

Correction Services

Robust GNSS positioning services

Veripos correction services are global, high-accuracy GNSS positioning products designed to meet all offshore positioning and navigation applications. Apex services deliver centimetre-level accuracy and complement Ultra services, which, when combined, provide the user with correction services derived from independent networks, mitigating against single-point failures.

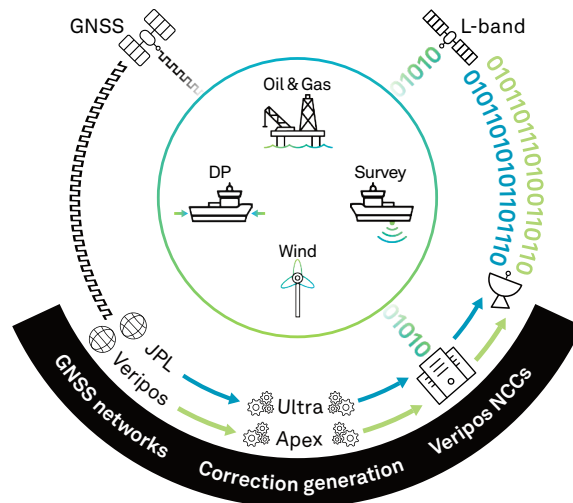
Precise Point Positioning (PPP)

Apex and Ultra services operate using Precise Point Positioning (PPP) – an absolute positioning technique used to correct or model all GNSS error sources. Adapting globally applicable corrections to the satellite orbits and clocks means the PPP technique maintains position accuracy, regardless of user location.

Correction generation and delivery

Proprietary Orbit and Clock Determination System (OCDS) technology allows Veripos to process data from the global Veripos reference station network, derive real-time corrections for all available GNSS satellites and provide the Apex corrections service. Similarly, an OCDS using a separate network maintained by JPL provides real-time corrections, which Veripos uses to generate Ultra corrections and offer service redundancy.

Veripos Network Control Centres (NCCs) send corrections via uplink sites, which transmit to the geostationary L-band communication satellites broadcasting to customers. Additionally, corrections are available directly from Veripos NCCs via Secure Internet Delivery (SID), independent from L-band.



Near-instant reconvergence, worldwide

Industry-leading RTK From the Sky™ technology combines the high accessibility of PPP with RTK precision to provide:

- Global centimetre-level PPP accuracy
- Fast convergence and near-instant reconvergence of PPP
- 99.999% global service availability
- Improved positioning resilience in masked environments

As more satellites are added to constellations, these will automatically become available within the corresponding Veripos services.

	Apex PRO	Apex ⁵	Apex ²	Ultra ²
Horizontal Accuracy	2.5 cm at 2 σ (95%)	<4 cm at 2 σ (95%)	<5 cm at 2 σ (95%)	<10 cm at 2 σ (95%)
Vertical Accuracy	5 cm at 2 σ (95%)	<9 cm at 2 σ (95%)	<12 cm at 2 σ (95%)	<20 cm at 2 σ (95%)
Constellations	GPS GLONASS BeiDou Galileo	GPS GLONASS BeiDou Galileo	GPS GLONASS	GPS GLONASS
Convergence	3 min	<30 min		

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For the most recent details of this product visit veripos.com

Performance specification subject to GNSS system characteristics, Signal-in-Space (SIS) operational degradation, ionospheric and tropospheric conditions, satellite geometry, multipath effects and the presence of intentional or unintentional interference. Best performance achieved with LD900 and V560 antenna. Signal content subject to change.

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