

DS-2TD2117-x/V1 Series

Thermal DeepinView Network Bullet Camera





- 160 x 120 Resolution (Upscaled to 320 x 240)
- Vanadium Oxide Uncooled Focal Plane Arrays
- NETD < 40 mK
- 3.1 mm, or 6.2 mm Thermal Lens Options
- Adaptive AGC, 3D DNR
- Digital Detail Enhancement
- Smart Features:
- Line Crossing, Intrusion, Region Entrance/Exit with Human and Vehicle Filtering
- Temperature Exception
- Early Warning Fire Prevention
- Advanced Fire Detection
- Cigarette Smoking Detection
- Temperature Range: -4° to 302° F (-20° to 150° C)
- Temperature Accuracy: ±14° F (8° C)
- 15 Pseudo Color Palettes Available
- IP66 Protection
- PoE (802.3af), 12 VDC, Maximum 8 W

The Hikvision DS-2TD2117-x/V1 Thermal-Optical DeepinView Network Bullet Cameras are equipped with highly sensitive thermal sensors and a graphical processing unit to run the video content analysis (VCA) algorithms developed by Hikvision's deep learning technology.

Hikvision's HikMicro factory manufactures the vanadium oxide uncooled focal plane array thermal sensor with best in class image quality and price. The sensor's 160 x 120 resolution is upscaled to 320 x 240 and features adaptive AGC (Automatic Gain Control), 3D DNR (Digital Noise Reduction), and Digital Detail Enhancement for outstanding image enhancement.

This camera series is an excellent solution for short-range outdoor and indoor perimeter detection, fire prevention, predictive maintenance, human smoking detection and other applications. The total cost of ownership for this innovative camera system comes at an unprecedented, low level, due to affordable installation cost and ultra-low thermal-optical camera cost, which is competitive with purely optical cameras.

Available Models:

DS-2TD2117-3/V1 (3.1 mm lens) DS-2TD2117-6/V1 (6.2 mm lens)























Specifications

	DS-2TD2117-3/V1	DS-2TD2117-6/V1		
Thermal Module				
Image sensor	Vanadium oxide uncooled focal plane arrays			
Maximum Resolution	160 x 120 (output image resolution is 320 x 240)			
Detector Pitch	17 μm			
Response waveband	8 μm to 14 μm			
NETD	<40 mK [@ 25° C, F#=1.0]			
Lens (focal length)	3.1 mm	6.2 mm		
IFOV	5.48 mRad	2.74 mRad		
Field of View	50° x 37.2°	25° x 18.7°		
Minimum Focusing Distance	0.2 m	0.6 m		
Aperture	f/1.1			
Smart Function				
VCA	Supports 4 VCA rule types (line crossing, intrusion, region entrance, and region exiting), 8 VCA rules			
Temperature Measurement	Supports 3 temperature measurement rule types, 21 rules (10 points, 10 regions, and 1 line)			
Temperature Range	-4° to 302° F (-20° to 150° C)			
Temperature Accuracy	±8° C (14.4° F)			
Fire Detection	Dynamic fire point detection, up to 10 fire points detectable			
Network				
Main Stream	25 fps (160 × 120 (the resolution of output image is 320 × 240))			
Sub-Stream	25 fps (160 × 120 (the resolution of output image is 320 × 240])			
Third Stream	25 fps (160 × 120 (the resolution of output image is 320 × 240))			
Video Compression	H.265/H.264/MJPEG, H.265+/H.264+ encoding with baseline/main/high profile			
Audio Compression	G.711u/G.711a/G.722.1/MP2L2/G.726/PCM			
Protocols	IPv4/IPv6, HTTP, HTTPS, 802.1x, Qos, FTP, SMTP, UPnP, SNMP, DNS, DDNS,NTP, RTSP, RTCP, RTP, TCP, UDP, IGMP, ICMP, DHCP, PPPoE			
Simultaneous Live View	Up to 20-ch			
User/Host Level	Up to 32 users, 3 levels: administrator, operator, user			
Security Measures	User authentication (ID and PW), MAC address binding, HTTPS encryption, IEEE 802.1x access control, IP address filtering			
Integration				
Alarm Input	2-ch inputs (0 to 5 VDC)			
Alarm Output	2-ch relay outputs, alarm response actions configurable			
Alarm Action	Preset/patrol scan/ pattern scan/SD card recording/relay output/smart capture/FTP upload/email linkage			
Audio Input	1-ch 3.5 mm microphone /line in interface. Line input: 2 to 2.4 V[p-p], output impedance: 1k Ω \pm 10%			
Audio Output	Linear level; impedance: 600Ω			
Reset	One reset button			
Communication Interface	1-port RJ-45 10M/100M Self-adaptive Ethernet interface, 1 RS-485 interface			
Onboard Storage	Built-in microSD/SDHC/SDXC card slot, up to 128 GB; supports manual/alarm recording			
Analog Video Output	1.0 V [p-p]/75 D, PAL/NTSC/BNC			
API	Open-ended API, supports ISAPI; supports HIKVISION SDK and third-party management platforms			
Client	iVMS-4200			
Web Browser	IE 9+, Chrome 31 to 44, Firefox 30 to 51, Safari 5.02+			
General				
Menu	English			
Power	12 VDC ± 20%, two-core terminal block, PoE (802.3at, class 4)			
Power Consumption	12 VDC ± 20%: 1.7 A, maximum 8 W, PoE (802.3af, class 3)			
Work Temperature/Humidity	From -40° to 149° F (-40° to 65° C), 95% or Less			
Protection Level	IP66 standard; TVS 6000V lightning protection, surge protection, and voltage transient protection			
Dimensions	13.9" x 4.45" x 4.45" (352.4 mm x 113.5 mm x 113 mm)			
Weight	3.2 lbs (1.45 kg)			

Range Performance¹

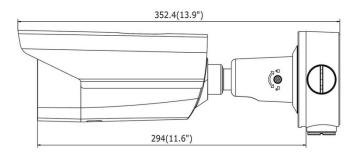
Standard Range	Model					
Table	DS-2TD2117-3/V1		DS-2TD2117-6/V1			
Johnson Criteria	Human	Vehicle	Human	Vehicle		
Detection	298 ft	919 ft	597 ft	1834 ft		
	(91 m)	(280 m)	(182 m)	(559 m)		
Recognition	75 ft	230 ft	151 ft	459 ft		
	(23 m)	(70 m)	(46 m)	(140 m)		
Identification	36 ft	114 ft	75 ft	230 ft		
	(11 m)	(35 m)	(23 m)	(70 m)		

Smart Functions Range Table	Model		
Line Cross/Intrusion/Region Entrance-Exit	Object	DS-2TD2117-3/V1	DS-2TD2117-6/V1
Optimized to Johnson Criteria	Human	69 ft (21 m)	138 ft (42 m)
(Recognition)	Vehicle	207 ft (63 m)	413 ft (126 m)
Temperature Exception	Size of Point	Max Range	Max Range
Accuracy at 5 x 5 pixels	2 m x 2 m	217 ft (66 m)	434 ft (132 m)
	1 m x 1 m	108 ft (33 m)	217 ft (66 m)
Advanced Fire Detection	Size of Point	Max Range	Max Range
Accuracy at 2 x 2 pixels	2 m x 2 m	591 ft (180 m)	1181 ft (360 m)
	1 m x 1 m	295 ft (90 m)	591 ft (180 m)

 $^{^{\,1}\,}$ Range performance values are calculated under ideal conditions and are not a guarantee of performance.



Dimensions





Units: mm (inch)