

M.2 is another type of SSD with SATA or NVMe interface. M.2 SATA Solid State Drive can be installed directly onto motherboard. It can be configured with 3D TLC, 3D pSLC, MLC, pSLC and SLC NAND and PCBA can be delivered in two sizes: 42 x 22 mm and 80 x 22 mm. Small footprint, lack of moving parts and low power consumption make M.2 SATA SSD a great solution for mobile applications. Other form factors (2260, 22110) available upon request.

M.2 SATA



M.2 NVMe



M.2 SATA Solid State Drive

Form factor	M.2 22 42					M.2 2280				
Flash type	3D TL C	3D pSL C	MLC	pSL C	SL C	3D TL C	3D pSL C	MLC	pSL C	SL C
Program/Erase cycles	3 000	50 000	3 000	20 000	60 000	3 000	50 000	3 000	20 000	60 000
Capacity	64 G B – 1 T B	32 GB – 256 GB	4 GB – 512 GB	16 GB – 256 GB	8 G B – 6 4 G B	64 G B – 2 T B	32 GB – 512 GB	4 GB – 512 GB	2 GB – 256 GB	8 GB – 128 GB
Inter face	SATA III									
Key featur es	Static and Dynamic W ear Lev eling - Bad Block Management - TRIM - S.M.A.R. T. - NCQ Over-pr ovisioning - Lo w Po wer Management - Thermal Thr ottling - DEVSLP Mode (optional) - PLP (optional) Build fr om major IC grades - FIX BOM (optional) - PCN and EOL notification									
Operating temperatur e (°C)	0 – 7 0 -40 – 85				-25 – 8 5 -40 – 8 5	0 – 7 0 -40 – 85		0 – 7 0 -25 – 8 5 -40 – 8 5	0 – 7 0 -40 – 8 5	-25 – 8 5 -40 – 8 5
Storage temperatur e (°C)	-40 – 85									
Maximum transf er speed (MB/s)	Read: up to 550 Write: up to 510		Read: up to 555 Write: up to 490	Read: up to 545 Write: up to 460	Read: up to 540 Write: up to 320	Read: up to 550 Write: up to 510		Read: up to 550 Write: up to 490		Read: up to 540 Write: up to 425
Max. po wer consumption (m W)	< 1 750	< 1 350	< 2 100	< 2 630	< 1 950	< 1 800	< 1 300	< 2 650		< 2 280
MTBF	> 2 000 000	> 3 000 000	> 2 000 000				> 3 000 000	> 2 000 000		
En vironmental test s resistance	High/Low temperatur e, High Humidity (55 , 95% RH), T emperatur e Cy cle (30 min, 20 cycles), Shock (1 500 G, Half Sin Pulse), Vibration (80 – 2 000 Hz/20 G in 3 Axis), Fr ee Fall (0.8 m), Torque (0.1 N/m, 30 sec/5 times), Bending (>20 N f or 1 min/5 times), Contact ESD (±4 KV contact 25 times)									
Dimensions ((L×W×H) (mm))	42 × 22 × 3 .8					80 × 22 × 3.8				

M.2 NVMe Solid State Drive

Interface	NVMe PCIe 4x4				NVMe PCIe 3x4			
Form factor	M.2 2230	M.2 22 42	M.2 2280		M.2 22 42		M.2 2280	
Flash type	3D TLC		3D TLC	3D pSLC	3D TLC	3D pSLC	3D TLC	3D pSLC
Program/Erase cycles	3 000		3 000	50 000	3 000	50 000	3 000	50 000
Capacity	256 GB – 512 GB	128 GB – 2 TB	128 GB – 2 TB	120 GB – 960 GB	128 GB – 2 TB	32 GB – 512 GB	128 GB – 2 TB	32 GB – 512 GB
Advanced features	Dynamic SLC Cache TCG Opal/Pyrite (optional) ETEDPP(End to End Data Path Protection) Read Only Mode Build from major IC grades FIX BOM (optional) PCN and EOL notification			TCG Pyrite/Opal (optional) NVMe Format Physical Presence (SID) (optional) Manufacturer's Secure ID (MSID) Read Only Mode Build from major IC grades FIX BOM (optional) PCN and EOL notification	Dynamic SLC cache - TCG Pyrite/OPAL (optional) Secure Erase and Crypto Erase - Media Wear Indicator Read Only Mode - Physical Presence SID (optional) PLP (optional) - Build from major IC grades FIX BOM (optional) - PCN and EOL notification			
Operating temperature (°C)	0 – 70 -40 – 85				0 – 70	0 – 70 -40 – 85	0 – 70	0 – 70 -40 – 85
Storage temperature (°C)	-40 – 85							
Maximum transfer speed (MB/s)	Read: up to 4 900 Write: up to 3 200	Read: up to 4 900 Write: up to 3 700		Read: up to 7 200 Write: up to 6 500	Read: up to 2 450 Write: up to 1 900			
Max. power consumption (mW)	< 5 200	< 5 300		< 11 000	< 3 900		< 4 000	
MTBF	> 2 000 000							
Dimensions ((L × W × H) (mm))	30 × 22 × 2.15	42 × 22 × 3.8	80 × 22 × 3.8	80 × 22 × 1.35	42 × 22 × 3.8		80 × 22 × 3.8	