
	Equipment in test PLB : Kannad XS3-GPS	INTESPACE Reference E7555-RTCM
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CHAPTER 9

SPURIOUS EMISSIONS TEST

	<p align="center">Equipment in test</p> <p align="center">PLB : Kannad XS3-GPS</p>	<p align="center">INTESPACE Reference</p> <p align="center">E7555-RTCM</p>
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9.1 TEST SPECIFICATIONS AND PROGRAMME

Following Section A8.0 of RTCM Recommended Standards for 406 MHz Satellite PLBs (Version 1.1 Feb 4, 2003) :

- Perform the spurious emissions measurements for the 406 MHz and 121.5 MHz signals at the minimum, maximum, and ambient temperatures .
- Control, respectively, that measurements not exceed the limits given in Figure 2-1(406 MHz Spectrum Mask) and Figure 2-5 (121.5 MHz Spectrum Mask)

Note : These tests are performed during the COSPAS-SARSAT Type Approval tests (chapter 10)

9.2 EQUIPMENT UNDER TEST

Beacon Unit : 1/2 (with 50 ohm output)
Name : MARTEC / KANNAD
Type : XS3_GPS
Number : UT1

9.3 TEST SITE

Toulouse Space Center (CST) - INTESPACE Laboratory.

9.4 TEST EQUIPMENT

- Climatic chamber : CLIMATS F.C.H. – Type: Austral 137H60/1,5E - S/N: S4880.
- Argos - Cospas/Sarsat Test Bench

9.5. TEST DATE

11 to 12 October 2007

9.6. RESULTS

The graphs of spurious measurements for the 406 MHz and 121.5 MHz signals are reported next pages :



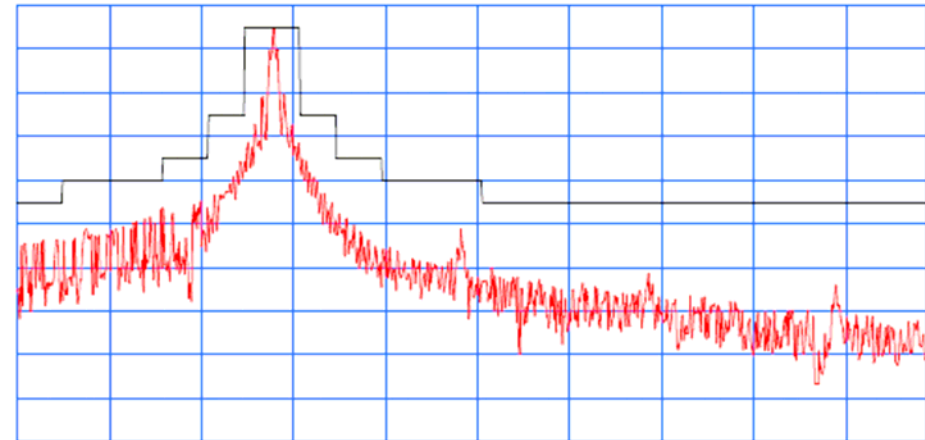
Equipment in test
PLB : Kannad XS3-GPS

INTESPACE Reference
E7555-RTCM

MARTEC / KANNAD
XS3-GPS
UT1
Spurious
406 MHz
-20 °C

CF : 406,05 MHz

SP : 100 KHz



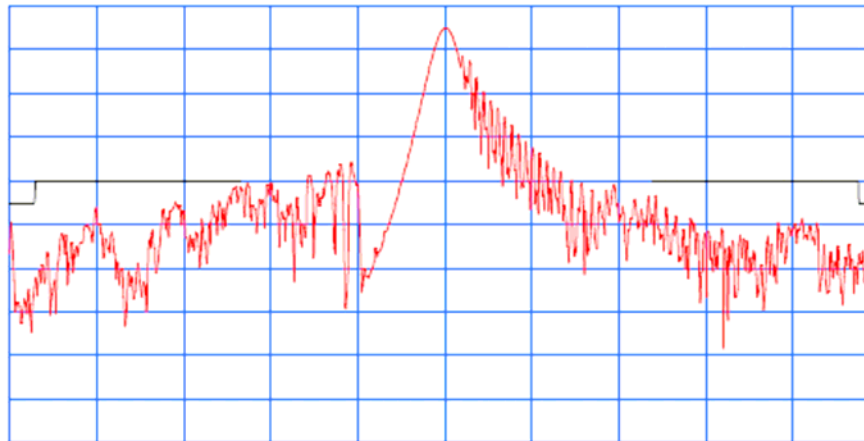
Rb : 0,1 KHz

10 dB/div.

St : 30 S

CF : 406,028 MHz

SP : 50 KHz



Rb : 1 KHz

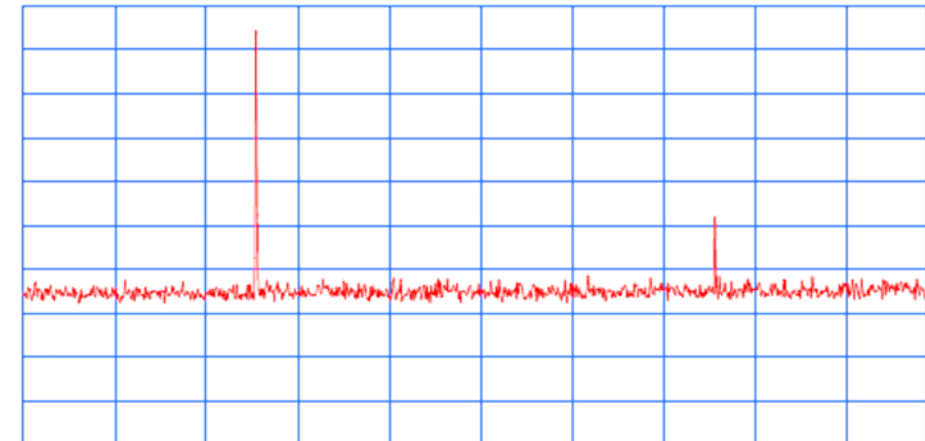
10 dB/div.

St : 0,305 S

CF : 600 MHz

Delta : -42,47 dB

SP : 800000 KHz



Rb : 100 KHz

10 dB/div.

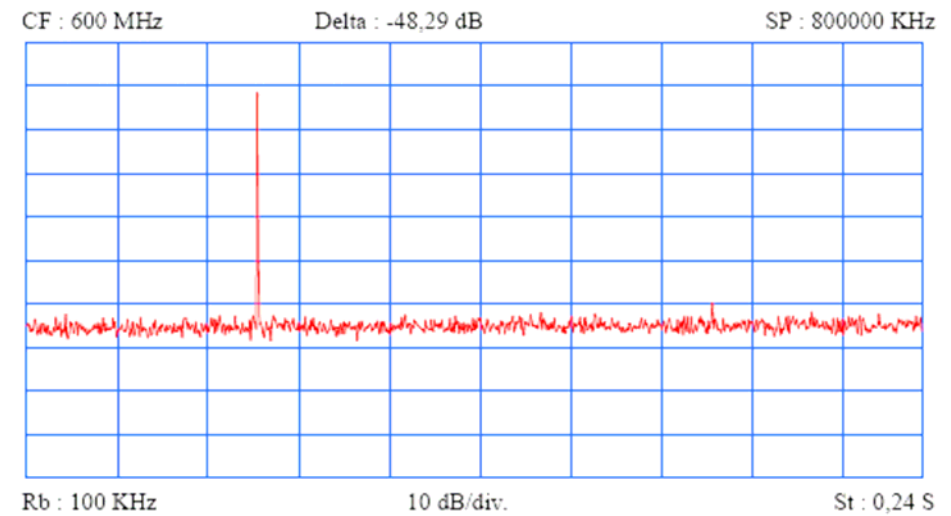
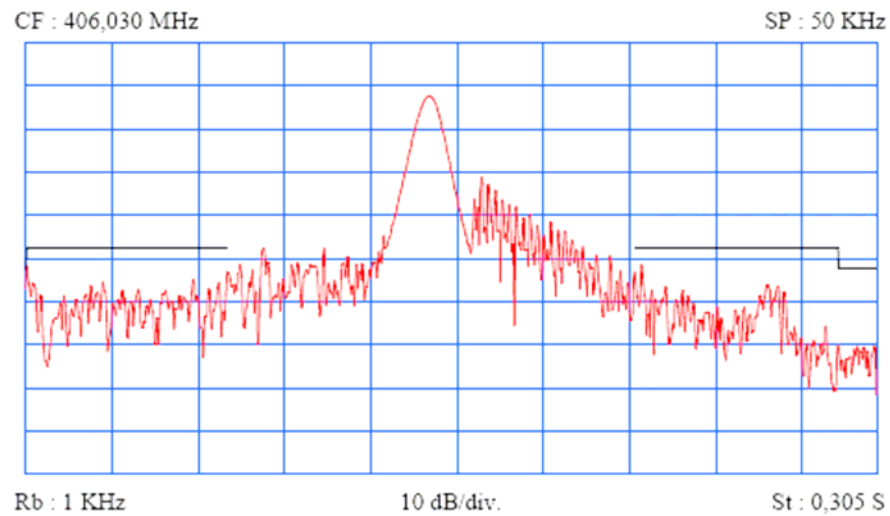
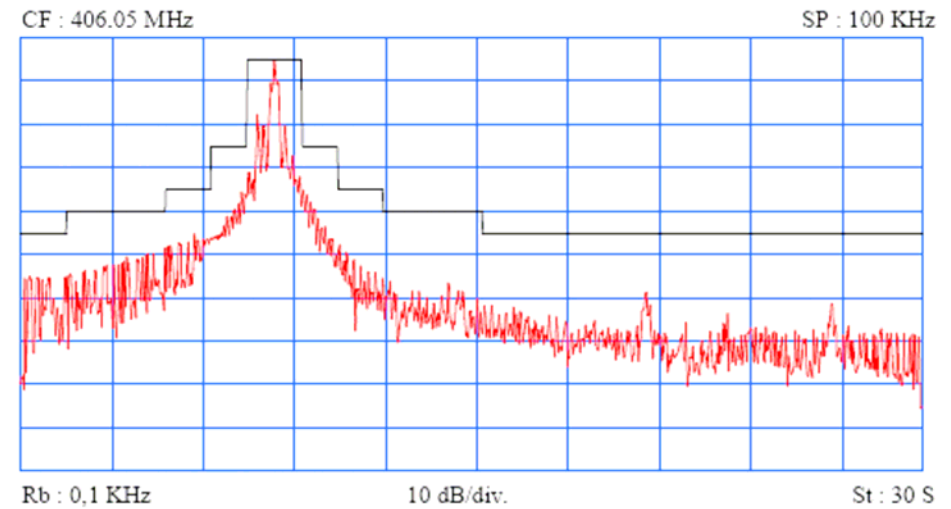
St : 0,24 S



Equipment in test
PLB : Kannad XS3-GPS

INTESPACE Reference
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MARTEC / KANNAD
XS3-GPS
UT1
Spurious
406 MHz
22 °C





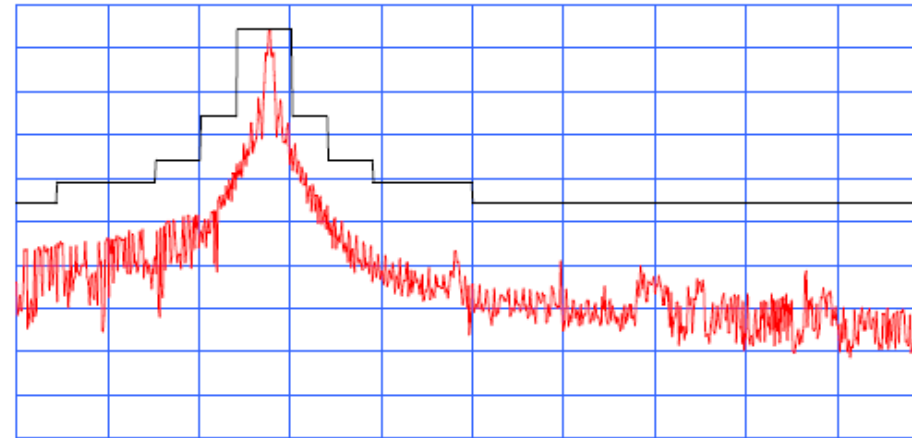
Equipment in test
PLB : Kannad XS3-GPS

INTESPACE Reference
E7555-RTCM

MARTEC / KANNAD
XS3-GPS
UT1
Spurious
406 MHz
55 °C

CF : 406,05 MHz

SP : 100 KHz



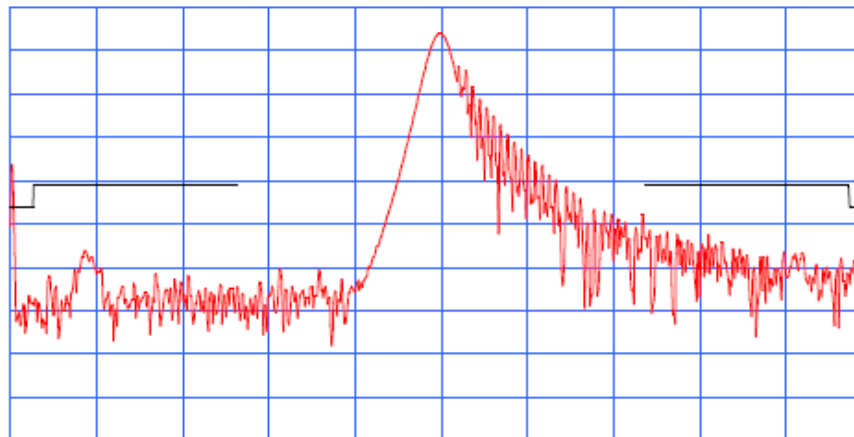
Rb : 0,1 KHz

10 dB/div.

St : 30 S

CF : 406,028 MHz

SP : 50 KHz



Rb : 1 KHz

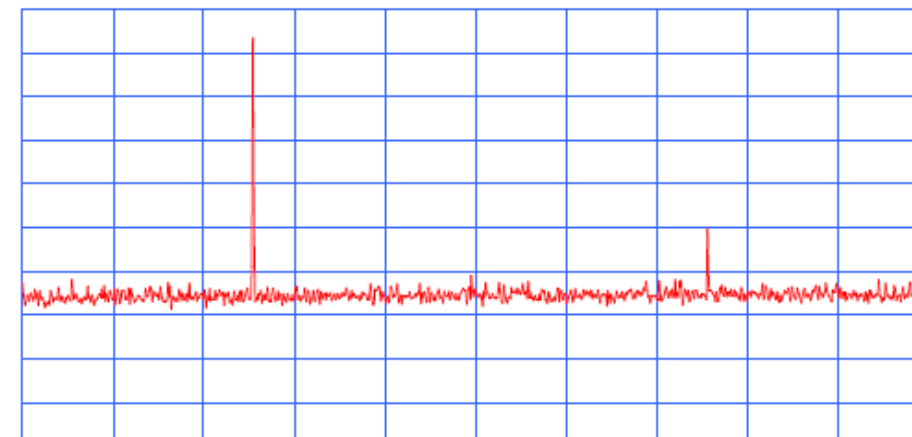
10 dB/div.

St : 0,305 S

CF : 600 MHz

Delta : -43,76 dB

SP : 800000 KHz



Rb : 100 KHz

10 dB/div.

St : 0,24 S



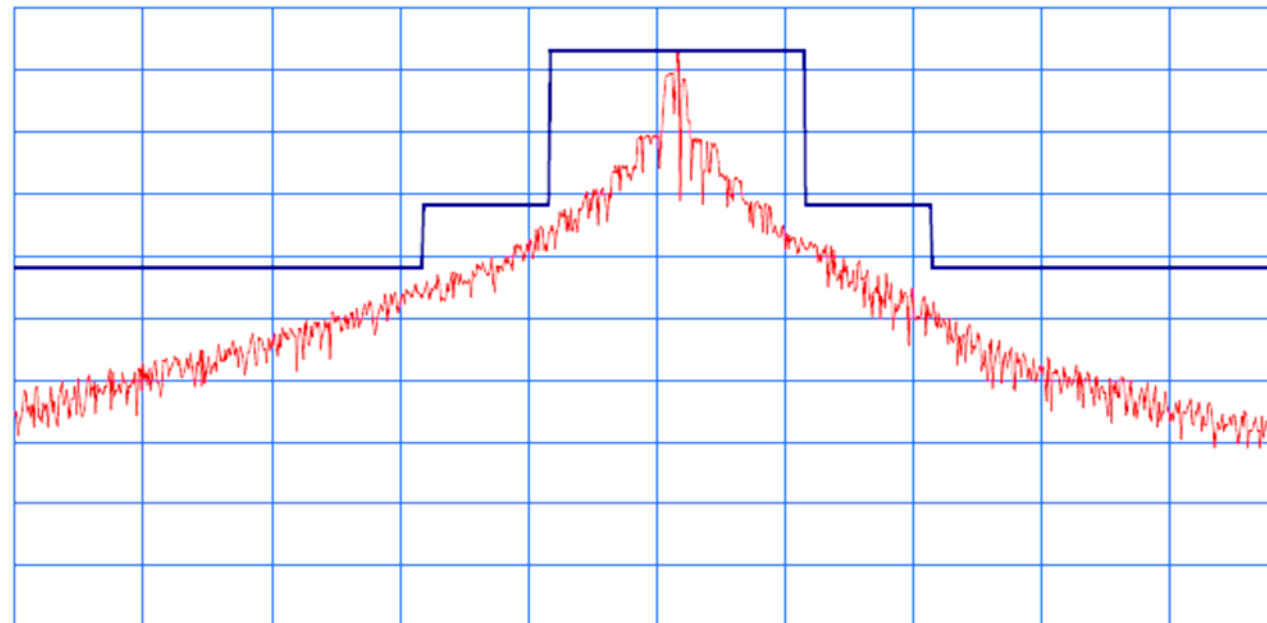
Equipment in test
PLB : Kannad XS3-GPS

INTESPACE Reference
E7555-RTCM

MARTEC / KANNAD
XS3-GPS
UT1
Spurious
121,5 MHz
-20 °C

CF : 121,5 MHz

SP : 125 KHz



Rb : 0,1 KHz

10 dB/div.

St : 37,5 S



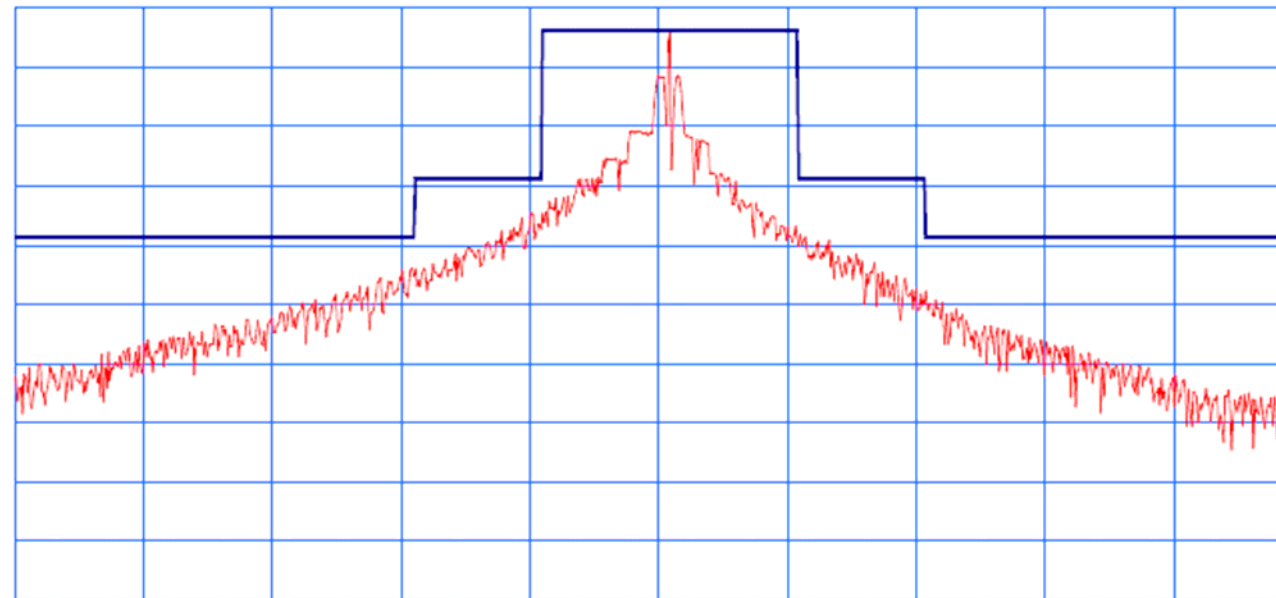
Equipment in test
PLB : Kannad XS3-GPS

INTESPACE Reference
E7555-RTCM

MARTEC / KANNAD
XS3-GPS
UT1
Spurious
121,5 MHz
22 °C

CF : 121,5 MHz

SP : 125 KHz



Rb : 0,1 KHz

10 dB/div.

St : 37,5 S



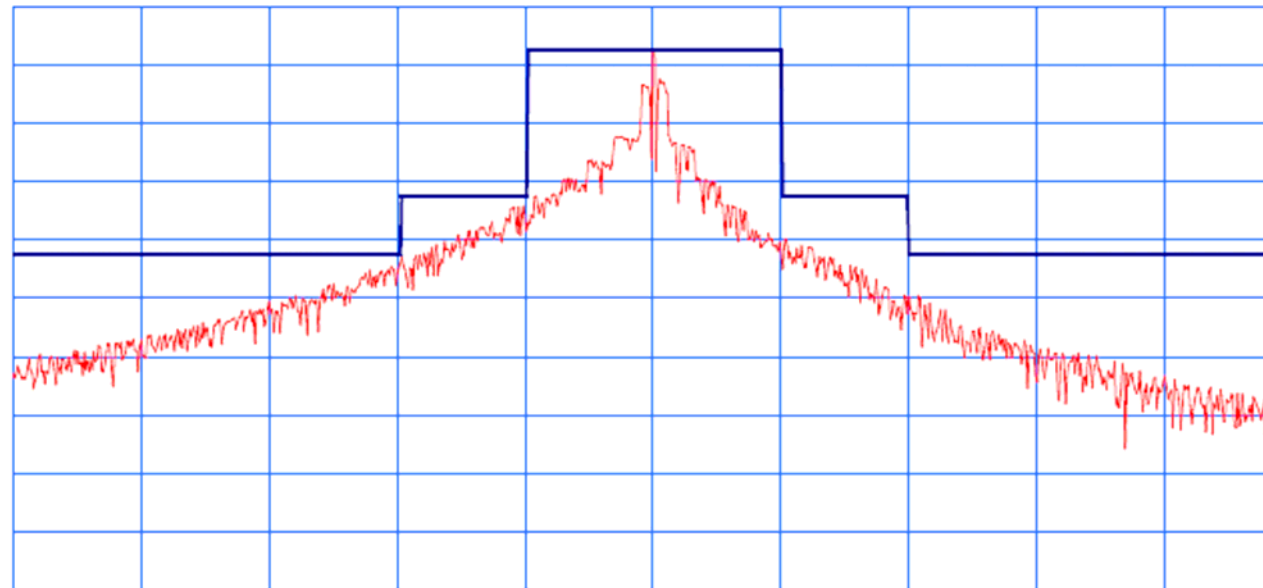
Equipment in test
PLB : Kannad XS3-GPS

INTESPACE Reference
E7555-RTCM

MARTEC / KANNAD
XS3-GPS
UT1
Spurious
121,5 MHz
55 °C

CF : 121,5 MHz

SP : 125 KHz



Rb : 0,1 KHz

10 dB/div.

St : 37,5 S