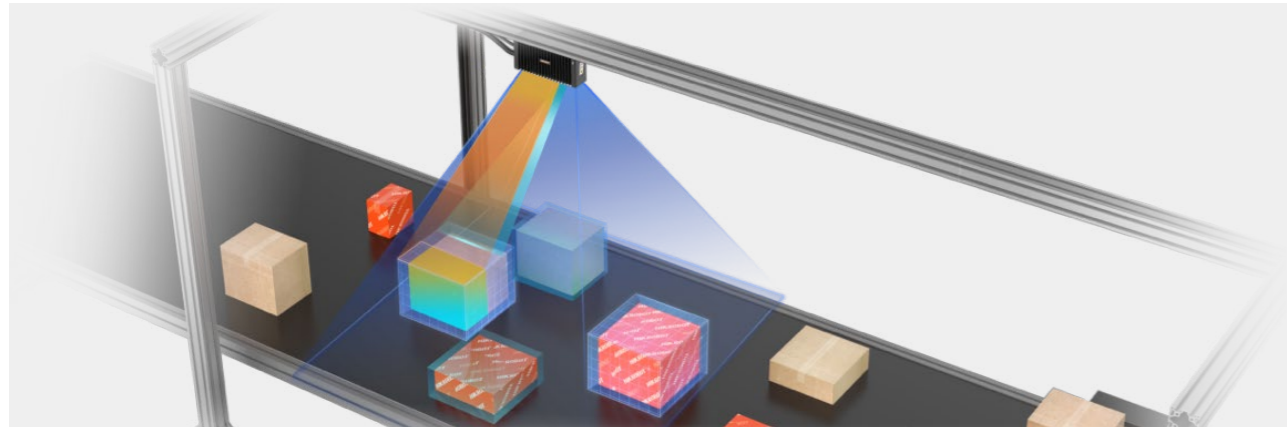
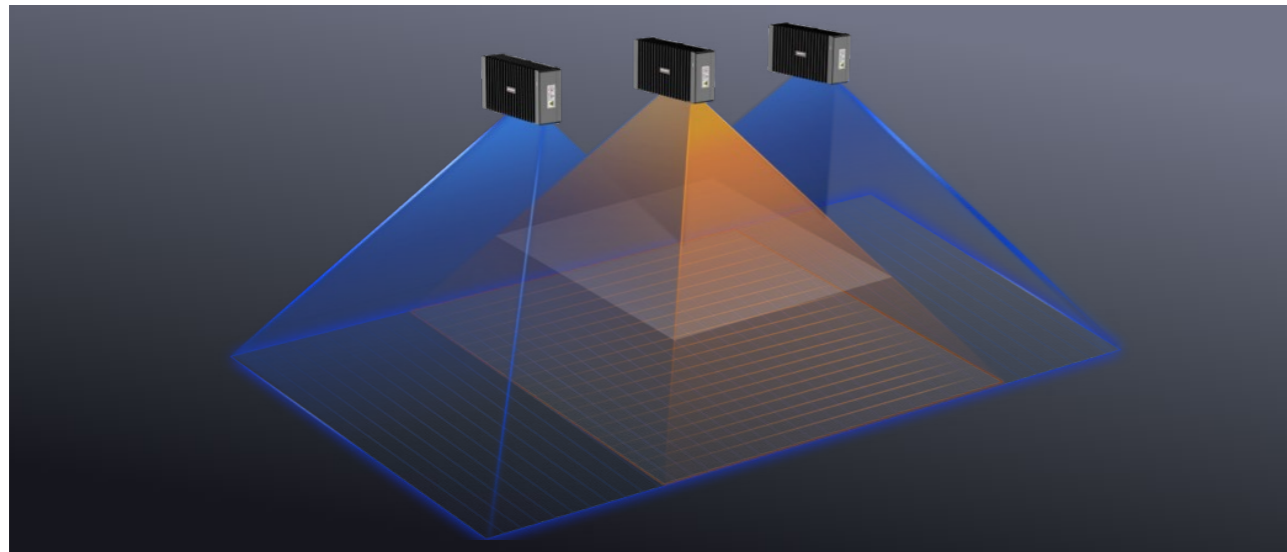


RGB-D smart 3D camera

By virtue of active binocular stereo imaging technology and in conjunction with color cameras, it can output RGB-D images at high frame rate. With the built-in AI algorithms, multiple tasks can be completed within the camera. It can be used as the vision core for applications such as singulation system, robotic parcel-feeding system, and depalletizing & palletizing system.



- One device with image and data integrated



- One-click calibration and user-friendly deployment

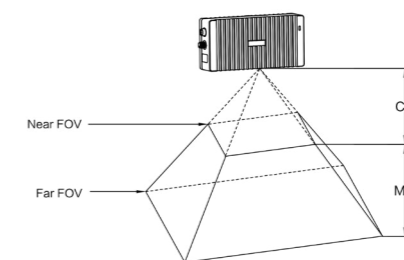
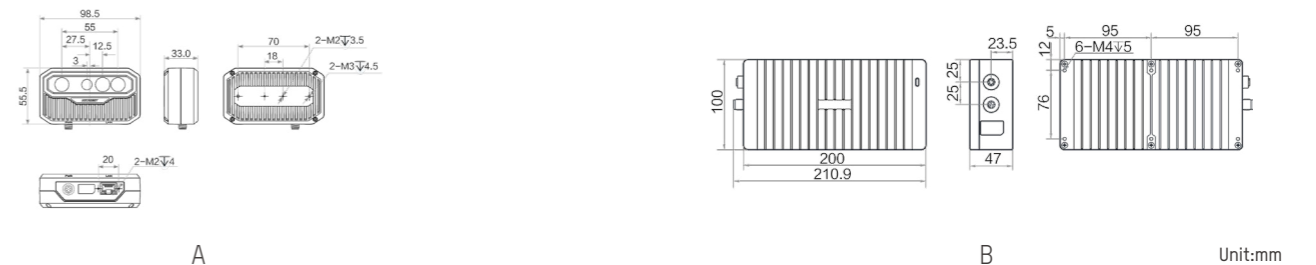
Specifications



Model	Near FOV	Far FOV	Clearance distance (CD)	Measurement range (MR)	Accuracy (Depth Image)	Accuracy (RGB Image)	Output Frame Rate	Data Format	Label
MV-DB300S *	325 mm × 320 mm	1850 mm × 1600 mm	300 mm	1200 mm	XY:5 mm@1 m; 10 mm@2 m Z: 10mm@1m; 20mm@2m	2.6 mm@1 m; 5.5 mm@2 m	RGB-Depth sync output 14 fps@1280 × 1024	Original image (mono and color images), depth image, RGB-D image	A
MV-DB500S	580 mm × 470 mm	2400 mm × 1800 mm	500 mm	1500 mm	XY:5 mm@1 m; 10 mm@2 m Z:5 mm@1 m; 10 mm@2 m	XY:2.6 mm@1 m; 5.5 mm@2 m	RGB-Depth sync output 18fps@1408×1024 30fps@704×512	Original image (mono and color images), depth image, RGB-D image	B
MV-DB500S-C	580 mm × 470 mm	2400 mm × 1800 mm	500 mm	1500 mm	XY:5 mm@1 m; 10 mm@2 m Z:5 mm@1 m; 10 mm@2 m	XY:2.6 mm@1 m; 5.5 mm@2 m	10 fps@EDP Mode	Original image (mono and color images), depth image, EDP detection result	B
MV-DB500S-S	580 mm × 470 mm	2400 mm × 1800 mm	500 mm	1500 mm	XY:5 mm@1 m; 10 mm@2 m Z:5 mm@1 m; 10 mm@2 m	XY:2.6 mm@1 m; 5.5 mm@2 m	28 fps@ Singulation Mode	Original image (mono and color images), depth image, package posture information	B
MV-DB500S-V	580 mm × 470 mm	2400 mm × 1800 mm	500 mm	1500 mm	XY:5 mm@1 m; 10 mm@2 m Z:5 mm@1 m; 10 mm@2 m	XY:2.6 mm@1 m; 5.5 mm@2 m	8 fps@ Measuring mode	Original image (mono and color images), depth image, volume data	B

Notice: * will be released soon.

Dimension



Singulation System Application Scenario

Under the trend of automatic logistics development, Packages still have side by side and densely distributed situations during the sorting process. The front-end package separation process mainly relies on manual sorting of packages in an order manner, which is high work intensity, low efficiency and can not meet the current needs. Hikrobot Singulation System is centered on an RGB-D smart stereo camera, which is equipped with self-developed 3D processing algorithms and deep learning algorithms for real-time and precise positioning of packages. At the same time, through the self-developed intelligent control systems, the separator module is controlled to separate the packages, achieving single packages passing through and maintaining fixed intervals between each other, efficiently solving the problem of automatic sorting front-end packages traveling parallel on the belt line.



Recommend Accessories List

Model	Description	Quantity
MV-DB500S-S	Including: Camera、Cable、Switch Power Supply	2-3
MV-VC3101H-128660	Vision Controller	1
MV3D-SCS	Singulator Control Client Dedicated Dongle	1
V036-System Calibration Cloth	Used for Singulation System Calibration	1

Package Sorting Application Scenario

Packages are subject to various factors such as packaging type, shape, stacking, etc. during sorting, volume measurement, and other processes, which can affect the judgment of automated systems. Therefore, it is necessary to use package classification equipment, combined with package classification recognition and stack detection results, as a basis to guide later automation equipment or manual sorting, measurement (bubble counting) and other applications.



Recommend Accessories List

Model	Description	Quantity
MV-DB500S-C	Including: Camera、Cable、Switch Power Supply	1
MV-VC3101H-128660	Vision Controller	1
52mm Calibration Plate	Used for EDP System Calibration	1

EDP System Application Scenario

Cross belt sorting is currently the main sorting method for small parcels in the domestic express delivery industry, but there is still a certain probability of misclassification. Therefore, it is necessary to use grayscale device to improve the efficiency and accuracy of logistics sorting. The HIKROBOT EDP System is based on an RGB-D smart 3D camera as the core, relying on our self-developed 3D image processing technology and deep learning positioning & segmentation algorithm to detect the number and position of packages on the cross belt. The system integrates dual detection, presence or absence detection, package correction, and edge detection functions, making it a fully functional solution suitable for various types of mainstream sorting machines at present.



Recommend Accessories List

Model	Description	Quantity
MV-DB500S-C	Including: Camera、Cable、Switch Power Supply	1
52mm Calibration Plate	Used for EDP System Calibration	1

Volume Measurement Application Scenario

Logistics e-commerce enterprises need to process a large number of packages every day. These packages need to collect data such as length, width, height, volume, weight, and code information when entering and leaving the warehouse. Most enterprises use manual work to complete data collection, so 3D cameras are needed to complete volume measurement functions, helping enterprises save labor and improve work efficiency.



Recommend Accessories List

Option 1: Suitable for package area up to 800 * 800 * 800mm

Model	Description	Quantity
MV-DB500S-V	Including: Camera、Cable、Switch Power Supply	1
MV-VC3101H-128660	Vision Controller	1

Option 2: Suitable for package area within 500 * 500 * 500mm

Model	Description	Quantity
MV-DB300S	Including: Camera、Cable、Switch Power Supply	1
MV-VC3101H-128660	Vision Controller	1