

Embedded Solutions



SATA III M.2 SSDs

MTS402M & MTS402I

Transcend's MTS402M with SATA III 6Gb/s interface and ultra compact dimensions make it best suited to address the high-performance needs and strict size limitations of small form factor devices. This means it is perfect for use in today's modern ultrabooks, thin and light notebooks, and tablets. Built with the SATA III 6Gb/s specifications, and with a powerful controller and exceptional transfer speeds, the M.2 SSD easily handles everyday computing tasks as well as demanding multimedia applications.

Transcend also offers the MTS402I with wide temperature (-40°C ~ 85°C) capabilities to ensure sustained functionality, enhanced endurance and optimal reliability in mission-critical applications.

Hardware Features

- Compliant with RoHS 2.0 standards
- Space-saving M.2 form factor (42mm) – ideal for mobile computing devices
- DDR3 DRAM Cache embedded
- MLC NAND flash
- Promised operational reliability in a wide temperature range (from -40°C to 85°C)

Firmware Features

- Built-in BCH ECC (Error Correction Code) functionality
- Advanced Global Wear-Leveling and Block management for reliability
- Advanced Garbage Collection
- Supports S.M.A.R.T. function to conduct health monitoring, analysis, and reporting for storage devices
- NCQ command for better performance

Ordering Information

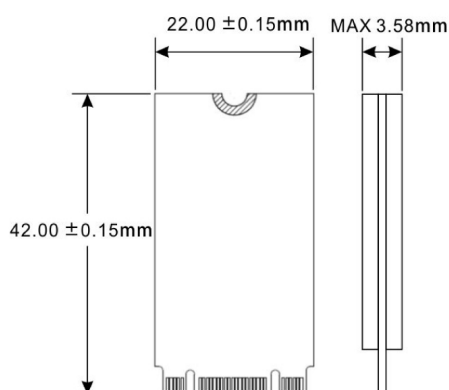
16GB	TS16GMTS402I TS16GMTS402M
32GB	TS32GMTS402I TS32GMTS402M
64GB	TS64GMTS402I TS64GMTS402M
128GB	TS128GMTS402I TS128GMTS402M
256GB	TS256GMTS402I TS256GMTS402M
512GB	TS512GMTS402I TS512GMTS402M



Specifications

Appearance	Dimensions	42.0 mm x 22.0 mm x 3.58 mm (1.65" x 0.87" x 0.14")
	Weight	5 g (0.18 oz)
	Form Factor	M.2
	M.2 Type	2242-D2-B-M (Double-sided)
Interface	Bus Interface	SATA III 6Gb/s
Storage	Flash Type	MLC NAND flash
	Capacity	16 GB / 32 GB / 64 GB / 128 GB / 256 GB / 512 GB
Operating Environment	Operating Voltage	3.3V±5%
	Operating Temperature	Standard Temp. 0°C (32°F) ~ 70°C (158°F)
		Wide Temp. -40°C (-40°F) ~ 85°C (185°F)
	Storage Temperature	-55°C (-67°F) ~ 85°C (185°F)
	Humidity	5% ~ 95%
	Shock	1500 G, 0.5 ms, 3 axis
	Vibration (Operating)	20 G (peak-to-peak), 7 Hz ~ 2,000 Hz (frequency)
Power	Power Consumption (Operation)	2.48 watt(s)
	Power Consumption (Sleep)	0.48 watt(s)
Performance	Sequential Read/Write (CrystalDiskMark)	Read: up to 530 MB/s Write: up to 470 MB/s
	4K Random Read/Write (IOMeter)	Read: up to 70,000 IOPS Write: up to 50,000 IOPS
	Mean Time Between Failures (MTBF)	2,500,000 hour(s)
	Terabytes Written (TBW)	up to 1,100 TBW
	Drive Writes Per Day (DWPD)	2 (3 yrs)
Warranty	Certificate	CE / FCC / BSMI / UKCA
	Warranty	Three-year Limited Warranty

Mechanical Dimensions



Product specifications are subject to change without notice. Pictures shown may differ from actual products. Total accessible capacity varies depending on operating environment. Due to the complexity and variety of industrial applications, Transcend cannot guarantee 100% compatibility with all platforms and under all scenarios. For special applications and environments, it is strongly suggested that you contact Transcend beforehand for clarification.

