

# T-CAM Camera Tracking Package



## Description

The T-Cam Camera Tracking package is a complete and out-of-the-box solution for conference camera tracking.

It allows straight-forward installation, fast configuration and integration of a camera tracking system with any Televic Conference system. The T-Cam solution controls up to 4 IP-CAM50<sup>1</sup>, using the 3G-SDI connectivity.

By combining hardware and software, the T-Cam solution makes it easy to use and control cameras. Installers can quickly set up cameras, create talking heads, automatically switch the camera between participants, and even add a participant's name as an overlay<sup>2</sup> on top of the image. The end result is a package that makes camera integration plug and play.

The T-Cam Camera Tracking Solution comes in 3 different packages.

1. The basic package includes 2 cameras by default. One additional license required for each additional camera. (for a maximum of 4 cameras)

2. Available as an add-on in the T-Cam Name Overlay package

## Packages

### Basic T-Cam Package [71.98.1303]

The basic package contains everything you need for a basic camera tracking set-up:

- » 2 IP-CAM50 cameras
- » Camera interconnection cables
- » Preview capture card: Blackmagic DeckLink Mini Recorder
- » Video switcher: Blackmagic ATEM Television Studio HD
- » T-Cam Software: PC software with a license for control of 2 cameras
- » BlackMagic Micro Converter SDI to HDMI

### IP-CAM 50 Camera & License [71.98.1304]

Adds another camera and a camera license. Up to 2 packages may be ordered for a maximum of 4 cameras.

- » 1 IP-CAM 50 Camera
- » Camera interconnection cables
- » 1 license for one additional camera

### T-Cam Name Overlay [71.98.1302]

This add-on allows an overlay to be added onto the video output by using an additional capture card.

- » 1 license for name overlay
- » Capture card: Blackmagic DeckLink Mini Recorder

## Global Features

T-Cam is built for seamless integration with Televic Conference systems and allows a number of features out of the box.

- » Integrates perfectly with D-Cerno, Plixus engine (Core), CoCon, and Confidea G3
- » Creation of a synoptic for easy configuration of camera positions
- » 2 shots per seat
- » 2 shots for the wide shot
- » Multiple seat configurations immediately available for flexible seating arrangements
- » Configuration of camera positions can be done with the software or with a USB-joystick (not included in any of the packages)
- » Manual switch to HDMI input for static input (e.g.: presentation laptop)
- » 20x Optical zoom on cameras
- » Software may be upgraded to webcasting software

## Product Features

### Full HD PTZ Camera

- » Camera

The T-Cam solution is a dynamic PTZ camera tracking solution ideally suited for conference room settings. With Full HD 1080p output at 60 fps, the camera provides excellent images. Additionally, the 20x zoom, outstanding white balance, and exposure mode bring even the smallest details into focus, especially in darker conference rooms where lighting conditions may be poor.

With a wide viewing angle (horizontal -170° to +170°, tilting up to 90° and down to -30°) and fast response and smooth operation, the camera captures every move securely.

Finally, the 3G-SDI interface allows for crystal-clear and uncompressed video without delays. Combined with Televic Conference's Plixus network, working with high-quality, lip-synced video becomes a joy.

### Blackmagic DeckLink Mini

- » Capture Card

### Blackmagic ATEM Television Studio HD

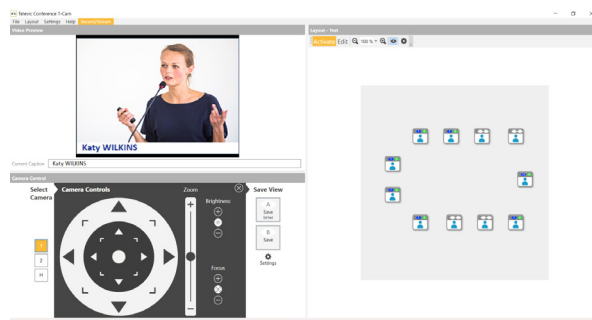
- » Video Switcher

The Blackmagic ATEM video switcher puts a host of video switching options easily at your fingertips. It includes 8 video inputs with both broadcast SDI and consumer HDMI inputs, making it ideal for use with the T-Cam cameras.

### T-Cam Camera Control

- » Software

Configure camera positions, assign name overlays (separate license required), set up 2 shots per seat, wide shots, etc. Manual override is available.



### BlackMagic Micro Converter SDI to HDMI

- » HDMI converter

## System Requirements

Recommended PC requirements:

- » Desktop PC with at least 1 PCI slot. 2 PCI slots, if both preview and overlay are required.
- » Windows 7, 8 and 10 supported
- » Serial COM port (USB to Serial converter can be used as well).

Standard USB joystick can be connected for camera control.

Recommended joystick: Axis T8310.

## Specifications

### T-CAM Camera Tracking Package

#### Mechanical

Size (mm)	570 x 300 x 420
Weight	11400g

### IP-CAM50

#### Technical & Electrical

Sensor	1/2.8" 2 MP CMOS
Video Output	1080p 60 / 59.94 / 50 fps, 1080i 60 / 59.94 / 50 fps, 1080p 30 / 29.97 / 25 fps, 720p 60 / 59.94 / 50 fps
Optical Zoom	20x
Panning Angle	-170° ~ +170°
Tilting Angle	-30° ~ +90°
Preset Positions	128
Video Output(HD) Interface	3G-SDI
PoE	PoE+ (IEEE802.3at)
Camera Control Interface	RS-232 / RS-422 / Ethernet
Camera Control Protocol	VISCA / PELCO D
Video S/N Ratio	> 50dB
Shutter Speed	1/1 ~ 1/10,000 sec
Focal Length	f = 4.7 ~ 94 mm

3D NR	Yes
Horizontal Viewing Angle	63°
Aperture	F1.6 ~ 3.5
Minimum Illumination	1.0 lux (F1.6, 50 IRE, 30fps)
Minimum Object Distance	1.2m
Gain Control	Auto, manual
White Balance	Auto, indoor, outdoor, one-push, manual
Exposure Control	Auto, manual
Focus System	Auto, manual
Image Flip	Yes
Audio Input	Line In / MIC In
Audio Output	Ethernet, SDI and HDMI

### Blackmagic ATEM Television Studio HD

Technical & Electrical	
Total Video Inputs	8
Total Video Outputs	8
SDI Rates	270Mb, 1.5G, 3G.
SDI Video Inputs	4 x 10-bit SD/HD switchable. 2 channel embedded audio.
SDI Program Output	5 x 10-bit SD/HD switchable
SDI Audio Outputs	2 Ch embedded into SDI output
SD Video Standards	525i59.94 NTSC 4:3 or 16:9, 625i50 PAL 4:3 or 16:9
HD Video Standards	720p50, 720p59.94, 1080p23.98, 1080p24, 1080p25, 1080p29.97, 1080p50, 1080p59.94, 1080i50, 1080i59.94
SDI Compliance	SMPTE 259M, 292M and 424M
Video Sampling	4:2:2 10-bit
Color Precision	4:2:2 10-bit
Color Space	4:2:2 YUV
Power Supply	1 x internal 110 – 240V AC

Environmental	
Operating Temperature	5° C to 40° C (41° - 104°F)
Storage Temperature	-10° to 60° C (14° to 140° F)
Relative Humidity	0% to 90% non-condensing