



Nano X90

Nano X90 is the latest solid-state LiDAR system released by LidarSwiss in 2024. This compact LiDAR system integrates the new Cepton® Sora X90i solid-state scanner, a 42mp camera, an Applanix® IMU/GNSS, and a LidarSwiss controller equipped with LSAP technology.

The prominent feature of the Nano X90 is its acre/minute ratio. With 3 times the efficiency of other LiDAR systems in its category, this robust LiDAR system offers users a solution with high efficiency, high accuracy with little effort in data processing. DSM is ready at landing in local coordinates, and DOM is one step away. The colored point cloud created by LSAP can also be available for direct creation of 3D models. Nano X90 is the perfect tool for small to medium area mapping.

Railroad Sample Data



Key Features:

- Solid-state scanner MMT
- Effective flying height of 180m
- Applanix® IMU/GNSS & RTX
- 42mp calibrated camera
- Rigid control unit
- Automatic RGB attribution to laser points
- EXIF information to images automatically
- Fits in small Pelican® case
- High accuracy
- High point density
- High stability

Small Area Mapping Sample Data



Technical Parameters:

Item:	Specification:
• Laser class	Class 1, eye safe
• Wave length	Near infrared
• Laser beam divergence angle	0.6 mrad
• Scanning range	200m @ 10% reflective
• Scanning angle	90°
• Pulse rate	430kHz (single return)
• Point density	Up to 900pts/m ²
• Scanning mechanism	MMT (mirrorless, non-rotational)
• Scanning rate	240Hz (fixed)
• Pitch/Roll accuracy	0.025°
• Heading accuracy	0.08°
• Recording media	Solid State Drive (SSD)
• Storage capacity	512GB
• Single scanning swath	250m
• Image resolution	42mp with 24mm lens
• Effective operating range	Conductors: 80m, others: 180m
• Voltage	18-28V
• Power consumption	max 65w
• Dimensions (LxWxH)	175mm x 125mm x 150mm
• Weight	2.5kg
• Working temperature	-20°C to 60°C
• Storage temperature	-40°C to 70°C

