Video 2.5 HDD

Data Sheet

Reliable. Quiet. Low Power.

- Purpose-built 2.5-inch drive tuned for video streaming, 24×7 operation and low power consumption[1]

- Small form factor—1/6 the size of 3.5-inch solutions—allows system cost reduction, operational power savings and fanless design while supporting flexibility in a sleeker industrial system design.

- Eco-friendly power consumption enables energy-efficient, always-on systems with up to 55% in power savings in comparison to 3.5-inch solutions.

- Proven Seagate reliability of 0.55% AFR supports longevity in demanding consumer electronic environments.

- Designed for cool, quiet, worry-free operation

- Media streaming optimized for smooth content delivery of up to 12 HD streams

Best-Fit Applications

- DVR and media center applications

- Home theater PCs

- Karaoke and audio jukeboxes

- Cable, satellite and IPTV set-top boxes

- In-camera or surveillance systems

1 Seagate® Video 2.5 HDD was previously known as the Pipeline HD® Mini hard drive.

Video 2.5 HDD

Seagate®

Specifications	500GB[1]	320GB[1]	250GB[1]
Model Number	ST500VT000	ST320VT000	ST250VT000
Interface Options	SATA 3Gb/s	SATA 3Gb/s	SATA 3Gb/s
Performance			
Cache, Multisegmented (MB)	16	16	16
Simultaneous HDTV Streams Supported (Assumes 20Mb host buffer per stream)	12	12	12
Power-On to Ready (typical, sec)	3.0	3.0	3.0
Standby to Ready (typical, sec)	2.5	2.5	2.5
Maximum Sustained Data Transfer Rate (MB/s)	100	100	100
Voltage			
Voltage Tolerance (including noise)	5V ± 5%	5V ± 5%	5V ± 5%
Reliability			
Nonrecoverable Read Errors per Bits Read	1 sector per 10E14	1 sector per 10E14	1 sector per 10E14
Annualized Failure Rate (AFR)	0.55%	0.55%	0.55%
Load/Unload Cycles (software/hardware-controlled power cycles)	20,000 600,000	20,000 600,000	20,000 600,000
Warranty, Limited (years)	3	3	3
Power Management			
Startup Current (5V, A max)	1.0	1.0	1.0
Operating Seeks (W)	1.5	1.5	1.5
Idle Average (W)	0.66	0.66	0.66
Standby/Sleep Mode (typical, W)	0.18	0.18	0.18
Environmental			
Temperature (°C) Operating (drive case max) Nonoperating (drive case min) Nonoperating (ambient)	60 0 −40 to 70	60 0 −40 to 70	60 0 −40 to 70
Temperature Gradient, Operating/Nonoperating (°C per hour max)	20/35	20/35	20/35
Relative Humidity, Operating/Nonoperating (non-condensing, %)	5 to 95	5 to 95	5 to 95
Wet Bulb Temperature, Operating/Nonoperating (°C max)	37.7/40.0	37.7/40.0	37.7/40.0
Shock Operating: 2ms (max, Gs) Nonoperating: 1ms (max, Gs)	400 1000	400 1000	400 1000
Vibration, Operating 5Hz to 200Hz (Gs, max displacement applies below 10Hz) 200Hz to 500Hz (Gs, 0 to peak)	2.0 1.0	2.0 1.0	2.0 1.0
Vibration, Nonoperating 5Hz to 500Hz (Gs, max displacement applies below 22Hz)	5.0	5.0	5.0
Acoustics			
PVR Profile (typical/max, bels)	2.2/2.4	2.2/2.4	2.2/2.4
Physical			
Height (mm/in)[2]	7.0/0.276	7.0/0.276	7.0/0.276
Width (mm/in)[2]	70.1/2.76	70.1/2.76	70.1/2.76
Depth (mm/in)[2]	100.55/3.959	100.55/3.959	100.55/3.959
Weight (g/lb, max)	0.209/95	0.209/95	0.209/95
Carton Unit Quantity	50	50	50
Cartons per Pallet	60	60	60
Cartons per Layer	10	10	10

1 One gigabyte, or GB, equals one billion bytes and one terabyte, or TB, equals one trillion bytes when referring to drive capacity.
2 These base deck dimensions conform to the Small Form Factor Standard (SFF-8203) found at www.sffcommittee.org. For connector-related dimensions, see SFF-8223.

www.seagate.com