



ioi camwdc100dn

Ultra-Wide-Dynamic-Range Color Day/Night Intelligent-Video IP Camera

The compact all-in one wdc100dn ioicam combines high performance video analytics with a state-of-the-art ultra-wide-dynamic-range IP camera to achieve a unique high-grade surveillance automation solution that makes intelligent video easier to deploy and operate.

For both indoor and outdoor surveillance, the built-in self-sustained video analytics can



simultaneously detect intruders, suspicious baggage, stopped vehicles and removed items for automatic detection even in extreme lighting and harsh weather conditions.

Securing nuclear power sites and national infrastructures, the computerized-detection of the ioicam provides high-security, yet is so versatile and easy-to-use, it is ideal for any security site.

rule-driven video analytics



intrusion detection

automatically detects and alarms on forbidden directional movement with three flexible options to choose from including detection of human and vehicle movement in controlled areas, tripwire (single or multi-segment lines), and fence trespassing



unattended baggage detection

automatically detects and alarms on the abandonment of baggage or objects in controlled areas



stopped vehicle detection

automatically detects and alarms on the presence of a stopped vehicle in an area where parking/standing is a violation



object removal detection

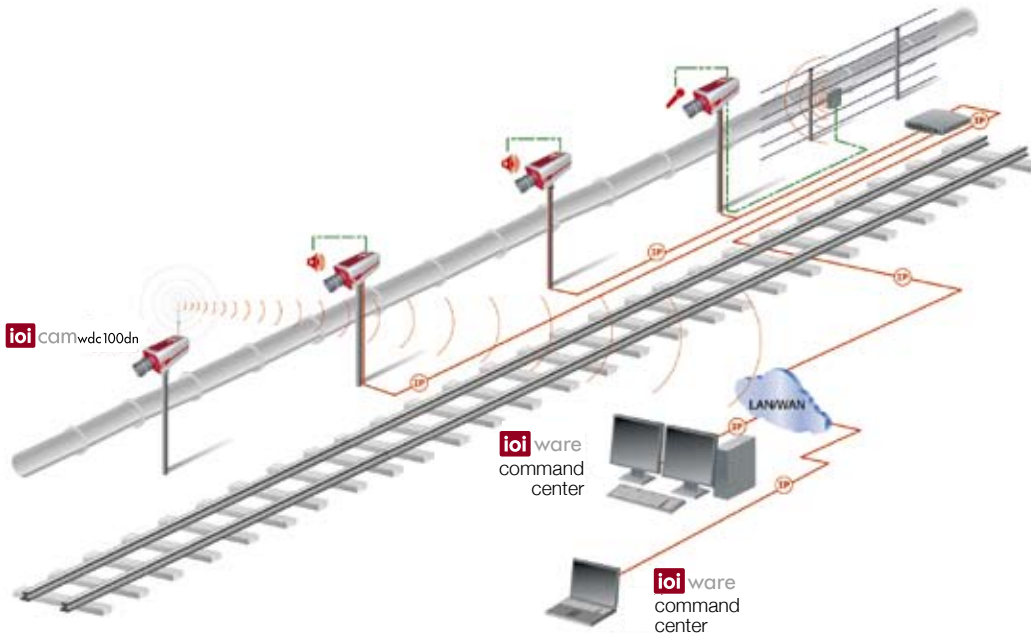
automatically detects and alarms on the sustained removal of objects or products from their given location

Advantages

- Creates invisible fence capabilities without the costs of fence installation and hardware or the degradation of aesthetics
- Provides wide-area detection that can alert security of suspicious behavior inside and outside of the perimeter
- Provides better coverage than straight-line detectors or point sensors, such as PIR, fence sensors, ground sensors, smart fences, etc
- Provides instant video confirmation and additional information for assessment of an alarm event
- Can be used on a wireless network reducing deployment and infrastructure costs
- Automatic responses provide instant deterrent and remediation capabilities that can prevent escalation
- Built-in stand-alone video analysis out-performs high-maintenance network dependant solutions that share processing resources, use up bandwidth, and suffer from network latency
- On-alarm video-display reduces the need for fulltime displaying and constant watching of unchanging video
- Ultra-wide-dynamic-range delivers crisp video quality even in extreme lighting, optimizing intelligent video performance and availability

camera features

- 1/3" CMOS image Sensor
- NTSC/PAL
- PIXIM™ DPS Digital Pixel System
- Ultra Wide Dynamic Range Up to 120 dB
- 540 HTVL (RGB), Effective Pixels: 720(H)X540(V)
- Automatic image quality enhancer for best detection
- Day/night Mode: On/Off/Automatic/Scheduled
- IR Cut Filter: Auto/Manual On/Off
- Auto-Iris Control (DC)
- AGC
- Electronic Shutter AUTO
- White Balance Auto/Manual
- Backlight Compensation
- Gamma Correction Options
- Extended Slow Shutter



web based setup



High Sensitivity for Low-Light Images

- Advanced Noise Reduction Technology
- 0.6 lux Color Minimum Illumination, f/1.2, 50IRE, 34dB Gain
- 0.1 lux B/W Minimum Illumination, f/1.2, 50IRE, 34dB Gain

Lens

- ALC Lens Drive DC Servo
- Mount: CS-Mount

Ultra-Wide Dynamic Imaging

PIXIM technology is a digital-pixel technology that provides accurate image reproduction and low-noise even in high-dynamic-range scenes under extreme-lighting conditions:

- Includes greater dynamic range for significantly improving image quality in scenes consisting of both bright and dark areas
- Built in technology for overcoming lighting problems as pixels are independently monitored and controlled to best capture images in the most difficult of scenes

ultra-wide-dynamic-range imaging for enhanced image quality and detection

Standard



wdc100dn



Simplicity

- Easy to install, sets up in minutes - intelligent video detection is configured using a web browser or optional control software
- Automatically adjusts for best detection at all times – no ongoing configuration required
- Fully-embedded stand-alone units – no PC required

Performance

- High probability of detection while maintaining a remarkably low false alarms rate
- Detects intruders under harsh weather conditions low visibility, and poor lighting
- Detects camouflaged intruders, extremely slow progression (as slow as 1 ft/5 min), and burst movements
- Superior non-flat detection sees objects in 3D-scape and at great distances for reliable detection
- Supports pre-alarm recording for capturing the moments before an alarm

Reliability

- The same ioicam analytic technology has been certified by the Israeli Defense Forces and by leading testing laboratories
- Field-proven with thousands of ioicams and ioiboxes deployed since 2003, protecting nuclear facilities, government sites, petrochemical factories, airports, and sea-ports
- Robust DSP-based intelligent video edge device, no central PC processing required

- Ignores false alarms generated by small animals, swaying branches, cloud shadows, light changes, rain, snow and trivial movements in the scenery

Highlights

- The all-in-one wdc100dn operates both as a stand-alone intelligent video camera or as part of an integrated network configuration
- Ultra-wide dynamic range day/night IP camera
- Built-in high-performance video analytics
- Built-in HTML web server for access, configuration, and viewing through a network via a standard web browser
- Enhanced with PIXIM technology for providing a crisp viewable image even in harsh lighting variations, backlight inundation, reflective glare, etc.
- Hybrid support for both analog and IP network streaming MPEG-4 architectures includes audio, video and indication of the cause of an alarm with on screen display overlays
- Two-way audio capabilities
- On-alarm recording to any network PC
- Supports remote field-deployment with easy configuration and software upgrades over a network
- Automatic image quality enhancer for best detection
- Infrared cut filter: manual & automatic switching from day (color) to night (B&W)
- Automatic white balance modes
- Automatic gain control (AGC)
- Automatic electronic shutter (AES)
- Advanced back light compensation (BLC)
- DC auto iris lens compatibility

ioi camwdc100dn specifications

Digital Video Output

- MPEG-4 (ISO/IEC 14496) at 4CIF and CIF Resolutions with up to 30 fps.
- User Defined Image Frame Rate 1fps–30fps
- Bitrate User Defined
- CBR/VBR User Defined

Analog Video Output

- Standard – NTSC/PAL
- 1 Physical Connector – BNC 75 Ω , Composite 1Vp-p
- Includes Graphical Overlay

Analog Audio Input

- 1 Unbalanced Mini Jack – Audio Impedance 10k Ω

Analog Audio Output

- 1 Unbalanced Mini Jack – Audio Impedance 10k Ω
- Audio Gain Control: -73dB- +6dB

Digital Audio Output

- Standard – ADPCM (G.729)
- 16kbps

Serial I/O

- RS-232/RS-485

Discrete I/O Interface

- IN – Dry Contacts (max. 12VDC 50mA)
- OUT – Relay Out (max. 24VDC 1A, 24VAC 0.5A)

Software

- Integrated Web Server
- Application Programming Interface (API)

Network

- Ethernet Port RJ45 10/100 with PoE
- Services and Protocols: TCP/IP, UDP/IP, HTTP, SMTP, DHCP, DNS, SNTP
- Audio and Video – RTP/RTSP
- Alarms and Commands - HTTP

Power Source

- 12VDC, 24VAC - 50/60 Hz
- Power Over Ethernet (PoE)

Power Consumption

- 8.28W

Environmental

- Ambient Operating Temperature: -20°C - 50°C
- Ambient Operating Humidity: Less Than 90% (non condensing)

Dimensions

- (HxWxD) 60x71.3x130mm (without lens)

Disclaimer: Specifications are subject to change without prior notice. Dimensions are approximate. ioimage is not responsible for network performance and/or other manufacturer products that reside on the network.