OxTS Inertial+ Systems

OxTS (UK) has added Trimble's 5700 GPS receiver to the range of receivers that are properly integrated in to the Inertial+. The Inertial+ is a full Inertial and GPS Navigation System that uses gyros and accelerometers to make measurements of position, velocity and orientation. The low price of the Inertial+ compared to traditional inertial navigation systems makes it attractive for a wide range of survey applications.

By fully integrating the outputs of the Trimble 5700 with the Inertial+ the accuracy is improved and bad GPS points are rejected. The Trimble 5700 is a very capable GPS receiver, able to give better than 2cm positioning in dynamic conditions. By tightly integrating the GSOF outputs of the Trimble 5700, the Inertial+ can get the best heading, pitch and roll measurements. This, in turn, gives the minimum drift when GPS is not available. The Inertial+ also includes a wheel speed correction, which vastly reduces drift when there is no GPS.

The biggest advantage for the Inertial+ is seen in mobile applications, for example when the GPS is mounted on a moving vehicle. However, the Inertial+ is also applicable to other surveying applications such as aerial survey.

Caption: The Trimble 5700 is now integrated with Inertial+

https://www.gim-international.com/content/news/oxts-inertial-systems