## Precise GPS Without Base Stations or Reference Services

Terratec is introducing software capable of accurate positioning based on post-processing of GPS-observations, without the use of reference stations or DGPS services. Typical accuracy for kinematic applications are 3cm horizontally and 4cm vertically (RMS). TerraPos utilize precise orbits and clock corrections for the satellites, together with error modeling to produce positions with impressing accuracy. The result is a tool for positioning in applications allowing for post-processing, such as airborne photogrammetric or lidar operations, seabed mapping, or seismic surveying.

The development started at the Norwegian University of Life Sciences (UMB), with a later cooperation between UMB and <u>Terratec AS</u>. The Norwegian Hydrographic Service has also been an important partner, and is now using TerraPos in their production of the official Norwegian sea-charts.

Terratec has used TerraPos for their own aerial operations for almost one year already, and has saved both time and money as there is no need to provide reference stations at the ground, or making passes over them to initialize GPS/INS.

https://www.hydro-international.com/content/news/precise-gps-without-base-stations-or-reference-services