OLYMPUS PEN

Specifications E-P7	
Туре	
Lens mount	Micro Four Thirds
Image Sensor	
Туре	4/3" Live MOS sensor
Effective pixels	20.3 Megapixels
Engine	
Туре	TruePic VIII
Filter	
Dust reduction filter	Supersonic Wave Filter
Live View	
Displayed information	Aperture, Shutter speed, Auto bracket, AE lock, Focus mode, Shooting mode, Battery check, IS activating mode, Face / Eye detection mode, Record mode, ISO, Sequential shooting mode , White Balance, Metering mode, Exposure compensation value, AF frame display, AF confirmation mark, Shooting information, Spot metering area, Super FP, Flash status, Touch Panel Condition, Focal length, Flash mode, Histogram, Level Gauge, Highlight & Shadow, Focus peaking, Number of storable pictures, Custom, Face detection, Flash intensity, Wi-Fi
Field of view	Approx. 100%
Magnification levels	5 / 7 / 10 / 14 x
Image Stabiliser	
Туре	Sensor shift
Modes	Five-dimensional, vertical or horizontal activation, automatic
Effective Compensation Range	Up to 4.5 EV steps* CIPA
Live View stabilisation	Available * According to CIPA standards. *When using M.Zuiko Digital ED 14-42mm F3.5-5.6 EZ (focal length =42mm (35mm equivalent: 84mm))
Focusing Syster	n
Method	Contrast Detection AF system
Focus areas	121 points / All target, Group target (9-areas), Single target
AF lock	Available, Locked by first position of shutter release button in single AF mode, AE/AF lock button (customised)
Modes	Manual focus, Single AF, Continuous AF, Single AF + MF, AF Tracking, Super Spot AF, Face Detection AF
AF illuminator	Equipped
Manual focus	Available, With enlarged focusing area or focus peaking
AF targeting pad	No
Free Detection automation	Fue Detect AF. Off. Near side priority
Face Detection extension	Eye Detect AF: Off, Near side priority

AF tracking	
F	Available, Available in continuous AF mode
Exposure Syster	
Modes	Programme automatic, Aperture priority, Shutter priority, Manual, Bulb, Time, i-Auto, Advanced Photo Modes, Scene Modes, Art Filter, Movie, Live Time, Live Composite
Exposure compensation	+/- 5 EV (1/3 steps)
	Note: Movie shooting, monitor and EVF displays only up to $\pm 3 \mbox{ EV}$.
AE lock	Available
Advanced Photo	Modes
Modes	Live Composite, Live Bulb, Multiple Exposure, HDR Backlight*, Silent, Panorama, Keystone Compensation, AB bracketing, AF bracketing * 4 images automatically shot and combined into a single image composite
Scene Modes	
Number of scene modes	21
Modes	Portrait, e-Portrait, Landscape with Portrait, Night Scene with portrait, Children, Sports, Panning, Night Scene, Hand-held Starlight, Fireworks, Light trails, Landscape, Sunset, Beach and Snow, Candle, Silent mode, Backlight HDR, Macro, Nature Macro, Documents, Multi Focus
Multi-Exposure	
Max. number of frames	2 frames (shooting)
Frame assistance	Live View
Auto gain control	Available
Light Metering	
Method	TTL open aperture light metering
Zones	324 zones Multi-pattern Sensing System
Detection range	-2 - 20 EV (f2.8, ISO 100)
Modes	ESP light metering, Spot metering, Centre weighted metering, Highlight, Shadow
Art Filter	
Modes	Pop Art, Soft Focus, Pale & Light Colour, Light Tone, Grainy Film, Pin Hole, Diorama, Cross Process, Gentle Sepia, Dramatic Tone, Key Line, Water colour, Vintage, Partial Colour*, Bleach Bypass, Instant Film
Variation / Effect	Available * 18 colours selectable
Sensitivity	
Auto	ISO LOW* - 6400
Manual	ISO LOW - 25600 (adjustable in 1/3 EV step) *approx. 100
Shutter	
Chuttor tupo	Computerised focal-plane shutter
Shutter type	computenseu local-plane shutter

Shutter	
Modes	Single frame, Sequential shooting, Self timer
Shutter Speeds	
Standard operation	
Shutter speed range	1/4000 - 60 s (in 1/3 EV steps)
Bulb mode	Up to 30 minutes (selectable longest time in the menu, default: 8 minutes)
Silent mode	
Shutter type	Electronic shutter
Shutter speed	1/16000 - 60 s
Anti-shock mode	
Shutter type	Electronic first curtain shutter
Shutter speed	1/320* - 60 s * For speeds over 1/320 sec., mechanical shutter will automatically be selected.
White Balance	
Manual White balance (One-Touch)	Available
One-touch white balance	4 custom settings can be registered
Custom WB	1 setting can be registered at Kelvin temperature (2000K - 14000K)
Preset values	Sunlight, Shade, Overcast, Tungsten, Flourescent 1, Flash
Auto Flash adjustment	Off / Auto WB / Flash
Keep warm colour	On / Off
Sequence Shoot	ing
Speed (H)	Approx. 8.7 fps
Speed (L)	5 fps (IS on)
Max. number of frames	Up to card capacity (RAW)
	Up to card capacity (JPG / Large Normal mode)
Conditions	Memory card: KIOXIA SDXU-D032G
	Note: Depending on shooting conditions, the sequential shooting speed may reduce speed during shooting.
Speed (H)	Approx. 15 fps
Speed (L)	Approx. 6.3 fps
	Max. number of frames: RAW 42 / JPG (LF): 49
	Max. number of frames: RAW 945 / JPG (LF): Up to card capacity
Image Processin	g
Art Filter bracketing	Available
Picture mode	Colour Profile Control, Monochrome Profile Control, Art Filter
Flash	
Modes	AUTO, Manual, Manual (Full, 1/4, 1/16, 1/64), Red-eye reduction, Slow synchronisation with red-eye reduction, Slow synchronisation, Slow synchronisation 2nd curtain, Fill-in, Off, TTL-Auto

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Flash	
Туре	Built-in
Flash compensation	+/- 3 EV / 1/3 EV steps
Guide number	7.6 (ISO 200)
X-sync speed	1/250 s / 1/4000 s (Super FP Mode)
External Flash C	Control
X-sync speed	1/250 s / 1/4000 s (Super FP Mode)
Туре	TTL AUTO, AUTO, MANUAL, FP TTL AUTO, FP MANUAL
Modes	Auto, Red-eye reduction, Slow synchronisation, 2nd curtain and slow synchronisation, Fill-in for exclusive flash, Manual Note: Some functions are only available if they are supported by the externa flash.
Compatible external flash	FL-14, FL-20, FL-36R, FL-50R, FL-300R, FL-600R, FL-700WR, FL-900R, STF-8
Wireless Flash C	Control
Compatible external flash	FL-36R, FL-50R, FL-300R, FL-600R, FL-700WR, FL-900F
Control method	Triggered and controlled (Olympus Wireless RC Flash system)
	Commander flash: FL-900R, FL-700WR, FL-600R, STF-8 (no control with internal flash)
	Available when used together with flashes from the Olympus wireless RC flash system.
Radio control	
Radio wireless control	Available when attaching optional flash commander.
Compatible commander	FC-WR, FL-700WR For more details see specifications of commander units.
Compatible receiver	FL-700WR, FR-WR + wireless RC system flash
Modes	Auto, FP Manual, FP TTL, FP TTL Auto, Manual
Monitor	
Monitor type	Tiltable LCD - Touch Panel
Monitor size	7.6 cm / 3.0'' (3:2)
Resolution	1,037 K dots
Brightness adjustment	+/- 7 levels
Colour balance	+/- 7 levels Vivid (default) / Natural
Touch Control functions	Shutter release, AF area enlargement, AF area selection, Art Filter, Enlargement, Enlargement playback, Frame forward/backward, Live Guide, Scene Modes, Shooting mode, Super Control Panel, Wi-Fi connection
Tilt angle	80° (up) 180° (down)
Level Gauge	
Detection	2-axis
Display	Rear display and viewfinder
Recording Form	ats
RAW	12 bit
RAW & JPEG	Applied parallel recording

Recording Forma	ats		
JPEG	Applied		
Aspect ratio	4:3 / 3:2 / 16:9 / 6:6 / 3:4		
Still Image Recording			
EXIF	2.31		
DCF	Applied		
Movie Recording	g System		
Recording format	MOV(MPEG-4AVC/H.264)		
Image Stabilisation Mode	Applied Hybrid sensor shift + digital (5-axis)		
	3840 x 2160 (4K) / 30p, 25p, 24p / IPB (approx. 102 Mbps)		
HD Movie quality	Full HD 1920 x 1080 (16:9) / 30p, 25p, 24p (MOV) 29min.		
	Full HD 1920 x 1080 (16:9) / 60p, 50p / IPB (F,N) / (MOV) (MOV)		
	HD 1280 x 720 (16:9) / 60p, 50p, 30p, 25p, 24p (MOV)		
Maximum Recording Time	29 min (MOV)		
Exposure Modes	Art Filter, Programme automatic * Frame rate may drop when using certain art filter		
Movie Specialtie	S		
High-Speed Recording	720P / 120fps		
Time lapse	4k, 1080p, 720p Available		
Art Filter	Cross Process, Diorama, Dramatic Tone, Gentle Sepia, Grainy Film, Key Line, Light Tone, Pale & Light Colour, Pin Hole, Soft Focus, Pop Art, Bleach Bypass * Not available for 4K and High Speed movies		
Sound Recordin	• •		
Sound Recording	• •		
	g System		
Internal microphone	g System Stereo		
Internal microphone Recording format	g System Stereo Stereo PCM/16bit, 48kHz, Wave Format Base		
Internal microphone Recording format Image footage	g System Stereo Stereo PCM/16bit, 48kHz, Wave Format Base 30 s		
Internal microphone Recording format Image footage Speaker	g System Stereo Stereo PCM/16bit, 48kHz, Wave Format Base 30 s Equipped		
Internal microphone Recording format Image footage Speaker Microphone functions	g System Stereo Stereo PCM/16bit, 48kHz, Wave Format Base 30 s Equipped		
Internal microphone Recording format Image footage Speaker Microphone functions View Images	g System Stereo Stereo PCM/16bit, 48kHz, Wave Format Base 30 s Equipped Wind Noise Reduction, Recording Volume		
Internal microphone Recording format Image footage Speaker Microphone functions View Images Modes	g System Stereo Stereo PCM/16bit, 48kHz, Wave Format Base 30 s Equipped Wind Noise Reduction, Recording Volume Index, Calendar, Zoom, Slide show, Movie, Single		
Internal microphone Recording format Image footage Speaker Microphone functions View Images Modes Light box Histogram in playback	g System Stereo Stereo PCM/16bit, 48kHz, Wave Format Base 30 s Equipped Wind Noise Reduction, Recording Volume Index, Calendar, Zoom, Slide show, Movie, Single Available		
Internal microphone Recording format Image footage Speaker Microphone functions View Images Modes Light box Histogram in playback mode Shooting information Highlight/Shadow point warning	g System Stereo Stereo PCM/16bit, 48kHz, Wave Format Base 30 s Equipped Wind Noise Reduction, Recording Volume Index, Calendar, Zoom, Slide show, Movie, Single Available Available Off / On Available		
Internal microphone Recording format Image footage Speaker Microphone functions View Images Modes Light box Histogram in playback mode Shooting information Highlight/Shadow point warring Erase / Protect /	g System Stereo Stereo PCM/16bit, 48kHz, Wave Format Base 30 s Equipped Wind Noise Reduction, Recording Volume Index, Calendar, Zoom, Slide show, Movie, Single Available Available Off / On Available Copy Function		
Internal microphone Recording format Image footage Speaker Microphone functions View Images Modes Light box Histogram in playback mode Shooting information Highlight/Shadow point warning	g System Stereo Stereo PCM/16bit, 48kHz, Wave Format Base 30 s Equipped Wind Noise Reduction, Recording Volume Index, Calendar, Zoom, Slide show, Movie, Single Available Available Off / On Available		

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Image Editing	
Editing functions	RAW data edit, Red-eye reduction, Sepia, Black & White, Shadow Adjustment, Trimming, Aspect ratio
Menu	
Menu languages in camer	^a English, French, German, Spanish, Italian, Russian, Czech, Dutch, Danish, Polish, Portuguese, Swedish, Norwegian, Finnish, Croatian, Slovenian, Hungarian, Greek, Slovak, Turkish, Latvian, Estonian, Lithuanian, Ukrainian, Serbian
Customisation C	Options
Fn Button	Equipped
Programmable button	Equipped
Interface	
Hot shoe	Equipped
Media	SD Memory Card (SDHC, SDXC, UHS-I, UHS-II compatible) Class 10 or higher SD card is recommended for movie shooting UHS-I U3 card is recommended for 4K
HDMI™	Applied Micro connector (Type D) *
USB 2.0 High Speed	Applied
Wireless connectivity	Wi-Fi, Bluetooth®
Communication method	Bluetooth® Low Energy Ver.4.2 * "HDMI", the HDMI logo and "High-Definition Multimedia Interface" are trademarks or registered trademarks of HDMI Licensing LLC. *Wi-Fi is a registered trademark of the Wi-Fi Alilance. ** The Bluetooth® word mark and logos are registered trademarks owned by the Bluetooth SIG, Inc. and any use of such marks by OLYMPUS CORPORATION is under license.
Wi-Fi Functions	
Easy Connection	QR code setting
Wireless Shooting	Live View, Power off, Rec View, Self timer, Touch AF & Shutter, P/A/S/M exposure modes, Bulb mode, Live Composite, Zoom, Aperture priority, Manual
Image Share	Automatic transfer is possible via Share Order JPEG, MOV
GPS info	Available through Smartphone GPS data
Other Features	
Face Detection Technology	/ Applied
Menu guide	Available
Power Supply	
Battery	BLS-50 Lithium-Ion Battery (included)
Sleep mode	1, 3, 5min. and off selectable.
Live View shooting	Approx. 360 images (50% with Live View) images (100% with Live View) (using BLS-50 and KIOXIA SD with IS ON, based on CIPA testing standards)
Movie recording	80 min (standard JEITA conditions) 140 min (When repeatedly recording at the maximum time of 29 minutes, using M.Zuiko Digital ED 14-42mm F3.5-5.6 EZ, 4K video shooting)
Battery life	

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Power Supply	
Internal Charging	Available (Camera must be switched off)
Environment	
Temperature	0 - 40°C Operating temperature / -20 - 60°C storage temperature
Humidity	30 - 90% operation humidity / 10 - 90% storage humidity
Dimensions / Weight	
Width	118.3 mm
Height	68.5 mm
Depth	38.1 mm
Weight	337 g (including battery and memory card) (without tripod adapter)