



Put NVMe™ power at the heart of your PC for lightning-fast, ultra-responsive performance. The WD Blue™ SN550 NVMe™ SSD can deliver up to 4 times the read speed of SATA SSDs. Whether you're working, creating, casually gaming, or processing large amounts of data, take advantage of this powerful internal drive's high speeds to do more, faster. Available in capacities up to 1TB³ in an affordable M.2 2280 form factor, there's no time like now to make the change to NVMe.

Highlights

- Boost your system's performance with next-gen NVMe™ SSDs.
- Up to 4 times the read speed of our SATA SSDs.
- Slimline M.2 2280 form factor.
- Western Digital®-designed controller and firmware for optimized performance.
- Western Digital® SSD Dashboard constantly monitors the health of your SSD.

INTERFACE
PCIe Gen3 8Gb/s

CAPACITIES
250GB to 1TB³

FORM FACTOR :
M.2 2280

MODEL NUMBERS

WDBA3V0010BNC-WRSN
WDBA3V5000ANC-WRSN
WDBA3V2500ANC-WRSN

The Right Storage for Your Next PC

NVMe goes mainstream with a powerful, cost-effective storage solution that adds to the reliability of an SSD.

Boost Your Performance

Get breakneck sequential read speeds up to 2,400 MB/s² to improve your productivity no matter what you're doing or creating.

Think Small

Build powerful small-form factor PCs with a slim single-sided M.2 2280 PCIe® Gen3 x4 NVMe™ SSD.

Do More With Less

Scalable NVMe hardware, accelerated architecture for high performance and low power draw.

Do More, Faster

Western Digital® -designed controller and firmware paired with our latest 3D NAND for optimized, consistent performance.

Continuing the Legacy

Thousands of hours of hardware, firmware and validation testing combine to advance the award-winning WD Blue™ heritage of quality and reliability.

THE WESTERN DIGITAL ADVANTAGE

Western Digital puts our products through extensive Functional Integrity Testing (F.I.T.) prior to any product launch. This testing ensures our products consistently meet the highest quality and reliability standards of the Western Digital brand.

Western Digital also has a detailed Knowledge Base with more than 1,000 helpful articles as well as helpful software and utilities. Our customer support lines have longer operational hours to ensure you get the help you need when you need it. Our toll-free customer support lines are here to help or you can access our Western Digital Support site for additional details.

WD Blue™ SN550 NVMe™ SSD

DATA SHEET

INTERNAL DRIVE FOR RETAIL

Specifications

	250GB	500GB	1TB
Model Number	WDBA3V2500ANC-WRSN	WDBA3V5000ANC-WRSN	WDBA3V0010BNC-WRSN
Interface¹	PCIe Gen3 8Gb/s	PCIe Gen3 8Gb/s	PCIe Gen3 8Gb/s
Performance^{3,4}			
Sequential Read up to (MB/s)	2,400	2,400	2,400
Sequential Write up to (MB/s)	950	1,750	1,950
Random Read 4KB up to (IOPS)	170K	300K	410K
Random Write 4KB up to (IOPS)	135K	240K	405K
Endurance (TBW) ⁵	150	300	600
Power⁶			
Avg. Active Power (mW)	75	75	75
Low Power (PS3)	20mW	20mW	20mW
Sleep (PS4) (low power)	5mW	5mW	5mW
Maximum Operating Power	3.5W	3.9W	4.9W
Reliability			
MTTF ⁷	Up to 1.7M hours	Up to 1.7M hours	Up to 1.7M hours
Environmental			
Operating Temperatures	0°C to 70°C	0°C to 70°C	0°C to 70°C
Non-operating Temperatures ⁸	-55°C to 85°C	-55°C to 85°C	-55°C to 85°C
Operating Vibration	5.0 gRMS, 10–2000 Hz, 3 axes	5.0 gRMS, 10–2000 Hz, 3 axes	5.0 gRMS, 10–2000 Hz, 3 axes
Non-operating Vibration	4.9 gRMS, 7–800 Hz, 3 axes	4.9 gRMS, 7–800 Hz, 3 axes	4.9 gRMS, 7–800 Hz, 3 axes
Shock	1,500 G @ 0.5 msec half sine	1,500 G @ 0.5 msec half sine	1,500 G @ 0.5 msec half sine
Certifications	BSMI, CAN ICES-3(B)/NMB-3(B), CE, FCC, KCC, Morocco, RCM, TUV, UL, VCCI	BSMI, CAN ICES-3(B)/NMB-3(B), CE, FCC, KCC, Morocco, RCM, TUV, UL, VCCI	BSMI, CAN ICES-3(B)/NMB-3(B), CE, FCC, KCC, Morocco, RCM, TUV, UL, VCCI
Limited Warranty ⁹	5 years	5 years	5 years
Physical Dimensions			
Form Factor	M.2 2280	M.2 2280	M.2 2280
Length	80 ± 0.15mm	80 ± 0.15mm	80 ± 0.15mm
Width	22 ± 0.15mm	22 ± 0.15mm	22 ± 0.15mm
Height	2.38mm	2.38mm	2.38mm
Weight	6.5g ± 1g	6.5g ± 1g	6.5g ± 1g

Specifications are subject to change without notice

¹ Backwards compatible with PCIe Gen3 x2, PCIe Gen2 x4, PCIe Gen2 x2, and PCIe Gen2 x1.

² 1 MB/s = 1 million bytes per second. Based on internal testing; performance may vary depending upon host device, usage conditions, drive capacity, and other factors.

³ 1TB=1,000,000,000,000 bytes. 1GB=1,000,000,000 bytes. Actual user storage less

⁴ Test Conditions: Performance is based on the CrystalDiskMark 6.0.2 benchmark using a 1000MB LBA range ASUS Z270A desktop with Intel® i7-7700K 3.4GHz, 8GB

2133MHz DDR4. Windows 10 Pro 64-bit 19H1 using Microsoft StorNVMe driver, secondary drive. Performance may vary based on host device. 1 MB = 1,000,000 bytes. IOPS = input/output operations per second.

⁵ TBW (terabytes written) values calculated using JEDEC client workload (IESTD219) and vary by product capacity.

⁶ Measured using the MobileMark™ 2014 on ASUS B9400UA WITH I5-7200U, 8GB RAM. Windows 10 Pro 64-bit 19H1 using Microsoft StorNVMe driver, Primary drive.

⁷ MTTF = Mean Time To Failure based on internal testing using Telcordia stress part testing (Telcordia SR-332, GB, 25°C).

MTTF is based on a sample population and is estimated by statistical measurements and acceleration algorithms. MTTF does not predict an individual drive's reliability and does not constitute a warranty.

⁸ Operational temperature is measured by an on board temperature sensor.

⁹ See www.support.wdc.com/warranty for regional specific warranty details.

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CAN ICES-3 (B) / NMB-3 (B)

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