

Instructions for downloading static files from BRx7

You can follow the steps below to download static files from the memory of your BRx7 receiver:

- 1. Power on your BRx7 GPS receiver
- 2. Connect to your BRx7 by WiFi using the WiFi manager on your laptop or desktop computer by finding the BRx7 serial number in your list of available WiFi connections.
- 3. Open your web browser and in the URL address bar type the following IP address, then hit ENTER:

192.168.10.1

- 4. If prompted for user name and password, use the following:
 - a. User Name: admin
 - b. Password: brx7

Some computers are unable to connect to the BRx7 via WiFi. In most cases, going into Device Manager and upgrading the WiFi driver resolves this problem.

- 5. The WebUI Interface should now be displayed.
- 6. Click on the "Download" tab as shown below
- 7. You can click the green "Download" buttons to the right of each file name to download each raw static *.BIN file to your computer

	BRX7 Web	UI		×	+					2	-		×
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	BRx7	D20	0			I			S/N 2	I: D200 FW: 0.4 IP: 192 020-09-09	10.200 2.168. 9 15:23	1720 10.1 3:58	^
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	Select		Na	me		Size	Modification Time(UTC)		Oper	ation			
		16.	Jul20_	5pm.bin		24.285M	2020-07-16 21:10:20	€D	wnload	💼 Dei	lete		
		16.	Jul20_	Base.bin	3	27.957M	2020-07-16 21:17:34	O Do	ownload	💼 De	lete		
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8. After downloading the BIN files from your BRx7 to your computer you can click the link below to download and install the Rinex Desktop utility:

https://web.carlsonsw.com/files/knowledgebase/kbase_attach/1200/RinexDesktopSetup_v2.0.3.msi

- 9. After the install is complete, run RinexDesktop by double-clicking the icon
- 10. Click File / New Profile then click "Load Binary File" and browse to the *.BIN file you copied over from the BRx7 receiver

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11. Left-click on the "Binary Data Rate (Hz)" in the list and type in "0.10" in the box in the bottom left as shown in the screenshot

This reduces the file size to avoid OPUS rejecting larger files over 40 megabytes and applies a 10 second interval to the RINEX file. Since OPUS decimates all RINEX data submitted down to 30 second intervals there is no benefit submitting the larger RINEX files with a 1 second interval

Binary Data Rate (Hz)	1					
Output length limit (seconds)						
Binary Data File	()\tlakeroadprofile_v203.bin					
Observation File	()\tlakeroadprofile_v203.21o					
Navigation File	()\tlakeroadprofile_v203.21n					
Glonass Navigation Data File						
BeiDou Navigation Data File						
Galileo Navigation Data File						
<						
Binary Data Rate (Hz)						
0.10						
Process RINEX 3						

- 12. Then click the "Process RINEX 3" button in the bottom left and click OK to the Rinex Conversion summary.
- This creates *.2Xo and *.2Xn RINEX files in the same folder as your *.BIN file
 2X is the year the raw static observations were taken {for example a .22o for a file created in the year 2022 or *.23o for the year 2023}
- 14. Submit this *.230 file to OPUS {the file extension will match the year it was collected}
- 15. Select "HEMS631" as the antenna type for the BRx7 receiver
- OPUS requires a vertical measurement to the bottom-most part of the GNSS receiver in metric units for the "meters above your mark" (i.e. - 2.0 meters not 6.562 feet)



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