

Intel Core i9 i9-14900KS / 3.2 GHz processor - Box(BX8071514900KS)

Intel Core i9 i9-14900KS - 3.2 GHz - 24-core - 32 threads - 36 MB cache - FCLGA1700 Socket - Box

These processors feature an innovative architecture designed for intelligent performance (AI), immersive display and graphics, plus enhanced tuning and expandability to put gamers and PC enthusiasts fully in control of real-world experiences.

Main Specifications

Product Description	Intel Core i9 i9-14900KS / 3.2 GHz processor - Box
Product Type	Processor
Processor Type	Intel Core i9 i9-14900KS (14th Gen)
Number of Cores	24-core / 32 threads
Cache	36 MB
Integrated Graphics	Intel UHD Graphics 770
Compatible Processor Socket	FCLGA1700 Socket
Processor Qty	1
Clock Speed	3.2 GHz (P-core) / 2.4 GHz (E-core)
Max Turbo Speed	6.2 GHz (P-core) / 4.5 GHz (E-core)
Manufacturing Process	10 nm
Features	Intel Thermal Velocity Boost, Intel Turbo Boost Max Technology 3.0, Direct Media Interface (DMI), Intel Gaussian and Neural Accelerator 3.0, Enhanced SpeedStep technology, Hyper-Threading Technology, Idle States, Instruction Set 64-bit, Intel 64 Technology, Intel Adaptive Boost Technology, Intel Advanced Vector Extensions 2 (AVX2.0), Intel Deep Learning Boost (DL Boost), Intel Speed Shift Technology, Intel SSE4.1, Intel SSE4.2, Intel Thread Director, Intel Turbo Boost Technology 2.0, Intel Volume Management Device (VMD), Intel vPro Enterprise Platform Eligibility, Intel vPro Essentials Platform Eligibility, Intel vPro Platform Eligibility, Thermal Monitoring Technologies, Execute Disable Bit capability, Intel Active Management Technology, Intel AES New Instructions (AES-NI), Intel Boot Guard, Intel Control-Flow Enforcement Technology, Intel Hardware Shield Eligibility, Intel One-Click Recovery, Intel OS Guard, Intel Remote Platform Erase (RPE), Intel Secure Key, Intel Standard Manageability (ISM), Intel Threat Detection Technology (TDT), Intel Total Memory Encryption - Multi Key, Intel Trusted Execution Technology, Intel Virtualization Technology for Directed (VT-x), Intel Virtualization Technology for Directed I/O (VT-d), Intel Virtualization Technology with Redirect Protection (VT-rp), Intel VT-x with Extended Page Tables (EPT), Mode-based Execute Control (MBEC)
Manufacturer Warranty	3-year warranty

Extended Specification

General

Product Type	Processor
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Manufacturer Warranty

Service & Support	Limited warranty - 3 years
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Processor

Type / Form Factor	Intel Core i9 i9-14900KS (14th Gen)
Number of Cores	24-core
Number of Threads	32 threads
Cache	36 MB

Cache Memory Details	Smart Cache - 36 MB L2 - 32 MB
Processor Qty	1
Clock Speed	3.2 GHz (P-core) / 2.4 GHz (E-core)
Max Turbo Speed	6.2 GHz (P-core) / 4.5 GHz (E-core)
Compatible Processor Socket	FCLGA1700 Socket
Manufacturing Process	10 nm
Thermal Design Power	150 W
Thermal Specification	100 °C
PCI Express Revision	4.0/5.0
PCI Express Configurations	1x16+4, 2x8+4
PCI Express Lanes Qty	20

Architecture Features	Intel Thermal Velocity Boost, Intel Turbo Boost Max Technology 3.0, Direct Media Interface (DMI), Intel Gaussian and Neural Accelerator 3.0, Enhanced SpeedStep technology, Hyper-Threading Technology, Idle States, Instruction Set 64-bit, Intel 64 Technology, Intel Adaptive Boost Technology, Intel Advanced Vector Extensions 2 (AVX2.0), Intel Deep Learning Boost (DL Boost), Intel Speed Shift Technology, Intel SSE4.1, Intel SSE4.2, Intel Thread Director, Intel Turbo Boost Technology 2.0, Intel Volume Management Device (VMD), Intel vPro Enterprise Platform Eligibility, Intel vPro Essentials Platform Eligibility, Intel vPro Platform Eligibility, Thermal Monitoring Technologies, Execute Disable Bit capability, Intel Active Management Technology, Intel AES New Instructions (AES-NI), Intel Boot Guard, Intel Control-Flow Enforcement Technology, Intel Hardware Shield Eligibility, Intel One-Click Recovery, Intel OS Guard, Intel Remote Platform Erase (RPE), Intel Secure Key, Intel Standard Manageability (ISM), Intel Threat Detection Technology (TDT), Intel Total Memory Encryption - Multi Key, Intel Trusted Execution Technology, Intel Virtualization Technology for Directed (VT-x), Intel Virtualization Technology for Directed I/O (VT-d), Intel Virtualization Technology with Redirect Protection (VT-rp) , Intel VT-x with Extended Page Tables (EPT), Mode-based Execute Control (MBEC)
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Miscellaneous

Package Type	Intel Boxed
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Integrated Graphics

Type	Intel UHD Graphics 770
Base Frequency	300 MHz
Max Dynamic Frequency	1.65 GHz
Max Supported Memory Size	192 GB
Max Supported Resolution	4096x2160@60Hz (HDMI), 7680x4320@60Hz (DP), 5120x3200@120Hz (eDP)
Features	Intel Quick Sync Video, Intel Clear Video HD Technology, Quad Display Capable

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