

# WAT-03U2

1/3" Compact High Sensitivity USB2.0 HD Color Camera

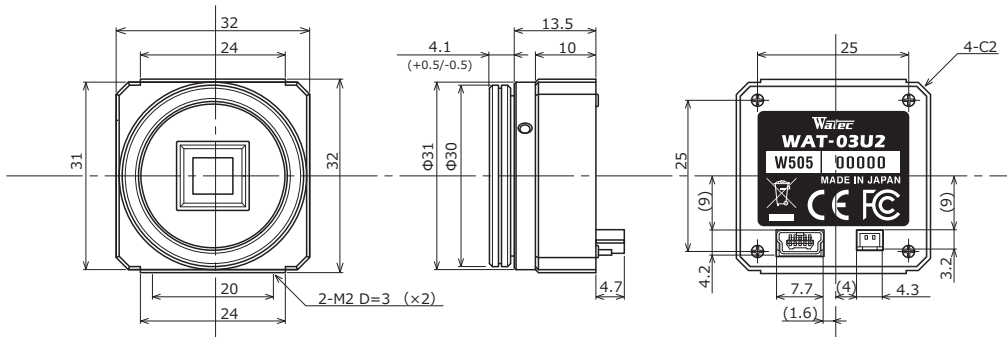
Directly import the captured image to your PC and compact design specializes in the embedded application



## Key features

- High sensitivity 1.3 M CMOS sensor
- Min. illumination 0.02 lx F1.2 (AGC ON=42dB, Shutter=OFF)  
0.005 lx F1.2 (AGC ON=42dB, Shutter=1/7.5 sec.)
- Frame rate : 30fps (HD)、60fps (VGA)
- USB Video Class & USB Bus Power (plug & play)

## Dimensions



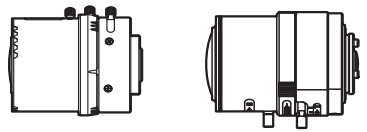
## Specifications

Pick-up element	1/3 inch CMOS image sensor	
Number of effective pixels	1305(H) × 977(V)	
Unit cell size	3.75μm(H) × 3.75μm(V)	
Imaging system	RGB primary color bayer arrangement mosaic filters on chip	
Synchronizing system	Internal	
Scanning system	Progressive	
Output size	1280×960, 1280×720, 640×480, 320×240	
Max. frame rate	60 fps	
Video compression	MJPEG, YUY2	
Video output	USB Video Class (Compatible)	
Minimum illumination	0.02 lx F1.2 (AGC ON=42dB, Shutter=OFF)	
	0.005 lx F1.2 (AGC ON=42dB, Shutter=1/7.5 sec.)	
S/N	-	
Function settings	Camera Viewer	
AE mode	Fixed	1/15, 1/7.5, 1/4, 1/2, 1, 2 sec.
	EI	1/30, 1/60, 1/120, 1/250, 1/500, 1/1000, 1/2000, 1/4000, 1/8000 sec.
White balance	ATW, MWB	1/30 - 1/8000 sec.
		1/7.5 - 1/8000 sec.
AGC	ON	0 - 42dB
	OFF	-
MGC	0 - 72dB (1dB step)	
Gamma characteristics	γ=USER (Level adjustable)	
Noise reduction	-	
Wide dynamic range	-	
Lens iris	-	
Back light compensation	BLC	
White blemish correction	-	
Sharpness	Level adjustable	
Defog	-	
Digital zoom	-	
Privacy mask	-	
Mirror image	-	
Freeze	-	
Motion detection	-	
Neg.image	-	
Interface	USB (High speed), 2P connector (Snap shot)	
Power supply	USB +5V	
Power consumption	0.75W (150mA)	
Operating temperature	-10 - +50°C	
Storage temperature	-30 - +70°C	
Operating / Storage humidity	95% RH or less (Without condensation)	
Lens mount	CS mount (Back focus adjustable)	
Cable length	Shorter than 3.0m recommended	
Weight	Approx. 35g	
Accessories	Hex. Wrench, Camera bracket, EX cable, USB cable	
Min. System Requirements	CPU	800MHz or faster
	RAM	512MB or larger
	Others	USB2.0 Port
Recommended System Specifications	CPU	Intel® Core TM i Series
	RAM	2GB or larger
	Others	USB2.0 Port, 1920×1080 or better resolution display
Operation Confirmed OS	Windows 7 32bit/64bit, Windows 8 32bit/64bit, Windows 8.1 32bit/64bit, Windows 10 32bit/64bit	

Accessories Options


### WAT-03U2

**CS-mount lenses**



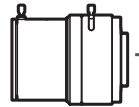
M13VM288IR A4Z2812CS-MPIR

**Miniature lenses / Mount adaptors**




M2520BC-12 M2920BC-12  
M3620BC-12 M0620BC-12 28MMA-M12-155  
M0820BC-12  
M1616BC-12 28MMA-M12-140

**C-mount lenses**

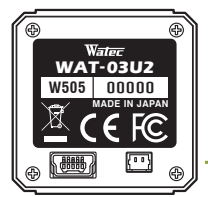
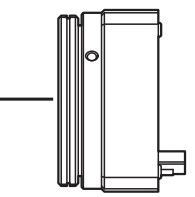


\*Not in our lineup

**C-mount adaptor**



30CMA-R

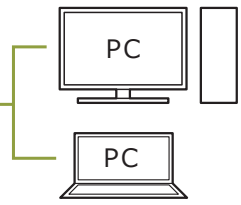


**GPIO**




EX cable (300mm) Snap shot

**USB cable (1m)**



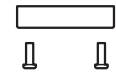
\*Watec Camera Viewer recommended  
Download from Watec website

**Holder**




H003

**Camera bracket**



B005

**Stand**



MS50