

RxControl Diagnostic Report

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RxControl Information

RxControl Version

Product: RxControl

Version: 4.7.0

Internal ID: RxTools_1_8_0_rc2 (1112191539)

Description: Controls and monitors Septentrio receivers released after PolaRx2/2e model. Does not support PolaRx2/2e receivers.

Library	Version
comms2.dll	2.1.6
fw2.dll	2.1.6
geod2.dll	2.1.6
messageapicmr2.dll	2.1.6
messageapiframework2.dll	2.1.6
messageapigui2.dll	2.1.6
messageapirtcm22.dll	2.1.6
messageapirtcm32.dll	2.1.6
messageapisbf2.dll	2.1.6
msvcmm90.dll	9.00.21022
msvcpr90.dll	9.00.21022
msvcr90.dll	9.00.21022
phonon4.dll	4.4.0
QtCore4.dll	4.7.3
QtGui4.dll	4.7.3
QtNetwork4.dll	4.7.3
QtOpenGL4.dll	4.7.3
QtSvg4.dll	4.7.3
QtWebKit4.dll	4.7.3
QtXml4.dll	4.7.3
QtXmlPatterns4.dll	4.7.3
sepqt2.dll	2.1.6
ssnplot2.dll	2.1.6

External Program	Version
RINEX	sb2rin-8.1.0

ISMR
CGGTTS

sbf2ismr-4.3.0
rin2cgg-4.3

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Installation Information

Installation directory C:\Program Files\Septentrio\RxTools\bin
Settings directory C:\Documents and Settings\AntCa\septentrio\
Logging directory C:\Documents and Settings\AntCa\My Documents\AsteRx\

Current Connection (AsteRx.tcpip)

Connected to SSRC2 on IP15

Hostname or IP-address: 10.74.19.23

Portnumber: 28784

Event Information

#	Severity	Date	Time	Message
552	Error	2012-11-26	20:19:08	Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console.
553	Error	2012-11-26	20:20:00	- Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console. - Receiver output data congestion
554	Error	2012-11-26	20:20:01	Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console.
555	Error	2012-11-26	20:21:36	- Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console. - Receiver output data congestion
556	Error	2012-11-26	20:21:37	Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console.
557	Error	2012-11-26	20:21:55	- Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console. - Receiver output data congestion
558	Error	2012-11-26	20:21:56	Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console.
559	Error	2012-11-26	20:23:31	- Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console. - Receiver output data congestion
560	Error	2012-11-26	20:23:32	Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console.
561	Error	2012-11-26	20:24:09	- Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console. - Receiver output data congestion
562	Error	2012-11-26	20:24:10	Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console.
563	Error	2012-11-26	20:24:53	- Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console. - Receiver output data congestion
564	Error	2012-11-26	20:24:54	Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console.
565	Error	2012-11-26	20:25:36	- Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console. - Receiver output data congestion
566	Error	2012-11-26	20:25:37	Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console.
567	Error	2012-11-26	20:27:41	- Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console. - Receiver output data congestion
568	Error	2012-11-26	20:27:42	Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console.
569	Error	2012-11-26	20:28:38	- Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console. - Receiver output data congestion
570	Error	2012-11-26	20:28:39	Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console.
571	Error	2012-11-26	20:30:33	- Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console. - Receiver output data congestion

execute lif,Error in the Expert Console.

633 Error 2012-11-26 20:57:26 - Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console. - Receiver output data congestion

634 Error 2012-11-26 20:57:27 Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console.

635 Error 2012-11-26 20:57:50 - Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console. - Receiver output data congestion

636 Error 2012-11-26 20:57:51 Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console.

637 Error 2012-11-26 20:58:29 - Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console. - Receiver output data congestion

638 Error 2012-11-26 20:58:30 Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console.

639 Error 2012-11-26 20:58:48 - Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console. - Receiver output data congestion

640 Error 2012-11-26 20:58:49 Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console.

641 Error 2012-11-26 20:58:53 - Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console. - Receiver output data congestion

642 Error 2012-11-26 20:58:54 Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console.

643 Error 2012-11-26 20:59:07 - Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console. - Receiver output data congestion

644 Error 2012-11-26 20:59:08 Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console.

645 Error 2012-11-26 21:01:12 - Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console. - Receiver output data congestion

646 Error 2012-11-26 21:01:13 Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console.

647 Error 2012-11-26 21:01:17 - Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console. - Receiver output data congestion

648 Error 2012-11-26 21:01:18 Software failure occurred. To see the error source and to clear the error signal execute lif,Error in the Expert Console.

649 Error 2012-11-26 21:01:20 The receiver returned the following error: lstInternalFile: Argument 'File' can't be omitted!

650 Error 2012-11-26 21:01:55 Receiver output data congestion

651 Error 2012-11-26 21:04:43 Receiver output data congestion

Connected Receiver Information

lstInternalFile, Identification

```
<?xml version="1.0" encoding="ISO-8859-1" ?>
<rxproduct xmlns="http://septentrio.com/ns/ProductDescription/2.6">
  <hwplatform name="SSRC2" serialnr="2001644"
    product="AsteRx2eH_PRO"
    rxfullid="SN09472001644">
    <mainboard type="GRB00121000AB0201"/>
  </hwplatform>
  <firmware version="2.1.3" interface="1.0" type="mainp">
    <bootloader version="1.10" type="ssn-u-boot-cpdfh"/>
    <gnssfw version="2.1.3" type="mainp"></gnssfw>
    <fpgaconfiguration jedeccode="00B21102"/>
  </firmware>
  <files>
    <permfile permid="20091502-2001644-1"/>
    <chancfg name="ssrc2-2.1.3-14gpc12rc3s"/>
    <antinfo format="3.0" ngs2bin="1.0" ngsid="BGK-10/05/03=303"/>
  </files>
</rxproduct>
```

IstInternalFile, Permissions

```
<?xml version="1.0" encoding="ISO-8859-1" ?>
<septpermissions version="1.91">
  <title>Septentrio Permission File for
    <permid>20091502-2001644-1</permid>
  </title>
  <receivers>
    <range serial="2001644"/>

    <gpsl1ca      val="1" descr="Tracking of GPS L1 C/A" valdescr="Permitted"/>
    <gpsl1py      val="1" descr="Tracking of GPS L1 P(Y)" valdescr="Permitted"/>
    <gpsl2py      val="1" descr="Tracking of GPS L2 P(Y)" valdescr="Permitted"/>
    <gpsl2c       val="1" descr="Tracking of GPS L2 C" valdescr="Permitted"/>
    <gpsl5        val="0" descr="Tracking of GPS L5 I/Q" valdescr="Not permitted"/>
    <glol1ca     val="1" descr="Tracking of GLONASS L1 C/A" valdescr="Permitted"/>
    <glol1p      val="1" descr="Tracking of GLONASS L1 P" valdescr="Permitted"/>
    <glol2p      val="1" descr="Tracking of GLONASS L2 P" valdescr="Permitted"/>
    <glol2ca     val="1" descr="Tracking of GLONASS L2 C/A" valdescr="Permitted"/>
    <gall1a      val="0"
descr="Tracking of Galileo L1 A" valdescr="Not permitted"/>
    <gall1bc     val="0"
descr="Tracking of Galileo L1 BC" valdescr="Not permitted"/>
    <galle6a     val="0"
descr="Tracking of Galileo E6 A" valdescr="Not permitted"/>
    <galla6bc    val="0"
descr="Tracking of Galileo E6 BC" valdescr="Not permitted"/>
    <gale5a      val="0"
descr="Tracking of Galileo E5a I/Q" valdescr="Not permitted"/>
    <gale5b      val="0"
descr="Tracking of Galileo E5b I/Q" valdescr="Not permitted"/>
    <gale5       val="0"
descr="Tracking of Galileo E5 AltBOC" valdescr="Not permitted"/>

    <dgps_rover  val="1" descr="DGPS Rover" valdescr="Permitted"/>
    <dgps_base   val="1" descr="DGPS Base" valdescr="Permitted"/>
    <rtk_rover   val="0" descr="RTK Rover" valdescr="Not permitted"/>
    <rtk_base    val="0" descr="RTK Base" valdescr="Not permitted"/>
    <nb_ant      val="2"
descr="Number of antennas" valdescr="Permitted for 2 antennas"/>
    <pps_in      val="0" descr="1PPS input" valdescr="Not permitted"/>
    <ethernet    val="1" descr="Ethernet" valdescr="Permitted"/>
    <logging     val="1" descr="Logging" valdescr="Permitted"/>
    <event_tracking val="0" descr="Event tracking" valdescr="Not permitted"/>
    <attitude    val="2"
descr="Attitude" valdescr="Permitted mode 2 (angles, rates and aux ant positions)"/>
    <datarate    val="25"
descr="Maximum Data Rate" valdescr="Permitted up to 25 Hz"/>
    <usb         val="1" descr="USB" valdescr="Permitted"/>
    <ins         val="0" descr="INS" valdescr="Not permitted"/>
    <can         val="0" descr="CAN" valdescr="Not permitted"/>
    <wadiff      val="0" descr="Wide-Area Differential" valdescr="Not permitted"/>
    <apme        val="1" descr="APME" valdescr="Permitted"/>
    <nonatolimits val="0" descr="No NATO limits" valdescr="Not permitted"/>
    <raim        val="1" descr="RAIM" valdescr="Permitted"/>
    <lband       val="0" descr="Tracking of L-Band" valdescr="Not permitted"/>
    <augm_data_svc val="0" descr="Augmentation Data Svc" valdescr="None"/>
    <ppp         val="0" descr="PPP" valdescr="Not permitted"/>
  </receivers>
</septpermissions>
```

getChannelConfiguration

ChannelConfiguration, Ch01, GPSL1CA+GPSL2PY+GPSL2C

```

ChannelConfiguration, Ch02, GPSL1CA+GPSL2PY+GPSL2C
ChannelConfiguration, Ch03, GPSL1CA+GPSL2PY+GPSL2C
ChannelConfiguration, Ch04, GPSL1CA+GPSL2PY+GPSL2C
ChannelConfiguration, Ch05, GPSL1CA+GPSL2PY+GPSL2C
ChannelConfiguration, Ch06, GPSL1CA+GPSL2PY+GPSL2C
ChannelConfiguration, Ch07, GPSL1CA+GPSL2PY+GPSL2C
ChannelConfiguration, Ch08, GPSL1CA+GPSL2PY+GPSL2C
ChannelConfiguration, Ch09, GPSL1CA+GPSL2PY+GPSL2C
ChannelConfiguration, Ch10, GPSL1CA+GPSL2PY+GPSL2C
ChannelConfiguration, Ch11, GPSL1CA+GPSL2PY+GPSL2C
ChannelConfiguration, Ch12, GPSL1CA+GPSL2PY+GPSL2C
ChannelConfiguration, Ch13, GPSL1CA+GPSL2PY+GPSL2C
ChannelConfiguration, Ch14, GPSL1CA+GPSL2PY+GPSL2C
ChannelConfiguration, Ch15, GLOL1CA+GLOL2CA
ChannelConfiguration, Ch16, GLOL1CA+GLOL2CA
ChannelConfiguration, Ch17, GLOL1CA+GLOL2CA
ChannelConfiguration, Ch18, GLOL1CA+GLOL2CA
ChannelConfiguration, Ch19, GLOL1CA+GLOL2CA
ChannelConfiguration, Ch20, GLOL1CA+GLOL2CA
ChannelConfiguration, Ch21, GLOL1CA+GLOL2CA
ChannelConfiguration, Ch22, GLOL1CA+GLOL2CA
ChannelConfiguration, Ch23, GLOL1CA+GLOL2CA
ChannelConfiguration, Ch24, GLOL1CA+GLOL2CA
ChannelConfiguration, Ch25, GLOL1CA+GLOL2CA
ChannelConfiguration, Ch26, GLOL1CA+GLOL2CA
ChannelConfiguration, Ch27, GEOL1
ChannelConfiguration, Ch28, GEOL1
ChannelConfiguration, Ch29, GEOL1

```

getReceiverCapabilities

```

ReceiverCapabilities, Main+Aux1, GPSL1CA+GPSL2PY+GPSL2C+GLOL1CA+GLOL2P+GLOL2CA+GEOL1
, DSK1+COM1+COM2+COM3+COM4+USB1+USB2+IP10+IP11+IP12+IP13+IP14+IP15+IP16+IP17, SBAS+DGP
SRover+DGPSBase+RTCMv23+RTCMv3x+CMRv20+xPPSOutput+InternalLogging+Heading+APME+RAIM, 5
0, 50

```

getReceiverInterface

```

ReceiverInterface, RxName, "SSRC2"
ReceiverInterface, SNMPLanguage, "English"
ReceiverInterface, SNMPVersion, "20110207"

```

IstConfigFile, Boot

```

# Configuration File "Boot"
# Different from RxDefault:
setDataInOut, COM1, , SBF+NMEA+ASCIIDisplay
setIPSettings, Static
setIPSettings, , "10.74.19.23"
setIPSettings, , , "10.74.19.1"

```

IstConfigFile, Current

```

# Configuration File "Current"
# Different from RxDefault:
setDataInOut, COM1, , SBF
setDataInOut, USB1, , SBF
setSBFOutput, Stream1, USB1
setSBFOutput, Stream1, , PVTCartesian
setSBFOutput, Stream1, , , msec200
setIPSettings, Static
setIPSettings, , "10.74.19.23"
setIPSettings, , , "10.74.19.1"

```

getSbfOutput

```

SBFOutput, Stream1, USB1, PVTCartesian, msec200
SBFOutput, Stream2, none, none, off
SBFOutput, Stream3, none, none, off
SBFOutput, Stream4, none, none, off
SBFOutput, Stream5, none, none, off
SBFOutput, Stream6, none, none, off
SBFOutput, Stream7, none, none, off
SBFOutput, Stream8, none, none, off
SBFOutput, Stream9, none, none, off
SBFOutput, Stream10, none, none, off
SBFOutput, Res1, IP15, OutputLink+AttEuler+GEOIGPMask+GEOIonoDelay+PVTGeodetic+PosCo
vGeodetic+VelCovGeodetic+DOP+EndOfPVT+ReceiverTime+ExtEvent+DiffCorrIn+BaseStation+Cha
nnelStatus+ReceiverStatus+ReceiverSetup+Commands+BaseVectorCart, msec200
SBFOutput, Res2, none, none, off
SBFOutput, Res3, none, none, off
SBFOutput, Res4, none, none, off

```

getDataInOut

```

DataInOut, DSK1, CMD, SBF+NMEA, (on)
DataInOut, COM1, CMD, SBF, (on)
DataInOut, COM2, CMD, SBF+NMEA, (on)
DataInOut, COM3, CMD, SBF+NMEA, (on)
DataInOut, COM4, CMD, SBF+NMEA, (on)
DataInOut, USB1, CMD, SBF, (on)
DataInOut, USB2, CMD, SBF+NMEA, (on)
DataInOut, IP10, CMD, SBF+NMEA, (off)
DataInOut, IP11, CMD, SBF+NMEA, (off)
DataInOut, IP12, CMD, SBF+NMEA, (off)
DataInOut, IP13, CMD, SBF+NMEA, (off)
DataInOut, IP14, CMD, SBF+NMEA, (off)
DataInOut, IP15, CMD, SBF+NMEA, (on)
DataInOut, IP16, CMD, SBF+NMEA, (off)
DataInOut, IP17, CMD, SBF+NMEA, (off)

```

IstInternalFile, Error

```

WARNING: THIS IS AN OLD ERROR!!!
GNSS FW: 2.1.3 SN: 2001644
CURRENT TIME:1037999128
0 1037968191 Lv: Err Ln: 378 fn_TrackerRouter_processIntert Received warningflag fro
m tracker : Main ( 0 ----- Lv: Err Ln: 723 intertrack_CreateTrackerdataCh non-
zero channelInfo data found while PRN=0 (log=19,ant=0)
1 1037968190 Lv: Err Ln: 378 fn_TrackerRouter_processIntert Received warningflag fro
m tracker : Main ( 0 ----- Lv: Err Ln: 723 intertrack_CreateTrackerdataCh non-
zero channelInfo data found while PRN=0 (log=19,ant=0)
2 1037968190 Lv: Err Ln: 378 fn_TrackerRouter_processIntert Received warningflag fro
m tracker : Main ( 0 ----- Lv: Err Ln: 723 intertrack_CreateTrackerdataCh non-
zero channelInfo data found while PRN=0 (log=19,ant=0)

```

IstInternalFile, SisError

No error information available!

IstInternalFile, DiffCorrError

No error information available!

Ascii Display

```

#21:05:31 26 Nov 2012 - sec:162331 week:1716 - uptime: 9d21:57
# -- TRACKING 18 sats -----
#Ch PRN Cor El Res DRes|Sg LT C/N0 LT C/N0 |Sg LT C/N0 LT C/N0 |
Sg LT C/N0 LT C/N0
# [d] [m] [m/s] | [s] [dBHz] [s] [dBHz] | [s] [dBHz] [s]
[dBHz] | [s] [dBHz] [s] [dBHz]

```



```

#
AUX1--- | ---MAIN--- ---AUX1--- | ---MAIN--- ---
# 1 2 1 16- -0.5 +0.008|1C 24035 40.6 24265 41.6 |2P 23986 24.2 24241 22.7 |
2C ACQ ACQ
# 2 21 1 39+ +0.0 +0.008|1C 5128 46.7 5127 46.0 |2P 5116 33.6 5116 31.6 |
2C ACQ ACQ
# 3 8 1 11- -0.3 +0.006|1C 2929 40.7 2928 39.4 |2P 2920 19.5 2912 18.4 |
2C ACQ ACQ
# 4 18 1 24+ -0.4 -0.013|1C 2806 43.3 2806 43.5 |2P 2789 26.2 2797 24.1 |
2C ACQ ACQ
# 5 5 1 36- +0.2 -0.006|1C 17995 47.2 17995 47.1 |2P 17986 36.6 17989 34.7 |
2C 17990 42.9 17987 41.2
# 6 29 1 46- +0.2 +0.002|1C 12193 49.5 12193 49.1 |2P 12187 41.2 12187 39.3 |
2C 12188 45.0 12188 43.7
# 7 26 1 58- -0.2 -0.001|1C 10909 51.8 10909 51.3 |2P 10900 43.8 10903 41.7 |
2C ACQ ACQ
# 8 15 1 73+ -0.1 -0.000|1C 7993 52.8 7993 52.2 |2P 7978 48.4 7987 46.4 |
2C 7979 49.7 7986 48.3
# 9
#10
#11
#12
#13
#14
#15 42 12+ |1C 298 44.2 298 36.8 |
2C 298 42.4 298 38.7 |
#16
#17 55 47- |1C 13120 53.2 13120 49.8 |
2C 13120 49.9 13120 49.2 |
#18 40 43- |1C 14182 50.3 14174 41.8 |
2C 14182 48.6 14177 45.1 |
#19 41 54+ |1C 7879 53.7 7474 45.4 |
2C 7683 50.5 7510 46.5 |
#20 56 55+ |1C 6118 53.6 6118 46.8 |
2C 6118 49.7 6116 47.1 |
#21 49 11- |1C 2223 44.5 2223 40.2 |
2C 2222 38.8 2222 40.1 |
#22 50 17+ |1C 1536 44.8 1535 40.3 |
2C 1536 40.2 1535 39.5 |
#23
#24
#25
#26
#27 135 18+ |
1C 1132 43.1 99999 42.4 |
#28 133 38+ |
1C 99999 45.3 99999 43.6 |
#29 138 35+ |
1C 99999 47.6 99999 46.4 |
# -- PVT: SBAS - 138 ----- 8 sats -----
# POS N 38°12'07.916" W 77°22'24.951" H +34.812 m
# VEL N +0.001 m/s E -0.004 m/s U +0.005 m/s
# CLK B +41.514 usec D -1905.312 ppb
# DOP P +1.785 H +1.021 V +1.464
# -- Heading ----- 15 sats (Fixed) -----

```

```
# Baseline =          4.88 m      Heading = 358.64402 deg      Pitch = 0.03243 deg
# -- RX INFO -----
# CPU: 19% (tracking: 0%)      INTLTCY: 23ms
# ERROR: none                  DISK(S) : MOUNTED
```

Platform Information

Operating System

Microsoft Windows XP Professional Service Pack 3 (build 2600)

System CPU

CPU: Intel(R) Pentium(R) D CPU 2.80GHz (GenuineIntel)
Stepping ID: 7
Model: 4
Family: 15
L2 cache size: 1.0 MB
CPU Features: FPU MMX SSE SSE2 SSE3 HTT
Number of CPUs: 2

- CPU 0 speed: ~2,793 MHz
- CPU 1 speed: ~2,793 MHz

System Memory

Memory in use: 48%
Total physical memory: 1,014.1 MB
Free physical memory: 523.7 MB
Total paging file: 2.9 GB
Free paging file: 2.2 GB
Total virtual memory: 2.0 GB
Free virtual memory: 1.9 GB

System Disks

C:\

Used: 33%
Free: 100.3 GB
Total: 148.9 GB

D:\

Used: 51%
Free: 63.2 GB
Total: 128.0 GB