

P/N: 79305-0101

Copyright

© 2020, FLIR Systems, Inc.

All rights reserved worldwide. Names and marks appearing herein are either registered trademarks or trademarks of FLIR Systems and/or its subsidiaries. All other trademarks, trade names or company names referenced herein are used for identification only and are the property of their respective owners.

Document identity

Publ. No.: 79305-0101 Commit: 60393 Language: Modified: 2019-10-15 Formatted: 2020-04-03

Website

http://www.flir.com

Customer support

http://support.flir.com

Disclaimer

Specifications subject to change without further notice. Camera models and accessories subject to regional market considerations. License procedures may apply. Products described herein may be subject to US Export Regulations. Please refer to exportquestions@flir.com with any questions.



Imaging and optical data	
Infrared resolution	320 × 240 pixels
UltraMax (super-resolution) ¹	Yes
NETD	 <30 mK, 42° @ +30°C (+86°F) <40 mK, 24° @ +30°C (+86°F)
Field of view	 42° × 32° 24° × 18°
Minimum focus distance	 0.15 m (0.49 ft.), 42° 0.15 m (0.49 ft.), 24° Macro mode 103 μm as option to 24°
Minimum focus distance with MSX	 0.65 m (2.13 ft.), 42° 0.5 m (1.64 ft.), 24°
Focal length	 10 mm (0.39 in.), 42° 17 mm (0.67 in.), 24°
Spatial resolution (IFOV)	 2.41 mrad/pixel, 42° 1.31 mrad/pixel, 24°
Available extra lenses	 14° (AutoCal) 6° (service calibration required)
Lens identification	Automatic
f number	 1.1, 42° 1.3, 24°
Image frequency	30 Hz
Focus	 Continuous LDM One-shot LDM One-shot contrast Manual

1. Not supported when using macro.



P/N: 79305-0101

Imaging and optical data				
Field of view match		Yes		
Digital zoom		1-4× continuous	S	
Detector data				
Focal plane array/spectral range		Uncooled micro	bolometer/7.5–14 µm	
Detector pitch		17 µm		
Image presentation				
Resolution		640 × 480 pixels	s (VGA)	
Surface brightness (cd/m ²)		400		
Screen size		4 in.		
Viewing angle		80°		
Color depth (bits)		24		
Aspect ratio		4:3		
Auto-rotation		Yes		
Touchscreen		Optically bonded PCAP		
Display technology		IPS		
Cover glass material		Dragontrail®		
Programmable buttons		2		
Viewfinder		No		
Image adjustment		AutomaticAutomatic maximumAutomatic minimumManual		
Image presentation modes				
Infrared image		Yes		
Visual image		Yes		
MSX		Yes		
Picture in picture		Resizable and movable		
Gallery		Yes		
Measurement				
Camera temperature range	Object temperature range		Accuracy — for ambient temperature +15 to +35°C (+59 to +95°F)	
-20 to +120°C (-4 to +248°F) -20 to +100°C (–4 to +212°F)	±2°C (±3.6°F)	
	+100 to +120°C F)	(+212 to +248°	±2%	
0 to +650°C (+32 to +1202°F)	0 to +100°C (+3	2 to +212°F)	±2°C (±3.6°F)	
+100 to + 650°C +1202°F)		(+212 to ±2%		
Optional +300 to +1200°C (+572 to +2192°F)	+300 to +1200°C (+572 to +2192°F)		±2%	



P/N: 79305-0101

Measurement analysis	
Spotmeter	3 in live mode
Area	3 in live mode
Automatic hot/cold detection	Automatic maximum/minimum markers within area
Measurement presets	 No measurements Center spot Hot spot Cold spot User preset 1 User preset 2
Difference temperature	Yes
Reference temperature	Yes
Emissivity correction	Yes, variable from 0.01 to 1.0 or selected from materials list
Measurement corrections	Yes
External optics/windows correction	Yes
Screening	0.5°C (0.9°F) accuracy at 37°C (98.6°F) with reference
Alarm	
Color alarm (isotherm)	 Above Below Interval Condensation (moisture/humidity/dewpoint) Insulation
Measurement function alarm	Audible/visual alarms (above/below) on any selected measurement function
Set-up	
Color palettes	 Iron Gray Rainbow Arctic Lava Rainbow HC
Setup commands	Local adaptation of units, language, date, and time formats
Languages	21
Service functions	
Camera software update	Using USB cable or SD card
Storage of images	
Storage media	Removable memory: SD card
Time lapse (Periodic image storage)	10 seconds to 24 hours (infrared)
Remote control operation	Using USB cable or Wi-Fi
Image file format	Standard JPEG, measurement data included. Infrared-only mode



P/N: 79305-0101

Image annotations	
Voice	60 seconds with built-in microphone and speaker (and via Bluetooth) on still images and video
Text	Text from predefined list or soft keyboard on touchscreen
Visual image annotation	Yes
Image sketch	Yes: on infrared only
Sketch	From touchscreen
METERLINK	Wireless connection (Bluetooth) to:
	FLIR meters with METERLiNK
Area measurement information	Yes
GPS	Location data automatically added to every still image and first frame in video from built-in GPS
Video recording in camera	
Radiometric infrared-video recording	RTRR (.csq)
Non-radiometric infrared-video recording	H.264 to memory card
Visual video recording	H.264 to memory card
Video streaming	
Radiometric infrared-video streaming (compressed)	Over UVC
Non-radiometric video streaming (compressed: IR, MSX, visual, Picture in Picture)	 H.264 (AVC) over RTSP (Wi-Fi) MPEG4 over RTSP (Wi-Fi) MJPEG over UVC and RTSP (Wi-Fi)
Visual video streaming	Yes
Digital camera	
Resolution	5 MP with LED light
Focus	Fixed
Field of view	53° × 41°
Video lamp	Built-in LED light
Laser pointer	
Laser alignment	Position is automatically displayed on the infrared image
Laser distance meter	Activated by dedicated button
Laser	Class 2, 0.05–40 m (0.16–131 ft.) ±1% of measured distance
Data communication interfaces	
Interfaces	USB 2.0, Bluetooth, Wi-Fi, DisplayPort
METERLINK/Bluetooth	Communication with headset and external sensors
Wi-Fi	Peer to peer (ad hoc) or infrastructure (network)
Audio	Microphone and speaker for voice annotation of images



P/N: 79305-0101

Data communication interfaces	
USB standard	USB 2.0 High Speed
Video out	DisplayPort
Video connector type	DisplayPort over USB Type-C
Radio	
Operating frequency	Bluetooth + EDR/LE: 2402–2480 MHz
	WLAN 2.4 GHz: 2412–2462 MHz
	WLAN 5 GHz: 5150–5350 MHz (DFS: only slave mode)
	Note that frequency band 5150–5350 MHz is for indoor use only, see national regulations.
RF output (EIRP)	Bluetooth + EDR/LE: < 10 dBm
	WLAN: < 17 dBm
Antenna	Integrated PIFA antenna (gain: maximum 1.4 dBi)
Power system	
Battery type	Rechargeable Li-ion battery
Battery voltage	3.6 V
Battery operating time	> 4 hours at 25°C (77°F) with typical use
Charging system	In camera (AC adapter or 12 V from a vehicle) or two-bay charger
Charging time (using two-bay charger)	3.5 h to 90% capacity, on-screen indicator
Charging temperature	0°C to +45°C (+32°F to +113°F), except for the Korean market: +10°C to +45°C (+50°F to +113° F)
External power operation	AC adapter 90–260 V AC (50/60 Hz) or 12 V from a vehicle (cable with standard plug, optional)
Power management	Automatic shut-down and sleep mode
Environmental data	
Operating temperature range	–15 to +50°C (5–122°F)
Storage temperature range	-40 to +70°C (-40 to 158°F)
Humidity (operating and storage)	IEC 60068-2-30/24 hours, 95% relative humidity, 25–40°C (77–104°F)/2 cycles
EMC	 ETSI EN 301 489-1 (radio) ETSI EN 301 489-17 EN 61000-6-2 (immunity) EN 61000-6-3 (emission) FCC 47 CFR Part 15 Class B (emission)
Radio spectrum	 ETSI EN 300 228 FCC Part 15.249 RSS-247 Issue 2
Encapsulation	IP 54 (IEC 60529)
Shock	25g (IEC 60068-2-27)
Vibration	2g (IEC 60068-2-6)
Safety	EN/UL/CSA/PSE 60950-1



P/N: 79305-0101

© 2020, FLIR Systems, Inc. #79305-0101; r. 60393;

Physical data		
Weight (including battery)	1.3 kg (2.9 lb.)	
Size (L × W × H)	 Lens vertical: 140 × 201.3 × 84.1 mm (5.5 × 7.9 × 3.3 in.) Lens horisontal: 140 × 201.3 × 167.3 mm (5.5 × 7.9 × 6.6 in.) 	
Battery weight	195 g (6.89 oz.)	
Battery size $(L \times W \times H)$	59 × 66 × 94 mm (2.3 × 2.6 × 3.7 in.)	
Tripod mounting	UNC ¼″-20	
Housing material	PCABS with TPE, magnesium	
Color	Black	
Warranty and service		
Warranty	http://www.flir.com/warranty/	
Shipping information		
Packaging, type	Cardboard box	
Packaging, contents	 Accessory box I: Power supply for battery charger Power supply, 15 W/3 A Printed documentation SD card (8 GB) USB 2.0 A to USB Type-C cable USB Type-C to HDMI and PD adapter USB Type-C to USB Type-C cable (USB 2.0 standard) Accessory box II: Lens cap strap Lens cleaning cloth Neck strap Battery (2 ea) Battery charger Extra lens, 42° FLIR Thermal Studio Pro license card (1 year subscription) Hard transport case Infrared camera with lens Lens cap, front Lens cap, front and rear (only for extra lenses) 	
Packaging, weight	6.2 kg (13.7 lb.)	
Packaging, size	$500 \times 190 \times 370 \text{ mm} (19.7 \times 7.5 \times 14.6 \text{ in.})$	
EAN-13	7332558012956	
UPC-12	845188014643	
Country of origin	Sweden	

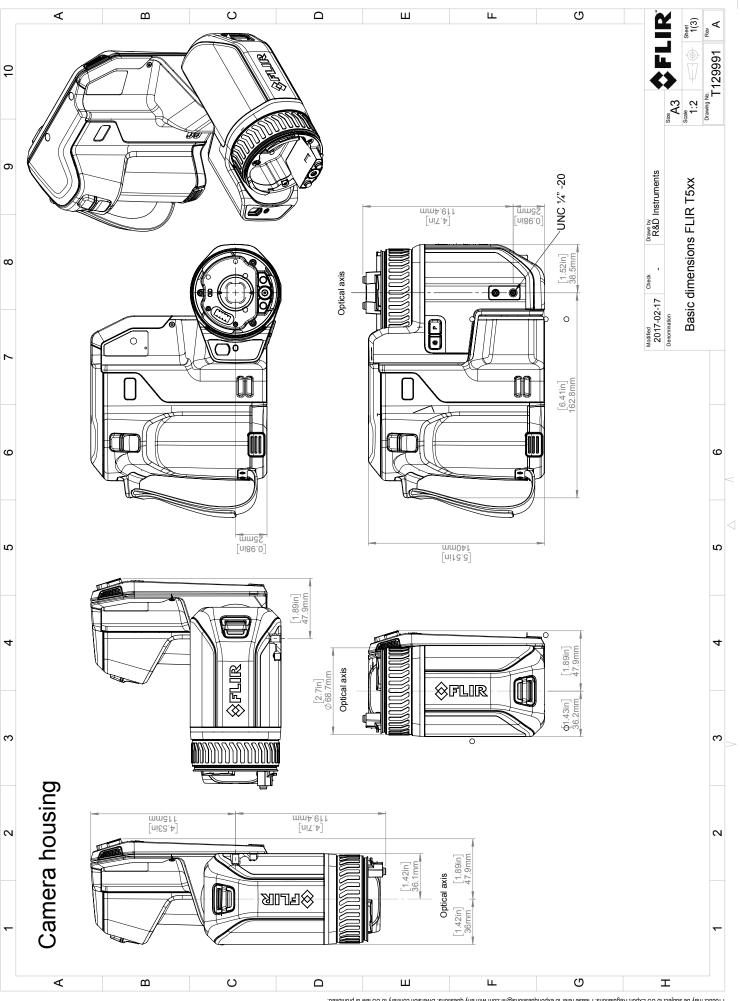
Supplies and accessories:

- T300238; Macro lens 2.0x with case
- T199300ACC; Battery
- T199610; Battery charger
- T199601; Hand strap and neck strap
- T199347ACC; Hard transport case for FLIR T8xx, T5xx, and GF7x series

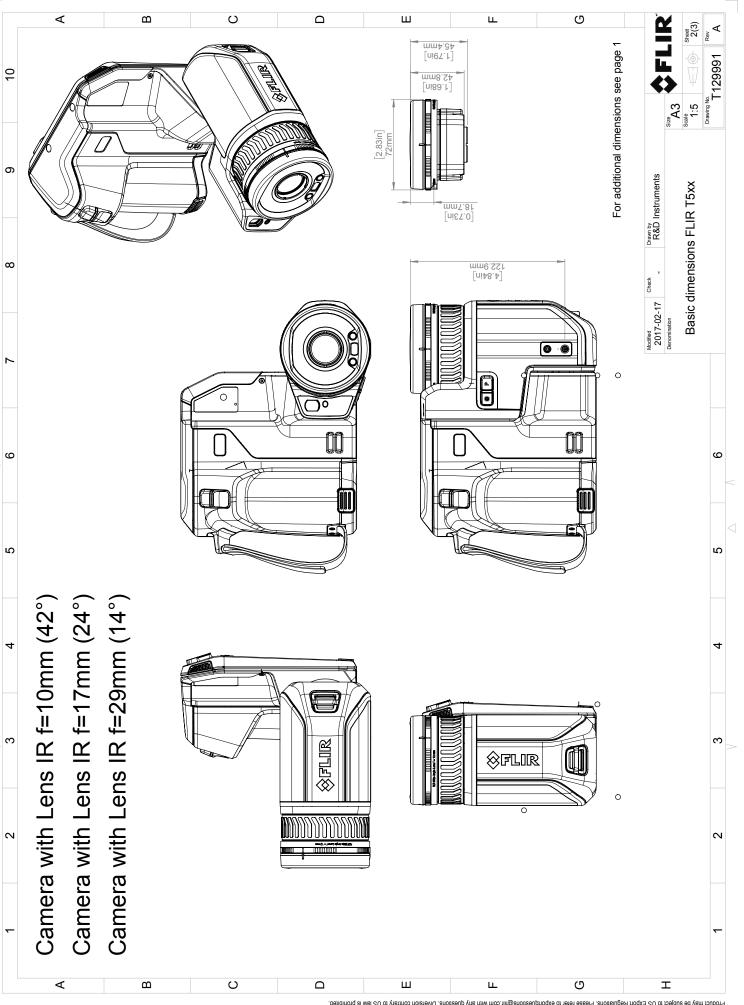


P/N: 79305-0101

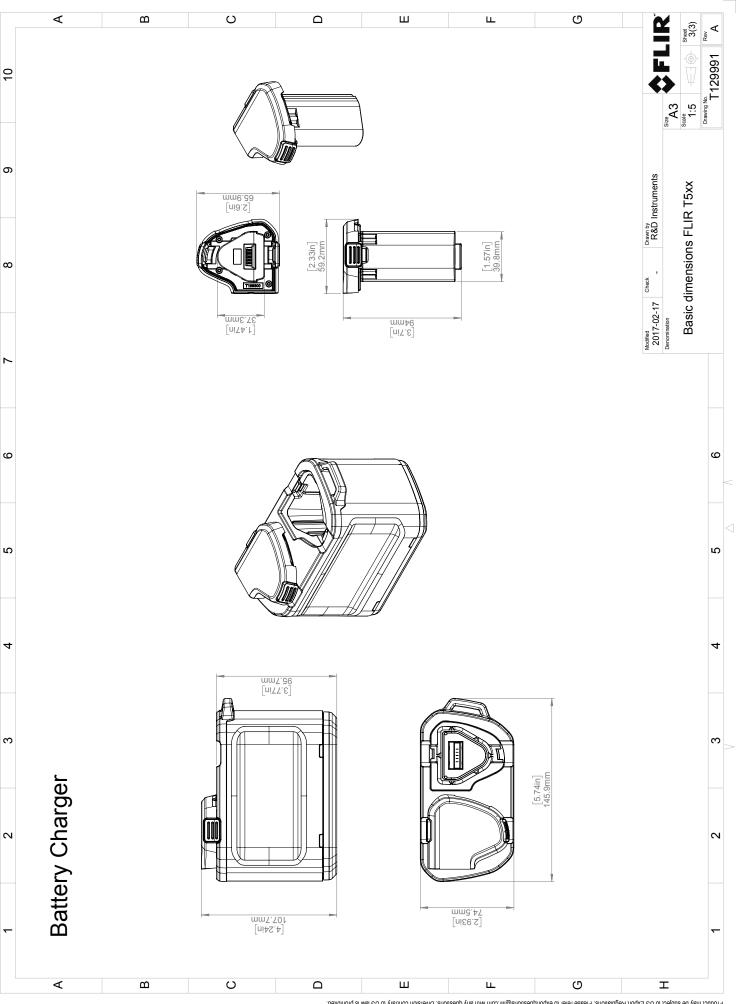
- T199616; Option, High temperature, +300 to +1200°C
- T300030; Option, No radio
- + T199609; Option, Macro mode 50/71/101 μm for 24°
- T850105; FLIR Inspection Route Camera Option
- T130337ACC; Calibration target
- T199588; IR lens, f=29 mm (14°) with case
- T199589; IR lens, f=17 mm (24°) with case
- T199590; IR lens, f=10 mm (42°) with case
- T300095; IR lens, f=70 mm (6°) with case
- T911630ACC; Power supply for camera, 15 W/3 A
- T911631ACC; USB 2.0 A to USB Type-C cable, 0.9 m
- T911633ACC; Power supply for battery charger
- T911705ACC; USB Type-C to USB Type-C cable (USB 2.0 standard), 1.0 m
- T911706ACC; Car adapter 12 V
- T911845ACC; USB Type-C to HDMI and PD adapter
- T911846ACC; USB 2.0 A to USB Type-C with Power supply
- T198495; Pouch
- T197771ACC; Bluetooth Headset
- T300244; FLIR Route Creator Plugin for FLIR Thermal Studio Pro, 1 Year Subscription
- T300243; FLIR Thermal Studio Pro, 1 Year Subscription
- T300083; FLIR Thermal Studio Pro, Perpetual license
- T300258; FLIR Thermal Studio, Perpetual license
- T198583; FLIR Tools+ (download card incl. license key)
- T198696; FLIR ResearchIR Max 4 (hardware sec. dev.)
- T199013; FLIR ResearchIR Max 4 (printed license key)
- T199043; FLIR ResearchIR Max 4 Upgrade (printed license key)
- 4220499; FLIR Research Studio 1 Year Subscription (online activation)
- 4220500; FLIR Research Studio Perpetual License (online activation)
- 4220646; FLIR Research Studio Perpetual License (USB dongle)
- INST-EW-0145; Extended Warranty 1 Year for T530
- INST-EWGM-0155; Premium Service Package for A3xx, T4xx mkll, T530
- INST-GM-0140; General Maintenance Package for T530



© 2016, FLR Systems, Inc. All rights reserved worldwide. No part of this drawing may be reproduced, stored in a retrieval system, or transmitted in any form, or by any means, electronic, mechanical, photocopying, recording, or otherwise, without written period and in a retrieval system, or transmitted in any form, or by any means, electronic, mechanical, photocopying, recording, or otherwise, without written period and in a retrieval system, or transmitted in any form, or by any means, electronic, mechanical, photocopying, recording, or otherwise, without written proved any be subject to regional market considerations. License procedures may apply.



© 2016, FLIR Systems, Inc. Bil rights reserved worldwide, No part of this drawing may be reproduced, stored in a retrieval system, or transmitted in any form, or by any means, electronic, mechanical, protocopying, recording, or otherwise, written permission from FLIR Systems, Inc. Specifications utilise to export of the indiversion concerding, or otherwise, Products may be subject to regional market considerations. License procedures may apply.



© 2016, FLR Systems, Inc. All rights reserved worldwide. No part of this drawing may be reproduced, stored in a retrieval system, or transmitted in any form, or by any means, electronic, mechanical, photocopying, recording, or otherwise, without written permission from FLIR Systems, Inc. Specifications under the system without butther notice. Dimensional data is based on nominal values. Products may be subject to regional market considerations. License procedures may apply.



The World's Sixth Sense"

February 2, 2019 Täby, Sweden

AQ320246

CE Declaration of Conformity – EU Declaration of Conformity

Product: FLIR T5XX-, T8XX- and GF7X-series Name and address of the manufacturer: FLIR Systems AB PO Box 7376 SE-187 15 Täby, Sweden

This declaration of conformity is issued under the sole responsibility of the manufacturer. The object of the declaration: FLIR T5XX-, T8XX- and GF7X-series (Product Model Name FLIR-T8210). The object of the declaration described above is in conformity with the relevant Union harmonisation legislation:

Directives:

Directives.			
Directive Directive	2012/19/EU 2014/53/EU	Waste electrical and electric equipment Radio Equipment Directive (RED)	
Directive	1999/519/EC		
Directive		Limitation of exposure to electromagnetic fields (SAR)	
Directive	2011/65/EU	конз а	und 2015/830/EU
Standards:			
EMC Radio:	ETSI EN 301 489-1 + -17	7	EMC for radio, broadband data transmission
Emission:	EN 61000-6-3/A1:2011		EMC – Generic standards
Immunity:	EN 61000-6-2:2005		Electromagnetic Compability Generic
	EN 301489-1:2016 v2.1	.0	ERM – EMC for radio equipment
	EN 301489-17:2012 v2.	2.1	ERM – EMC Wideband data
Laser:	EN 60825-1		Safety of laser products
Radio:	ETSI EN 300 328 v2.1.1		Harmonized EN covering essential
			requirements of the R&TTE Directive
	ETSI EN 301 893 v.2.1.1		5GHz WLAN
	EN 303 413 v1.1.0		Radio Spectrum Efficiency (gps)
SAR:	EN 50566:2013/AC:2014	4	Handheld and body mounted wireless
	EN 62209-02:2010		Handheld and body mounted wireless
Safety:	IEC 60950-1:2005+A1:20	009+	Information technology equipment
	A2:2013 EN 60950-1:20	06+	
	A11:2009+AC:2011+A12		
RoHS:	EN 50581:2012		Technical documentation
	2.1.00002.2012		

FLIR Systems AB Quality Assurance

the door

Lea Dabiri Quality Manager

> PO Box 7376, SE-187 15 Täby Sweden [T] +46 8 753 25 00 [F] +46 8 753 23 64 www.flir.com