TOSHIBA

Wide range of Capacity Models providing reliable data storage for Datacenters

A wide range of capacities from 1 TB to 10 TB are available for data centers and storage systems. Providing products optimum for various systems.

Enterprise Capacity
Hard Disk Drive

MG Series
Conventional-Air

A choice of SATA or SAS models up to 10TB

The lineup includes products with a wide range of uses such as data centers and more conventional server/storage systems. The range of capacity models helps to optimize storage density to reduce TCO and lower cost per unit of storage capacity.

Durability and reliability

With an annual workload of 550TB and a maximum MTTF of 2.5 million hours, this series is designed for business critical workloads that require consistent 24/365 performance with high reliability.

Toshiba's Persistent Write Cache Technology

Helps to enhances write performance between the host and the drive, and also helps to prevents data loss in the event of a sudden loss of power (512e models).

Enterprise Capacity Hard Disk Drive

Application

- Data Center Server and Storage Infrastructure
- Software-defined data center infrastructure
- File and Object-based storage infrastructure
- Mid-line / Nearline Business Critical Workloads
- Tier 2 Business-Critical Servers and Storage Systems
- Data Analytics

Specifications (10TB to 6TB)

Formatted Capacity			10TB	8TB		6TB	
Model Number	SATA	4Kn	MG06ACA10TA	MG08ADA800A	MG06ACA800A	MG08ADA600A	MG06ACA600A
		512e	MG06ACA10TE	MG08ADA800E	MG06ACA800E	MG08ADA600E	MG06ACA600E
		512n	-	-	-	-	-
	SAS	4Kn	MG06SCA10TA	MG08SDP800A	MG06SCA800A	MG08SDP600A	MG06SCA600A
		512e	MG06SCA10TE	MG08SDP800E	MG06SCA800E	MG08SDP600E	MG06SCA600E
		512n	-	-	-	-	-
Specification							
Mechanical Design			Conventional-Air				
Recording Technology			CMR				
Form Factor			3.5-inch (Height:26.1 mm, Length: 147.0 mm, Wide:101.85 mm)				
Weight			770 g	720 g	770 g	700 g	770 g
Interface			SATA : 6.0 Gbit/s SAS : 12.0 Gbit/s				
Rotation Speed			7200 rpm				
Buffer Size			256 MiB				
Reliability							
MTTF			2.5 M hours	2.0 M hours	2.5 M hours	2.0 M hours	2.5 M hours
Workloads			550 Total TB Transferred per Year				
Environmental Requirements							
Temperature	Operating		5 °C to 55 °C				
Vibration	Operating		7.35 m/s^2 { 0.75 G } (5 - 300 Hz), 2.45 m/s^2 { 0.25 G } (300 - 500 Hz)				
	Non-Operating		29.4 m/s^2 { 3.0 G } (5 to 500 Hz)				
Shock	Non-Operating		2450 m/s^2 { 250 G } (2 ms duration)				
Acoustic	Idle		34 dB	31 dB	34 dB	31 dB	34 dB

Enterprise Capacity Hard Disk Drive

Specifications (4TB to 1TB)

Formatted Capacity			**4**TB		**2**TB	**1**TB
Model Number	SATA	4Kn	MG08ADA400A	MG04ACA400A	MG04ACA200A	-
		512e	MG08ADA400E	MG04ACA400E	MG04ACA200E	-
		512n	MG08ADA400N	MG04ACA400N	MG04ACA200N	MG04ACA100N
	SAS	4Kn	MG08SDA400A	MG04SCA40EA	MG04SCA20EA	-
		512e	MG08SDA400E	MG04SCA40EE	MG04SCA20EE	-
		512n	MG08SDA400N	MG04SCA40EN	MG04SCA20EN	-
Specification						
Mechanical Design			Conventional-Air			
Recording Technology			CMR			
Form Factor			3.5-inch (Height:26.1 mm, Length: 147.0 mm, Wide:101.85 mm)			
Weight			693 g	720 g		
Interface			SATA : 6.0 Gbit/s SAS : 12.0 Gbit/s			
Rotation Speed			7200 rpm			
Buffer Size			256 MiB	128 MiB		
Reliability						
MTTF			2.0 M hours	1.4 M hours		
Workloads			550 Total TB Transferred per Year			
Environmental Requirements						
Temperature	Operating		5 °C to 55 °C			
Vibration	Operating		$7.35 \ m/s^2$ { 0.75 G } (5 - 300 Hz), $2.45 \ m/s^2$ { 0.25 G } (300 - 500 Hz)			
	Non-Operating		$29.4 \ m/s^2$ { 3.0 G } (5 to 500 Hz)	$49 \ m/s^2$ { 5.0 G } (5 to 500 Hz)		
Shock	Non-Operating		$2450 \ m/s^2$ { 250 G } (2 ms duration)	$2940 \ m/s^2$ { 300 G } (2 ms duration)		
Acoustic	Idle		31 dB			

• Definition of capacity: One terabyte (TB) = one trillion bytes, but storage capacity actually available may vary depending on operating environment and formatting. Available storage capacity (including examples of various media files) will vary based on file size, formatting, settings, software and operating system and/or pre-installed software applications, or media content. Actual formatted capacity may vary. • A mebibyte (MiB) means 2^{20}, or 1 048 576 bytes. • MTTF (Mean Time to Failure) assumes 8760 h/year power on hours (24 hours per one day, 7 days per one week), up to 550TB/year total data transfers, and average HDA surface temperature:40°C or less. Use at case HDA surface temperature above 40°C may degrade product reliability and reduce warranty period. • Read and write speed may vary depending on the host device, read and write conditions, and file size. • "3.5-inch" means the form factor of HDDs. They do not indicate drive's physical size. • Workload is a measure of the data throughput of the year, and it is defined as the amount of data written, read or verified by commands from the host system. • Before creating and producing designs and using, customers must also refer to and comply with the latest versions of all relevant information of this document and the instructions for the application that Product will be used with or for. • Company names, product names, and service names may be trademarks of their respective companies.

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