



DATA SHEET

## Trusted. Efficient. Versatile. Exos 10E2400



Seagate® Exos® 10E2400 enterprise hard drives are the industry's fastest 10K-RPM drives, with capacities up to 2.4TB in a 2.5-inch form factor, and intended for traditional data centers where density, power consumption and data integrity are paramount.



### Best-Fit Applications

- Mission critical servers and external storage arrays
- Database and online transaction process (OLTP) applications
- Power- and space-constrained data centers
- Green IT and drive-retirement cost reduction initiatives
- Compliance and data security initiatives
- Migration from 3.5-inch drive systems to next-generation technology
- Cost-effective alternative to higher-priced performance solutions



### The Perfect Match of High Capacity and High Performance

The high capacity and small 2.5-inch footprint of the Exos 10E2400 drive enables data centers to keep pace with data growth and optimize data center real estate. Exos 10E2400 delivers up to 2.4TB of high-performance data access for write-intensive applications. A single advanced format interface model lets you future-proof your storage infrastructure. The Seagate Enhanced Caching feature accelerates read and write I/O operations, preventing applications from slowing down under peak usage conditions. The latest 12Gb/s SAS interface provides improved scalability.

### Maximize Storage Investments for the Long Haul

Exos 10E2400 offers Protection Information (PI) to help protect against data corruption,<sup>1</sup> and Seagate PowerChoice™ technology for T10-compliant power management enables IT organizations to tailor systems for enhanced power consumption. RAID recovery is faster and safer with the help of the Seagate RAID Rebuild® technology option.

### Industry-Leading Data Security Features

Seagate Secure™ SED and FIPS 140-2 government-grade models offer hardware-based security to help protect data-at-rest.<sup>2</sup> With Instant Secure Erase, drive retirement is safe, fast and cost-effective. Seagate Secure models meet the NIST 800-88 media sanitization specification and support the Trusted Computer Group (TCG) standard.<sup>2</sup>

### Exos 10E300 Enterprise Hard Drives

The industry's fastest 10K-RPM drives are also available in 300GB capacity and are a perfect choice for entry-level boot server applications.

<sup>1</sup> Protection Information (PI) feature requires PI-compliant host or controller support.

<sup>2</sup> Seagate Secure models not available in all countries. May require TCG-compliant host or controller support.



Specifications	FastFormat™ 512 Emulation/4K Native			
	2.4TB	1.8TB	1.2TB	600GB
Capacity	2.4TB	1.8TB	1.2TB	600GB
Standard Model	ST2400MM0129	ST1800MM0129	ST1200MM0129	ST600MM0099
Seagate Secure™ SED Model	—	—	ST1200MM0139	ST600MM0109
Seagate Secure FIPS 140-2/Common Criteria Model <sup>1</sup>	ST2400MM0149	ST1800MM0149	—	—
<b>Performance</b>				
Spindle Speed (RPM)	10000RPM	10000RPM	10000RPM	10000RPM
Average Latency (ms)	2.9	2.9	2.9	2.9
Sustained Transfer Rate (Outer to Inner Diameter, MB/s)	266 to 130	266 to 130	266 to 130	266 to 130
Cache, Multisegmented (MB)	256	256	256	256
<b>Enhanced Caching Features</b>				
I/O Acceleration and Response Time Optimization	Enabled	Enabled	Enabled	Enabled
Intelligent NAND Endurance Management	Yes	Yes	Yes	Yes
<b>Enterprise Features</b>				
Secure Download & Diagnostics (SD&D) and Instant Secure Erase Option	Yes	Yes	Yes	Yes
FastFormat (512e/4Kn AF Switching)	Yes	Yes	Yes	Yes
12Gb/s SAS	Yes	Yes	Yes	Yes
<b>Configuration/Reliability</b>				
Disks/Heads	4/8	3/6	2/4	1/2
External Transfer Rate (MB/s)	1,200	1,200	1,200	1,200
Nonrecoverable Read Errors per Bits Read, Max	1 per 10E16	1 per 10E16	1 per 10E16	1 per 10E16
Annualized Failure Rate (AFR)	0.44%	0.44%	0.44%	0.44%
Limited Warranty (years)	5	5	5	5
<b>Power Management</b>				
Typical Op (A) +5V/+12V	0.47/0.52	0.44/0.42	0.45/0.39	0.46/0.40
Typical Operating (W)	8.6	7.2	6.9	7.1
Average Idle Power (W)	4.9	4.3	3.7	3.4
Performance Efficiency Index (Idle W/GB)	0.0020	0.0024	0.0031	0.0057
<b>Environmental</b>				
Ambient Temperature, Operating (C°)	5° C – 55° C	5° C – 55° C	5° C – 55° C	5° C – 55° C
Ambient Temperature, Nonoperating (C°)	-40° C – 70° C	-40° C – 70° C	-40° C – 70° C	-40° C – 70° C
Shock, Max. Operating: 11ms (Gs)	40	40	40	40
Shock, Max. Nonoperating: 2ms (Gs)	400	400	400	400
Vibration, Operating: <500Hz (Gs)	0.5	0.5	0.5	0.5
Vibration, Nonoperating: <500Hz (Gs)	3	3	3	3
<b>Physical</b>				
Height (in/mm, max) <sup>2</sup>	0.591in/15mm	0.591in/15mm	0.591in/15mm	0.591in/15mm
Width (in/mm, max) <sup>2</sup>	2.75in/69.85mm	2.75in/69.85mm	2.75in/69.85mm	2.75in/69.85mm
Depth (in/mm, max) <sup>2</sup>	3.955in/100.45mm	3.955in/100.45mm	3.955in/100.45mm	3.955in/100.45mm
Weight (g/lb)	202g/0.445lb	206g/0.455lb	191g/0.422lb	179g/0.394lb
Carton Unit Quantity	40	40	40	40
Cartons per Pallet/Cartons per Layer	60/10	60/10	60/10	60/10

<sup>1</sup> Not all drives may be available in all countries. Seagate Secure drives meet ISO/IEC 27040 and NIST 800-88 standards and may require use of TCG-compliant host or controller support.

<sup>2</sup> These base deck dimensions conform to the Small Form Factor Standard (SFF-8201) found at [www.sffcommittee.org](http://www.sffcommittee.org).



Specifications	512 Native		512 Native (v8 models)
Capacity	1.2TB	600GB	300GB
Standard Model	ST1200MM0009	ST600MM0009	ST300MM0048
Seagate Secure™ SED Model	ST1200MM0039	ST600MM0039	ST300MM0058
Seagate Secure FIPS 140-2/Common Criteria Model <sup>1</sup>	—	—	—
<b>Performance</b>			
Spindle Speed (RPM)	10000RPM	10000RPM	10000RPM
Average Latency (ms)	2.9	2.9	2.9
Sustained Transfer Rate (Outer to Inner Diameter, MB/s)	250 to 130	250 to 130	215 to 125
Cache, Multisegmented (MB)	128	128	128
<b>Enhanced Caching Features</b>			
I/O Acceleration and Response Time Optimization	—	—	—
Intelligent NAND Endurance Management	—	—	—
<b>Enterprise Features</b>			
Secure Download & Diagnostics (SD&D) and Instant Secure Erase Option	Yes	Yes	Yes
FastFormat (512e/4Kn AF Switching)	—	—	—
12Gb/s SAS	Yes	Yes	Yes
<b>Configuration/Reliability</b>			
Disks/Heads	2/4	1/2	1/2
External Transfer Rate (MB/s)	1,200	1,200	1,200
Nonrecoverable Read Errors per Bits Read, Max	1 per 10E16	1 per 10E16	1 per 10E16
Annualized Failure Rate (AFR)	0.44%	0.44%	0.44%
Limited Warranty (years)	5	5	5
<b>Power Management</b>			
Typical Op (A) +5V/+12V	0.45/0.39	0.46/0.40	0.34/0.38
Typical Operating (W)	6.9	7.1	6.3
Average Idle Power (W)	3.7	3.4	3.1
Performance Efficiency Index (Idle W/GB)	0.0031	0.0057	0.010
<b>Environmental</b>			
Ambient Temperature, Operating (C°)	5°C – 55°C	5°C – 55°C	5°C – 55°C
Ambient Temperature, Nonoperating (C°)	-40°C – 70°C	-40°C – 70°C	-40°C – 70°C
Shock, Max. Operating: 11ms (Gs)	40	40	40
Shock, Max. Nonoperating: 2ms (Gs)	400	400	400
Vibration, Operating: <500Hz (Gs)	0.5	0.5	0.5
Vibration, Nonoperating: <500Hz (Gs)	3	3	3
<b>Physical</b>			
Height (in/mm, max) <sup>2</sup>	0.591in/15mm	0.591in/15mm	0.591in/15mm
Width (in/mm, max) <sup>2</sup>	2.76in/70.1mm	2.76in/70.1mm	2.76in/70.1mm
Depth (in/mm, max) <sup>2</sup>	3.955in/100.45mm	3.955in/100.45mm	3.955in/100.45mm
Weight (g/lb)	191g/0.422lb	179g/0.394lb	218g/0.481lb
Carton Unit Quantity	40	40	40
Cartons per Pallet/Cartons per Layer	60/10	60/10	60/10

<sup>1</sup> Not all drives may be available in all countries. Seagate Secure drives meet ISO/IEC 27040 and NIST 800-88 standards and may require use of TCG-compliant host or controller support.

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