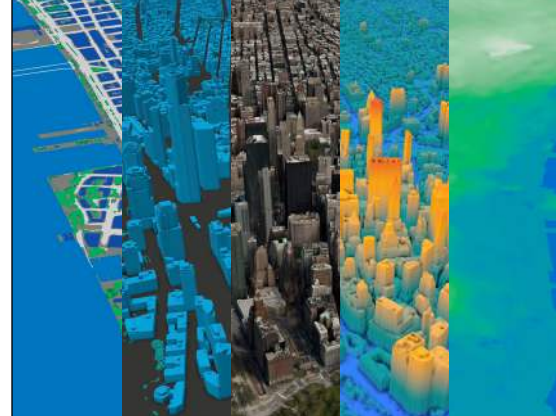


Vivid™ Terrain



Deeply immersive, mission-grade 3D terrain

Powered by automated 3D modeling software, Vivid Terrain represents an ultra-realistic representation of the physical world with an absolute accuracy of 3 m in all dimensions. Comprising more than 100 million sq km—95% of the highest areas of interest around the world—these products include mesh surface models with real textures, raster, and point cloud elevation data.

Combine Vivid Terrain with our Forge™ automated sensor fusion software to create a 3D operational terrain that gives people and machines a shared source of ground truth.

Features

- + 3 m absolute accuracy without ground control points
- + 100+ million sq km off-the-shelf coverage
- + AI-powered 3D reconstruction
- + Fully automated production
- + Six co-registered products from one foundation

Benefits

- + Most accurate commercial 3D terrain data—no expensive field validation required
- + Global reach with instant access anywhere on Earth
- + Photorealistic textures on all surfaces
- + 60% more accurate than traditional photogrammetry
- + Immersive visualizations for training and simulation
- + Weeks to deliver country-scale areas, not months
- + Perfect alignment eliminates integration challenges

Unparalleled global scale

Access over 100 million square kilometers of unique, very high-resolution 3D terrain data available off the shelf, with new coverage being produced every week.



Accuracy in all dimensions

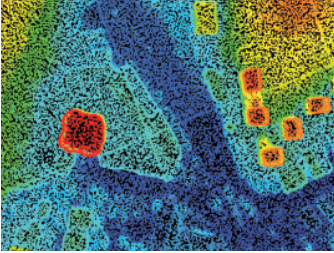
Achieve 3-meter absolute accuracy in all dimensions without relying on expensive or inaccessible ground control points. Our AI-powered 3D reconstruction engine delivers 60% improvement in accuracy and detail compared to traditional 3D modeling techniques, creating precise models free from occlusion and correlation errors.

Model types



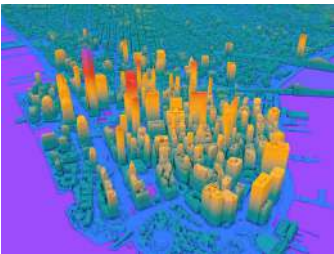
3D Surface Model (TIN)

Photorealistic digital twin with triangulated irregular network representing elevation and texture. The most immersive version for mod/sim and visualizations.



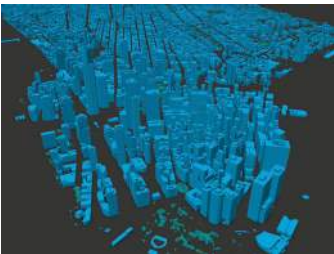
Point Cloud (LAS)

RGB colorized point cloud describing surface form and texture. Compatible with traditional lidar processing tools for mapping, surveying, and geospatial analysis.



Digital Surface/Terrain Models (GeoTIFF)

Standard GIS elevation data including trees and structures (DSM) or bare earth (DTM). Used for urban planning, line-of-sight analysis, and forest canopy assessment.



3D Buildings (Shapefile/GeoPackage)

Vector representations of buildings and vegetation with height attribution. Automatically extracted for mapmaking and telecommunications planning.



True Ortho (GeoTIFF)

Top-down view without parallax for detailed urban analysis, building footprint extraction, and change detection.



Land Use Classification (Raster)

Ground-cover type classification with 20+ categories automatically extracted for environmental and planning applications.

How to access

- + **The Vantor™ Hub**
Stream and download from the cloud powered by Tensorglobe™ platform. Subscribe for direct API access and automated integration.
- + **Direct sales**
Work with Vantor representatives to build customized packages for large-scale deployments and enterprise requirements.
- + **Approved resellers**
Contact qualified regional partners for smaller orders and local support through their existing platforms.

Technical specifications

- + **Resolution**
50 cm 3D coverage
- + **Absolute accuracy**
3 m SE90 globally without ground control points
- + **Coverage**
100+ million unique sq km available off the shelf
- + **Data formats**
3D mesh, raster and vector formats provided, point cloud, DSM/DTM, vector, GeoTIFF, raster
- + **Processing**
Fully automated AI-powered 3D reconstruction
- + **Foundation**
Derived from Vantor's industry-leading 30 cm resolution satellite imagery