

X70^{GO}



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3D Product Manager

X70^{GO} - New era of hybrid scanning

X70^{GO} is a real-time 3D model reconstruction device which integrates inertial navigation module, high performance computer and storage system.

It is equipped with a 360° rotating head, which, combined with the SLAM algorithm, generates high-precision point cloud data.

A 12MP RGB camera provides texture information, while a visual camera guarantees stronger real time preview with *GOapp*.

Mapping results are generated immediately inside the scanner, right after scanning: choose if you want to color them and improve their accuracy, postprocessing with *GOpost* software.

X-Whizz
ROOM

The system's big innovation is the hybrid scanning: combine advantages of SLAM mode with resolution of a static scan, by using the *X-Whizz* mode.



STONEX
SLAM X70^{GO}
HANDHELD 3D SCANNER

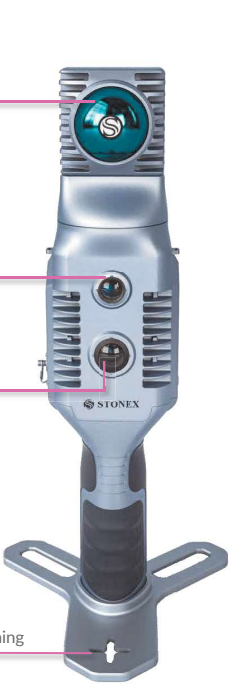
X70^{GO} - Component introduction

LiDAR
70-meter range | 200k pts/s

Visual camera
12 Mpx | More stable real-time

RGB camera
12 Mpx | 210° Diagonal FOV

GCP base
Collect ground control point while scanning



Rotating Head
360°

SSD storage
512GB built-in SSD storage disk

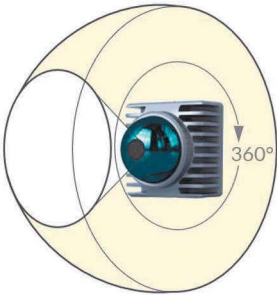
Extended Interface
Abundant external equipment

Dismountable Handle
Replaceable lithium battery handle

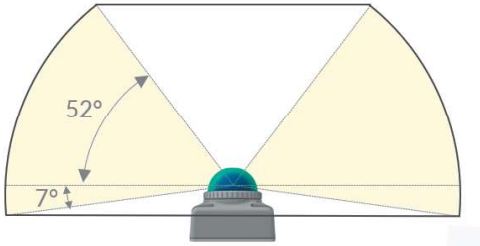


X70^{GO} – Technical specifications

LiDAR	
Range	0.1 – 70 m
Scanning point frequency	200.000 pts/s
Field of view	360° H, -7~52° V
Laser class	1



LiDAR Horizontal FOV



LiDAR Vertical FOV



X70^{GO} FOV

X70^{GO} – Technical specifications

RGB Camera	
Pixels	12 Mpx
Diagonal FOV	210°
Focal Length	1.26mm
Resolution	4000x3000

Visual Camera	
Pixels	12 Mpx
Diagonal FOV	100°
Focal Length	3.24mm
Resolution	4000x3000



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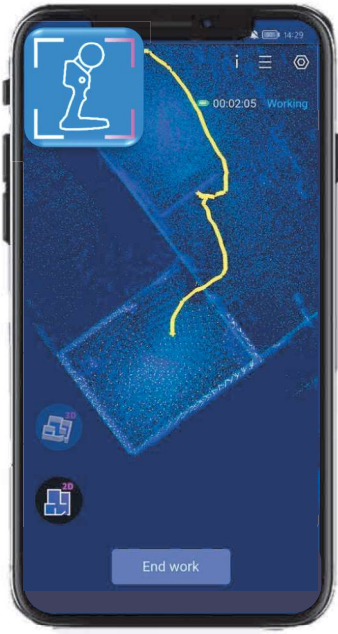
X70^{GO} – Technical specifications

System	
Relative accuracy	6mm *
Communication	Wi-fi, USB type-c, LEMO
Data storage	512GB SSD
Operating time	1.5h (each battery)
Weight	925g (without battery) 1450g (with battery)
Dimension	364.5 x 173.8 x 170 mm
Operating temperature	-20° C to +50° C (-4° F to 122° F)
Waterproof/Dustproof	IP54



*Environment dependent

X70^{GO} – Data collection

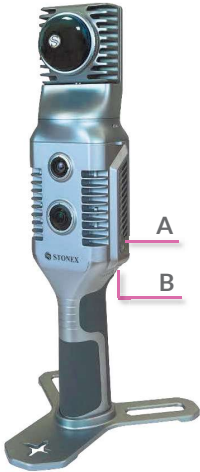


GOapp

GOapp is dedicate mobile application for X70^{GO}, to manage projects, real time point cloud display, image preview, firmware upgrade and other operations.

The APP runs on Android devices.

	Device only	GOapp
Start/stop scanning	A	✓
X-Whizz mode	B + 10sec	
GCP collection	B + 10sec	✓



X70^{GO} – Software

	Real time	GOpost
Colored point cloud	✗	✓
GCP compensation	✗	✓
Relative accuracy	1cm	6mm

GOpost

Windows post processing software which performs:

- Processing optimization
- Coloring of point clouds
- Rototranslation/Elastic compensation on GCP
- GNSS trajectory integration
- Denoising/filtering



X70^{GO} New features



X-Whizz Mode

X70^{GO} combines quick mobile survey with stationary scans, providing denser and more detailed data.



Visual Camera

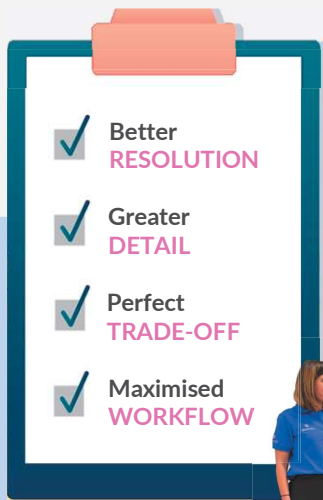
The built-in visual camera makes the real time SLAM algorithm more stable, especially in weak structural textures environments.



Data ready in the field

The system can directly output the mapping results after the acquisition is completed. Choose to post-process the data, for improving accuracy.

X[⚡]WHIZZ M DO M



Walk around around the scene to collect the entire point cloud, using SLAM technology.

If you need more details in some key areas, attach the X70^{GO} on a monopod and stand still to perform a static scan with the **X-Whizz** mode. All the data will be perfectly superimposed and ready to be used.

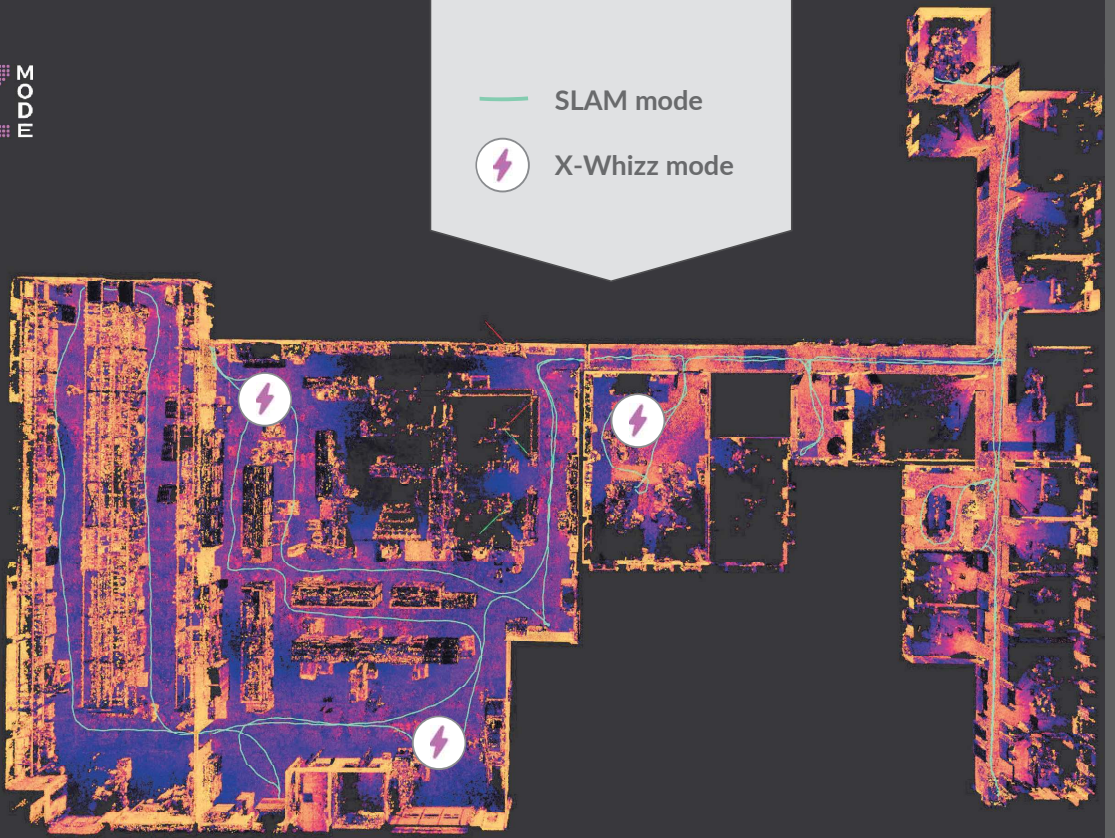
X70GO is the perfect trade-off for who needs **speed and details** in a mobile survey!

X4WHIZZ MOD II

- SLAM mode
- ⚡ X-Whizz mode

Hybrid survey
SLAM + X-Whizz

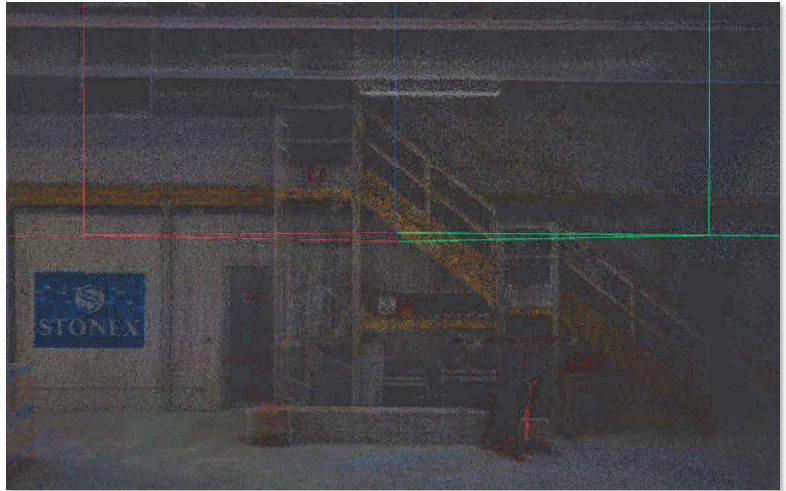
SLAM: 8 minutes
X-Whizz: 80 secs each



X-Whizz mode:

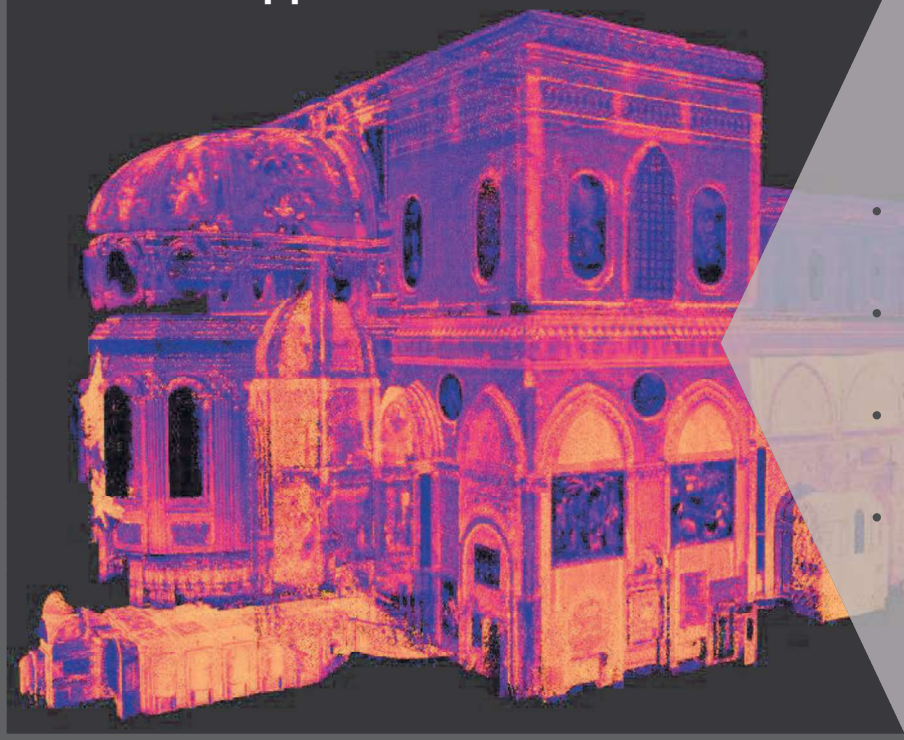


SLAM mode:



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X70^{GO} Applications



HERITAGE & ARCHITECTURE

- Complete survey of all the interested building in a while
- High resolution capturing of details thanks to X-Whizz mode
- Digital twin representation for cultural heritage conservation
- Detailed floorplan extraction, including room dimensions, wall thickness and architectural elements

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X70^{GO} Applications

BIM & FACILITIES

- Fast detection of large areas and extensive structures
- Detailed view of existing structures, pipes and equipments
- Update existing models during renovations
- Adding information directly to models
- Centralising and digitising information



X70^{GO} Applications

TUNNELS & MINING

- Overground and underground capturing
- Volume calculations and production progress mapping
- Reduction of exposure to hazardous environment for the operators

X70^{GO}

Marketing

X70^{GO} - Pictures



X70GO - Brochure

X70GO TECHNICAL FEATURES

SYSTEM	
Scan range	20 x 300m
Scan angle	33°
Resolution	0.0001m
Measurement accuracy	±0.0001m
Scan rate	30000 scans/sec
Laser Class	Class II
Power supply	Rechargeable Li-Ion
Weight	1.5kg
Dimensions	180 x 100 x 100mm

ELECTRICAL SPECIFICATION	
Power consumption	10W
Operating temperature	-20°C to 50°C
Storage temperature	-30°C to 60°C
Relative humidity	10% to 90%
Shock resistance	10g
Vibration resistance	10g



X70GO Laser Scanner

3D Handheld Laser Scanner



Xu-HIZZI



ACCESSORIES

RTK MODULE

RTK module for real-time kinematic positioning. It can be used with the system, collecting RTK data to improve the accuracy of the system. The RTK module is not included in the system price.

ACCESSORIES	
RTK Module	RTK-001
Telescopic Pole	TEP-001

TELESCOPIC POLE

Telescopic pole for the scanner. It can be used to extend the scanner to a higher position. The telescopic pole is not included in the system price.



STONEX
SLAM

X70GO The new era of hybrid scanning

X70GO is a real-time 3D model reconstruction device which integrates hybrid navigation module, high performance computer and storage system.

It is equipped with a 5MP rotating lens, which, combined with the SLAM algorithm, generates high-precision point cloud data.

A 3D real-time light camera provides feature information, which is then combined with the SLAM algorithm to generate high-precision point cloud data.

Mapping results are generated immediately inside the scanner, right after scanning, choose if you want to color them and improve their accuracy, corresponding with Cloud software.





X-WHIZZ MODE

X70GO supports real-time 3D scanning. It is the combination of SLAM structure that allows you to scan large areas in a very short time. It consists of stationary mode to scan with higher accuracy, and X70GO for moving and scanning for areas that are difficult to scan. It is the perfect choice for those who need speed and accuracy in a short time.

REAL TIME RESULTS

No more multiple scan stations, just move around the scene to collect the whole 3D point cloud without transferring or cloud processing.

RAPIDITY AND REDUCED WORKLOAD

When capturing data, X70GO is able to collect reference points too. They can be imported afterwards to generate the point cloud.

SLAM TECHNOLOGY

Simultaneous Localization And Mapping

STONEX SLAM technology allows users to scan, store points, see, record and see in data on board processing algorithms to reach unmatched speed of capture and stability even in the most demanding environments.

BUNDLED SOFTWARE

- GOapp: 3D mapping mobile application for X70GO. It manages projects, real-time point cloud display, image preview, feature upgrade and other operations. The APP runs on Android operating system.
- GOpost: Real-time post-processing software which performs optimization processing, coloring of point clouds and creation of panoramic images. You can also import control points to georeference the point cloud.

3D SOFTWARE

- cube 3d: A 3D point cloud software for mapping and 3D image processing, dedicated to hand scanning operations. It will transform image data into high-precision digital maps and 3D models with extreme precision. It is compatible with various 3D software.
- PointCab: Thanks to the collaboration between Stonex and PointCab, you can manage your point clouds with PointCab Origin. It provides the most stable and accurate to the production of point cloud data - working with all laser scanners and compatible with all CAD and BIM systems.

STONEX SLAM

X70GO - Video



 [X70GO Video](#)



X70GO

Configuration

X70^{GO} – Configuration

	Product code	Description	Q.ty
	X70GO SLAM Handheld laser scanner		1
1	30-350738	X70GO shipping case	1
2	30-350736	X70GO battery handle	1
3	30-350737	X70GO GCP base	1
4	30-350740	X70GO charger	1
5	30-350741	X70GO power cable	1
6	30-350657	GOpost software dongle key	1



X70GO – Bundle Configuration



Product code	Description
B60-200443	X70GO + Cube3D SCANNER



Product code	Description
B60-200440	X70GO + PointCab Origins
B60-200441	X70GO + PointCab Origins 3D
B60-200442	X70GO + PointCab Origins PRO
B60-200444	X70GO + PointCab Origins PRO EDU



X70^{GO} – Accessories

Product code	Description
30-350743	X70GO Telescopic monopod with tripod stand
30-350671	X120GO/X70GO RTK Module

Product code	Description
40-WE2011	X120GO/X70GO Warranty Extension 2° Year
40-WE3029	X120GO/X70GO Warranty Extension 2° and 3° Years

