

# SAMSUNG

## S90C – OLED 4K Smart TV (2023)

Experience the Wow difference of Samsung OLED



55", 65", 77"

### Top Features

#### Samsung OLED Technology

With over 8 million specially engineered self-illuminating pixels, contrast is breathtaking. At its best in-viewing settings with controlled lighting, colour and brightness is stunning and life-like with Samsung's QD-OLED pixels powered by Quantum Dot technology. <sup>1</sup>

#### Quantum HDR OLED

The Quantum HDR OLED panel allows for HDR10+ content to reveal what you might have missed in particularly dark or light scenes, making them pop with breathtaking colour and contrast. <sup>2</sup>

#### Dolby Atmos

Lose yourself in the breathtaking realism of cinematic sound, right in your own home. Your Samsung TV features Dolby Atmos support to deliver larger-than-life audio experiences. <sup>3</sup>

#### Object Tracking Sound Lite (OTS Lite)

Object Tracking Sound Lite uses AI and the TV's bottom speakers to simulate a 3D audio experience which appears to track the action on screen. <sup>4</sup>

<sup>1</sup> Picture quality may vary depending on quality and resolution of source content and viewing conditions.

<sup>2</sup> Source content must be HDR10+ format. The Range of Quantum HDR claims luminance based on internal testing standards and is subject to change according to viewing environment or specific conditions.

<sup>3</sup> Source content must be Dolby Atmos® enabled for Dolby Atmos® playback.

<sup>4</sup> The quality of sound effects may vary depending on the source content, installation and environmental characteristics (e.g. ceiling).

Product	Product Category	55"	65"	77"
		OLED	OLED	OLED
Model Number		QA55S90CAWXXY	QA65S90CAWXXY	QA77S90CAWXXY
Display	Screen Size	55"	65"	77"
	Resolution	3,840 x 2,160	3,840 x 2,160	3,840 x 2,160
	Motion Rate	200	200	200
	Anti Reflection	Yes	Yes	Yes
Video	Picture Engine	Neural Quantum Processor 4K	Neural Quantum Processor 4K	Neural Quantum Processor 4K
	One Billion Colours	Yes	Yes	Yes
	HDR (High Dynamic Range)	Quantum HDR OLED	Quantum HDR OLED	Quantum HDR OLED
	HDR 10+	Yes (ADAPTIVE/ GAMING)	Yes (ADAPTIVE/ GAMING)	Yes (ADAPTIVE/ GAMING)
	HLG (Hybrid Log Gamma)	Yes	Yes	Yes
	Contrast	Self-illuminating true RGB pixels	Self-illuminating true RGB pixels	Self-illuminating true RGB pixels
	Colour	Perceptual Colour Mapping	Perceptual Colour Mapping	Perceptual Colour Mapping
	Viewing Angle	Ultra Viewing Angle	Ultra Viewing Angle	Ultra Viewing Angle
	Micro Dimming	N/A	N/A	N/A
	Contrast Enhancer	Real Depth Enhancer	Real Depth Enhancer	Real Depth Enhancer
	Noise Reduction	Yes	Yes	Yes
	Film Mode	Yes	Yes	Yes
	Expert Calibration	N/A	N/A	N/A
	Smart Calibration	Basic	Basic	Basic
	AI Upscale	Yes	Yes	Yes
Filmmaker Mode	Yes	Yes	Yes	
Brightness/Colour Detection	Brightness/Colour Detection	Brightness/Colour Detection	Brightness/Colour Detection	
Audio	Dolby Atmos	Yes	Yes	Yes
	Object Tracking Sound	OTS Lite	OTS Lite	OTS Lite
	Dolby Digital Plus	MS12 5.1ch	MS12 5.1ch	MS12 5.1ch
	Q-Symphony	Yes	Yes	Yes
	Sound Output (RMS)	40W	40W	40W
	Speaker Type	2.1CH	2.1CH	2.1CH
	Woofers	Yes	Yes	Yes
	Multiroom Link	Yes	Yes	Yes
	Bluetooth Audio	Yes	Yes	Yes
	Active Voice Amplifier	Yes	Yes	Yes
	Adaptive Sound	Adaptive Sound+	Adaptive Sound+	Adaptive Sound+
	Dual Audio Support (Bluetooth)	Yes	Yes	Yes
Buds Auto Switch	Yes	Yes	Yes	
Smart Service	Operating System	Tizen™ Smart TV	Tizen™ Smart TV	Tizen™ Smart TV
	Bixby	Yes	Yes	Yes
	Far-Field Voice Interaction	Yes	Yes	Yes
	Built-in Voice Assistant	Alexa	Alexa	Alexa
	Works with AI Speaker	Alexa, Google Assistant	Alexa, Google Assistant	Alexa, Google Assistant
	Samsung TV Plus	Yes	Yes	Yes
	Web Browser	Yes	Yes	Yes
	SmartThings Hub / Matter Hub / IoT-Sensor Functionality	Yes	Yes	Yes
	Media Home	Yes	Yes	Yes

	55"	65"	77"
Smart Feature			
NFC on TV	N/A	N/A	N/A
Video Communication	Google Meet Yes (requires Android 8.1† with Screen Cast capabilities)	Google Meet Yes (requires Android 8.1† with Screen Cast capabilities)	Google Meet Yes (requires Android 8.1† with Screen Cast capabilities)
Tap View			
Multi-View	Up to 2 videos	Up to 2 videos	Up to 2 videos
Music Wall	Yes	Yes	Yes
Mobile Camera Support	Yes	Yes	Yes
Easy Setup	Yes	Yes	Yes
App Casting	Yes	Yes	Yes
Ambient Mode	Ambient Mode+	Ambient Mode+	Ambient Mode+
Wireless Dex	Yes	Yes	Yes
Web Service	Microsoft 365 (Subscription required)	Microsoft 365 (Subscription required)	Microsoft 365 (Subscription required)
Game Feature			
Auto Game Mode (ALLM)	Yes	Yes	Yes
Game Motion Plus	Yes	Yes	Yes
Dynamic Black EQ	Yes	Yes	Yes
Surround Sound	Yes	Yes	Yes
Super Ultra Wide Game View	Yes	Yes	Yes
MiniMap Zoom	Yes	Yes	Yes
Light-sync	N/A	N/A	N/A
Freesync	FreeSync Premium	FreeSync Premium	FreeSync Premium
HGiG	Yes	Yes	Yes
Gaming Hub	N/A	N/A	N/A
Tuner/Broadcasting			
Digital Broadcasting	DVB-T(T2 Ready)	DVB-T(T2 Ready)	DVB-T(T2 Ready)
Analog Tuner	Yes	Yes	Yes
CI (Common Interface)	N/A	N/A	N/A
Connectivity			
HDMI	4	4	4
HDMI (High Frame Rate)	4K 144Hz (for HDMI 1/2/3/4)	4K 144Hz (for HDMI 1/2/3/4)	4K 144Hz (for HDMI 1/2/3/4)
HDMI Audio Return Channel	eARC	eARC	eARC
USB	2	2	2
USB-C (Camera Only)	N/A	N/A	N/A
Component In (Y/Pb/Pr)	N/A	N/A	N/A
Composite In (AV)	N/A	N/A	N/A
Ethernet (LAN)	Yes	Yes	Yes
Audio Out (Mini Jack)	N/A	N/A	N/A
Digital Audio Out (Optical)	1	1	1
RF In (Terrestrial / Cable input / Satellite input)	1/1(Common Use for Terrestrial)/0	1/1(Common Use for Terrestrial)/0	1/1(Common Use for Terrestrial)/0
Ex-Link ( RS-232C )	N/A	N/A	N/A
WiFi	Yes (WiFi5)	Yes (WiFi5)	Yes (WiFi5)
Bluetooth	Yes (BT5.2)	Yes (BT5.2)	Yes (BT5.2)
Anynet+ (HDMI-CEC)	Yes	Yes	Yes

		55"	65"	77"
Design	Design	LaserSlim Design	LaserSlim Design	LaserSlim Design
	Bezel Type	4 Bezel-less	4 Bezel-less	4 Bezel-less
	Slim Type	Ultra Slim	Ultra Slim	Ultra Slim
	Front Colour	TITAN BLACK	TITAN BLACK	TITAN BLACK
	Stand Type	SIMPLE PLUS-METAL	SIMPLE PLUS-METAL	SIMPLE PLUS-METAL
	Stand Colour	TITAN BLACK	TITAN BLACK	TITAN BLACK
	Slim Type	Ultra Slim	Ultra Slim	Ultra Slim
	Front Colour	TITAN BLACK	TITAN BLACK	TITAN BLACK
	Stand Type	SLIM OC STAND	SLIM OC STAND	SLIM OC STAND
	Stand Colour	TITAN BLACK	TITAN BLACK	TITAN BLACK
Additional Feature	Auto Rotation	N/A	N/A	N/A
	9:16 Screen Support	N/A	N/A	N/A
	Caption(Subtitle)	Yes	Yes	Yes
	EPG	Yes	Yes	Yes
	Extended PVR	Yes	Yes	Yes
	OSD Language	Local Languages	Local Languages	Local Languages
	Picture-In-Picture	N/A	N/A	N/A
	Teletext (TTX)	Yes	Yes	N/A
	Time Shift	Yes	Yes	Yes
	One Connect Box	N/A	N/A	N/A
MBR Support	Yes	Yes	Yes	
Accessibility	Voice Guide	AU English, China Chinese, Korean, France French, Italian, German, Spain Spanish, Malay	AU English, China Chinese, Korean, France French, Italian, German, Spain Spanish, Malay	AU English, China Chinese, Korean, France French, Italian, German, Spain Spanish, Malay
	Learn TV Remote / Learn Menu Screen	English, French, Spanish, Portuguese, Persian, Indonesian, Thai, Vietnamese, Arabic (Languages are supported if there is a language that matches the OSD language)	English, French, Spanish, Portuguese, Persian, Indonesian, Thai, Vietnamese, Arabic (Languages are supported if there is a language that matches the OSD language)	English, French, Spanish, Portuguese, Persian, Indonesian, Thai, Vietnamese, Arabic (Languages are supported if there is a language that matches the OSD language)
Power & Eco Solution	Power Supply	AC220-240V~ 50/60Hz	AC220-240V~ 50/60Hz	AC220-240V~ 50/60Hz
	Power Consumption (Max)	310 W	360 W	460 W
	Power Consumption (Stand-by)	0.5 W	0.5 W	0.5 W
	Power Consumption (Typical)	113.0 W	154.0 W	178.0 W
	Power Consumption (Energy Saving Mode)	N/A	N/A	N/A
	Yearly Power Consumption (EU standard)	416 kWh	565 kWh	653 kWh
	Eco Sensor	Yes	Yes	Yes
	Auto Power Saving	Yes	Yes	Yes
	Energy Efficiency Class	4	4	4.5
Auto Power Off	Yes	Yes	Yes	
Dimension	Package Size (WxHxD)	1385 x 833 x 153 mm	1617 x 950 x 160 mm	1890 x 1182 x 192 mm
	Set Size with Stand (WxHxD)	1225.4 x 773.5 x 265.9 mm	1444.3 x 896.6 x 265.9 mm	1718.5 x 1058.9 x 359.8 mm
	Set Size without Stand (WxHxD)	1225.4 x 708.6 x 39.9 mm	1444.3 x 831.7 x 39.9 mm	1718.5 x 987.6 x 44.9 mm
	Stand (Basic) (WxD)	366.0 x 265.9 mm	366.0 x 265.9 mm	366 x 359.8 mm
	Stand (Minimum) (WxD)	N/A	N/A	N/A
	VESA Spec	300 x 200 mm	300 x 200 mm	400 x 300 mm

		<b>55"</b>	<b>65"</b>	<b>77"</b>
Weight	Package Weight	24.4 kg	30.9 kg	49.1 kg
	Set Weight with Stand	18.2 kg	23.1 kg	37.8 kg
	Set Weight without Stand	16.2 kg	21.1 kg	35.1 kg
Accessory	Remote Controller Model	TM2360E	TM2360E	TM2360E
	Batteries (for Remote Control)	N/A	N/A	N/A
	Slim Fit Wall-mount Support	Yes	Yes	N/A
	Studio Stand Support	N/A	N/A	N/A
	Vesa Wall Mount Support	Yes	Yes	Yes
	Auto-Rotation Accessory Support	N/A	N/A	N/A
	Full Motion Slim Wall Mount Support (Y22)	Yes	Yes	Yes
	SlimFit Cam Support	Yes	Yes	Yes
	User Manual	Yes	Yes	Yes
	E-Manual	Yes	Yes	Yes
	Power Cable	Yes	Yes	Yes
Optional One Connect Cable Support	N/A	N/A	N/A	