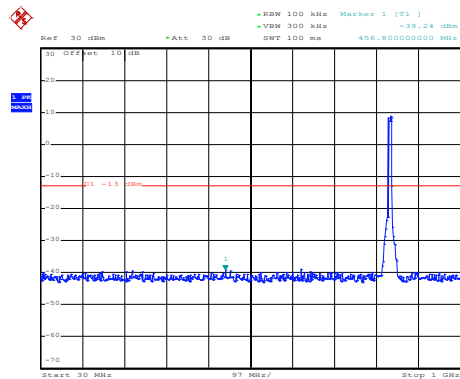
30MHz~1GHz



Date: 9.OCT.2019 19:28:34

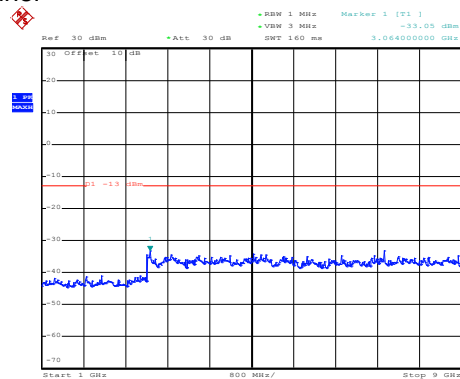
1GHz~9GHz

Middle channel



Date: 8.OCT.2019 17:36:53

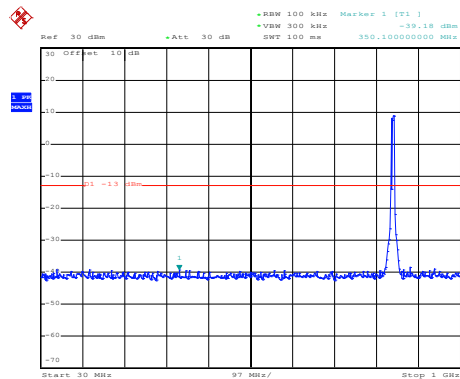
30MHz~1GHz



Date: 9.OCT.2019 19:28:58

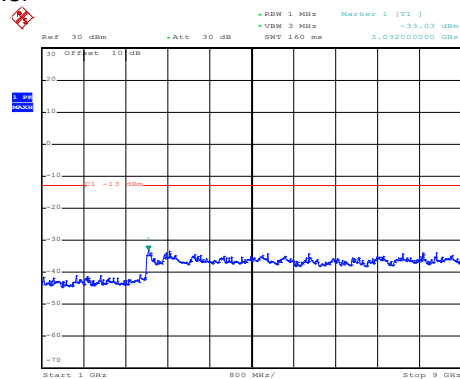
1GHz~9GHz

High channel



Date: 8.OCT.2019 17:38:07

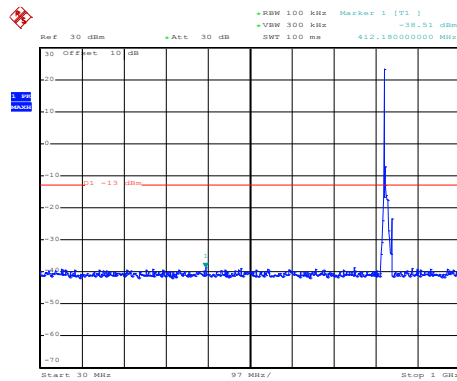
30MHz~1GHz



Date: 9.OCT.2019 19:29:52

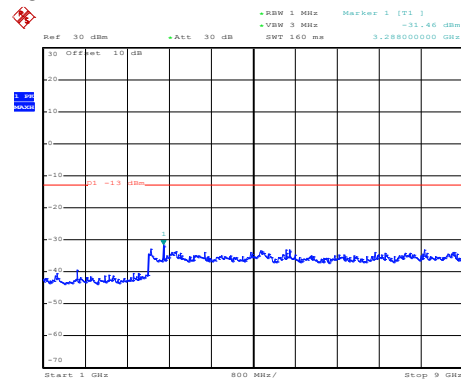
1GHz~9GHz

## LTE Band 5: QPSK & RB Size 1 BW: 10MHz Lowest channel



Date: 8.OCT.2019 17:36:01

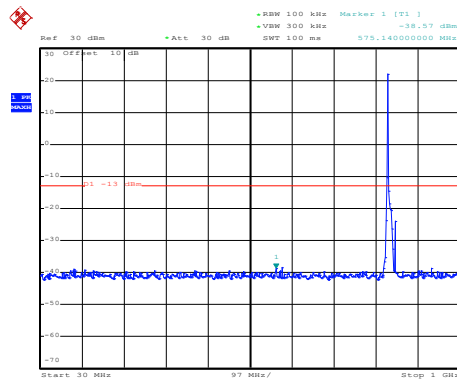
30MHz~1GHz



Date: 9.OCT.2019 19:28:18

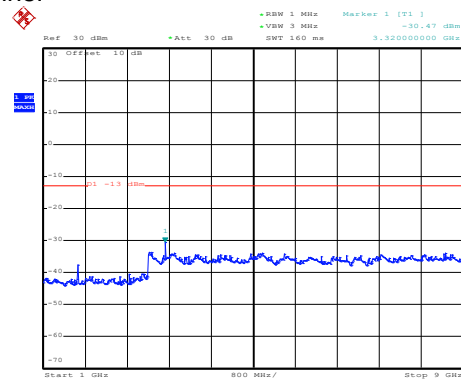
1GHz~9GHz

## Middle channel



Date: 8.OCT.2019 17:37:05

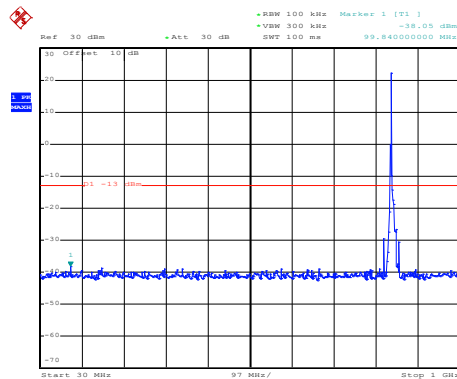
30MHz~1GHz



Date: 9.OCT.2019 19:29:06

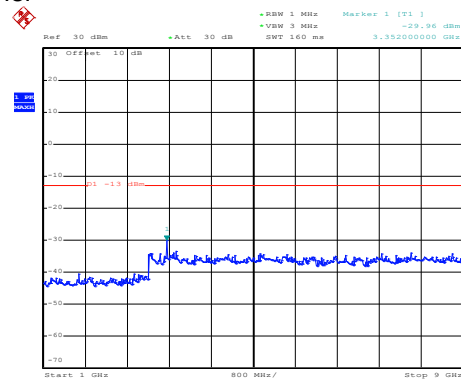
1GHz~9GHz

## High channel



Date: 8.OCT.2019 17:37:33

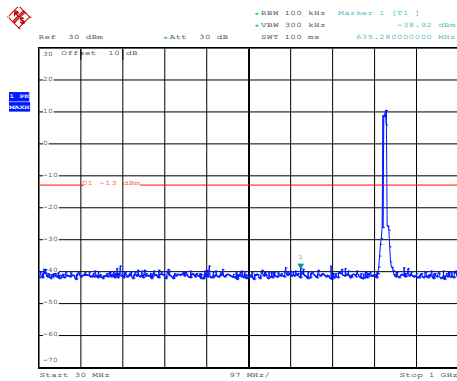
30MHz~1GHz



Date: 9.OCT.2019 19:29:37

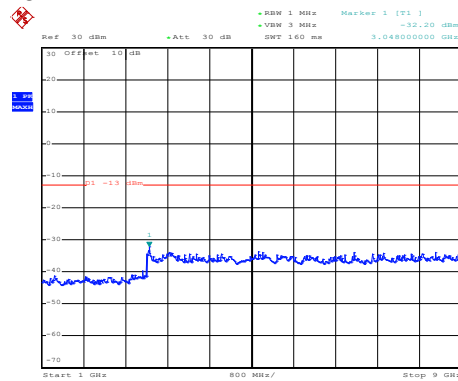
1GHz~9GHz

## LTE Band 5: QPSK & RB Size 50 BW: 10MHz Lowest channel



Date: 8.OCT.2019 17:36:21

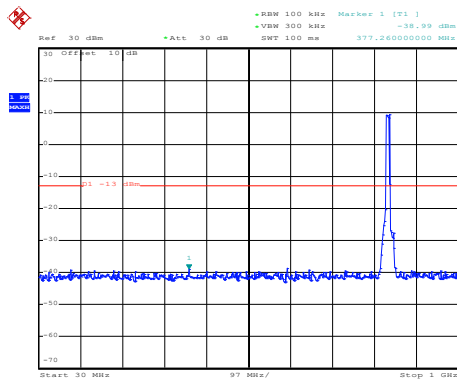
30MHz~1GHz



Date: 9.OCT.2019 19:28:30

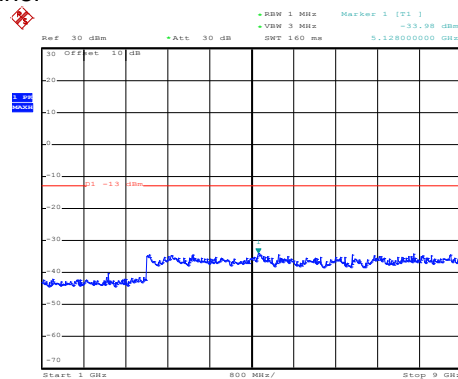
1GHz~9GHz

## Middle channel



Date: 8.OCT.2019 17:36:46

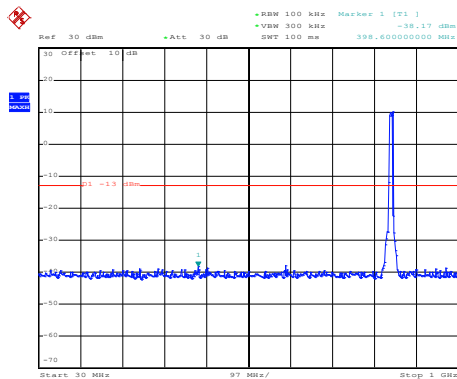
30MHz~1GHz



Date: 9.OCT.2019 19:28:53

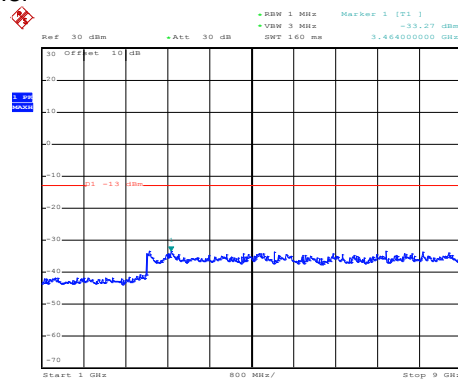
1GHz~9GHz

## High channel



Date: 8.OCT.2019 17:37:55

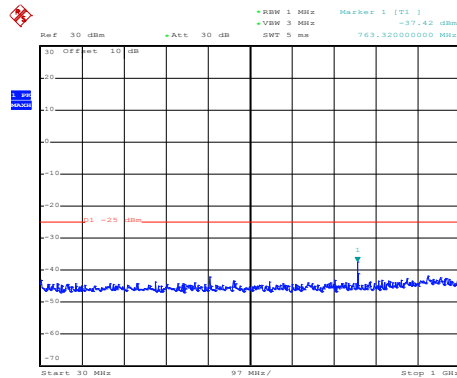
30MHz~1GHz



Date: 9.OCT.2019 19:29:47

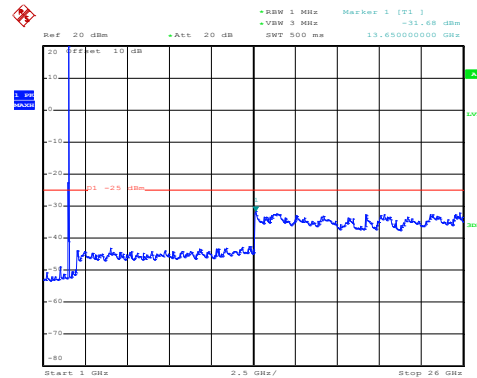
1GHz~9GHz

## LTE Band 7 part:

LTE Band 7: 16 QAM & RB Size 1  
BW: 5MHz  
Lowest channel

Date: 8.OCT.2019 17:25:29

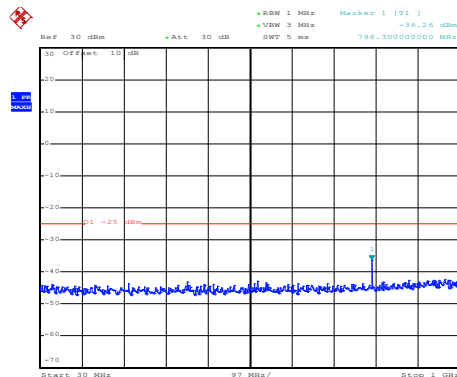
30MHz~1GHz



Date: 9.OCT.2019 19:31:15

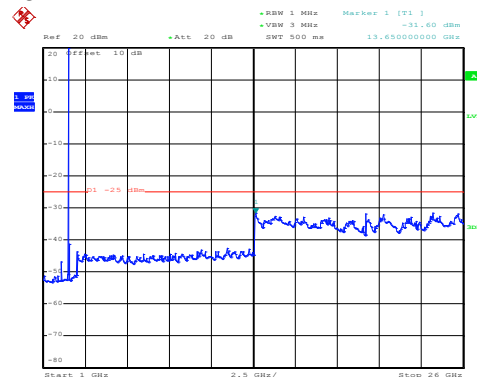
1GHz~25GHz

## Middle channel



Date: 8.OCT.2019 17:26:06

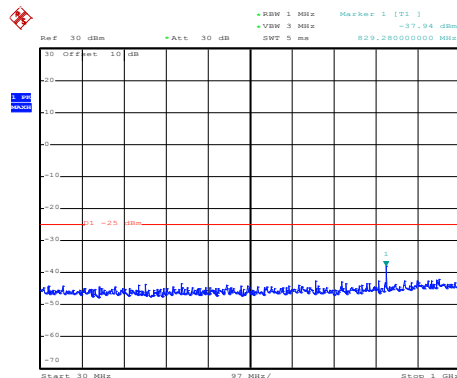
30MHz~1GHz



Date: 9.OCT.2019 19:33:39

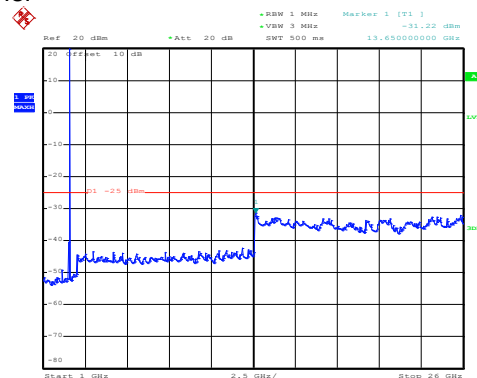
1GHz~25GHz

## High channel



Date: 8.OCT.2019 17:26:21

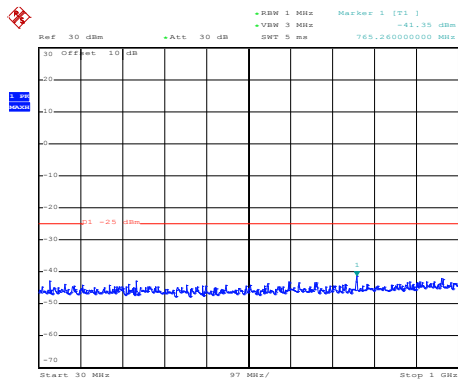
30MHz~1GHz



Date: 9.OCT.2019 19:33:59

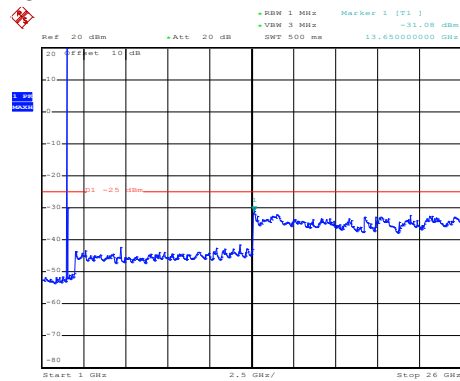
1GHz~25GHz

LTE Band 7: 16 QAM & RB Size 25  
BW: 5MHz  
Lowest channel



Date: 8.OCT.2019 17:25:42

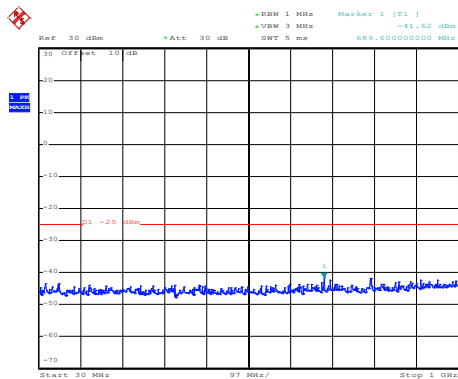
30MHz~1GHz



Date: 9.OCT.2019 19:32:51

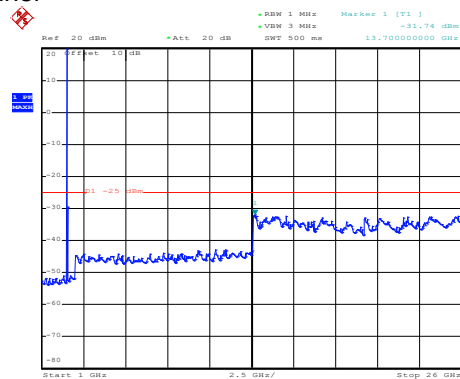
1GHz~25GHz

Middle channel



Date: 8.OCT.2019 17:25:55

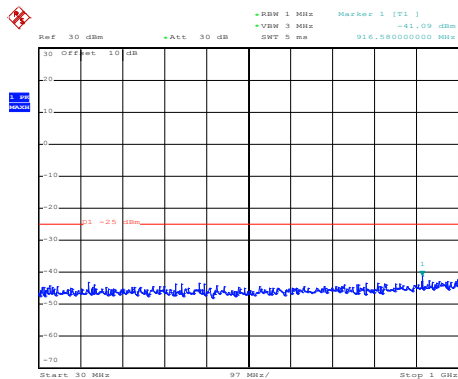
30MHz~1GHz



Date: 9.OCT.2019 19:33:20

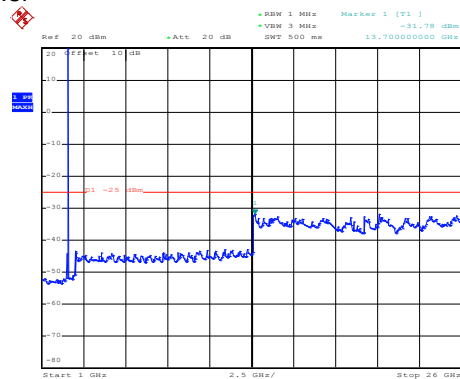
1GHz~25GHz

High channel



Date: 8.OCT.2019 17:26:34

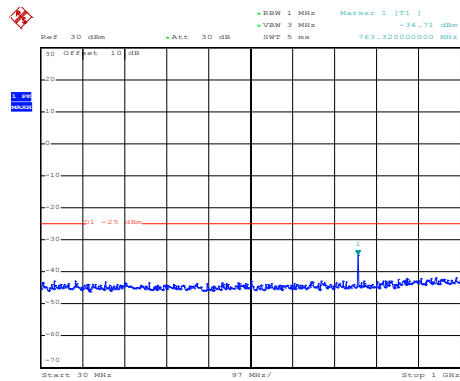
30MHz~1GHz



Date: 9.OCT.2019 19:34:17

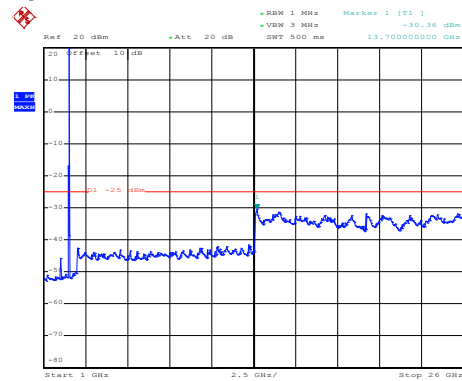
1GHz~25GHz

## LTE Band 7: QPSK & RB Size 1 BW: 5MHz Lowest channel



Date: 8.OCT.2019 17:25:24

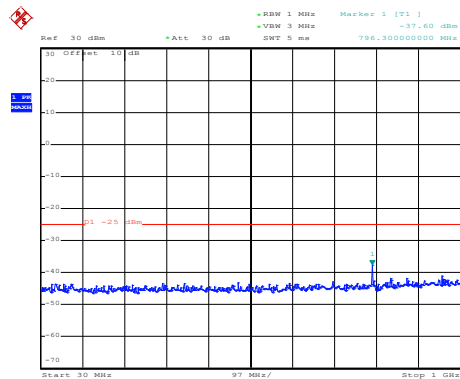
30MHz~1GHz



Date: 9.OCT.2019 19:31:05

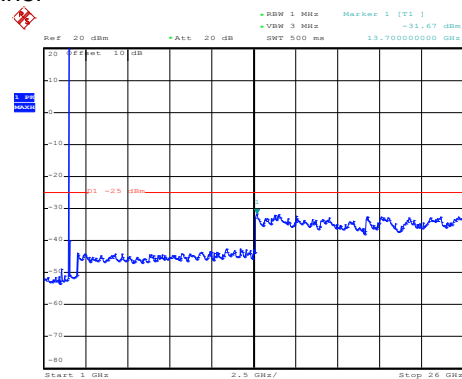
1GHz~25GHz

## Middle channel



Date: 8.OCT.2019 17:26:02

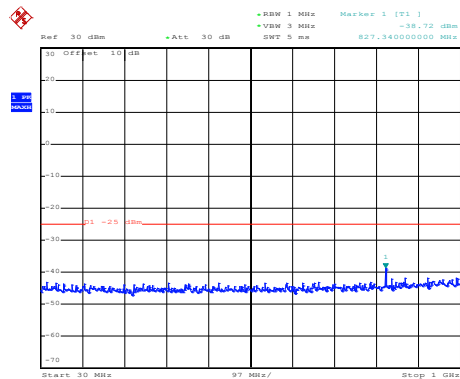
30MHz~1GHz



Date: 9.OCT.2019 19:33:31

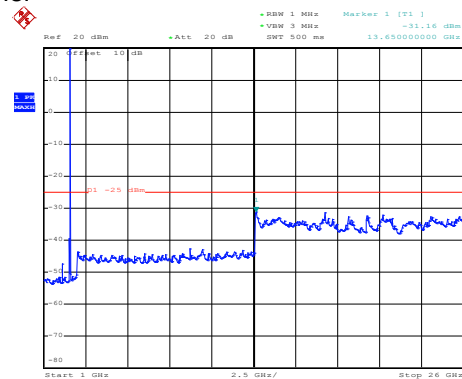
1GHz~25GHz

## High channel



Date: 8.OCT.2019 17:26:17

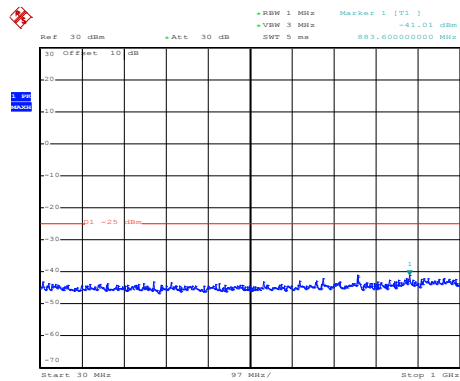
30MHz~1GHz



Date: 9.OCT.2019 19:33:51

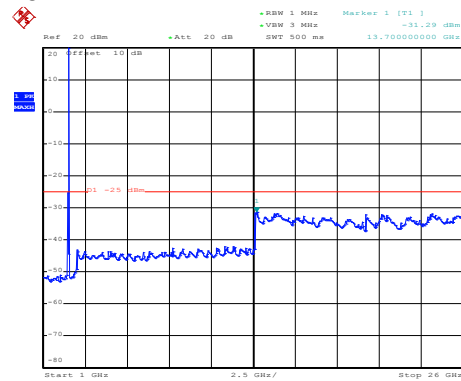
1GHz~25GHz

LTE Band 7: QPSK & RB Size 25  
BW: 5MHz  
Lowest channel



Date: 8.OCT.2019 17:25:37

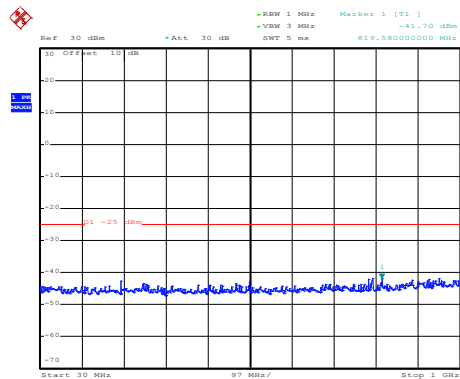
30MHz~1GHz



Date: 9.OCT.2019 19:31:44

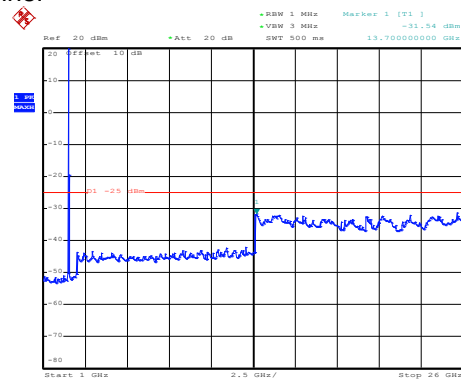
1GHz~25GHz

Middle channel



Date: 8.OCT.2019 17:25:50

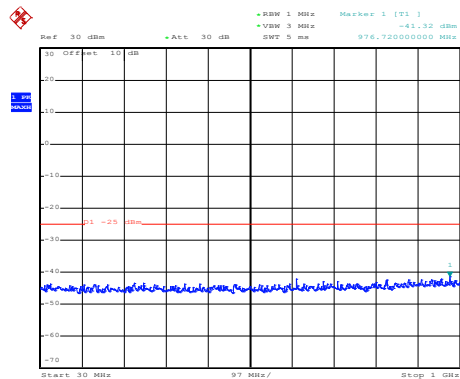
30MHz~1GHz



Date: 9.OCT.2019 19:33:12

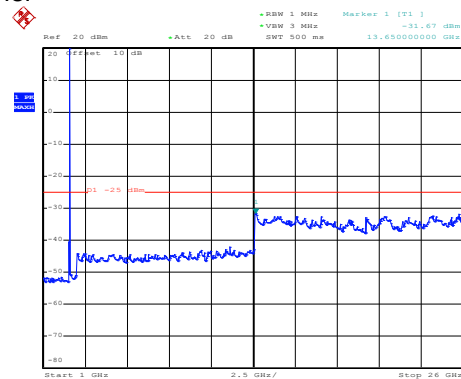
1GHz~25GHz

High channel



Date: 8.OCT.2019 17:26:29

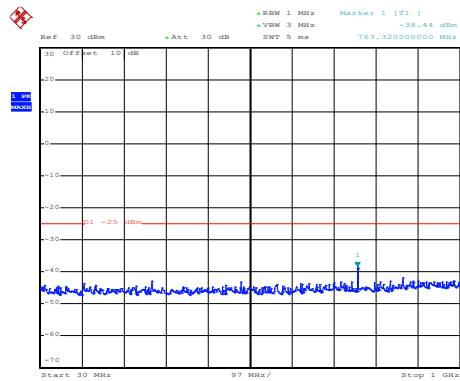
30MHz~1GHz



Date: 9.OCT.2019 19:34:09

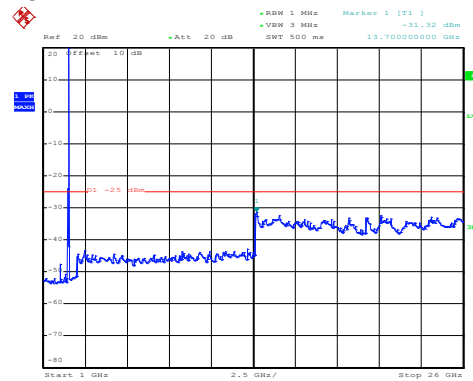
1GHz~25GHz

LTE Band 7: 16 QAM & RB Size 1  
BW: 10MHz  
Lowest channel



Date: 8.OCT.2019 17:23:51

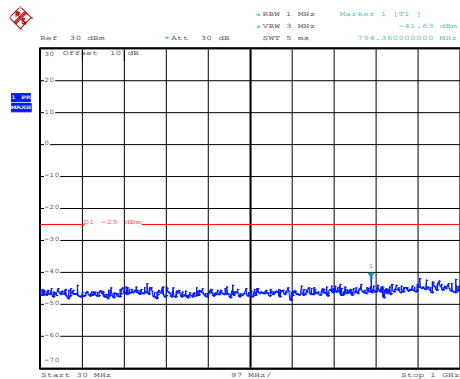
30MHz~1GHz



Date: 9.OCT.2019 19:34:53

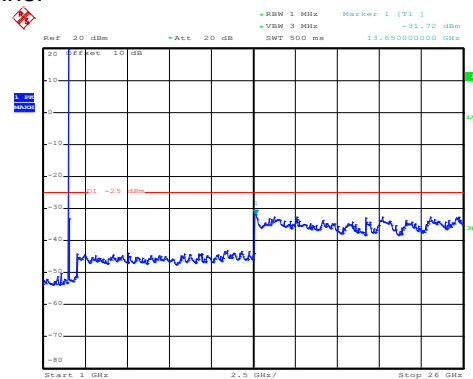
1GHz~25GHz

Middle channel



Date: 8.OCT.2019 17:24:28

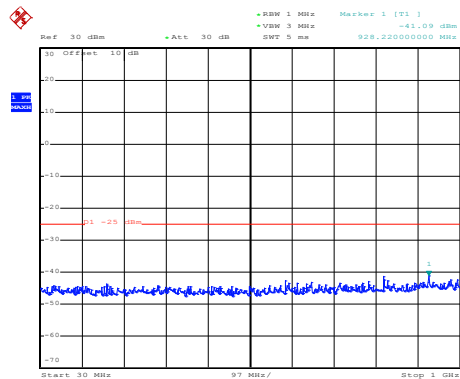
30MHz~1GHz



Date: 9.OCT.2019 19:35:50

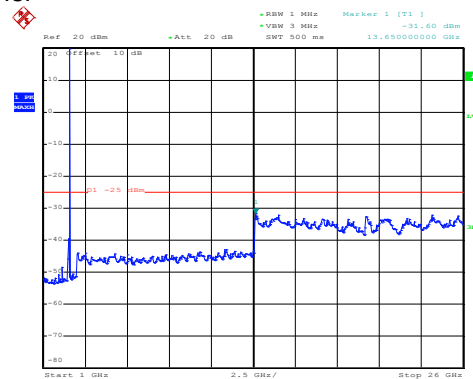
1GHz~25GHz

High channel



Date: 8.OCT.2019 17:24:45

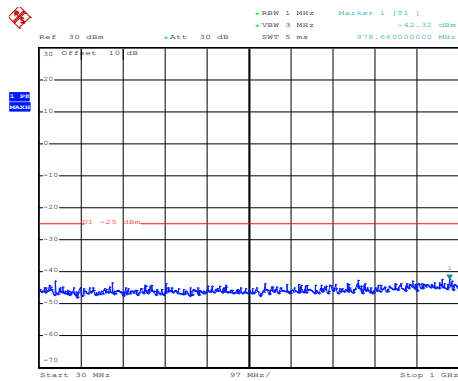
30MHz~1GHz



Date: 9.OCT.2019 19:36:13

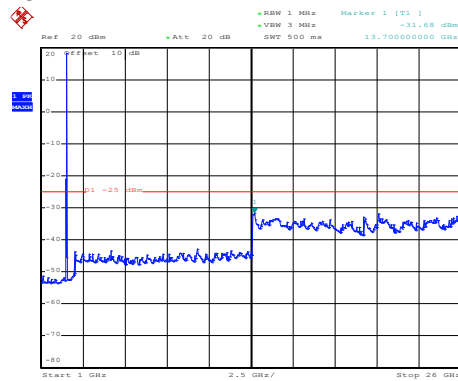
1GHz~25GHz

LTE Band 7: 16 QAM & RB Size 50  
BW: 10MHz  
Lowest channel



Date: 8.OCT.2019 17:24:03

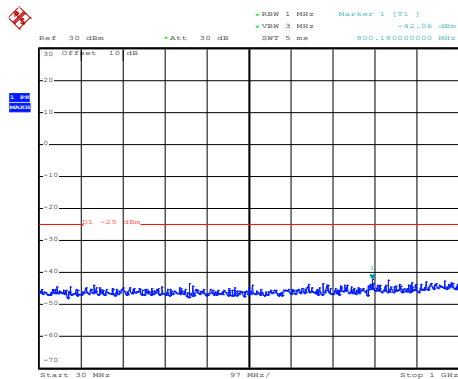
30MHz~1GHz



Date: 9.OCT.2019 19:35:09

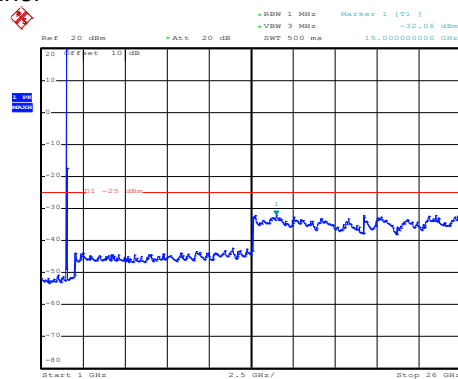
1GHz~25GHz

Middle channel



Date: 8.OCT.2019 17:24:17

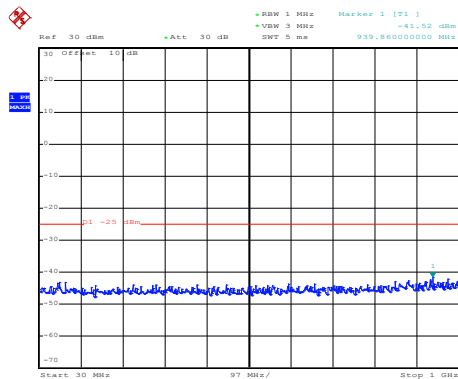
30MHz~1GHz



Date: 9.OCT.2019 19:35:34

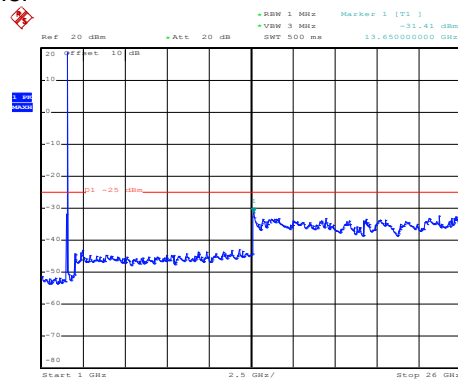
1GHz~25GHz

High channel



Date: 8.OCT.2019 17:24:57

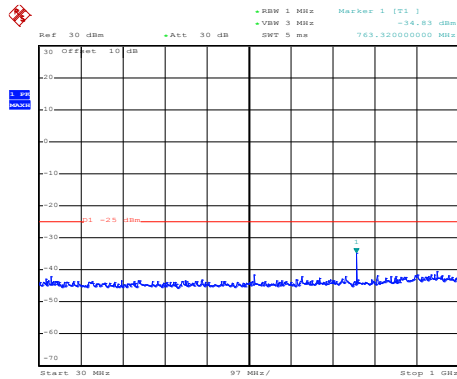
30MHz~1GHz



Date: 9.OCT.2019 19:36:32

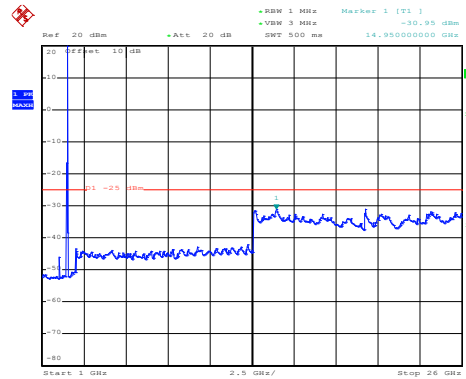
1GHz~25GHz

LTE Band 7: QPSK & RB Size 1  
BW: 10MHz  
Lowest channel



Date: 8.OCT.2019 17:23:46

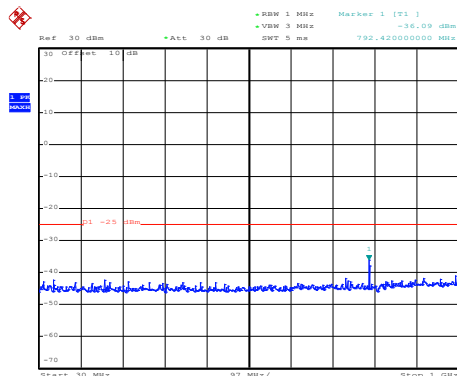
30MHz~1GHz



Date: 9.OCT.2019 19:34:46

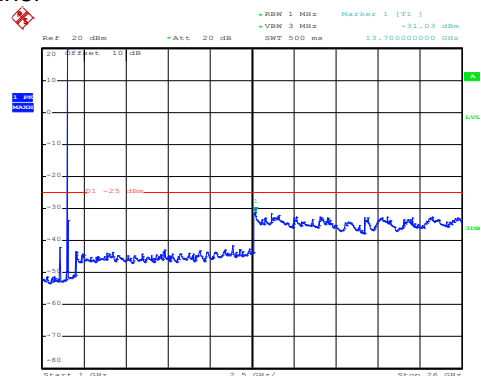
1GHz~25GHz

Middle channel



Date: 8.OCT.2019 17:24:24

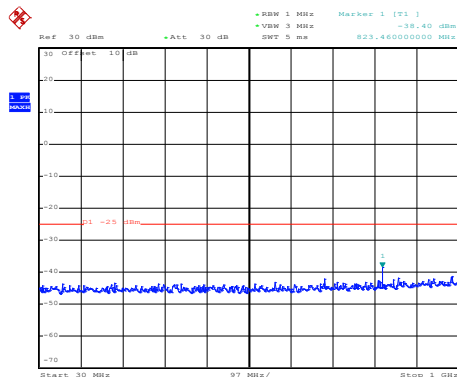
30MHz~1GHz



Date: 9.OCT.2019 19:35:45

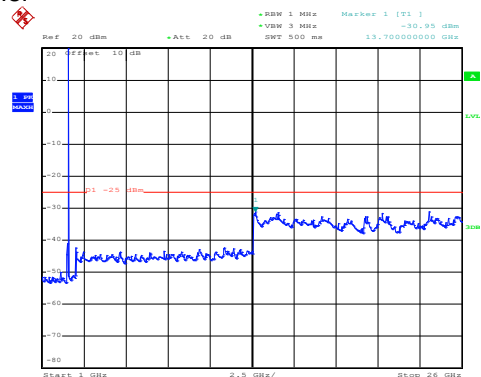
1GHz~25GHz

High channel



Date: 8.OCT.2019 17:24:41

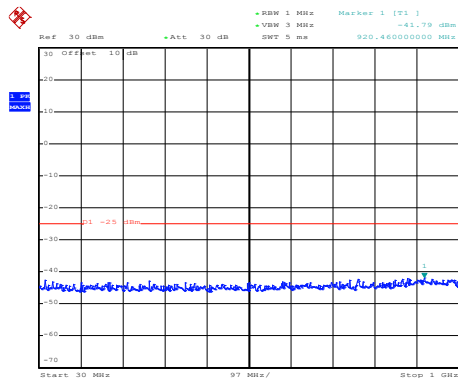
30MHz~1GHz



Date: 9.OCT.2019 19:36:05

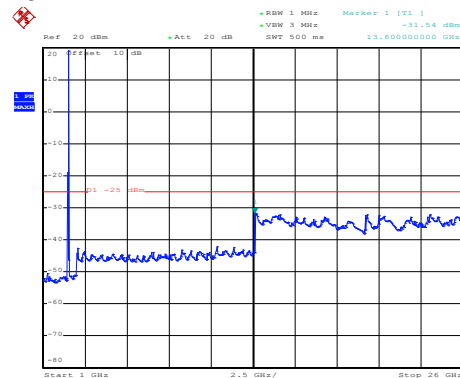
1GHz~25GHz

LTE Band 7: QPSK & RB Size 50  
BW: 10MHz  
Lowest channel



Date: 8.OCT.2019 17:23:59

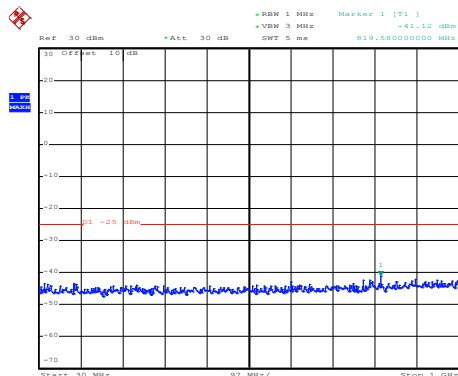
30MHz~1GHz



Date: 9.OCT.2019 19:35:03

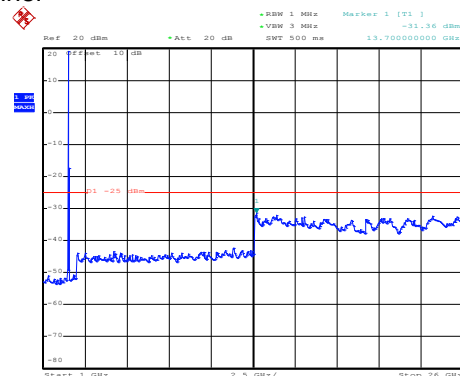
1GHz~25GHz

Middle channel



Date: 8.OCT.2019 17:24:12

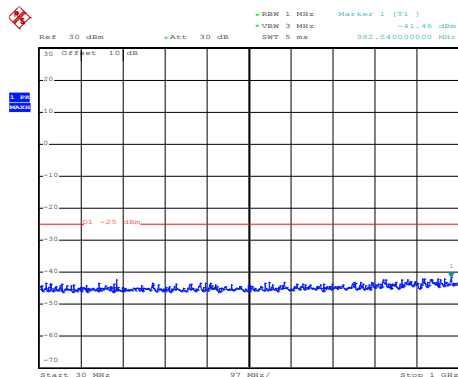
30MHz~1GHz



Date: 9.OCT.2019 19:35:22

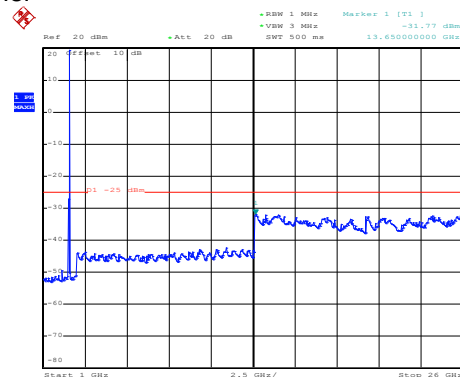
1GHz~25GHz

High channel



Date: 8.OCT.2019 17:24:53

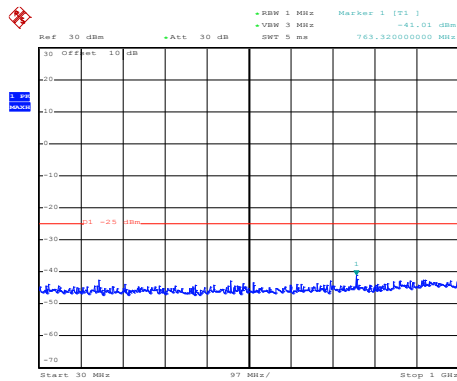
30MHz~1GHz



Date: 9.OCT.2019 19:36:26

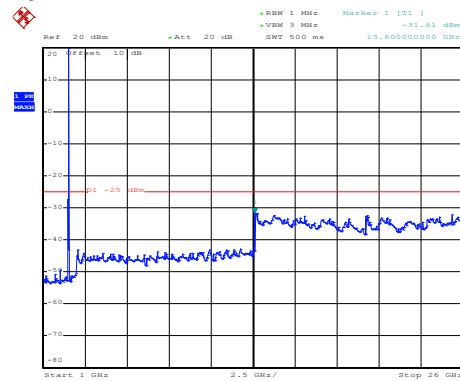
1GHz~25GHz

LTE Band 7: 16 QAM & RB Size 1  
BW: 15MHz  
Lowest channel



Date: 8.OCT.2019 17:21:53

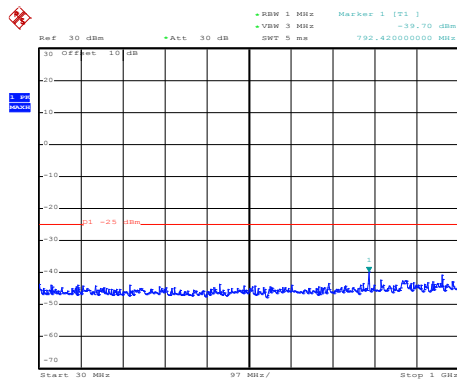
30MHz~1GHz



Date: 9.OCT.2019 19:37:35

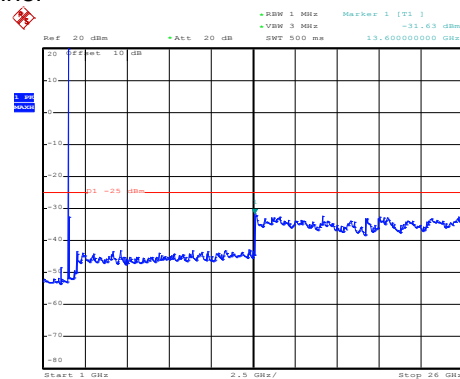
1GHz~25GHz

Middle channel



Date: 8.OCT.2019 17:22:32

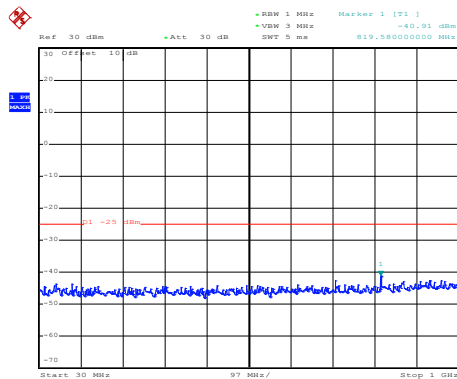
30MHz~1GHz



Date: 9.OCT.2019 19:38:37

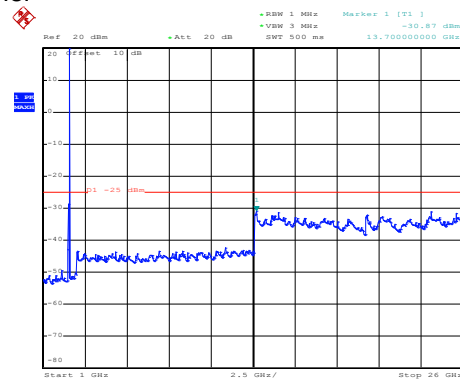
1GHz~25GHz

High channel



Date: 8.OCT.2019 17:22:50

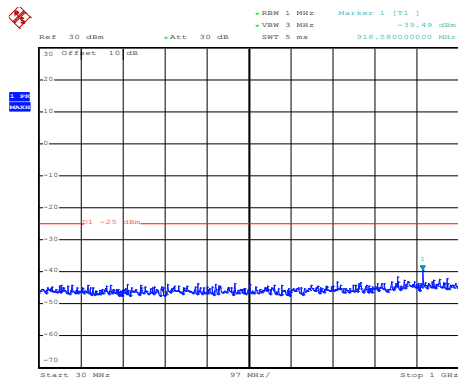
30MHz~1GHz



Date: 9.OCT.2019 19:39:04

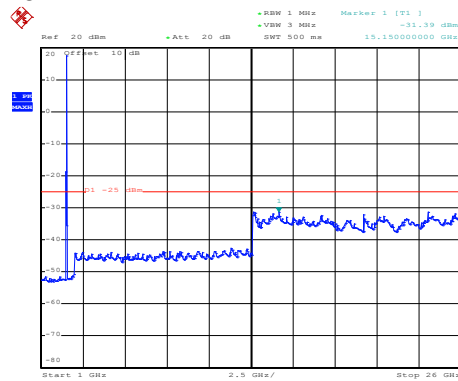
1GHz~25GHz

LTE Band 7: 16 QAM & RB Size 75  
BW: 15MHz  
Lowest channel



Date: 8.OCT.2019 17:22:05

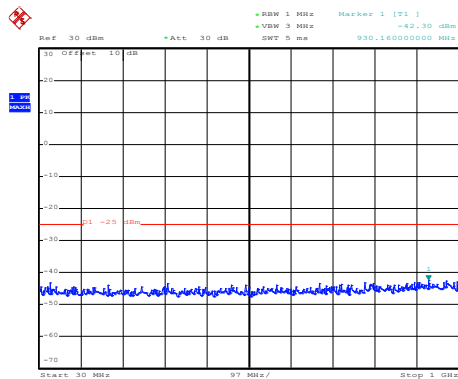
30MHz~1GHz



Date: 9.OCT.2019 19:37:56

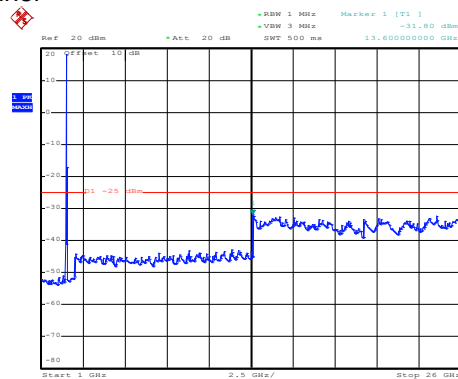
1GHz~25GHz

Middle channel



Date: 8.OCT.2019 17:22:18

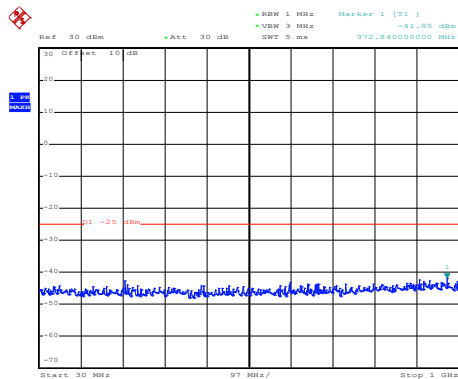
30MHz~1GHz



Date: 9.OCT.2019 19:38:21

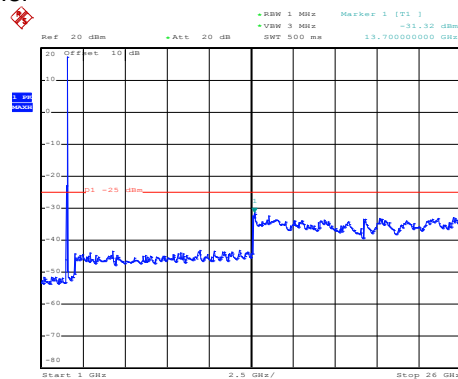
1GHz~25GHz

High channel



Date: 8.OCT.2019 17:23:02

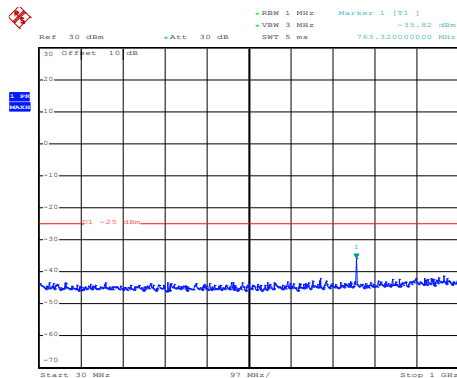
30MHz~1GHz



Date: 9.OCT.2019 19:39:21

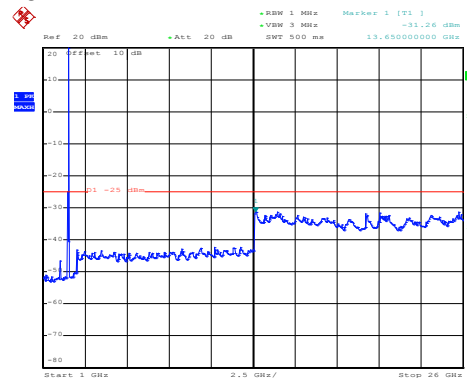
1GHz~25GHz

LTE Band 7: QPSK & RB Size 1  
BW: 15MHz  
Lowest channel



Date: 8.OCT.2019 17:21:48

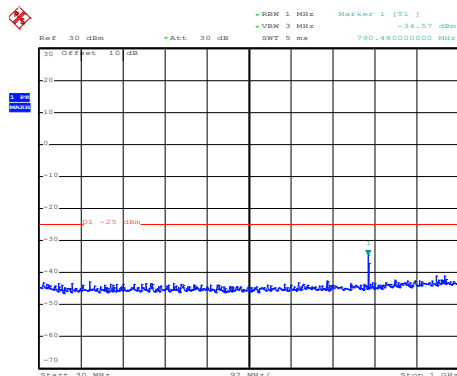
30MHz~1GHz



Date: 9.OCT.2019 19:37:27

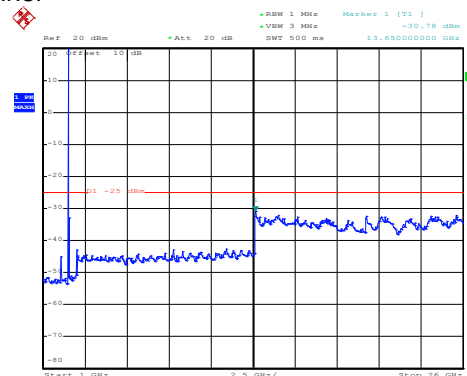
1GHz~25GHz

Middle channel



Date: 8.OCT.2019 17:22:28

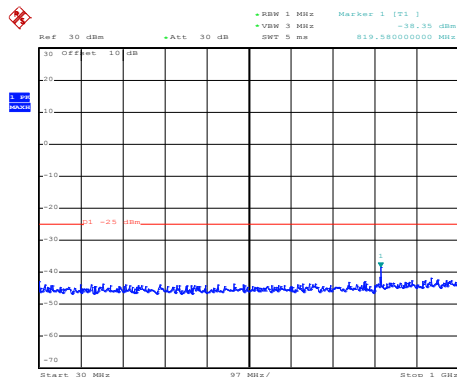
30MHz~1GHz



Date: 9.OCT.2019 19:38:30

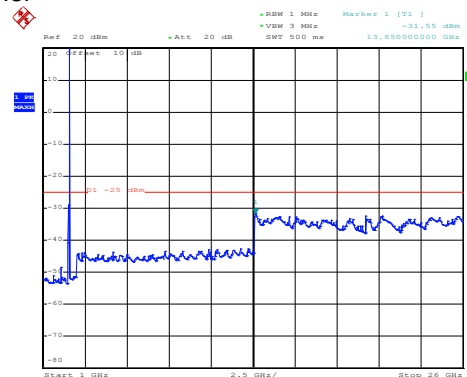
1GHz~25GHz

High channel



Date: 8.OCT.2019 17:22:46

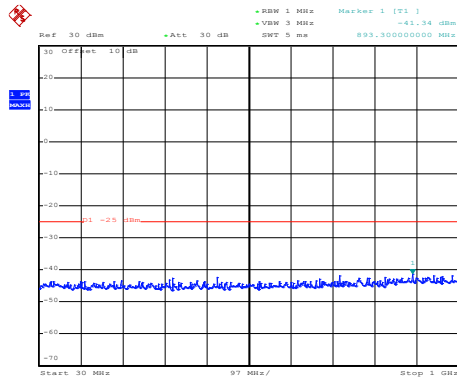
30MHz~1GHz



Date: 9.OCT.2019 19:38:53

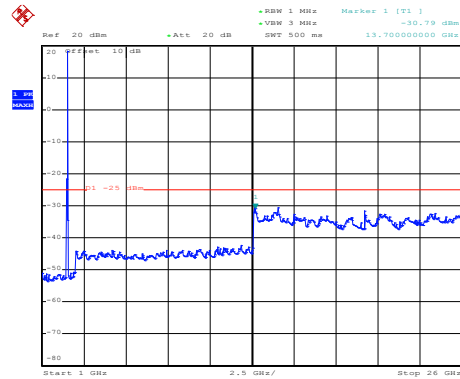
1GHz~25GHz

## LTE Band 7: QPSK & RB Size 75 BW: 15MHz Lowest channel



Date: 8.OCT.2019 17:22:00

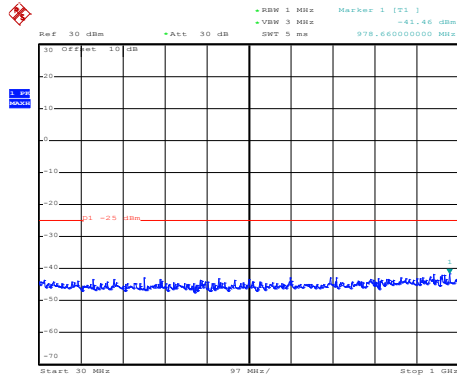
30MHz~1GHz



Date: 9.OCT.2019 19:37:45

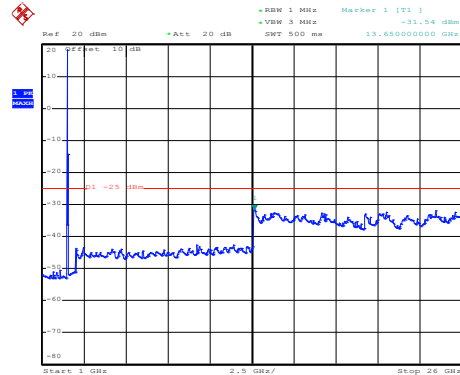
1GHz~25GHz

## Middle channel



Date: 8.OCT.2019 17:22:14

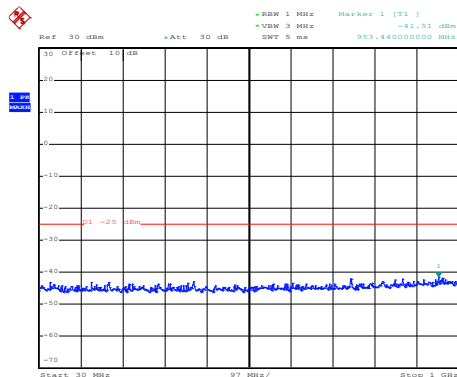
30MHz~1GHz



Date: 9.OCT.2019 19:38:15

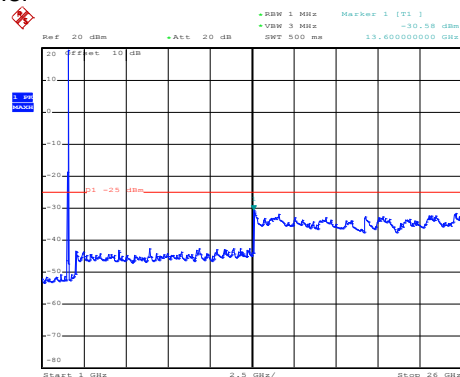
1GHz~25GHz

## High channel



Date: 8.OCT.2019 17:22:58

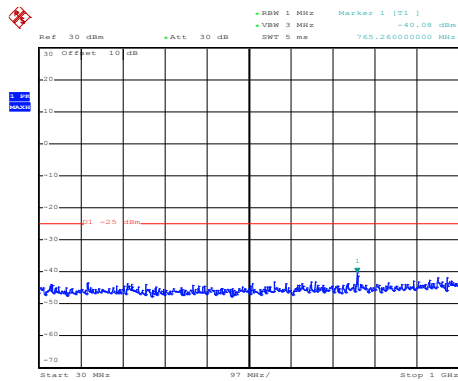
30MHz~1GHz



Date: 9.OCT.2019 19:39:15

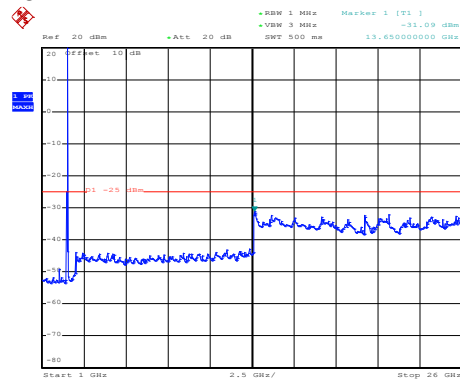
1GHz~25GHz

LTE Band 7: 16 QAM & RB Size 1  
BW: 20MHz  
Lowest channel



Date: 8.OCT.2019 17:21:07

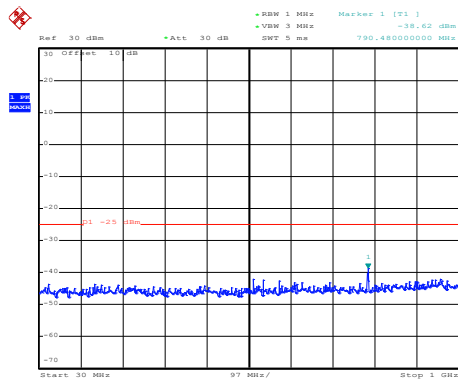
30MHz~1GHz



Date: 9.OCT.2019 19:39:54

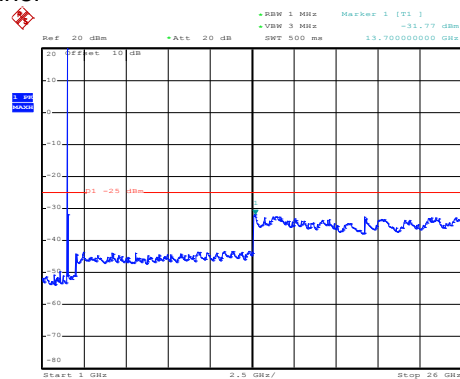
1GHz~25GHz

Middle channel



Date: 8.OCT.2019 17:20:46

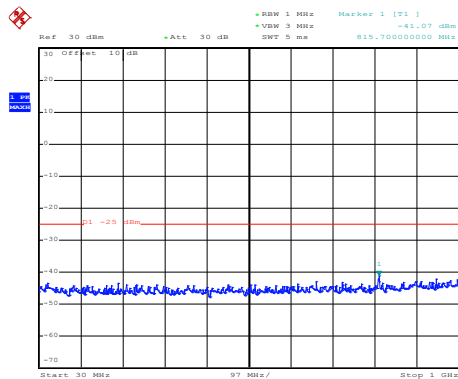
30MHz~1GHz



Date: 9.OCT.2019 19:41:03

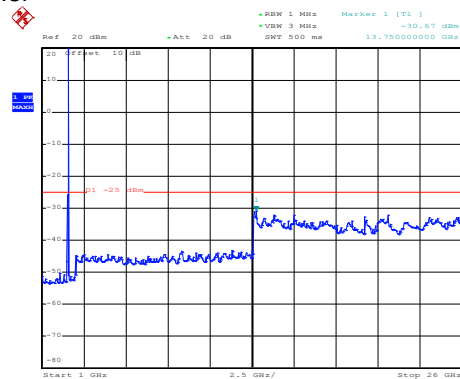
1GHz~25GHz

High channel



Date: 8.OCT.2019 17:19:57

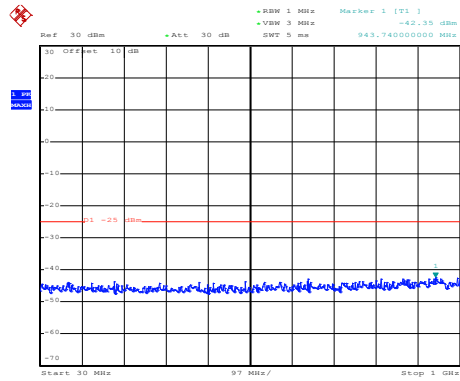
30MHz~1GHz



Date: 9.OCT.2019 19:41:29

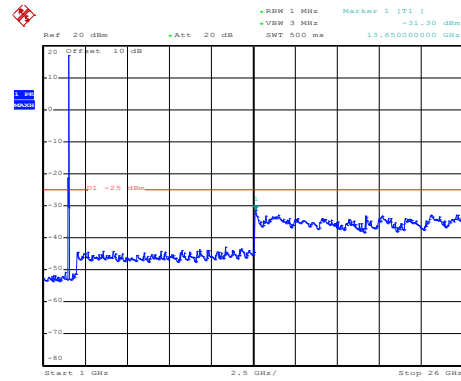
1GHz~25GHz

## LTE Band 7: 16 QAM & RB Size 100 BW: 20MHz Lowest channel



Date: 8.OCT.2019 17:21:20

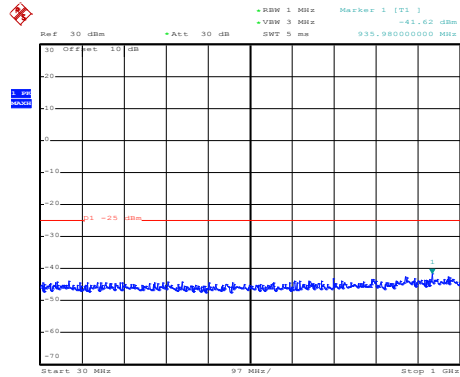
30MHz~1GHz



Date: 9.OCT.2019 19:40:11

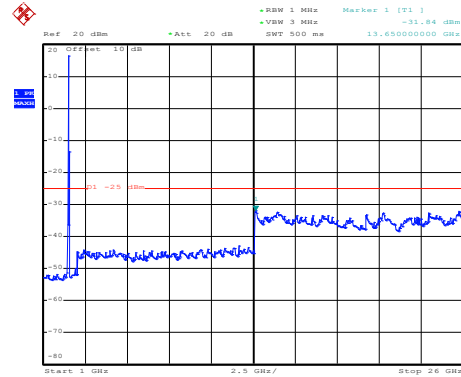
1GHz~25GHz

## Middle channel



Date: 8.OCT.2019 17:20:35

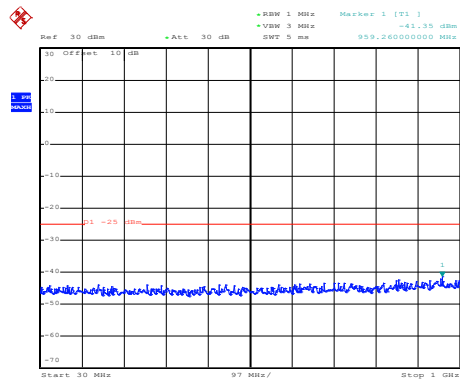
30MHz~1GHz



Date: 9.OCT.2019 19:40:36

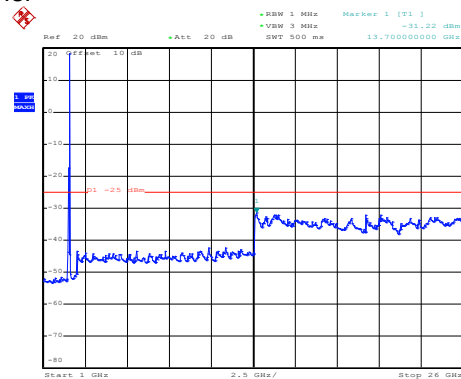
1GHz~25GHz

## High channel



Date: 8.OCT.2019 17:20:13

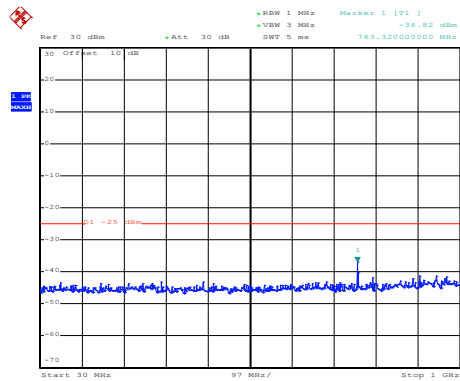
30MHz~1GHz



Date: 9.OCT.2019 19:41:58

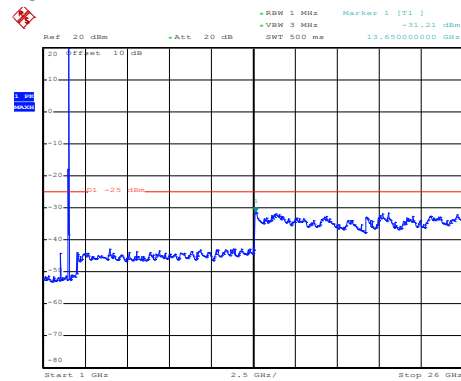
1GHz~25GHz

LTE Band 7: QPSK & RB Size 1  
BW: 20MHz  
Lowest channel



Date: 8.OCT.2019 17:21:03

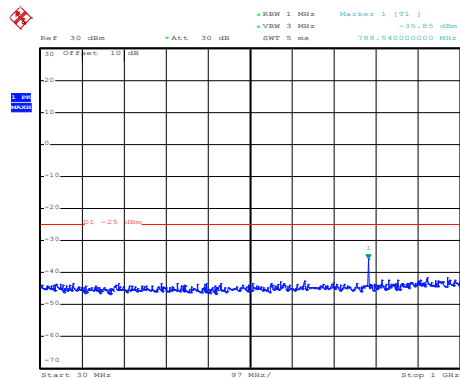
30MHz~1GHz



Date: 9.OCT.2019 19:39:48

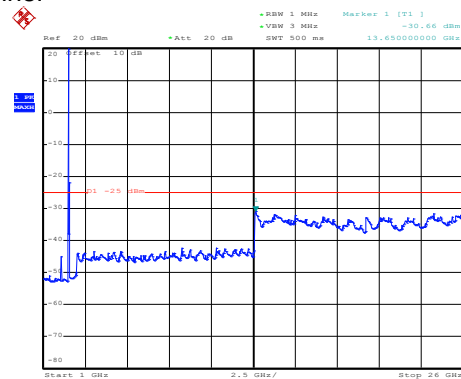
1GHz~25GHz

Middle channel



Date: 8.OCT.2019 17:20:42

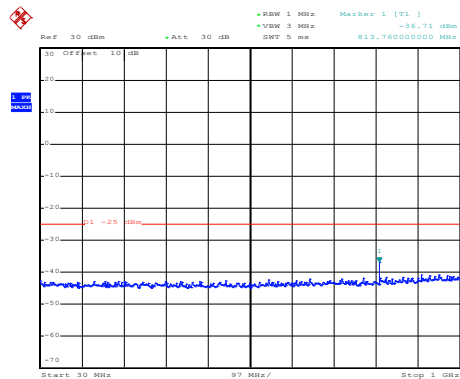
30MHz~1GHz



Date: 9.OCT.2019 19:40:56

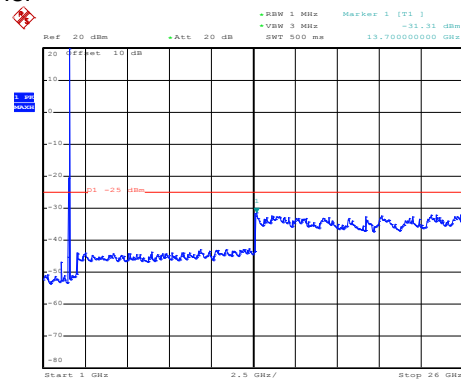
1GHz~25GHz

High channel



Date: 8.OCT.2019 17:19:50

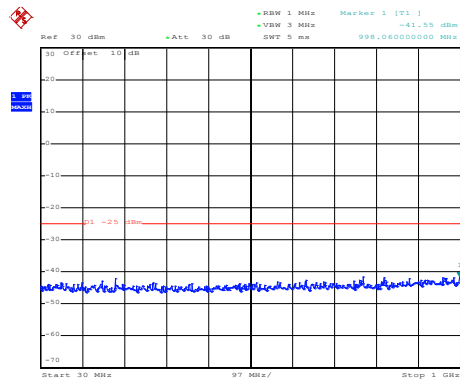
30MHz~1GHz



Date: 9.OCT.2019 19:41:23

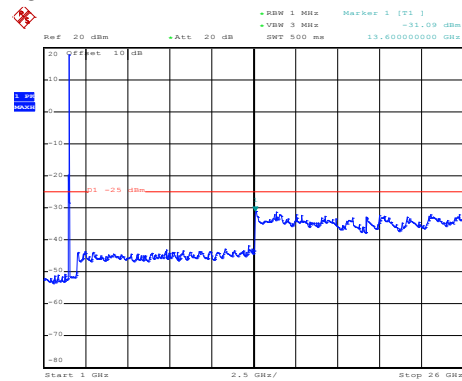
1GHz~25GHz

LTE Band 7: QPSK & RB Size 100  
BW: 20MHz  
Lowest channel



Date: 8.OCT.2019 17:21:15

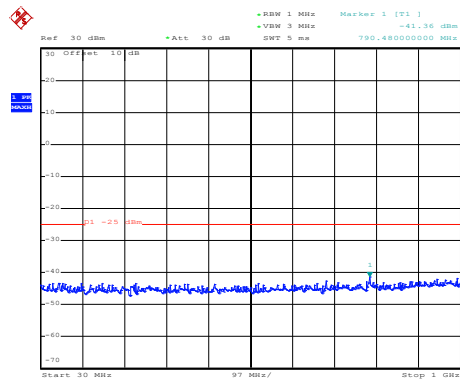
30MHz~1GHz



Date: 9.OCT.2019 19:40:05

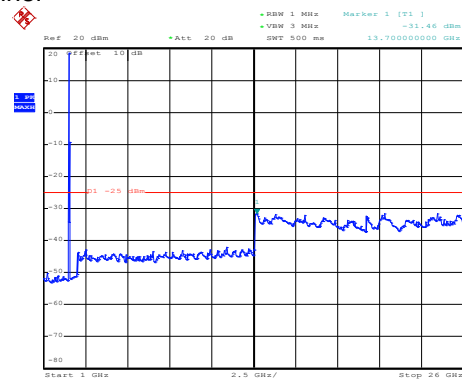
1GHz~25GHz

Middle channel



Date: 8.OCT.2019 17:20:31

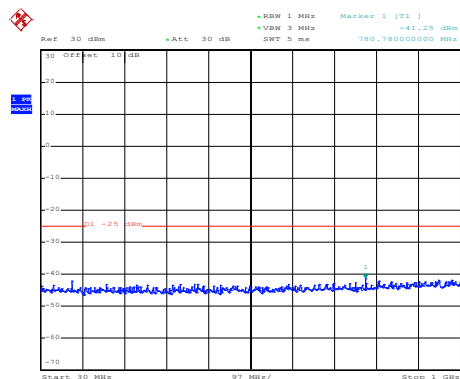
30MHz~1GHz



Date: 9.OCT.2019 19:40:31

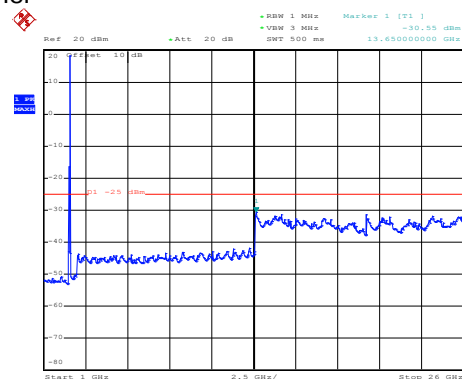
1GHz~25GHz

High channel



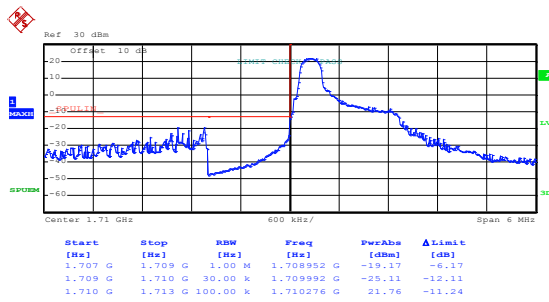
Date: 8.OCT.2019 17:20:09

30MHz~1GHz



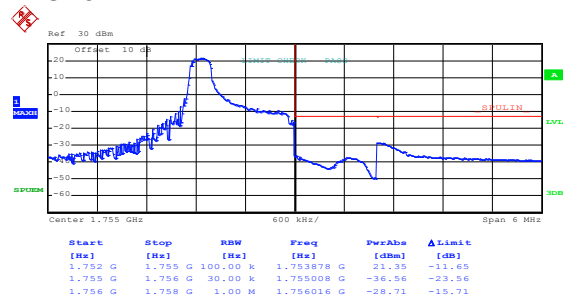
Date: 9.OCT.2019 19:41:49

1GHz~25GHz

**Band edge emission:****LTE Band 4 part:****LTE Band 4, BW: 1.4MHz  
16QAM & RB Size 1**

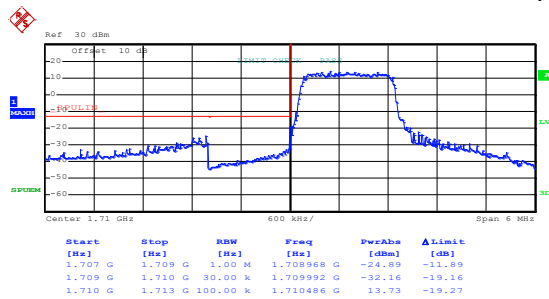
Date: 9.OCT.2019 20:03:11

Lowest channel



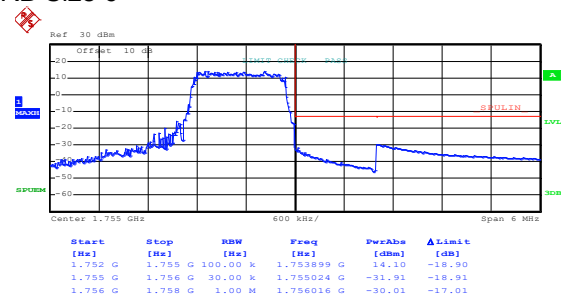
Date: 9.OCT.2019 20:04:08

Highest channel

**16QAM & RB Size 6**

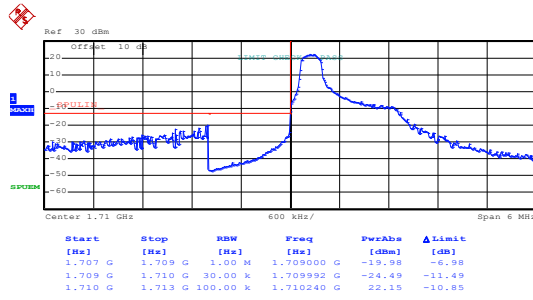
Date: 9.OCT.2019 20:03:24

Lowest channel



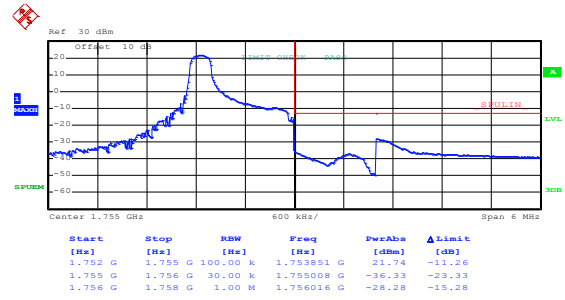
Date: 9.OCT.2019 20:03:45

Highest channel

LTE Band 4, BW: 1.4MHz  
QPSK & RB Size 1

Date: 9.OCT.2019 20:02:58

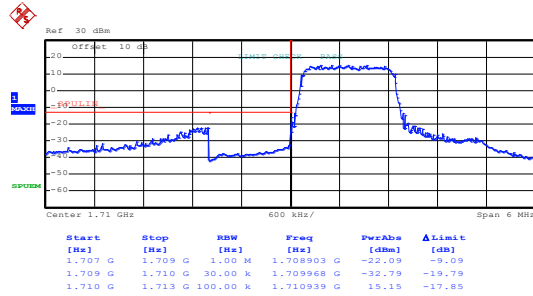
Lowest channel



Date: 9.OCT.2019 20:04:19

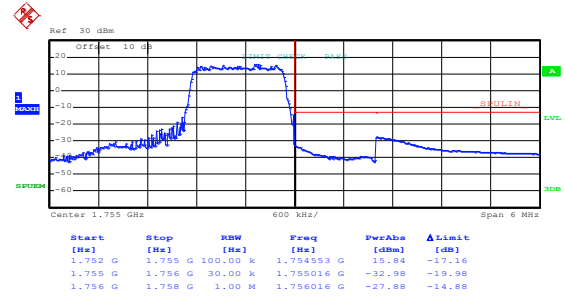
Highest channel

## QPSK &amp; RB Size 6



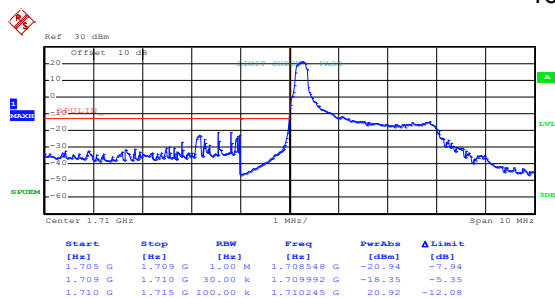
Date: 9.OCT.2019 20:03:19

Lowest channel



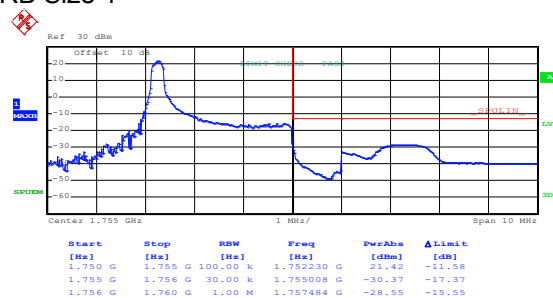
Date: 9.OCT.2019 20:03:39

Highest channel

LTE Band 4, BW: 3MHz  
16QAM & RB Size 1

Date: 9.OCT.2019 20:06:12

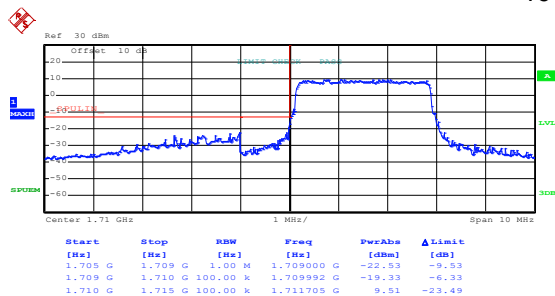
Lowest channel



Date: 9.OCT.2019 20:04:52

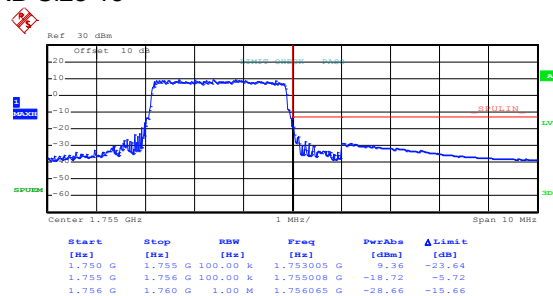
Highest channel

## 16QAM &amp; RB Size 15



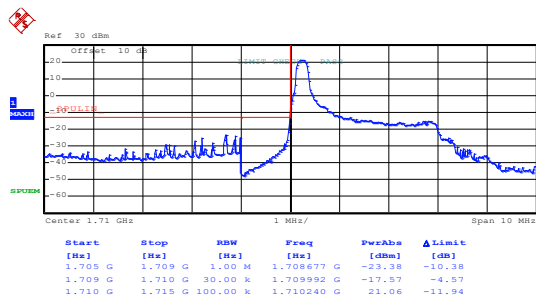
Date: 9.OCT.2019 20:05:46

Lowest channel



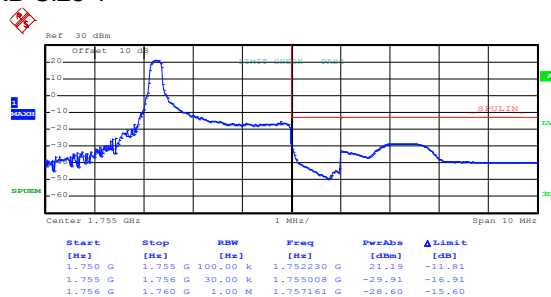
Date: 9.OCT.2019 20:05:14

Highest channel

LTE Band 4, BW: 3MHz  
QPSK & RB Size 1

Date: 9.OCT.2019 20:06:00

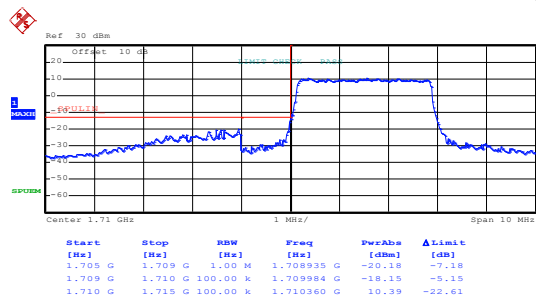
Lowest channel



Date: 9.OCT.2019 20:04:41

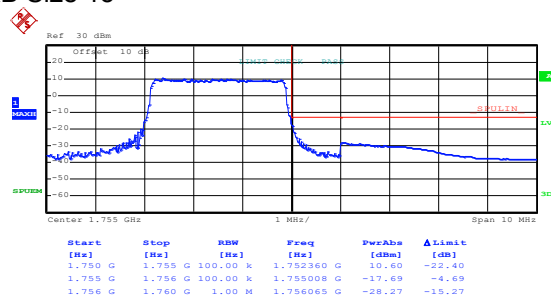
Highest channel

## QPSK &amp; RB Size 15



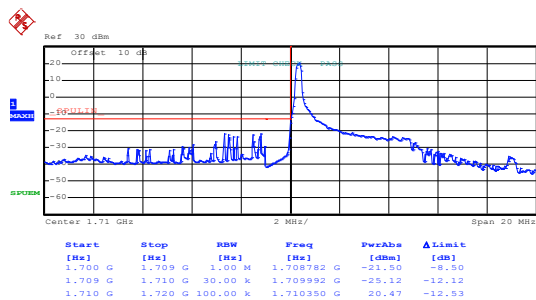
Date: 9.OCT.2019 20:05:39

Lowest channel



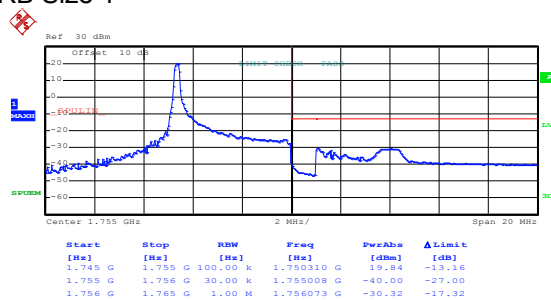
Date: 9.OCT.2019 20:05:09

Highest channel

LTE Band 4, BW: 5MHz  
16QAM & RB Size 1

Date: 9.OCT.2019 20:07:06

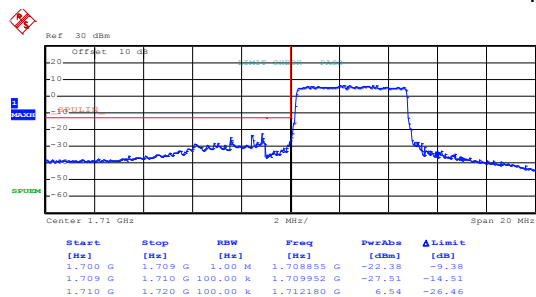
Lowest channel



Date: 9.OCT.2019 20:08:09

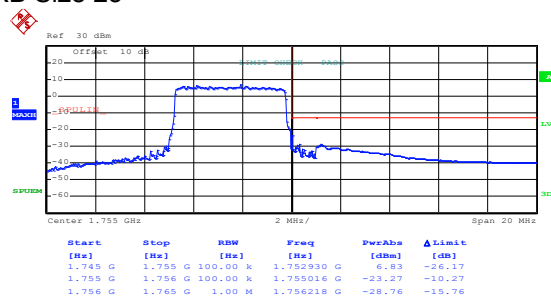
Highest channel

## 16QAM &amp; RB Size 25



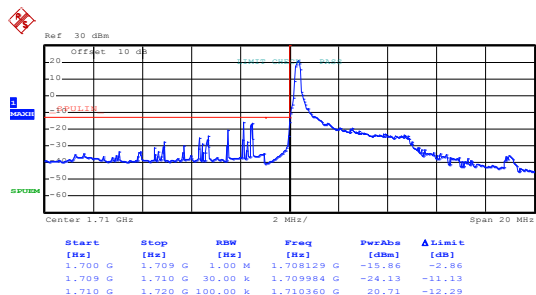
Date: 9.OCT.2019 20:07:27

Lowest channel



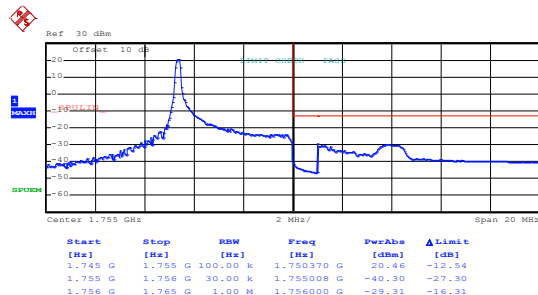
Date: 9.OCT.2019 20:07:47

Highest channel

LTE Band 4, BW: 5MHz  
QPSK & RB Size 1

Date: 9.OCT.2019 20:06:49

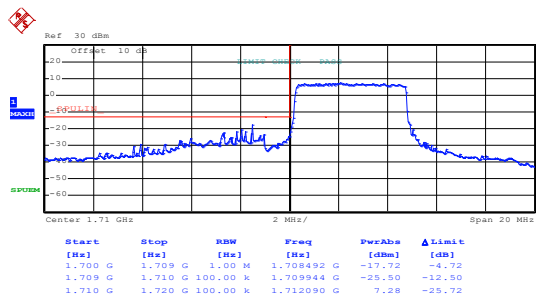
Lowest channel



Date: 9.OCT.2019 20:08:00

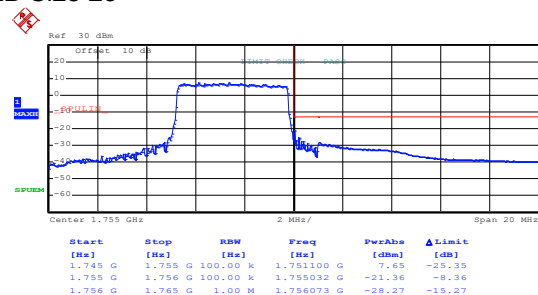
Highest channel

## QPSK &amp; RB Size 25



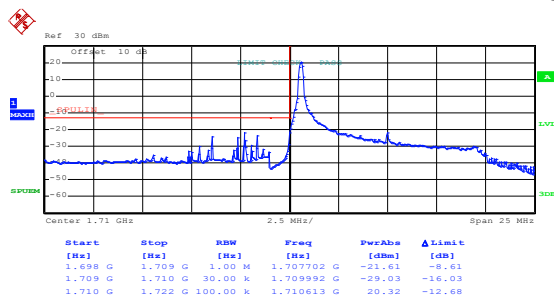
Date: 9.OCT.2019 20:07:21

Lowest channel



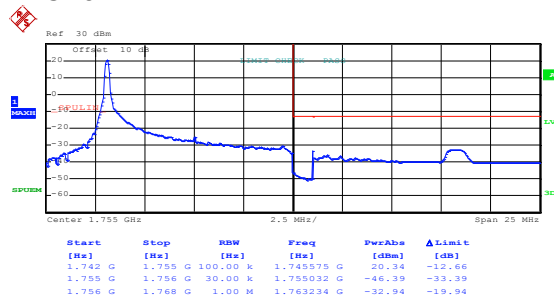
Date: 9.OCT.2019 20:07:41

Highest channel

LTE Band 4, BW: 10MHz  
16QAM & RB Size 1

Date: 9.OCT.2019 20:10:15

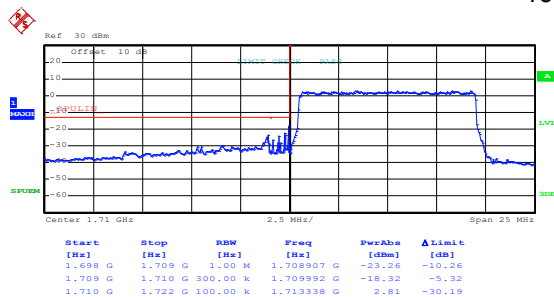
Lowest channel



Date: 9.OCT.2019 20:09:09

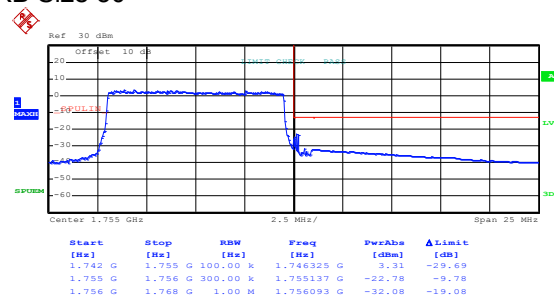
Highest channel

## 16QAM &amp; RB Size 50



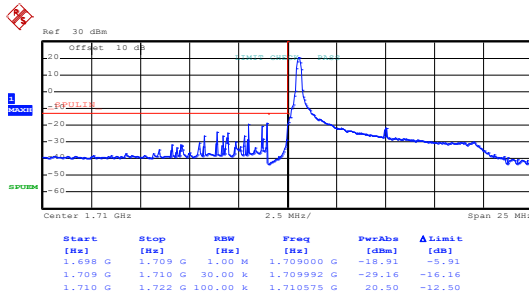
Date: 9.OCT.2019 20:09:57

Lowest channel



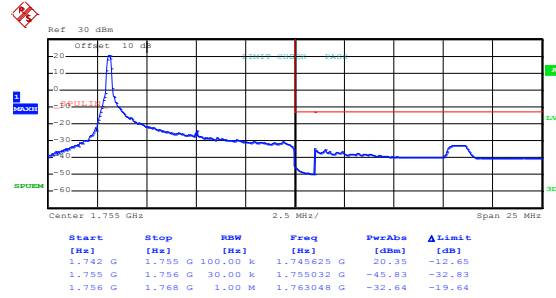
Date: 9.OCT.2019 20:09:39

Highest channel

LTE Band 4, BW: 10MHz  
QPSK & RB Size 1

Date: 9.OCT.2019 20:10:09

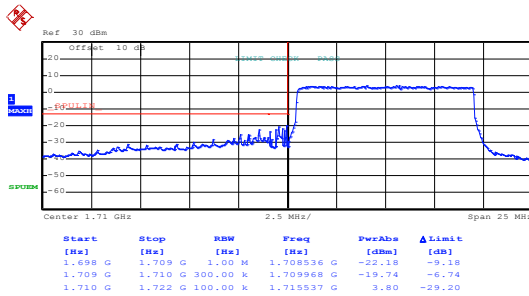
Lowest channel



Date: 9.OCT.2019 20:09:00

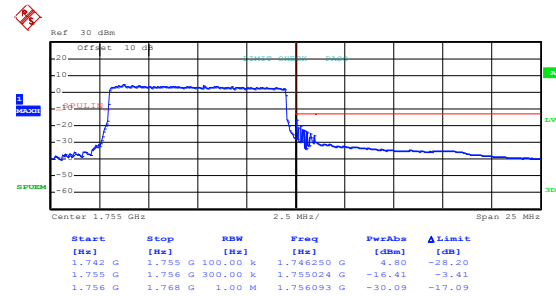
Highest channel

## QPSK &amp; RB Size 50



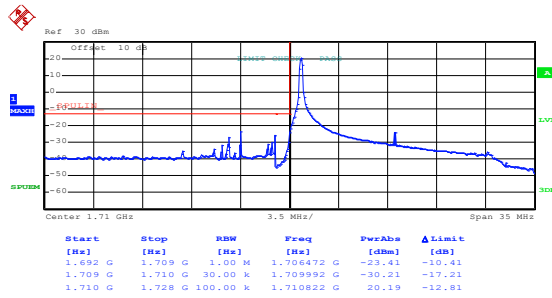
Date: 9.OCT.2019 20:09:52

Lowest channel



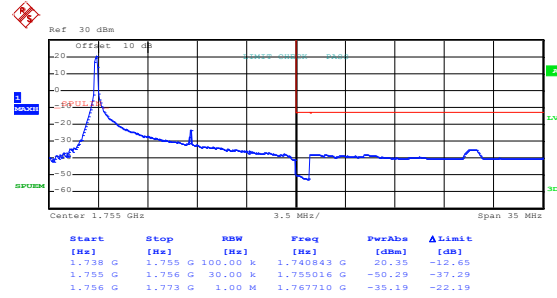
Date: 9.OCT.2019 20:09:33

Highest channel

LTE Band 4, BW: 15MHz  
16QAM & RB Size 1

Date: 9.OCT.2019 20:10:48

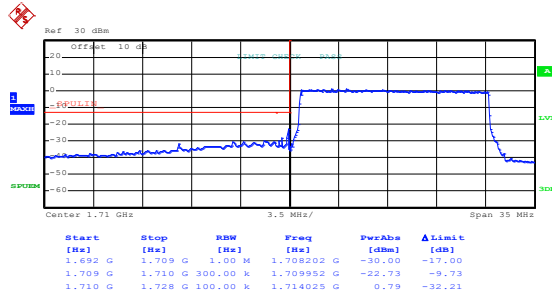
Lowest channel



Date: 9.OCT.2019 20:11:45

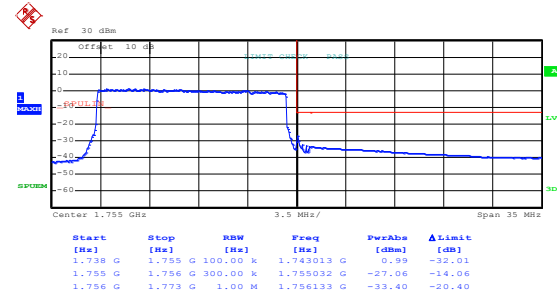
Highest channel

## 16QAM &amp; RB Size 75



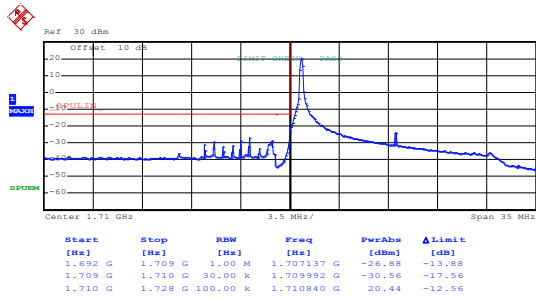
Date: 9.OCT.2019 20:11:05

Lowest channel



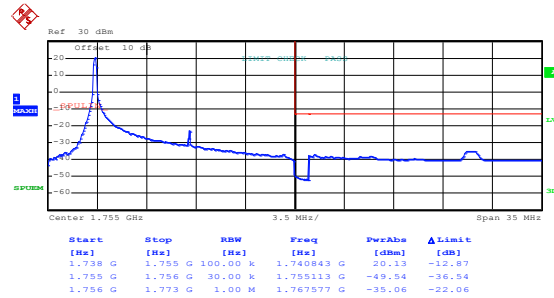
Date: 9.OCT.2019 20:11:23

Highest channel

LTE Band 4, BW: 15MHz  
QPSK & RB Size 1

Date: 9.OCT.2019 20:10:41

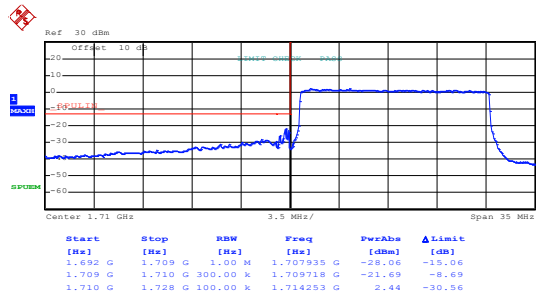
Lowest channel



Date: 9.OCT.2019 20:11:38

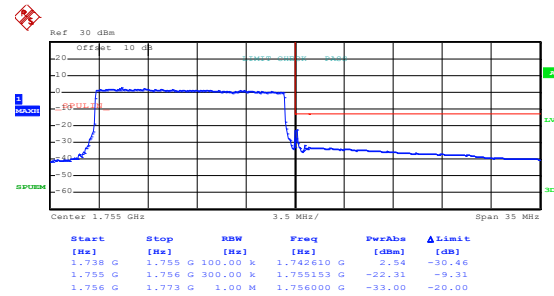
Highest channel

## QPSK &amp; RB Size 75



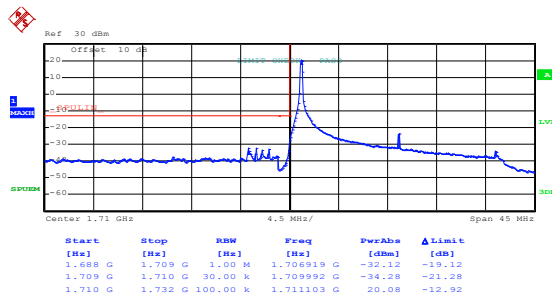
Date: 9.OCT.2019 20:11:00

Lowest channel



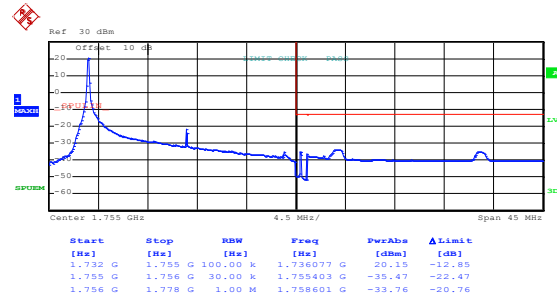
Date: 9.OCT.2019 20:11:17

Highest channel

LTE Band 4, BW: 20MHz  
16QAM & RB Size 1

Date: 9.OCT.2019 20:13:20

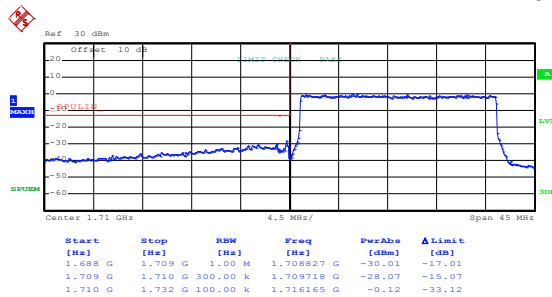
Lowest channel



Date: 9.OCT.2019 20:12:23

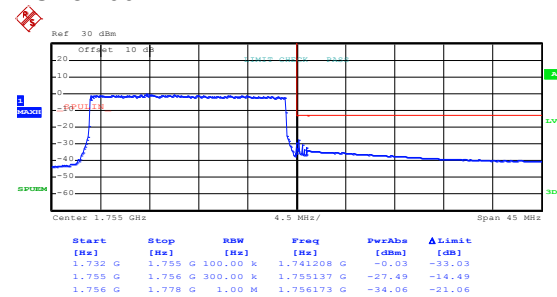
Highest channel

## 16QAM &amp; RB Size 100



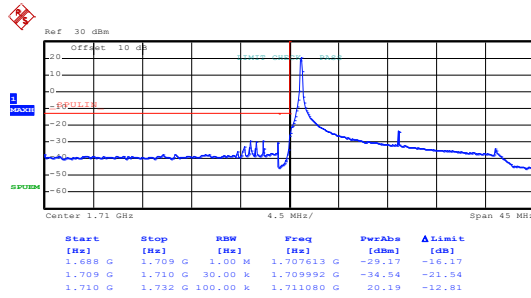
Date: 9.OCT.2019 20:13:02

Lowest channel



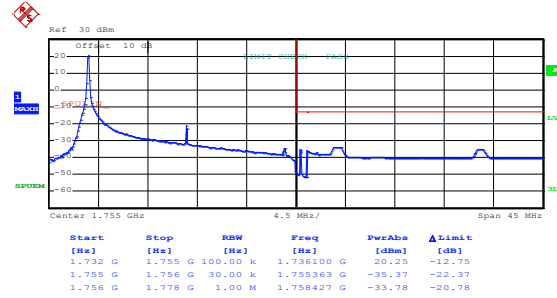
Date: 9.OCT.2019 20:12:41

Highest channel

LTE Band 4, BW: 20MHz  
QPSK & RB Size 1

Date: 9.OCT.2019 20:13:15

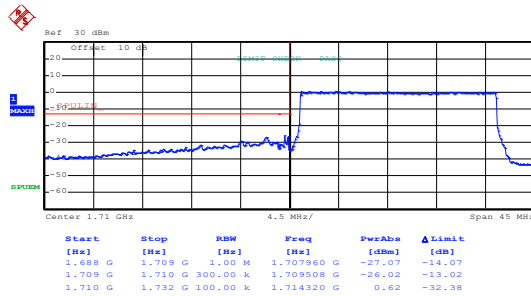
Lowest channel



Date: 9.OCT.2019 20:12:13

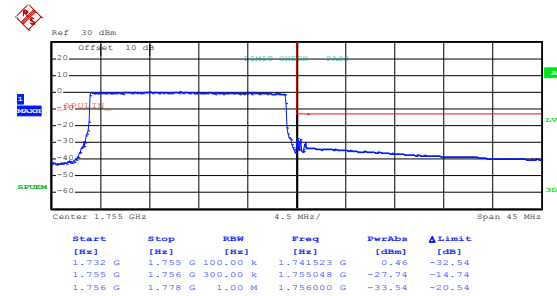
Highest channel

## QPSK &amp; RB Size 100



Date: 9.OCT.2019 20:12:57

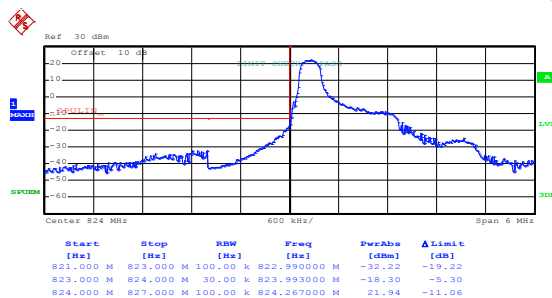
Lowest channel



Date: 9.OCT.2019 20:12:36

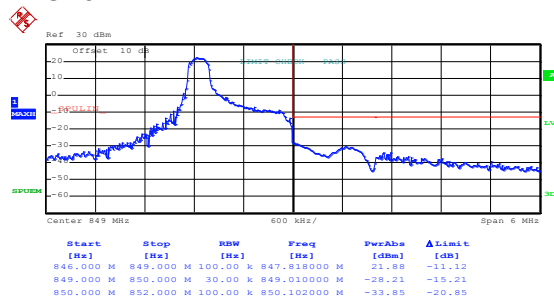
Highest channel

## LTE Band 5 part:

LTE Band 5, BW: 1.4MHz  
16QAM & RB Size 1

Date: 9.OCT.2019 19:55:02

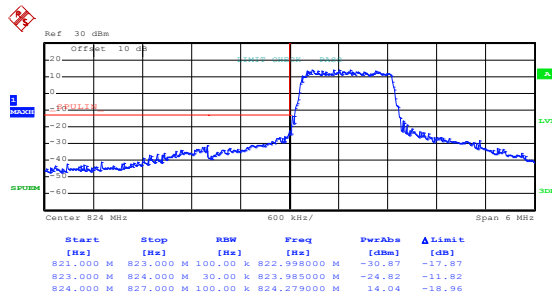
Lowest channel



Date: 9.OCT.2019 19:56:04

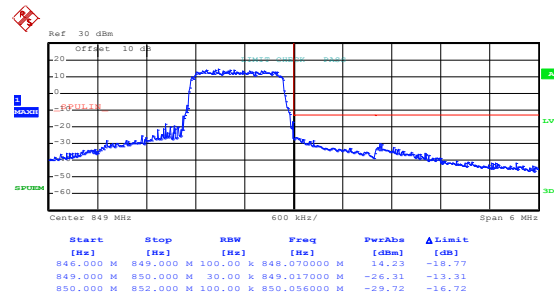
Highest channel

## 16QAM &amp; RB Size 6



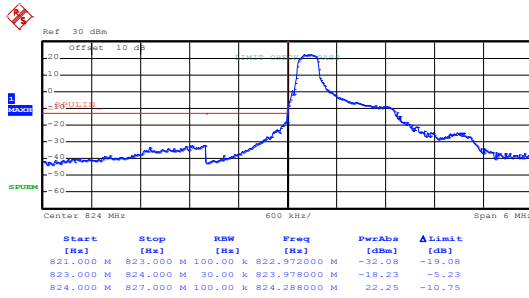
Date: 9.OCT.2019 19:55:15

Lowest channel



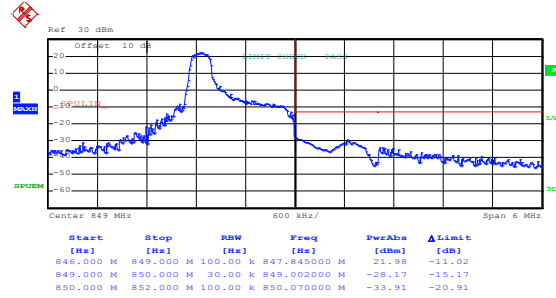
Date: 9.OCT.2019 19:55:36

Highest channel

LTE Band 5, BW: 1.4MHz  
QPSK & RB Size 1

Date: 9.OCT.2019 19:54:42

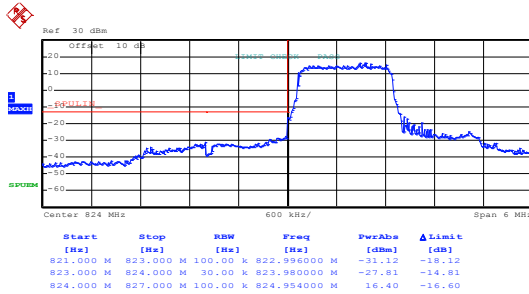
Lowest channel



Date: 9.OCT.2019 19:55:49

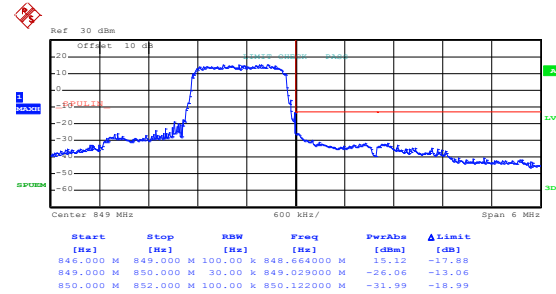
Highest channel

## QPSK &amp; RB Size 6



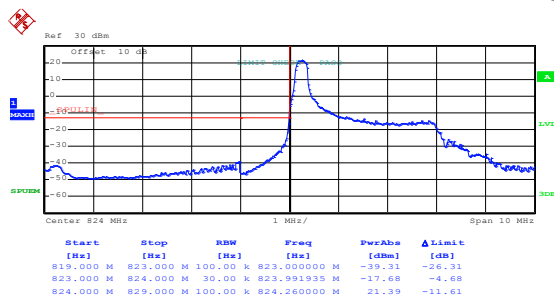
Date: 9.OCT.2019 19:55:10

Lowest channel



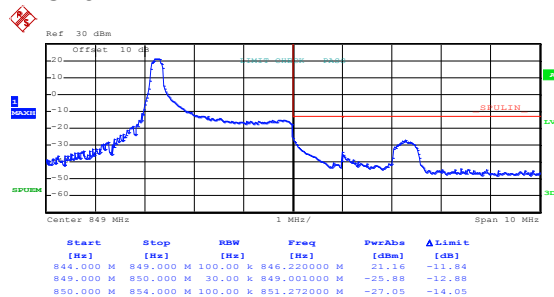
Date: 9.OCT.2019 19:55:29

Highest channel

LTE Band 5, BW: 3MHz  
16QAM & RB Size 1

Date: 9.OCT.2019 19:58:42

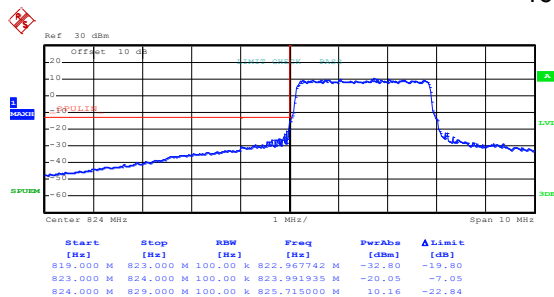
Lowest channel



Date: 9.OCT.2019 19:56:58

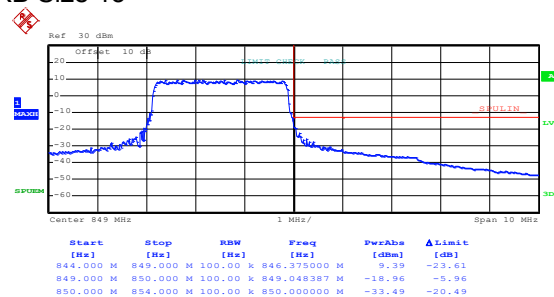
Highest channel

## 16QAM &amp; RB Size 15



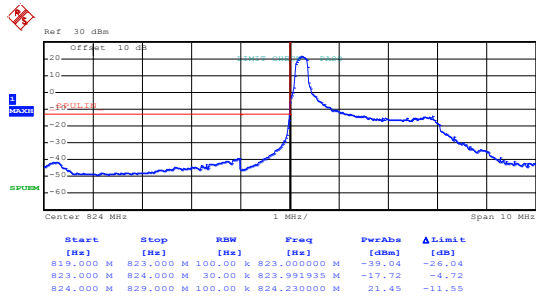
Date: 9.OCT.2019 19:58:10

Lowest channel



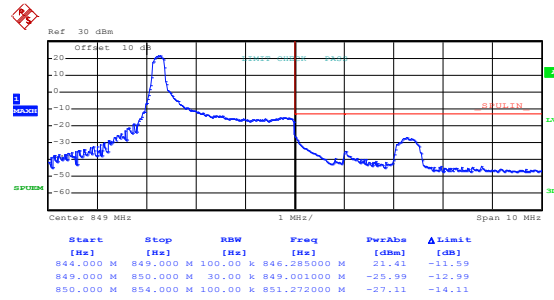
Date: 9.OCT.2019 19:57:39

Highest channel

LTE Band 5, BW: 3MHz  
QPSK & RB Size 1

Date: 9.OCT.2019 19:58:32

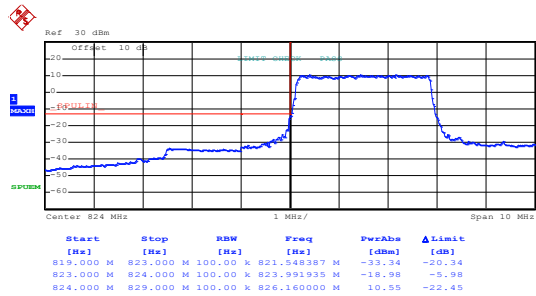
Lowest channel



Date: 9.OCT.2019 19:56:48

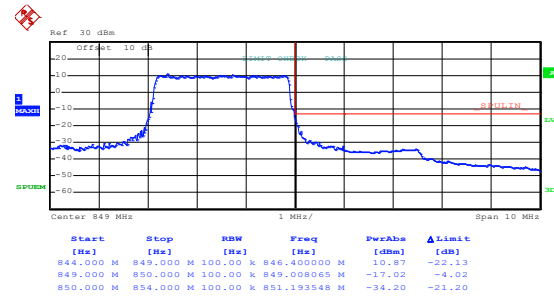
Highest channel

## QPSK &amp; RB Size 15



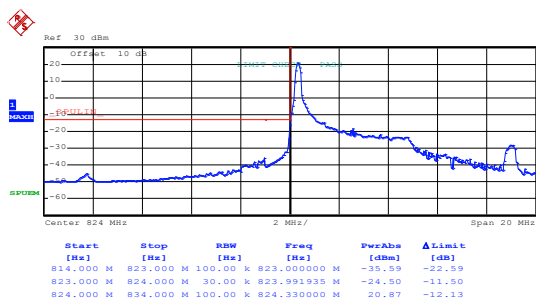
Date: 9.OCT.2019 19:58:05

Lowest channel



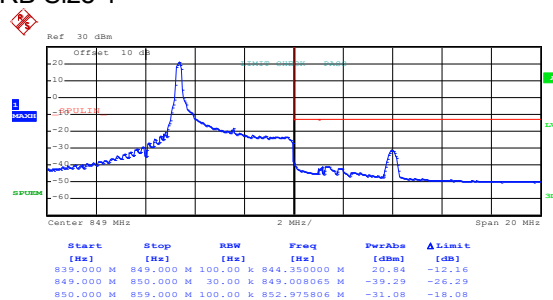
Date: 9.OCT.2019 19:57:34

Highest channel

LTE Band 5, BW: 5MHz  
16QAM & RB Size 1

Date: 9.OCT.2019 19:59:19

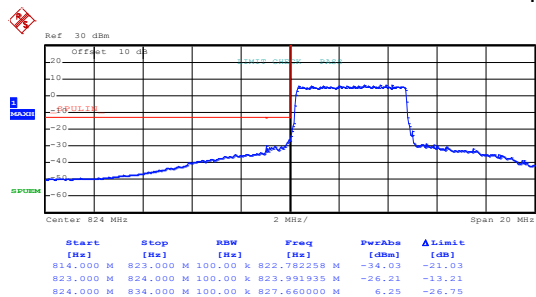
Lowest channel



Date: 9.OCT.2019 20:00:21

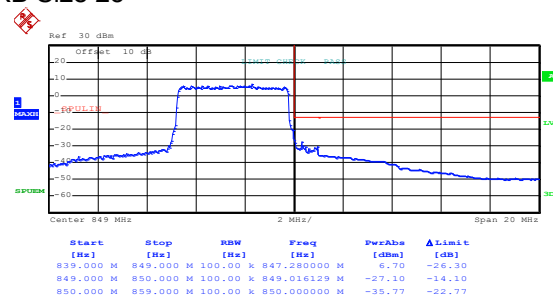
Highest channel

## 16QAM &amp; RB Size 25



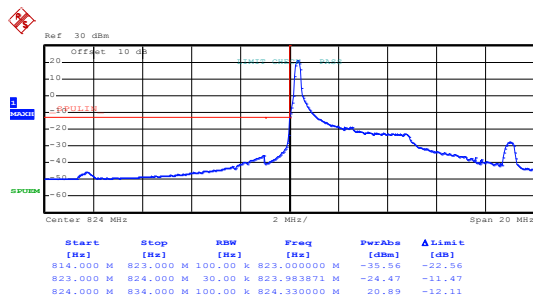
Date: 9.OCT.2019 19:59:39

Lowest channel



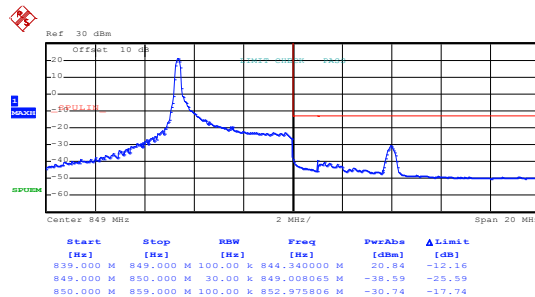
Date: 9.OCT.2019 19:59:57

Highest channel

LTE Band 5, BW: 5MHz  
QPSK & RB Size 1

Date: 9.OCT.2019 19:59:12

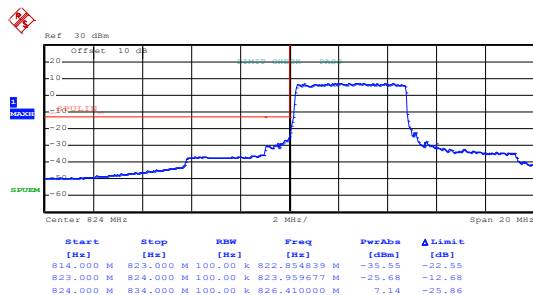
Lowest channel



Date: 9.OCT.2019 20:00:12

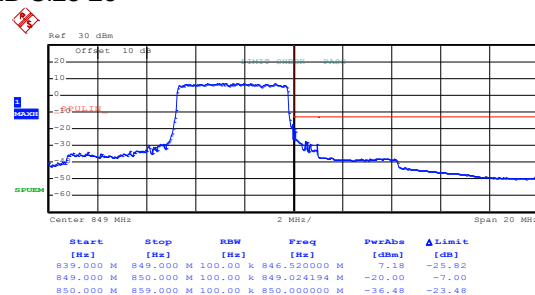
Highest channel

## QPSK &amp; RB Size 25



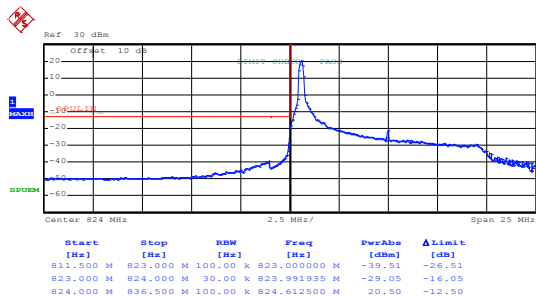
Date: 9.OCT.2019 19:59:34

Lowest channel



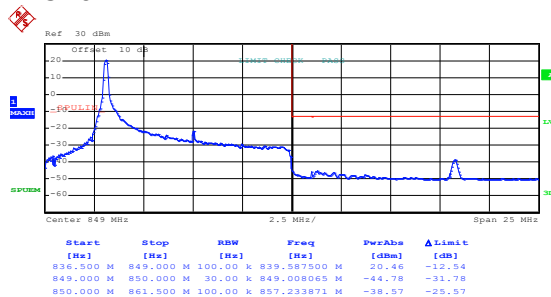
Date: 9.OCT.2019 19:59:52

Highest channel

LTE Band 5, BW: 10MHz  
16QAM & RB Size 1

Date: 9.OCT.2019 20:01:52

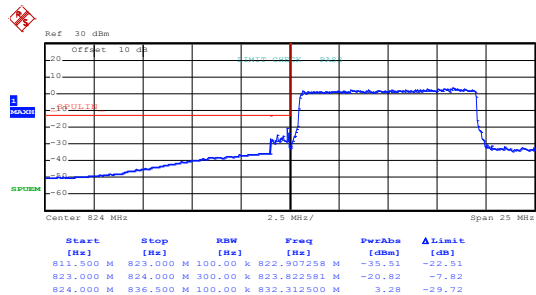
Lowest channel



Date: 9.OCT.2019 20:00:47

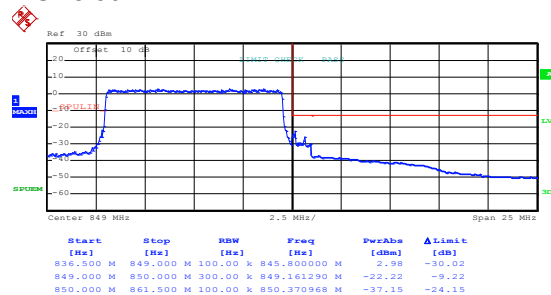
Highest channel

## 16QAM &amp; RB Size 50



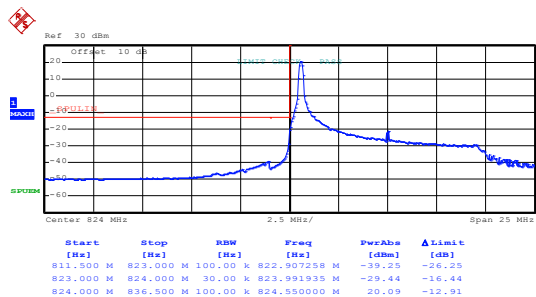
Date: 9.OCT.2019 20:01:34

Lowest channel



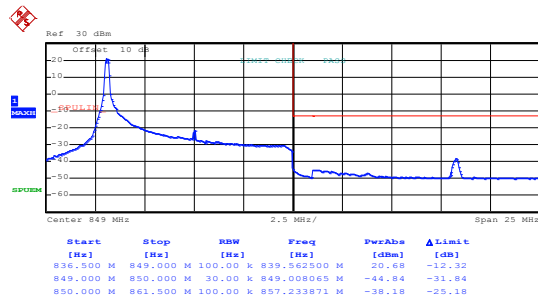
Date: 9.OCT.2019 20:01:05

Highest channel

LTE Band 5, BW: 10MHz  
QPSK & RB Size 1

Date: 9.OCT.2019 20:01:45

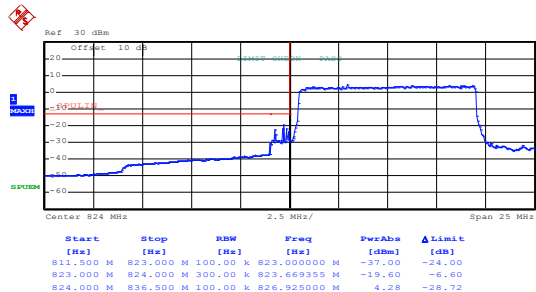
Lowest channel



Date: 9.OCT.2019 20:00:41

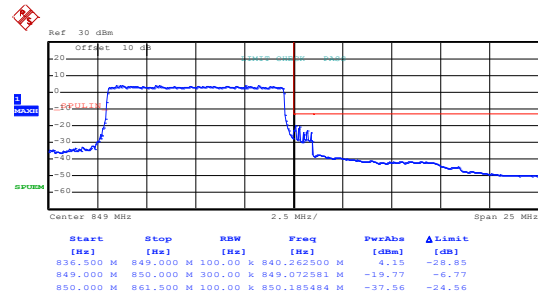
Highest channel

## QPSK &amp; RB Size 50



Date: 9.OCT.2019 20:01:28

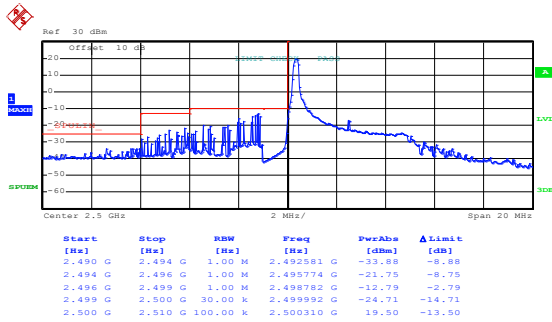
Lowest channel



Date: 9.OCT.2019 20:01:00

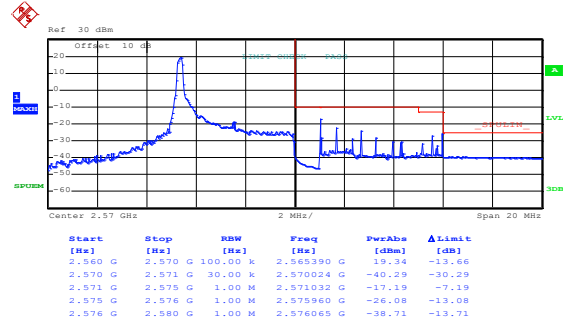
Highest channel

## LTE Band 7 part:

LTE Band 7, BW: 5MHz  
16QAM & RB Size 1

Date: 9.OCT.2019 19:45:01

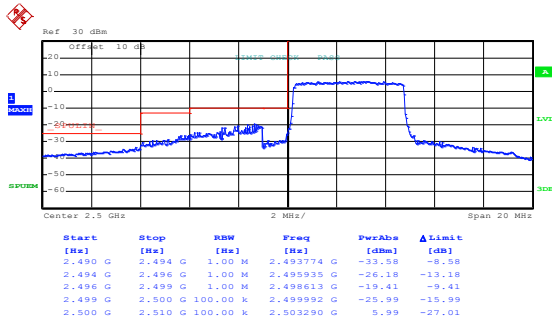
Lowest channel



Date: 9.OCT.2019 19:46:31

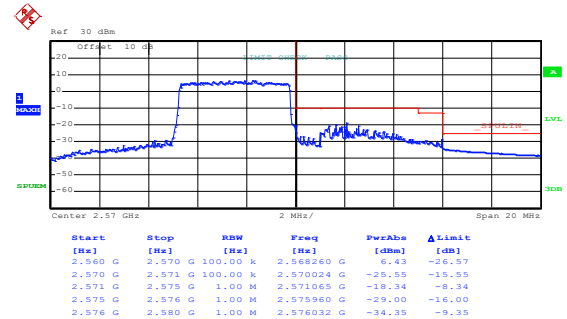
Highest channel

## 16QAM &amp; RB Size 25



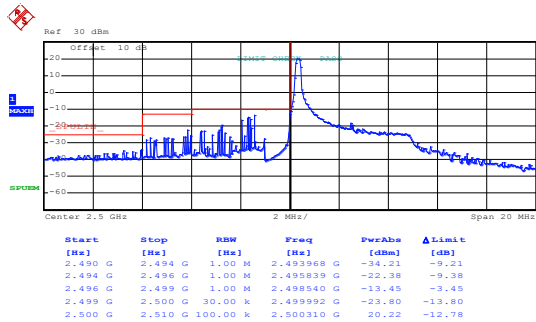
Date: 9.OCT.2019 19:45:25

Lowest channel



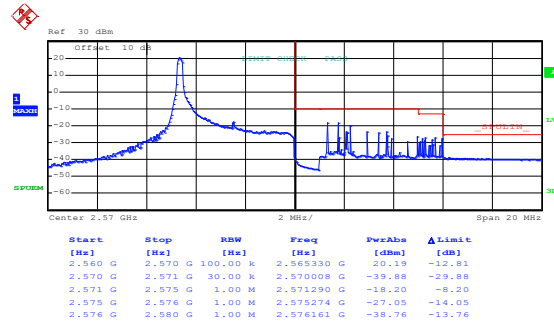
Date: 9.OCT.2019 19:46:06

Highest channel

LTE Band 7, BW: 5MHz  
QPSK & RB Size 1

Date: 9.OCT.2019 19:44:22

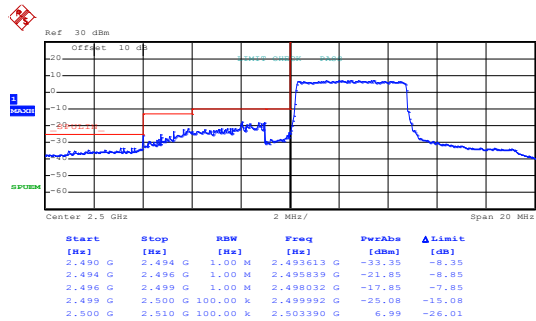
Lowest channel



Date: 9.OCT.2019 19:46:23

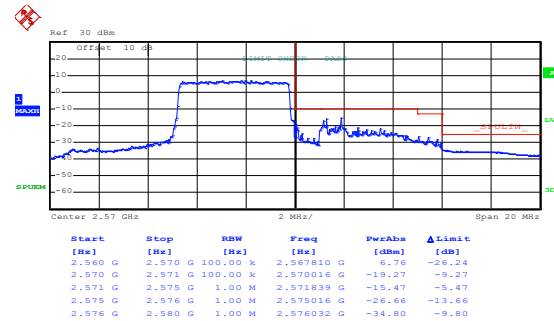
Highest channel

## QPSK &amp; RB Size 25



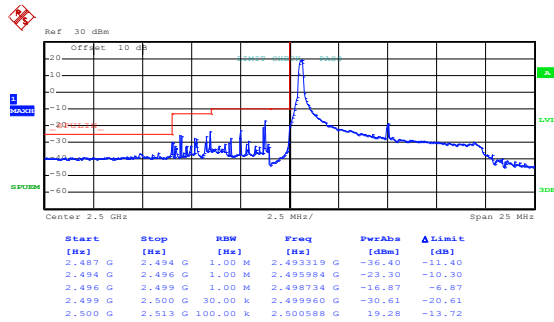
Date: 9.OCT.2019 19:45:18

Lowest channel



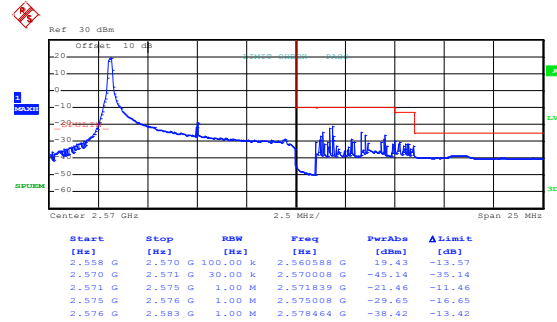
Date: 9.OCT.2019 19:46:01

Highest channel

LTE Band 7, BW: 10MHz  
16QAM & RB Size 1

Date: 9.OCT.2019 19:49:45

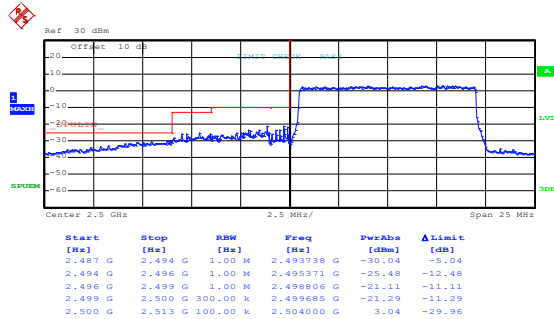
Lowest channel



Date: 9.OCT.2019 19:48:26

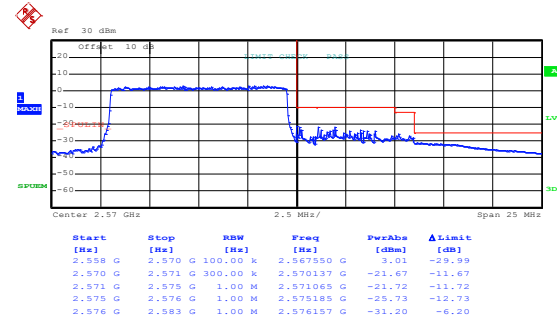
Highest channel

## 16QAM &amp; RB Size 50



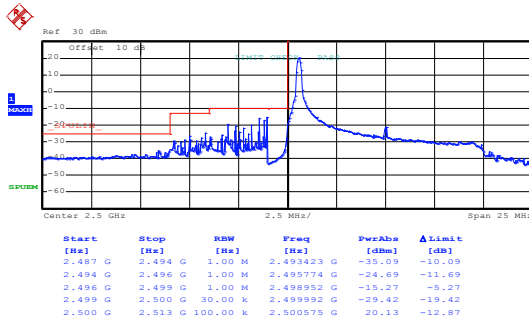
Date: 9.OCT.2019 19:49:23

Lowest channel



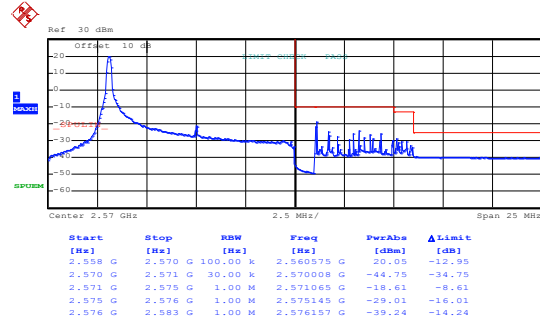
Date: 9.OCT.2019 19:48:49

Highest channel

LTE Band 7, BW: 10MHz  
QPSK & RB Size 1

Date: 9.OCT.2019 19:49:37

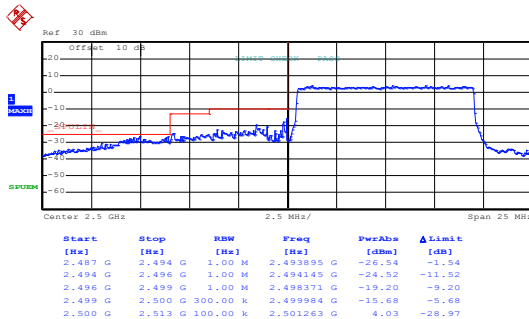
Lowest channel



Date: 9.OCT.2019 19:47:02

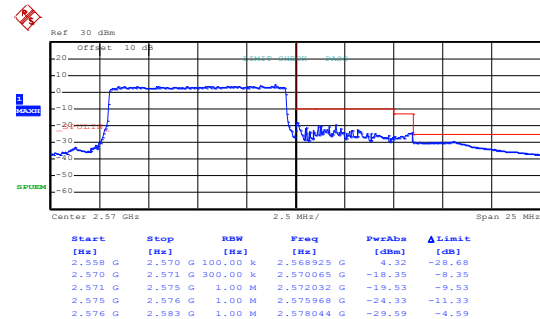
Highest channel

## QPSK &amp; RB Size 50



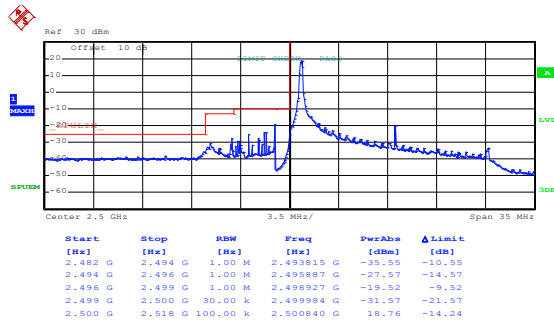
Date: 9.OCT.2019 19:49:16

Lowest channel



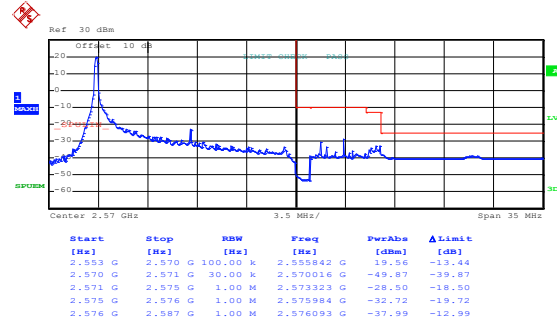
Date: 9.OCT.2019 19:48:43

Highest channel

LTE Band 7, BW: 15MHz  
16QAM & RB Size 1

Date: 9.OCT.2019 19:50:25

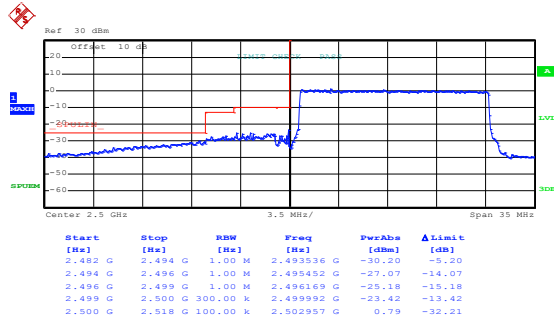
Lowest channel



Date: 9.OCT.2019 19:51:38

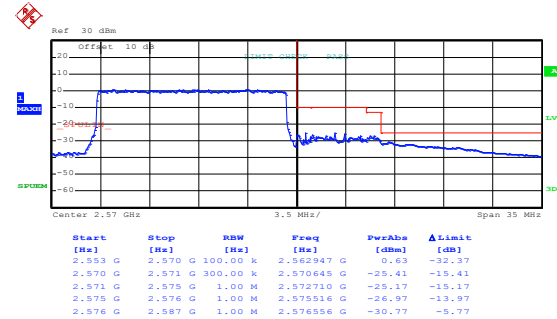
Highest channel

## 16QAM &amp; RB Size 75



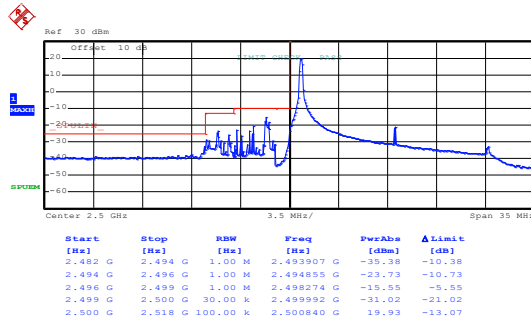
Date: 9.OCT.2019 19:50:46

Lowest channel



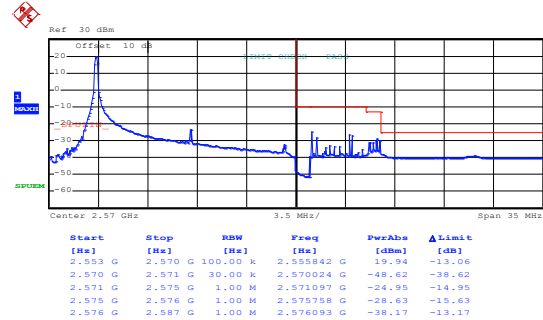
Date: 9.OCT.2019 19:51:08

Highest channel

LTE Band 7, BW: 15MHz  
QPSK & RB Size 1

Date: 9.OCT.2019 19:50:14

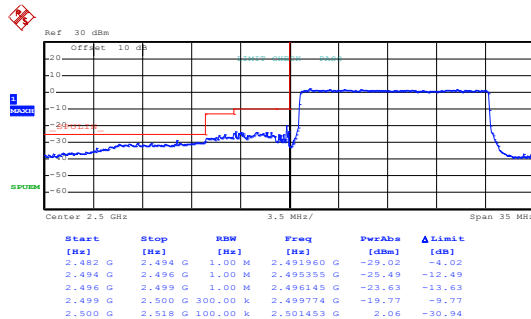
Lowest channel



Date: 9.OCT.2019 19:51:23

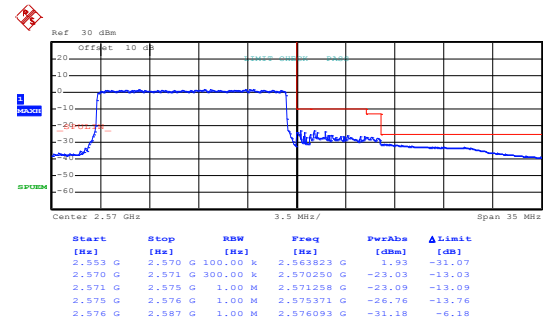
Highest channel

## QPSK &amp; RB Size 75



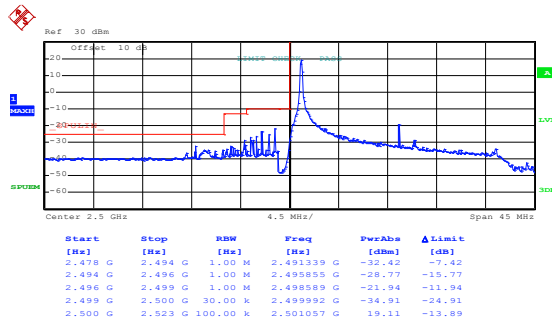
Date: 9.OCT.2019 19:50:41

Lowest channel



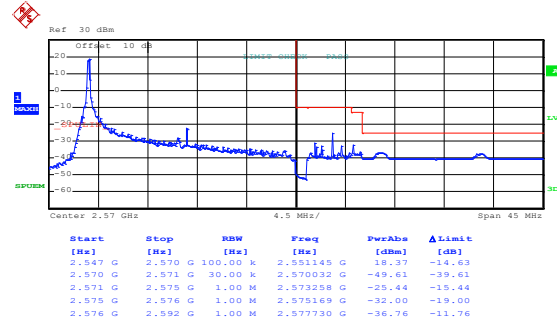
Date: 9.OCT.2019 19:51:02

Highest channel

LTE Band 7, BW: 20MHz  
16QAM & RB Size 1

Date: 9.OCT.2019 19:53:25

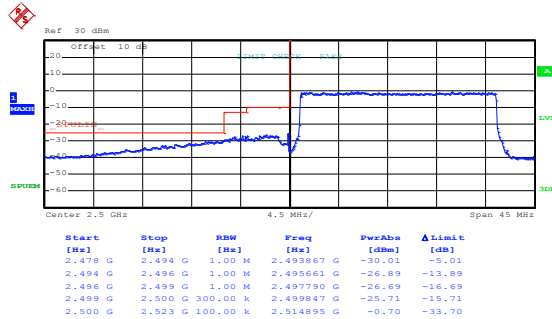
Lowest channel



Date: 9.OCT.2019 19:52:20

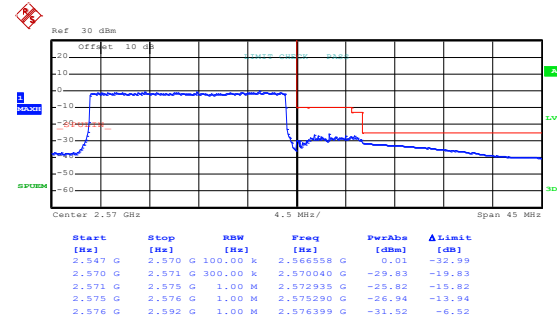
Highest channel

## 16QAM &amp; RB Size 100



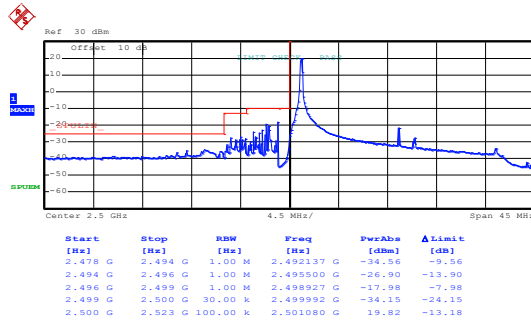
Date: 9.OCT.2019 19:53:03

Lowest channel



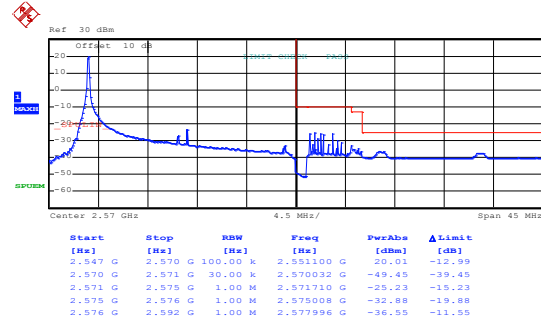
Date: 9.OCT.2019 19:52:40

Highest channel

LTE Band 7, BW: 20MHz  
QPSK & RB Size 1

Date: 9.OCT.2019 19:53:17

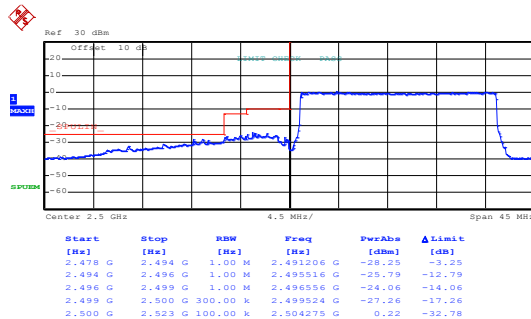
Lowest channel



Date: 9.OCT.2019 19:52:13

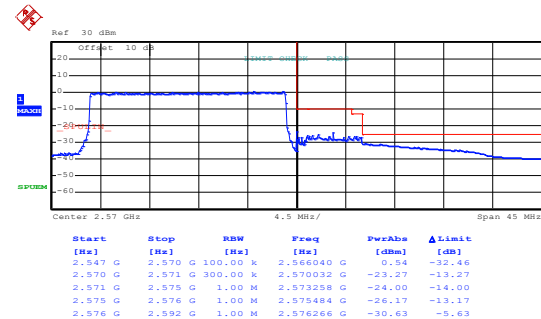
Highest channel

## QPSK &amp; RB Size 100



Date: 9.OCT.2019 19:52:55

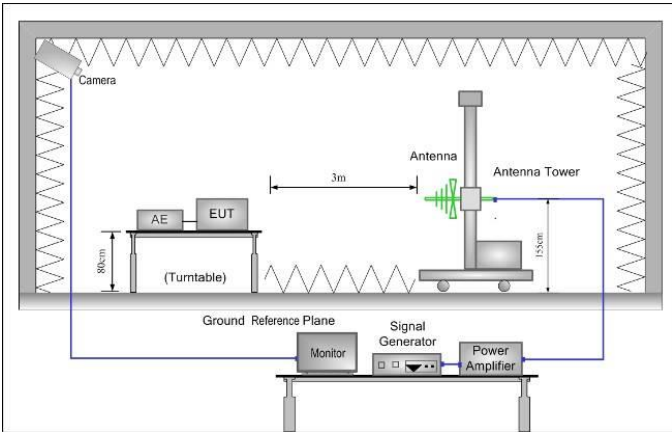
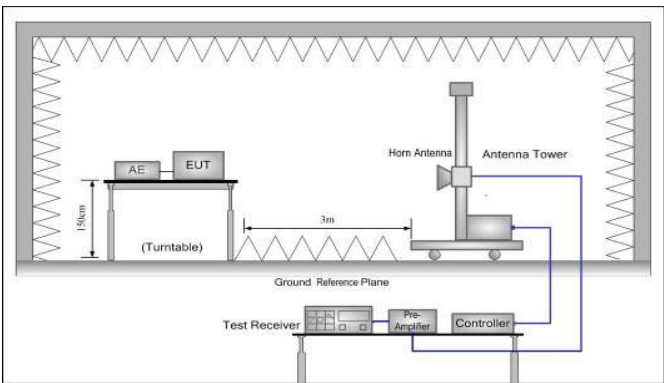
Lowest channel



Date: 9.OCT.2019 19:52:34

Highest channel

## 6.5 Field strength of spurious radiation measurement

|                   |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |
|-------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Test Requirement: | Part 22.917(b), Part 27.53(m), Part 27.53(h)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |
| Limit:            | <p>LTE Band 4 &amp; 5:<br/>The power of any emission outside a licensee's frequency block shall be attenuated below the transmitter power (P) in watts by at least <math>43 + 10 \log_{10}(P)</math> dB (-13 dBm).</p> <p>LTE Band 7:<br/>For mobile digital stations, the attenuation factor shall be not less than <math>40 + 10 \log(P)</math> dB on all frequencies between the channel edge and 5 megahertz from the channel edge, <math>43 + 10 \log(P)</math> dB on all frequencies between 5 megahertz and X megahertz from the channel edge, and <math>55 + 10 \log(P)</math> dB on all frequencies more than X megahertz from the channel edge, where X is the greater of 6 megahertz or the actual emission bandwidth as defined in paragraph (m)(6) of this section. In addition, the attenuation factor shall not be less than <math>43 + 10 \log(P)</math> dB on all frequencies between 2490.5 MHz and 2496 MHz and <math>55 + 10 \log(P)</math> dB at or below 2490.5 MHz.</p> |
| Test setup:       | <p>Below 1GHz</p>  <p>Above 1GHz</p>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    |
| Test Procedure:   | <ol style="list-style-type: none"> <li>1. The EUT was placed on an non-conductive turntable using a non-conductive support. The radiated emission at the fundamental frequency was measured at 3 m with a test antenna and EMI spectrum analyzer.</li> <li>2. During the tests, the antenna height and the EUT azimuth were varied in order to identify the maximum level of emissions from the EUT. This maximization process was repeated with the EUT positioned in each of its three orthogonal orientations.</li> <li>3. The frequency range up to tenth harmonic was investigated for each of three fundamental frequency (low, middle and high channels). Once spurious emission was identified, the power of the emission</li> </ol>                                                                                                                                                                                                                                                   |

|                   |                                                                                                                                                                                                                                                                                                             |
|-------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
|                   | <p>was determined using the substitution method.</p> <p>4. The spurious emissions attenuation was calculated as the difference between radiated power at the fundamental frequency and the spurious emissions frequency.</p> <p>ERP / EIRP = S.G. output (dBm) + Antenna Gain(dB/dBi) – Cable Loss (dB)</p> |
| Test Instruments: | Refer to section 5.10 for details                                                                                                                                                                                                                                                                           |
| Test mode:        | Refer to section 5.3 for details.                                                                                                                                                                                                                                                                           |
| Test results:     | Passed                                                                                                                                                                                                                                                                                                      |

**Measurement Data:****LTE Band 4 part:**

| LTE Band 4, WB: 1.4MHz                                                                           |                   |             |             |        |
|--------------------------------------------------------------------------------------------------|-------------------|-------------|-------------|--------|
| RB size 1 & RB offset 0                                                                          |                   |             |             |        |
| Frequency (MHz)                                                                                  | Spurious Emission |             | Limit (dBm) | Result |
|                                                                                                  | Polarization      | Level (dBm) |             |        |
| Lowest Channel                                                                                   |                   |             |             |        |
| 3421.40                                                                                          | Vertical          | -47.62      | -13.00      | Pass   |
| 5132.10                                                                                          | V                 | -44.46      |             |        |
| 6842.80                                                                                          | V                 | -38.77      |             |        |
| 3421.40                                                                                          | Horizontal        | -48.74      |             |        |
| 5132.10                                                                                          | H                 | -44.38      |             |        |
| 6842.80                                                                                          | H                 | -38.28      |             |        |
| Middle Channel                                                                                   |                   |             |             |        |
| 3465.00                                                                                          | Vertical          | -47.56      | -13.00      | Pass   |
| 5197.50                                                                                          | V                 | -44.29      |             |        |
| 6930.00                                                                                          | V                 | -38.63      |             |        |
| 3465.00                                                                                          | Horizontal        | -48.42      |             |        |
| 5197.50                                                                                          | H                 | -44.42      |             |        |
| 6930.00                                                                                          | H                 | -38.12      |             |        |
| Highest Channel                                                                                  |                   |             |             |        |
| 3508.60                                                                                          | Vertical          | -47.58      | -13.00      | Pass   |
| 5262.90                                                                                          | V                 | -44.94      |             |        |
| 7017.20                                                                                          | V                 | -38.71      |             |        |
| 3508.60                                                                                          | Horizontal        | -48.12      |             |        |
| 5262.90                                                                                          | H                 | -44.58      |             |        |
| 7017.20                                                                                          | H                 | -38.69      |             |        |
| Note:                                                                                            |                   |             |             |        |
| 1. The emission levels of below 1 GHz are 20 dB lower than the limit so not show in this report. |                   |             |             |        |
| 2. For above 1 GHz, all test modes were performed, and just the worst case shown in the report.  |                   |             |             |        |

| LTE Band 4, WB: 20MHz                                                                            |                   |             |             |        |
|--------------------------------------------------------------------------------------------------|-------------------|-------------|-------------|--------|
| RB size 1 & RB offset 0                                                                          |                   |             |             |        |
| Frequency (MHz)                                                                                  | Spurious Emission |             | Limit (dBm) | Result |
|                                                                                                  | Polarization      | Level (dBm) |             |        |
| Lowest Channel                                                                                   |                   |             |             |        |
| 3440.00                                                                                          | Vertical          | -47.41      | -13.00      | Pass   |
| 5160.00                                                                                          | V                 | -44.12      |             |        |
| 6880.00                                                                                          | V                 | -38.68      |             |        |
| 3440.00                                                                                          | Horizontal        | -48.12      |             |        |
| 5160.00                                                                                          | H                 | -44.07      |             |        |
| 6880.00                                                                                          | H                 | -38.12      |             |        |
| Middle Channel                                                                                   |                   |             |             |        |
| 3465.00                                                                                          | Vertical          | -47.91      | -13.00      | Pass   |
| 5197.50                                                                                          | V                 | -44.94      |             |        |
| 6930.00                                                                                          | V                 | -38.63      |             |        |
| 3465.00                                                                                          | Horizontal        | -48.41      |             |        |
| 5197.50                                                                                          | H                 | -44.19      |             |        |
| 6930.00                                                                                          | H                 | -38.58      |             |        |
| Highest Channel                                                                                  |                   |             |             |        |
| 3490.00                                                                                          | Vertical          | -47.38      | -13.00      | Pass   |
| 5235.00                                                                                          | V                 | -44.46      |             |        |
| 6980.00                                                                                          | V                 | -38.47      |             |        |
| 3490.00                                                                                          | Horizontal        | -48.34      |             |        |
| 5235.00                                                                                          | H                 | -44.63      |             |        |
| 6980.00                                                                                          | H                 | -38.42      |             |        |
| Note:                                                                                            |                   |             |             |        |
| 1. The emission levels of below 1 GHz are 20 dB lower than the limit so not show in this report. |                   |             |             |        |
| 2. For above 1 GHz, all test modes were performed, and just the worst case shown in the report.  |                   |             |             |        |

## LTE Band 5 part:

| LTE Band 5, WB: 1.4MHz                                                                           |                   |             |             |        |
|--------------------------------------------------------------------------------------------------|-------------------|-------------|-------------|--------|
| RB size 1 & RB offset 0                                                                          |                   |             |             |        |
| Frequency (MHz)                                                                                  | Spurious Emission |             | Limit (dBm) | Result |
|                                                                                                  | Polarization      | Level (dBm) |             |        |
| Lowest Channel                                                                                   |                   |             |             |        |
| 1649.40                                                                                          | Vertical          | -59.55      | -13.00      | Pass   |
| 2474.10                                                                                          | V                 | -49.27      |             |        |
| 3298.80                                                                                          | V                 | -37.97      |             |        |
| 1649.40                                                                                          | Horizontal        | -58.39      |             |        |
| 2474.10                                                                                          | H                 | -44.69      |             |        |
| 3298.80                                                                                          | H                 | -38.29      |             |        |
| Middle Channel                                                                                   |                   |             |             |        |
| 1673.00                                                                                          | Vertical          | -59.86      | -13.00      | Pass   |
| 2509.50                                                                                          | V                 | -49.84      |             |        |
| 3346.00                                                                                          | V                 | -37.42      |             |        |
| 1673.00                                                                                          | Horizontal        | -58.94      |             |        |
| 2509.50                                                                                          | H                 | -44.99      |             |        |
| 3346.00                                                                                          | H                 | -38.31      |             |        |
| Highest Channel                                                                                  |                   |             |             |        |
| 1696.60                                                                                          | Vertical          | -59.16      | -13.00      | Pass   |
| 2544.90                                                                                          | V                 | -49.58      |             |        |
| 3393.20                                                                                          | V                 | -37.18      |             |        |
| 1696.60                                                                                          | Horizontal        | -58.42      |             |        |
| 2544.90                                                                                          | H                 | -44.33      |             |        |
| 3393.20                                                                                          | H                 | -38.39      |             |        |
| Note:                                                                                            |                   |             |             |        |
| 1. The emission levels of below 1 GHz are 20 dB lower than the limit so not show in this report. |                   |             |             |        |
| 2. For above 1 GHz, all test modes were performed, and just the worst case shown in the report.  |                   |             |             |        |

| LTE Band 5, WB: 10MHz                                                                            |                   |             |             |        |
|--------------------------------------------------------------------------------------------------|-------------------|-------------|-------------|--------|
| RB size 1 & RB offset 0                                                                          |                   |             |             |        |
| Frequency (MHz)                                                                                  | Spurious Emission |             | Limit (dBm) | Result |
|                                                                                                  | Polarization      | Level (dBm) |             |        |
| Lowest Channel                                                                                   |                   |             |             |        |
| 1658.00                                                                                          | Vertical          | -539.10     | -13.00      | Pass   |
| 2487.00                                                                                          | V                 | -49.12      |             |        |
| 3316.00                                                                                          | V                 | -37.86      |             |        |
| 1658.00                                                                                          | Horizontal        | -58.84      |             |        |
| 2487.00                                                                                          | H                 | -44.12      |             |        |
| 3316.00                                                                                          | H                 | -38.34      |             |        |
| Middle Channel                                                                                   |                   |             |             |        |
| 1673.00                                                                                          | Vertical          | -59.12      | -13.00      | Pass   |
| 2509.50                                                                                          | V                 | -49.94      |             |        |
| 3346.00                                                                                          | V                 | -37.44      |             |        |
| 1673.00                                                                                          | Horizontal        | -58.56      |             |        |
| 2509.50                                                                                          | H                 | -44.84      |             |        |
| 3346.00                                                                                          | H                 | -38.24      |             |        |
| Highest Channel                                                                                  |                   |             |             |        |
| 1688.00                                                                                          | Vertical          | -59.58      | -13.00      | Pass   |
| 2532.00                                                                                          | V                 | -49.54      |             |        |
| 3376.00                                                                                          | V                 | -37.38      |             |        |
| 1688.00                                                                                          | Horizontal        | -58.88      |             |        |
| 2532.00                                                                                          | H                 | -44.42      |             |        |
| 3376.00                                                                                          | H                 | -38.56      |             |        |
| Note:                                                                                            |                   |             |             |        |
| 1. The emission levels of below 1 GHz are 20 dB lower than the limit so not show in this report. |                   |             |             |        |
| 2. For above 1 GHz, all test modes were performed, and just the worst case shown in the report.  |                   |             |             |        |

## LTE Band 7 part:

| LTE Band 7, WB: 5MHz                                                                             |                   |             |             |        |
|--------------------------------------------------------------------------------------------------|-------------------|-------------|-------------|--------|
| RB size 1 & RB offset 0                                                                          |                   |             |             |        |
| Frequency (MHz)                                                                                  | Spurious Emission |             | Limit (dBm) | Result |
|                                                                                                  | Polarization      | Level (dBm) |             |        |
| Lowest Channel                                                                                   |                   |             |             |        |
| 5005.00                                                                                          | Vertical          | -44.80      | -25.00      | Pass   |
| 7507.50                                                                                          | V                 | -38.55      |             |        |
| 10010.00                                                                                         | V                 | -35.56      |             |        |
| 5005.00                                                                                          | Horizontal        | -45.51      |             |        |
| 7507.50                                                                                          | H                 | -38.81      |             |        |
| 10010.00                                                                                         | H                 | -35.52      |             |        |
| Middle Channel                                                                                   |                   |             |             |        |
| 5070.00                                                                                          | Vertical          | -44.65      | -25.00      | Pass   |
| 7605.00                                                                                          | V                 | -38.90      |             |        |
| 10140.00                                                                                         | V                 | -35.06      |             |        |
| 5070.00                                                                                          | Horizontal        | -45.76      |             |        |
| 7605.00                                                                                          | H                 | -38.19      |             |        |
| 10140.00                                                                                         | H                 | -35.25      |             |        |
| Highest Channel                                                                                  |                   |             |             |        |
| 5135.00                                                                                          | Vertical          | -44.50      | -25.00      | Pass   |
| 7702.50                                                                                          | V                 | -38.72      |             |        |
| 10270.00                                                                                         | V                 | -35.64      |             |        |
| 5135.00                                                                                          | Horizontal        | -45.99      |             |        |
| 7702.50                                                                                          | H                 | -38.06      |             |        |
| 10270.00                                                                                         | H                 | -35.16      |             |        |
| Note:                                                                                            |                   |             |             |        |
| 1. The emission levels of below 1 GHz are 20 dB lower than the limit so not show in this report. |                   |             |             |        |
| 2. For above 1 GHz, all test modes were performed, and just the worst case shown in the report.  |                   |             |             |        |

| LTE Band 7, WB: 20MHz                                                                            |                   |             |             |        |
|--------------------------------------------------------------------------------------------------|-------------------|-------------|-------------|--------|
| RB size 1 & RB offset 0                                                                          |                   |             |             |        |
| Frequency (MHz)                                                                                  | Spurious Emission |             | Limit (dBm) | Result |
|                                                                                                  | Polarization      | Level (dBm) |             |        |
| Lowest Channel                                                                                   |                   |             |             |        |
| 5020.00                                                                                          | Vertical          | -44.24      | -25.00      | Pass   |
| 7530.00                                                                                          | V                 | -38.81      |             |        |
| 10040.00                                                                                         | V                 | -35.13      |             |        |
| 5020.00                                                                                          | Horizontal        | -45.99      |             |        |
| 7530.00                                                                                          | H                 | -38.06      |             |        |
| 10040.00                                                                                         | H                 | -35.67      |             |        |
| Middle Channel                                                                                   |                   |             |             |        |
| 5070.00                                                                                          | Vertical          | -44.24      | -25.00      | Pass   |
| 7605.00                                                                                          | V                 | -38.19      |             |        |
| 10140.00                                                                                         | V                 | -35.99      |             |        |
| 5070.00                                                                                          | Horizontal        | -45.52      |             |        |
| 7605.00                                                                                          | H                 | -38.86      |             |        |
| 10140.00                                                                                         | H                 | -35.04      |             |        |
| Highest Channel                                                                                  |                   |             |             |        |
| 5120.00                                                                                          | Vertical          | -44.91      | -25.00      | Pass   |
| 7680.00                                                                                          | V                 | -38.24      |             |        |
| 10240.00                                                                                         | V                 | -35.19      |             |        |
| 5120.00                                                                                          | Horizontal        | -45.55      |             |        |
| 7680.00                                                                                          | H                 | -38.53      |             |        |
| 10240.00                                                                                         | H                 | -35.52      |             |        |
| Note:                                                                                            |                   |             |             |        |
| 1. The emission levels of below 1 GHz are 20 dB lower than the limit so not show in this report. |                   |             |             |        |
| 2. For above 1 GHz, all test modes were performed, and just the worst case shown in the report.  |                   |             |             |        |

## 6.6 Frequency stability V.S. Temperature measurement

|                   |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         |
|-------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Test Requirement: | Part 22.355, Part 27.54, Part 2.1055(a)(1)(b)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           |
| Limit:            | $\pm 2.5\text{ppm}$                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     |
| Test setup:       | <p>The diagram illustrates the test setup. A Power Source is connected to a Divider. The Divider's output is split: one path goes through a feed-through attenuator (SA) to a Spectrum Analyzer (SS), and the other path goes through a feed-through attenuator (EUT) to a Temperature &amp; Humidity Chamber. The chamber contains the Equipment Under Test (EUT).</p>                                                                                                                                                                                                                                                                                                                                                                                                 |
| Test procedure:   | <ol style="list-style-type: none"> <li>1. The equipment under test was connected to an external DC power supply and input rated voltage.</li> <li>2. RF output was connected to a frequency counter or spectrum analyzer via feed through attenuators.</li> <li>3. The EUT was placed inside the temperature chamber.</li> <li>4. Set the spectrum analyzer RBW low enough to obtain the desired frequency resolution and measure EUT 25°C operating frequency as reference frequency.</li> <li>5. Turn EUT off and set the chamber temperature to -30°C. After the temperature stabilized for approximately 30 minutes recorded the frequency.</li> <li>6. Repeat step measure with 10°C increased per stage until the highest temperature of +50°C reached</li> </ol> |
| Test Instruments: | Refer to section 5.10 for details                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       |
| Test mode:        | Refer to section 5.3 for details                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |
| Test results:     | Passed                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  |

## Measurement Data (worst case):

## LTE Band 4 part:

| Reference Frequency: LTE Band 4 (10MHz) Middle channel=20175 channel=1732.50MHz |                  |                 |          |             |        |
|---------------------------------------------------------------------------------|------------------|-----------------|----------|-------------|--------|
| Power supplied (Vdc)                                                            | Temperature (°C) | Frequency error |          | Limit (ppm) | Result |
|                                                                                 |                  | Hz              | ppm      |             |        |
| QPSK                                                                            |                  |                 |          |             |        |
| 3.70                                                                            | -30              | 174             | 0.100433 | ±2.5        | Pass   |
|                                                                                 | -20              | 163             | 0.094084 |             |        |
|                                                                                 | -10              | 148             | 0.085426 |             |        |
|                                                                                 | 0                | 120             | 0.069264 |             |        |
|                                                                                 | 10               | 166             | 0.095815 |             |        |
|                                                                                 | 20               | 134             | 0.077345 |             |        |
|                                                                                 | 30               | 152             | 0.087734 |             |        |
|                                                                                 | 40               | 130             | 0.075036 |             |        |
|                                                                                 | 50               | 108             | 0.062338 |             |        |
| 16QAM                                                                           |                  |                 |          |             |        |
| 3.70                                                                            | -30              | 162             | 0.093506 | ±2.5        | Pass   |
|                                                                                 | -20              | 148             | 0.085426 |             |        |
|                                                                                 | -10              | 146             | 0.084271 |             |        |
|                                                                                 | 0                | 122             | 0.070418 |             |        |
|                                                                                 | 10               | 137             | 0.079076 |             |        |
|                                                                                 | 20               | 155             | 0.089466 |             |        |
|                                                                                 | 30               | 103             | 0.059452 |             |        |
|                                                                                 | 40               | 127             | 0.073304 |             |        |
|                                                                                 | 50               | 149             | 0.086003 |             |        |
| Note: Only the worst case shown in the report.                                  |                  |                 |          |             |        |

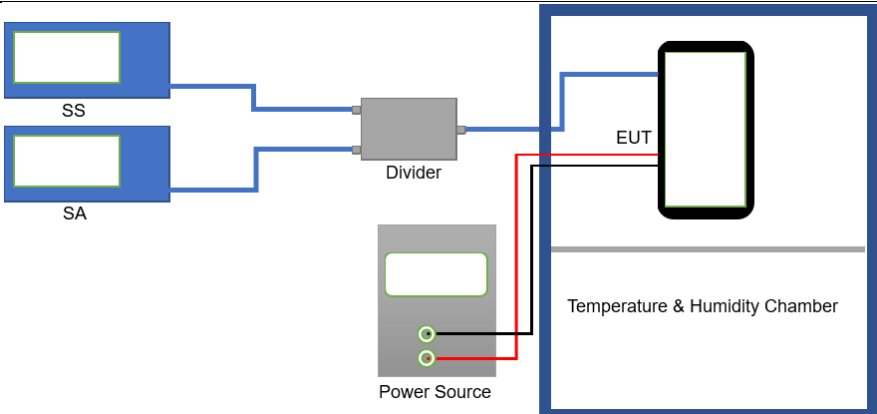
## LTE Band 5 part:

| Reference Frequency: LTE Band 5 (10MHz) Middle channel=20525 channel=836.50MHz |                  |                 |          |             |        |
|--------------------------------------------------------------------------------|------------------|-----------------|----------|-------------|--------|
| Power supplied<br>(Vdc)                                                        | Temperature (°C) | Frequency error |          | Limit (ppm) | Result |
|                                                                                |                  | Hz              | ppm      |             |        |
| QPSK                                                                           |                  |                 |          |             |        |
| 3.70                                                                           | -30              | 169             | 0.202032 | ±2.5        | Pass   |
|                                                                                | -20              | 124             | 0.148237 |             |        |
|                                                                                | -10              | 159             | 0.190078 |             |        |
|                                                                                | 0                | 160             | 0.191273 |             |        |
|                                                                                | 10               | 147             | 0.175732 |             |        |
|                                                                                | 20               | 150             | 0.179319 |             |        |
|                                                                                | 30               | 133             | 0.158996 |             |        |
|                                                                                | 40               | 160             | 0.191273 |             |        |
|                                                                                | 50               | 155             | 0.185296 |             |        |
| 16QAM                                                                          |                  |                 |          |             |        |
| 3.70                                                                           | -30              | 180             | 0.215182 | ±2.5        | Pass   |
|                                                                                | -20              | 176             | 0.210400 |             |        |
|                                                                                | -10              | 142             | 0.169755 |             |        |
|                                                                                | 0                | 108             | 0.129109 |             |        |
|                                                                                | 10               | 136             | 0.162582 |             |        |
|                                                                                | 20               | 155             | 0.185296 |             |        |
|                                                                                | 30               | 164             | 0.196055 |             |        |
|                                                                                | 40               | 124             | 0.148237 |             |        |
|                                                                                | 50               | 144             | 0.172146 |             |        |
| Note: Only the worst case shown in the report.                                 |                  |                 |          |             |        |

## LTE Band 7 part:

| Reference Frequency: LTE Band 7 (10MHz) Middle channel=21100 Frequency=2535.00MHz |                  |                 |          |             |        |
|-----------------------------------------------------------------------------------|------------------|-----------------|----------|-------------|--------|
| Power supplied<br>(Vdc)                                                           | Temperature (°C) | Frequency error |          | Limit (ppm) | Result |
|                                                                                   |                  | Hz              | ppm      |             |        |
| QPSK                                                                              |                  |                 |          |             |        |
| 3.70                                                                              | -30              | 174             | 0.068639 | ±2.5        | Pass   |
|                                                                                   | -20              | 158             | 0.062327 |             |        |
|                                                                                   | -10              | 153             | 0.060355 |             |        |
|                                                                                   | 0                | 169             | 0.066667 |             |        |
|                                                                                   | 10               | 134             | 0.052860 |             |        |
|                                                                                   | 20               | 126             | 0.049704 |             |        |
|                                                                                   | 30               | 158             | 0.062327 |             |        |
|                                                                                   | 40               | 120             | 0.047337 |             |        |
|                                                                                   | 50               | 107             | 0.042209 |             |        |
| 16QAM                                                                             |                  |                 |          |             |        |
| 3.70                                                                              | -30              | 169             | 0.066667 | ±2.5        | Pass   |
|                                                                                   | -20              | 135             | 0.053254 |             |        |
|                                                                                   | -10              | 124             | 0.048915 |             |        |
|                                                                                   | 0                | 157             | 0.061933 |             |        |
|                                                                                   | 10               | 117             | 0.046154 |             |        |
|                                                                                   | 20               | 125             | 0.049310 |             |        |
|                                                                                   | 30               | 160             | 0.063116 |             |        |
|                                                                                   | 40               | 106             | 0.041815 |             |        |
|                                                                                   | 50               | 155             | 0.061144 |             |        |
| Note: Only the worst case shown in the report.                                    |                  |                 |          |             |        |

## 6.7 Frequency stability V.S. Voltage measurement

|                   |                                                                                                                                                                                                                                                                                                                                                                                                                                                |
|-------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Test Requirement: | Part 22.355, Part 27.54, Part 2.1055(d)(2)                                                                                                                                                                                                                                                                                                                                                                                                     |
| Limit:            | ±2.5ppm                                                                                                                                                                                                                                                                                                                                                                                                                                        |
| Test setup:       |  <p>The diagram illustrates the test setup. A Spectrum Analyzer (SA) and a Signal Source (SS) are connected to a Divider. The Divider is connected to the EUT (Equipment Under Test) inside a Temperature &amp; Humidity Chamber. A Power Source is also connected to the EUT.</p>                                                                           |
| Test procedure:   | <ol style="list-style-type: none"> <li>1. Set chamber temperature to 25°C. Use a variable DC power source to power the EUT and set the voltage to rated voltage.</li> <li>2. Set the spectrum analyzer RBW low enough to obtain the desired frequency resolution and recorded the frequency.</li> <li>3. Reduce the input voltage to specify extreme voltage variation (+/- 15%) and endpoint, record the maximum frequency change.</li> </ol> |
| Test Instruments: | Refer to section 5.10 for details                                                                                                                                                                                                                                                                                                                                                                                                              |
| Test mode:        | Refer to section 5.3 for details                                                                                                                                                                                                                                                                                                                                                                                                               |
| Test results:     | Passed                                                                                                                                                                                                                                                                                                                                                                                                                                         |

## Measurement Data (worst case):

## LTE Band 4 part:

| Reference Frequency: LTE Band 4(10MHz) Middle channel=20175 channel=1732.50MHz |                      |                 |          |             |        |
|--------------------------------------------------------------------------------|----------------------|-----------------|----------|-------------|--------|
| Temperature (°C)                                                               | Power supplied (Vdc) | Frequency error |          | Limit (ppm) | Result |
|                                                                                |                      | Hz              | ppm      |             |        |
| QPSK                                                                           |                      |                 |          |             |        |
| 25                                                                             | 4.2                  | 84              | 0.048485 | ±2.5        | Pass   |
|                                                                                | 3.7                  | 65              | 0.037518 |             |        |
|                                                                                | 3.5                  | 57              | 0.032900 |             |        |
| 16QAM                                                                          |                      |                 |          |             |        |
| 25                                                                             | 4.2                  | 74              | 0.042713 | ±2.5        | Pass   |
|                                                                                | 3.7                  | 52              | 0.030014 |             |        |
|                                                                                | 3.5                  | 38              | 0.021934 |             |        |
| Note: Only the worst case shown in the report.                                 |                      |                 |          |             |        |

## LTE Band 5 part:

| Reference Frequency: LTE Band 5(10MHz) Middle channel=20525 channel=836.50MHz |                      |                 |          |             |        |
|-------------------------------------------------------------------------------|----------------------|-----------------|----------|-------------|--------|
| Temperature (°C)                                                              | Power supplied (Vdc) | Frequency error |          | Limit (ppm) | Result |
|                                                                               |                      | Hz              | ppm      |             |        |
| QPSK                                                                          |                      |                 |          |             |        |
| 25                                                                            | 4.2                  | 96              | 0.114764 | ±2.5        | Pass   |
|                                                                               | 3.7                  | 78              | 0.093246 |             |        |
|                                                                               | 3.5                  | 80              | 0.095637 |             |        |
| 16QAM                                                                         |                      |                 |          |             |        |
| 25                                                                            | 4.2                  | 56              | 0.066946 | ±2.5        | Pass   |
|                                                                               | 3.7                  | 37              | 0.044232 |             |        |
|                                                                               | 3.5                  | 48              | 0.057382 |             |        |
| Note: Only the worst case shown in the report.                                |                      |                 |          |             |        |

## LTE Band 7 part:

| Reference Frequency: LTE Band 7(10MHz) Middle channel=21100 Frequency=2535.00MHz |                      |                 |          |             |        |
|----------------------------------------------------------------------------------|----------------------|-----------------|----------|-------------|--------|
| Temperature (°C)                                                                 | Power supplied (Vdc) | Frequency error |          | Limit (ppm) | Result |
|                                                                                  |                      | Hz              | ppm      |             |        |
| QPSK                                                                             |                      |                 |          |             |        |
| 25                                                                               | 4.2                  | 76              | 0.029980 | ±2.5        | Pass   |
|                                                                                  | 3.7                  | 58              | 0.022880 |             |        |
|                                                                                  | 3.5                  | 49              | 0.019329 |             |        |
| 16QAM                                                                            |                      |                 |          |             |        |
| 25                                                                               | 4.2                  | 85              | 0.033531 | ±2.5        | Pass   |
|                                                                                  | 3.7                  | 64              | 0.025247 |             |        |
|                                                                                  | 3.5                  | 59              | 0.023274 |             |        |
| Note: Only the worst case shown in the report.                                   |                      |                 |          |             |        |