

VisionSense – iVisionSuite Series Product

Comprehensive AI-Powered Computer Vision Solution for Facial, People, and Object Analysis



Features

- Seamlessly integrates with your existing CCTV systems using the RTSP protocol.
- Preloaded with advanced AI modules for vision analytics, including:
 - People Vision: People counting, queue analysis.
 - Face Vision: Face recognition and analysis.
 - Object Vision: Traffic item detection, hand gesture recognition, and hard hat detection.
- Seamlessly integrates with third-party systems using standard protocols, such as HTTP commands.
- Optimized for compatibility with Nvidia, Intel, and Hailo edge computing devices.
- Achieves facial recognition accuracy of up to 99.8%.
- Face Vision module supports up to 10,000 stored profiles for enhanced performance.
- Implements role-based access control for streamlined and secure permission management.

Introduction

Introducing our cutting-edge AI-powered vision analytics solution- VisionSense, designed to seamlessly integrate with your existing CCTV systems and IoT ecosystem. Equipped with advanced AI modules—People Vision, Face Vision, and Object Vision—it offers powerful features such as people counting, face recognition, queue management, and object detection. Optimized for peak performance and accelerated by Open VINO, the system leverages Nvidia, Intel, and Hailo edge computing devices to deliver accurate and reliable analytics across people, faces, and objects. With role-based access control, and a privacy mode to safeguard user data, it ensures a comprehensive and secure experience. Additionally, its seamless integration with third-party systems via standard protocols like HTTP commands makes it an ideal solution for enhancing your IoT ecosystem.

Key Functions

People Vision

- **General People Detection & Counting:** Accurately tracks bi-directional footfalls with advanced tracking to prevent double counting.
- **Queue Length Analysis:** Track visitor numbers and set custom triggers for specific zones.

Face Vision

- **Face Analysis:** Detects and analyzes visitor faces at specific locations to determine age range, gender, mood, and visit frequency.
- **Tagging and Grouping:** Assign tags to each individual for quick identification and organize them into one or more groups (e.g., VIP, Blacklist, Staff, Visitor).
- **Privacy Protection:** Ensure data privacy with a pure data reporting function.

Object Vision

- **Object Analysis:** Detects and identifies various objects, such as traffic items, hand gestures, and hard hats.
- **Tagging and Categorization:** Assigns tags to objects for easier identification and organizes them into predefined categories.

Proactive Alerts and Automated Actions

- **Real-time Alerts:** Receive instant notifications (e.g., VisionSense app, email) upon detection of a person or object of interest, and schedule proactive alerts for routine checks.
- **API Integration:** Trigger custom actions within your systems using API.
- **Automated Actions:** Trigger predefined actions based on POI or group detection, or according to a set schedule.

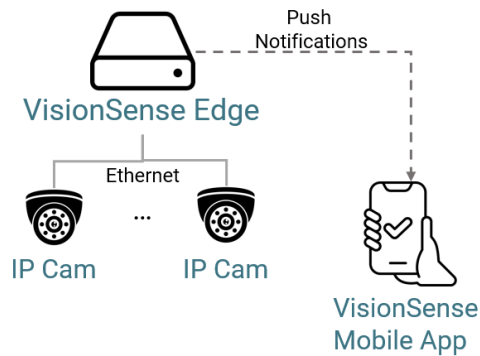
User Management & Security

- **Role-Based Access Control:** Supports multiple user groups and roles for enhanced security and data privacy.

In-Depth Integration Capabilities

- **Versatile Applications:** Integrate with various applications, including Signage dynamic content delivery based on lift and learn, and gender-based targeting.
- **Seamless Integration with IOT:** Leverage the RESTful API for easy integration with existing IOT systems and workflows.

VisionSense Solution Deployment Architecture

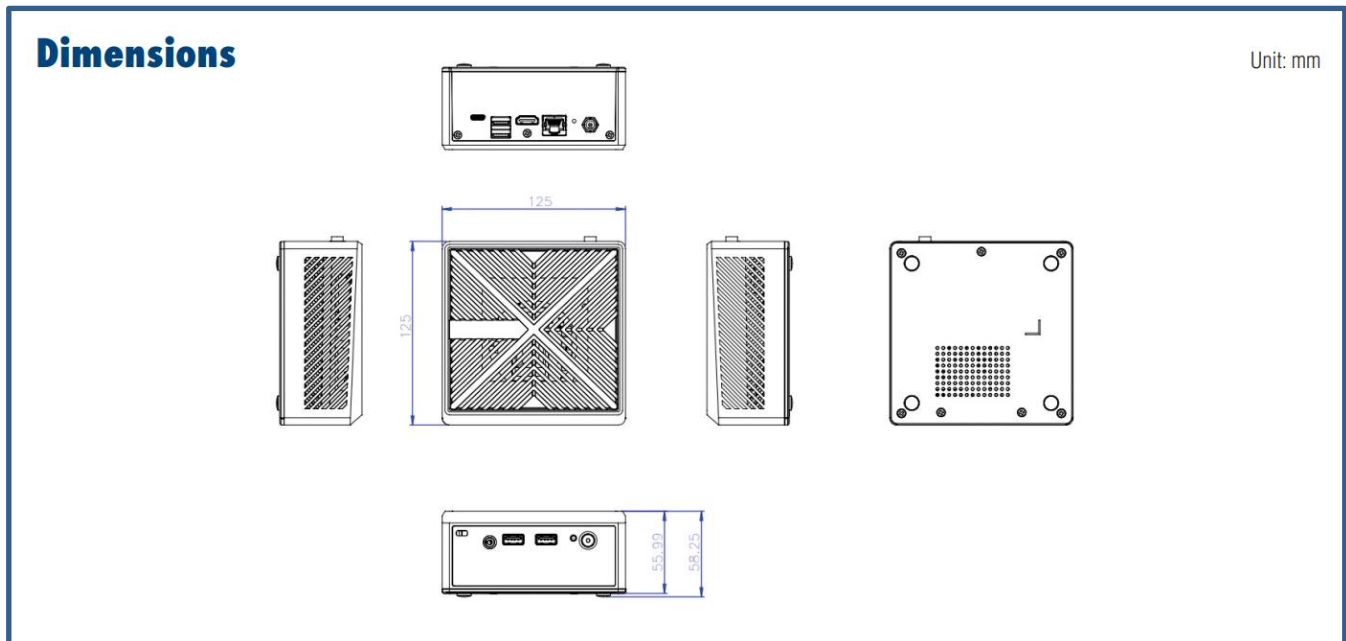


iVisionSuite/ VisionSense Software Specifications

| | | |
|-------------------------------|-----------------------------|--|
| System | Operating System | Ubuntu Linux, Windows |
| | Protocol | HTTP, HTTPS |
| | System Security | HTTPS with hardened security configurations Single login connection with renewable session token |
| | Supported Virtual Machine | VMWare, Hyper-V |
| Management Interface | Interface | Web Client |
| | Supported Browsers | Google Chrome on Windows, Linux, and Mac OS X |
| | Languages | English, Traditional Chinese, Simplified Chinese, Japanese, Korean |
| Video Source | Supported Types | IP camera with RTSP protocol |
| System Users Management | System Users | Register user accounts using name, email address, and phone number |
| | User Groups | Default administrator and user group, and user-defined groups Administrator group can setup the system |
| | Group Permissions | User and user-defined groups can only run attendance / investigation reports |
| Region of Interest Management | ROI Management | Define region of interest by web Manage person database through web portal |
| | Tag Management | Define different objects and people by different attributes |
| Detection Reports | Search Filters | Filter face results by video source, time period, tags, person's name, person group or stranger |
| | Data Export Format | Export face results in HTML or Excel format |
| Rules and Actions | Rule Engine | Rule based engine to trigger single or multiple system actions based on Capturing video source(s) Detection time period ROI/POI |
| | Supported System Actions | HTTP command Email Mobile app notification Trigger IO Box Trigger Wiegand Box |
| Live Notifications | Supported Platforms for app | iOS and Android |
| | Notification Type | Realtime notification to VisionSense mobile app or emails |

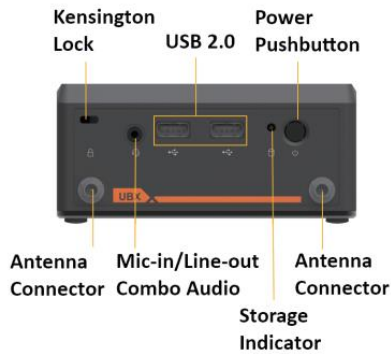
iVisionSuite/ VisionSense Recommended Hardware Specifications

| | | |
|----------------|--|--|
| Model | UBX-330M | |
| Processor | Core Ultra 5 125H, Core Ultra 5 135U | |
| Graphic Engine | Intel Integrated Graphics 125H: Intel Arc graphics 135U/155U: Intel graphics | |
| Security | TPM | TPM 2.0 |
| Memory | Technology | DDR5-SODIMM *1, up to 48G |
| Storage | M.2 2280 B+M Key *1, supports NVMe, SATA SSD and Apacer CoreSnapshot Quick Backup SSD* | |
| I/O - Front | USB | USB Type A 2.0 *2 |
| | Audio | Mic-in/Line-out Combo Audio *1 |
| | Button | Power Pushbutton *1 |
| | LED | Storage Indicator *1 |
| | Kensington Lock | Kensington Lock *1 |
| I/O - Rear | USB | USB 3.2 *2 |
| | Video | USB-C *1, supports DisplayPort protocols and 10W power delivery HDMI 2.1 *1 |
| | Button | System Recovery Button *1 (Equipped with Apacer CoreSnapShot Quick Backup SSD) |
| | Power | DC 12V Power Jack w/ Lock *1 |
| | LAN | LAN *1, up to 2.5 Gbps |
| Environment | Operating Temperature | 0 ~ 40 °C |
| | Storage Temperature | -20 ~ 60 °C |
| Intel vPro | Intel vPro | 125H: Intel vPro Essential 135U: Intel vPro Enterprise |
| Certificate | CE, FCC Class B, CCC, BSMI, UL, CB, EN 62368, ErP, RF RED | |
| Physical | Dimensions (W x D x H) | 125 x 125 x 58.25 mm |
| | Weight | NW: 0.8 Kg |



I/O Interface

Front View



Rear View



Note: Antenna connectors are available for the UBX-330M with UBX-330M-TE00 expansion SKU.

Optional I/O Expansion Kit

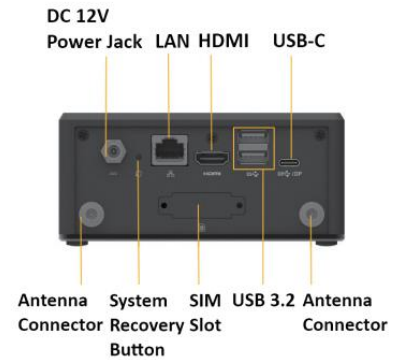
UBX-300E-CM00



UBX-300E-SA00



UBX-300E-TE00



Ordering Information

| Part Number | Description |
|-------------------|--|
| UBX-330MVI5-G1E-C | Core Ultra 5 125H,16G/512GB, iVisionSuite- VisionSense Edge with up to 6 channel video analysis |
| UBX-330MVH5-G1E-C | Core Ultra 5 135U,16G/512GB, iVisionSuite- VisionSense Edge with up to 10 channel video analysis |