Olympus OM-D E-M5 Mark III SPECIFICATIONS

Sensor / Dust Reduction

Sensor Type	4/3" Live MOS Sensor
Effective Pixels	20.4 million
Total Pixels	21.8 million
Aspect Ratio & Area	4:3 / 17.4 x 13.0mm
Dust Reduction	Super Sonic Wave Filter

Processor

Processor Type	TruePic™ VIII

Focusing System

AF System Type	High-speed imager AF: Imager phase detection AF and imager contrast AF used in combination. When a Micro Four Thirds lens (mount adapter sold separately necessary) is attached, imager phase detection AF is always enabled.
Focusing Points / Focusing Points Selection Mode	121-point cross-type phase detection AF and 121-point contrast AF All target, single target (normal / small), group target (5-area / 9-area / 25-area)
Focus Modes	Single AF (S-AF) Continuous AF (C-AF) Manual Focus (MF) S-AF + MF AF tracking (C-AF + TR) Preset MF * * Distance setting values are rough estimates and not compatible lens except the AF lens.
AF Limiter	Available (Fn button can be assigned to On/Off; can save 3 distance settings) *Distance setting values are rough estimates.
AF Performance	C-AF lock (5 steps) , AF scanner (3 types) , C-AF Center Priority , C-AF Center Start
Magnified Frame	3x , 5x , 7x , 10x , 14x * Autofocusing is possible in the magnified frame; can be assigned to button to turn magnify frame AF on and to activate magnification; touch icon on monitor to turn off; enables selection of AF point from over 800.
Super spot AF	Available*(Contrast AF in center of the monitor when magnified) *Available only when a Micro Four Thirds lens is attached.
Face Detection AF / Eye Detection	Available Eye Detection AF mode : off / nearer-eye priority / right-eye priority / left-eye priority
AF Targeting Pad	Available (activate / deactivate with double tap on rear monitor)
Manual Focus Assist	Focus ring rotation activates Live View image magnification and/or focus peaking when in S-AF+MF or MF mode
Peaking Function	Activate with to be assigned to the button or focus ring Change peaking settings using the "Info" button Color selection: white, black, red, yellow Intensity selection: high, normal, low Back light effect: on, off
AF Focus Adj.	Adjust all, adjust by lens (for Phase detection AF only)
AF Illuminator	Available

Image Stabilization

System Type	Built-in 5-axis* sensor-shift image stabilization for movie and still photos *yaw/pitch/roll/vertical shift/horizontal shift
Modes	4 modes (S-IS AUTO, S-IS1, S-IS2, S-IS3), OFF
Focal Length Setting	11 settings: 10 programmable settings (10 lenses), 1 open setting
5-Axis Sync IS	Available* *When using M.Zuiko Digital lenses equipped with image stabilization
Stabilization Performance	5.5 EV[*] * Based on CIPA measurement conditions. When using M.ZUIKO Digital ED 12-40mm F2.8 PRO (focal length =40mm (35mm equivalent: 80mm)) 6.5 EV[*] * Based on CIPA measurement conditions. When using M.ZUIKO Digital ED 12-100mm F4.0 PRO (focal length =100mm (35mm equivalent: 200mm)), halfway release image stabilization Off
Lens IS Priority	Available

Shutter / Sequential Shooting

Shutter Type	Focal-plane shutter : 1/8000 - 60 sec., with selectable EV adjustment steps (1/3, 1/2, 1) Live Bulb / Live Time: selectable exposure time (1 / 2 / 4 / 8 / 15 / 20 / 25 / 30 min.), with 8-min. default setting. Live Composite: maximum shooting time 3 hours Electronic first curtain shutter (Anti-shock mode) : 1/320 - 60 sec. Electronic shutter (Silent mode) : 1/32000 - 60 sec. (still) Flicker scan: 1/7634 - 1/50.0 sec. (movie) Flicker scan: 1/250 - 1/30.0[*] sec. *50fps movie: 1/50.0 sec., 60fps movie: 1/60.0sec., High speed video: 1/120.0sec.
Sequential Shooting Maximum Speed	[Sequential shooting H] approx. 10 fps with selectable 5 -10 fps [Sequential shooting L] approx. 6fps with selectable 1-6 fps [Anti-shock sequential shooting L] approx. 5.5 fps with selectable 1-6 fps [Silent sequential shooting H] approx. 30 fps with selectable 15, 20, 30 fps [Silent sequential shooting L] approx. 10 fps with selectable 1-10fps [Pro Capture H] approx. 30 fps with selectable 15, 20, 30fps [Pro Capture L] approx. 10 fps *When using the M.ZUIKO Digital ED 12-40mm F2.8 PRO *Maximum sequential shooting speed may be affected by several factors including lens used, brightness, aperture, shutter speed, and ISO setting. *When in Pro Capture mode, slower shutter speeds and flash cannot be used. *Pro Capture L is available when an M.ZUIKO lens or lens without communication capability is attached. (Auto-focus is not available for lenses without communication capability). *In Pro Capture Sequential L, the minimum aperture is F8. *When ISO is 8000 or above, the maximum sequential shooting speed is 30 fps, and the actual shooting speed may become slower than the set shooting speed by a few frames per second. When using ISO Bracketing, performance will be affected at ISO 2000 or above. *Focus and exposure are fixed at the values of the first shot when using sequential shoo

Max. Recordable Pictures in Sequential Shooting	[Sequential shooting H 10fps] RAW: Max. 150 frames, JPEG (LF): Until card is full [Sequential shooting L 6fps] RAW, JPEG (LF): Until card is full [Silent sequential shooting H 30fps] RAW: Max. 23 frames, JPEG (LF): Max. 26 frames [Silent sequential shooting L 10fps] RAW: Max. 152 frames, JPEG (LF): Until card is full *When using the M.ZUIKO Digital ED 12-40mm F2.8 PRO and the Toshiba SDXU-D032G memory card
Sequential Shooting Frame Count	1 - 99 frames
Pre-shutter Frames ***For Pro Capture mode only**	Number of frames recorded prior to full-press of the shutter button can be set from 0 to 14 frames
Self Timer	Operation time: 12 sec., 2 sec., custom (Wait time: 1-30sec., Shot interval: 0.5/1/2/3sec., Number of shots: 1-10, Every time AF: ON/OFF)
Viewfinder / Monitor	
Finder Type	Eye-level electronic viewfinder (OLED), approx. 2.36M dots
Field of View / Viewfinder Magnification	Approx. 100% / Approx. 1.20x[*1] - 1.37x[*2] (-1m-1, 50mm lens, Infinity) * 1: Finder Style 1, 2 (aspect ratio 4:3) * 2: Finder Style 3 (aspect ratio 4:3)
Eye Point / Diopter Adjustment Range	Approx. 27mm (-1m-1, Distance from rear lens surface) / -4 ~ +2m-1
Preview	Live View preview with depth of field preview lock
Display Grid	Off / normal grid / trichotomy / golden grid / scale / diagonal / movie grid * grid color is selectable
Level Gauge	2-axis (horizontal / vertical) level gauge
One Touch Tele-Converter	Available (2x)
Finder Style	3 styles
Brightness / Color Temp Control	Adaptive brightness technology (EVF Auto Luminance) / ±7 level manual brightness control /±7 level manual color temperature control
Rear Monitor Size	3.0-inch vari-angle monitor[*] * Approx. 1.04M dots (3:2), electrostatic capacitance touch panel
Touch Control	Shutter release, Touch AF (AF area selection, AF area size adjustment) AF targeting pad, frame forward/backward, magnified playback, Super Control Panel, Wi-Fi connection, movie controls
Tilting Capability	Available (mirror display when monitor is in self portrait position)
Brightness / Color Temp Control (Rear Monitor)	±7 levels / ±7 levels
Color Tone Select	Vivid / Natural
Live View	Approx. 100% field of view, exposure compensation preview, WB adjustment preview, gradation preview, face detection preview (up to 8 faces), grid line, magnification display (x3/x5/x7/x10/x14),
Live View Boost	Live View Boost 1 , Live View Boost 2* (For dark situations) *Settings can be specified for each shooting mode *Live View Boost 2: Frame Rate Priority or Quality Priority selectable *Off: Brightness in Live View shows specified exposure settings.
Exposure Control / Flash	
Metering System	Digital ESP metering (324-area multi pattern metering), center-weighted average metering, spot metering*, spot metering with highlight control, spot metering with shadow control *Also available AF target spot metering
Metering Range	EV -2 - 20 (ISO approx.100, with a F2.8 lens)
Exposure Mode / Shooting Mode	AUTO Program AE (Program shift can be performed) Aperture priority AE Shutter priority AE Manual Bulb (Live Bulb, Live Time and Live Composite are available) Custom * Scene select AE Art Filter Underwater wide / macro** **to be assigned to custom button *Custom settings from menu
Scene Select AE	[Scene] Portrait, e-Portrait, Landscape + Portrait, Night + Portrait, Children, Night scape, Sport, Hand-held Starlight[2], Fireworks, Light trails, Sports, Panning, Landscape, Sunset, Beach & Snow, Backlight HDR[1], Candlelight, Silent, Macro, Nature Macro, Documents, Multi Focus Shot *1 4 images automatically shot and combined into a single image composite *2 8 images automatically shot and combined into a single image composite
ISO Sensitivity	AUTO ISO (default): LOW (approx.64) - 6400 with customizable default and upper limit (200 - 6400) Manual ISO: LOW (approx.64, approx.100), 200 - 25600 (adjustable in 1/3 or 1 EV steps)
Exposure Compensation	±5 EV, adjustable by 1/3, 1/2 or 1 EV steps When shooting in HDR or in video, only adjustable up to ±3 EV steps Live View only reflects up to ±3 EV steps
AE Lock	Locks with a half-press of the shutter button (can be set to AEL/AFL button as well)
Anti-Flicker Shooting	Available
Flash Intensity Control Mode	TTL Auto, Auto*, Manual, Super FP*(FP-TTL AUTO, FP-MANUAL) * Available with external flash
Flash Mode	Redeye, Fill-in, Flash Off, Red-eye Slow sync.(1st curtain), Slow sync.(1st curtain), Slow sync.(2nd curtain), Manual（1/1（FULL）～1/64）
Synchronization Speed	1/250 sec. *When using Super FP: 1/125-1/8000 sec. *When using electronic shutter: 1/50 sec. up to ISO6400, 1/20 sec. for ISO 8000 and higher, and 1/20 sec. for ISO bracketing
Flash Intensity Control	Up to ±3 EV in 1/3, 1/2, 1 EV steps selectable
Compatible External Flash	FL-50R, FL-36R, FL-20, FL-14, FL-300R, FL-600R, FL-900R, STF-8, FL-700WR
Wireless Flash Control Method	Triggered and controlled by Olympus Wireless RC Flash system compatible flashes: included FL-LM3 or separately available FL-600R and FL-900R , STF-8, FL-700WR
External Flash Intensity Type	TTL Auto, Auto, Manual, FP-TTL-AUTO, FP-MANUAL
Channel No.	4 channels
Group No.	4 groups (External flash 3 groups + commander flash)
Radio Wireless Control	Available
Memory / Image Recording (File Format)	
Compatible Memory	SD, SDHC*1, SDXC*1 *1 UHS-I, UHS-II compatible

Recording Format	DCF2.0, Exif2.31
File Format	RAW (12-bit lossless compression), JPEG, RAW+JPEG
Recording Image Size	[RAW] 5184 x 3888 pixels [JPEG] 5184 x 3888 pixels - 1024 x 768 pixels

White Balance / Color Mode	
White Balance Mode	Auto WB, 7 Preset WBs, 4 Capture WBs, Custom WB(Kelvin setting)
White Balance Compensation*	±7 steps along A-B / G-M axis
Preset White Balance	7 preset WBs (3000K - 7500K) - Sunny(5300K), Shadow(7500K), Cloudy(6000K), Incandescent(3000K), Fluorescent(4000K), Underwater, WB Flash(5500K)
CWB (Kelvin Setting)	2000 - 14000K
Capture White Balance	4 custom settings can be registered
Color Mode	sRGB, Adobe RGB

Bracketing / HDR	
Exposure Bracketing	2, 3 or 5 frames in 0.3/0.7/1.0EV steps selectable, 7 frames in 0.3/0.7EV steps selectable
ISO Bracketing	3 frames in 0.3/0.7/1.0EV steps selectable
White Balance Bracketing	3 frames in 2, 4, 6 selectable steps for A-B/G-M axis.
Flash Bracketing	3 frames in 0.3/0.7/1.0EV step selectable
Art Filter Bracketing	i-Enhance, Vivid, Natural, Muted, Portrait, Monotone, Custom, Art Filters, Color Creator selectable
Focus Bracketing	3 to 999 shots, focus steps adjustable from 1 to 10 (compatible with Micro Four Thirds lenses)
Focus Stacking Mode	8 shots are taken at different focus points and automatically composited together into a single image Angle of view becomes slightly smaller Compatible with: M.ZUIKO Digital ED 60mm F2.8 Macro M.ZUIKO Digital ED 12-40mm F2.8 PRO M.ZUIKO Digital ED 40-150mm F2.8 PRO M.ZUIKO Digital ED 30mm F3.5 Macro M.ZUIKO Digital ED 7-14mm F2.8 PRO M.ZUIKO Digital ED 8mm F1.8 Fisheye PRO M.ZUIKO Digital ED 300mm F4.0 IS PRO M.ZUIKO Digital ED 12-100mm F4.0 IS PRO
HDR (Auto Composite)	HDR1, HDR2 (painting-like) ISO sensitivity is fixed at 200, and maximum shutter speed setting is 4 sec. Exposure compensation can be performed.
Bracketing for HDR post-process	HDR1, HDR2 (painting-like) ISO sensitivity is fixed at 200, and maximum shutter speed setting is 4 sec. Exposure compensation can be performed.

Creative Features	
Picture Mode	i-Enhance, Vivid, Natural, Muted, Portrait, Monotone, Custom, e-Portrait, Underwater, Color Creator, Art Filters
Gradation	Auto, Normal, High Key, Low Key [except when using e-Portrait, Underwater, Art Filters, Color Creator]
Highlight and Shadow Control	±7 steps each for highlight, shadow, midtone
Art Filter **(Variation / Art Effect)**	Pop Art (I, II / a.b.c.d.e.f) Soft Focus (- / c.e) Pale & Light Color (I, II / a.b.c.d.f) Light Tone (- / d.f) Grainy Film (I, II / b.c.d.g.h) Pin Hole (I, II, III / d) Diorama (I,II / d) Cross Process (I, II / b.c.d.f) Gentle Sepia (- / a.b.c.d.f.) Dramatic Tone (I / b.c.d.e.f) (II / b.c.d.e.f.g.h) Key Line (I, II / a.b.c.d.e.) Watercolor (I, II / a.b.c.d.) Vintage (I, II, III / a.b.c.d.e.f.i) Partial Color (I, II, III / a.b.c.d.e.f) Bleach Bypass (I, II / a.b.c.d.e.f.i) Instant Film (- / a.b.c.d.e.f.i)
Art Effect	a. Soft Focus Effect b. Pin-Hole Effect c. White Edge Effect d. Frame Effect e. Star Light Effect f. Blur Effect (Top & bottom, Left & Right) g. B&W Effect (None, Yellow, Orange, Red, Green) h. Picture Tone (None, Sepia, Blue, Purple, Green) i. Shade Effect (Top & bottom, Left & Right)
Color Ring (for partial color)	18 color selectable
Color Creator	Color pattern : 30 colors / Saturation setting -4 ~ +3
Live Bulb / Live Time	Update Interval Time - 0.5 sec – 60 sec
Live Composite	Update Interval Time / composite method – 0.5 sec – 60 sec / Lighten Mode (Bright area prioritization)
Interval Shooting	Interval Time 1 sec. - 24 Hours, Max 999 frames. Sutomatic creation of time-lapse movies possible
Multiple Exposure (number of pictures / function)	2 frames / Auto gain, exposure on recorded picture (RAW)
Fisheye Compensation	Available (angle : 1-3)
High Res Shot	Equivalent to 50 megapixels / 25 megapixels (8 shots combined into a single JPEG using sensor shift) Available in P/A/S/M mode, RAW+JPEG or JPEG. JPEG: 8160 x 6120(50M) 5760 x 4320(25M) / RAW: 10368 x 7776 RAW data can be developed in-camera. Olympus Workspace required to develop on a PC.
Keystone Compensation	Available (can be confirmed in Live View) *Horizontal and vertical compensation can be performed simultaneously.

Video / Audio Recording	
Video Recording Format	MOV(MPEG-4AVC/H.264)

Movie Mode / Frame Rate / Compression Method	4096×2160(C4K) / 24p / IPB(approx.237Mbps) 3840×2160(4K) / 30p, 25p, 24p / IPB(approx.102Mbps) 1920x1080(FHD) / 30p, 25p, 24p / ALL-I (A-I), IPB(SF, F, N) 1920x1080(FHD) / 60p, 50p / IPB(SF, F, N) 1280x720(HD) / 60p, 50p, 30p, 25p, 24p / ALL-I (A-I) , IPB(SF ,F ,N) 60p : 59.94 fps 50p : 50.00 fps 30p : 29.97 fps 25p : 25.00 fps 24p : 23.98 fps C4K 24.00 fps FHD ALL-I(A-I : ALL-Intra/approx.202Mbps)　　FHD IPB(SF : SuperFine / approx.52Mbps, F : Fine / approx.30Mbps, N : Normal / approx.18Mbps) HD ALL-I(A-I : ALL-Intra / approx.102Mbps)　　HD IPB(SF : SuperFine /approx.26Mbps, F : Fine / approx.14Mbps, N : Normal / approx.10Mbps) 　*Frame rates may drop when particular Art Filters and Movie Effects are used. 　*Class 10 or higher SD card is recommended for shooting movies. 　*UHS-II or UHS-I U3 card is recommended for 4K,C4K,ALL-I shooting.
Maximum Video Recording Time	Approx. 29min
Movie Tele-converter	Approx. 3x (enlarges view of selected area)
Art Filter Movie	Available (Frame rates may drop when certain Art Filters are used)
Movie Effect	One-shot Echo / Multi-echo / Art Fade / Old Film
Time-lapse Movie	[AVI] 3840×2160（4K）/ 5fps 1920×1080（FHD)/ 5fps，10fps，15fps 1280×720（HD)/ 5fps，10fps，15fps，30fps
Quick Movie / Slow Movie	With (Both or either of the two may not be available depending on the frame rates.)
High speed movie	120fps (1920×1080/MOV）
Image Stabilization for Movie	M-IS1*(Image sensor shift and electronic image stabilizer with multi motion IS), M-IS2(Image sensor shift with multi motion IS), Off *While using M-IS1, field of view may be affected.
AE Lock	Available
Video Exposure Control	Program AE, aperture priority AE, shutter priority AE, manual
Grid Lines / Focus Peaking	4 types of grid lines / 4 colors for focus peaking
Time Code	Rec run/free run, drop frame/non-drop frame
Live View Output via HDMI	Monitor Mode (outputs video and info display to a connected monitor) *1 Record Mode (outputs video only, with no info display) *2 *1 While recording, footage is simultaneously displayed on the HDMI monitor and on the camera, but the info display is shown only on either one of the two. 　While playing movies, footage is simultaneously displayed on the HDMI monitor (normal size) and on the camera (normal size or enlarged). 　　However, the image can not be enlarged on the camera when a movie is being recorded. *2 Movie quality is set to YCbCr 4:2:2 (8 bit), frame rate follows movie setting (24p, 30p and 60p settings are not recommended.), and sound will be recorded.
Movie Picture Mode	Flat (LUT file available for download from website)
Audio Recording Format	Wave Format (Stereo linear PCM/16-bit, Sampling frequency 48kHz) High quality sound recording (Stereo linear PCM/24-bit, Sampling frequency 96kHz)
Microphone / Speaker	Built-in stereo microphone / built-in mono speaker *External stereo microphone can be attached
Microphone Function	Wind noise reduction, recording volume, microphone volume limiter 　Audio dubbing possible for still pictures (up to 30 sec.) 　*May affect audio quality.
IC Recorder Linkage	Slate Tone / Synchronized Audio Rec-Movie Rec *LS-100 compatible
Operability	
Wireless Shooting	Live View, Rec View, Wireless Touch AF shutter, Self Timer (w/Countdown guidance, Sequential shooting, movie recording capability), Wireless Release, Movie Recording, Power Off *P / A / S / M / B and drive mode can be selected. Aperture, shutter speed, exposure, ISO sensitivity, white balance and sequential shooting can be adjusted.
Image Share	File Type: JPEG*, MOV Marking function for image share.
Easy Connection	Connect using a QR code Connect using Bluetooth (View, Transfer only. Enabled from the second time)
Playback Mode	Single-frame Information display Index display (4/9/25/100 frames), Calendar Enlargement (1:1, 2x - 14x) Movie (with sound, FF/REW/Pause) Picture rotation (auto) Light box display
Information Display	Histogram (independent luminance / RGB available), Highlight/Shadow point warning, AF frame, Photographic information, OFF
Custom	
Mode dial my set	1 type (Modes C can be accessed by mode dial)
Menu custom set	Modes C2, and C3 can be accessed via the menu * Some items including shooting mode may not be called up
Dial customization	Dial function and dial direction are customizable for both dials
Lever customization	Select assignment from 3 different modes, power switch, or off (no function assignment)
Button Customization	Buttons can be customized (select from 35 functions) Buttons on lenses can also be customized from the camera Some buttons may have restrictions to what functions can be assigned
Copyright Settings/Lens info Settings	Available (save up to 10 lenses)
Menu Languages (34 selectable)	English, French, German, Spanish, Italian, Japanese, Korean, Traditional Chinese, Simplified Chinese, Russian, Czech, Dutch, Danish, Polish, Portuguese, Swedish, Norwegian, Finnish, Croatian, Slovenian, Hungarian, Greek, Slovakian, Turkish, Latvian, Estonian, Lithuanian, Ukrainian, Serbian, Bulgarian, Rumanian, Indonesian, Malay, Thai
Connectivity / Power Requirements	

USB Connector	USB Micro-B
Remote Connector	φ2.5Pin Jack (when using separately available RM-CB2).
HDMI Connector	Micro HDMI （type D)
Flash Attachment	Hot shoe
Wireless LAN	Built-in (IEEE 802.11a/b/g/n)
Bluetooth	Built-in (Bluetooth® Ver.4.2 BLE)
MIC Input Jack	φ3.5 stereo mini jack (plug-in power on/off)
PC Interface	USB 2.0 Hi-Speed
Battery	BLS-50 Li-ion battery (included)
Battery Status Display	Remaining power (4 steps, %, or by-minute display), shot count, degradation
USB Charging	Built-in battery is charged with USB * When the camera power is off * Performance varies depending on different USB devices
Sleep Mode	Available (1/3/5 min. off)
Number of Recordable Pictures	Approx. 310 shots (using Toshiba SDHC UHS-I Card Exceria with IS ON, with no flashes attached, based on CIPA test standards)
Battery Life for Movie Recording	Approx. 60 minutes (under standard JEITA testing) Approx. 110 minutes (when zoom and other operational functions are not used) *When repeatedly recording at the maximum time of 29 minutes
Weights & Dimensions / Operating Environment / Box Contents	
Weight	Approx. 414g (with battery and memory card, based on CIPA standards) Approx. 366g (body only)
Dimensions	W:125.3mm H:85.2mm D:49.7mm (based on CIPA standards: excludes protrusions)
Environmentally Sealed	Dust, Splash, Freezeproof
Operating Temperature Range	-10ºC ~ +40ºC (when in operation) / -20ºC ~ +60ºC (when stored)
Operating Humidity Range	30 - 90% (when in operation) / 10 - 90% (when stored)
Box Contents	Body, USB cable, shoulder strap, instruction manual, warranty card, FL-LM3 flash, BLS-50 Li-ion battery, BLS-5 rapid Li-ion battery charger