# 4000 series 7.19b firmware

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The <u>attached .zip file</u> contain version 7.19b firmware for Trimble 4000SSE/SSi receivers. Instructions on how to load the firmware are included in the .zip file.

## Notes on Trimble 4000SSE/SSi firmware

#### Problem 1

12-channel, 4000 SSE and SSi GPS receivers with 7.29 firmware have experienced loss of data caused by an overloading of the receiver processor, possibly due to a large number of satellites in view at low elevation angles. According to Trimble, the overload might be triggered by their Everest multipath mitigation routine implemented in version 7.29 firmware. We have been able to reproduce this problem at the Boulder Facility in routine tracking with an elevation mask of 5 degrees. The Boulder Facility highly recommends that for continuously tracking, permanent GPS station installations, firmware should be re-flashed from v7.29 to v7.19b to prevent loss of data.

### Problem 2

A flash card internal memory problem was causing read-write errors on 4000SSi receivers causing significant loss of data. Trimble isolated the problem to the receiver internal flash disk power-up sequence and made firmware modifications to ensure read-write integrity. Version 7.19b firmware addresses this problem.

### Solution

To prevent data loss from these two problems, the UNAVCO Facility recommends that 12-channel 4000 SSE and SSi GPS receivers running 7.29 and 7.19 firmware are re-flashed to v7.19b (see above). Please see the <u>Trimble 4000 Firmware README for 7.19</u>.

Online URL: <a href="https://kb.unavco.org/article/4000-series-7-19b-firmware-332.html">https://kb.unavco.org/article/4000-series-7-19b-firmware-332.html</a>