PRODUCT|Guide

G-Technology
by Hitachi

G-Technology by Hitachi manufactures the industry's most comprehensive line of external disk storage solutions designed for professional content creation applications. Our USB, FireWire, eSATA, and Fibre Channel systems support all levels of audio/video production and are perfect for high-performance backup and storage. G-Tech's focus on technology, quality and design has resulted in disk storage solutions with unmatched performance, style and reliability.

Performance. Style. Reliability.

G|Index

USB 2.0	FireWire 400*	FireWire 800	eSATA	mini-SAS	Fibre Channel	RAID Protected		
✓	✓	✓					**G-DRIVE** mini	**4 - 5**
✓	✓	✓					**G-DRIVE** mini *SSD*	**6 - 7**
✓	✓	✓	✓				**G-DRIVE**	**8 - 9**
✓	✓	✓	✓			✓	**G-RAID** mini	**10 - 11**
✓	✓	✓	✓				**G-RAID**	**12 - 13**
✓		✓	✓			✓	**G-SAFE**	**14 - 15**
			✓			✓	**G-SPEED** *eS*	**16 - 17**
				✓		✓	**G-SPEED** *eS* **PRO**	**18 - 19**
				✓		✓	**G-SPEED** *eS* **PRO XL**	**20 - 21**
					✓	✓	**G-SPEED** FC / XL	**22 - 23**

*via included FireWire 800 to FireWire 400 cable
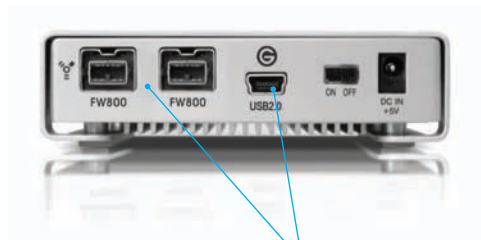
G|DRIVEmini

High-Speed Portable Drives for People on the Go!

G-DRIVE mini is the perfect storage solution for people on the go. Weighing less than 9 oz., G-DRIVE mini is the ultra-portable and stylish way to travel with all of your important documents, music, digital video and digital photo files. G-DRIVE mini's rugged all-aluminum enclosure protects your valuable data from the bumps and bruises encountered on the road. G-DRIVE mini features high-speed FireWire 800, FireWire 400* and USB 2.0 for true universal connectivity. The system is bus-powered, eliminating the need to carry a bulky external AC adapter. A built-in heat sink silently dissipates heat to ensure maximum reliability and data integrity.

High-speed interface with FireWire 800, FireWire 400* and USB 2.0 connectivity.

G-DRIVE mini incorporates a unique "fan-less" cooling system designed to silently dissipate heat for superior reliability and data integrity.

Up to 500GB

5400 and 7200 RPM
Time Machine® Ready!

To keep G-DRIVE mini safe when on the road, a protective carrying case is included.

*via included FireWire 800 to FireWire 400 cable

MAC   PC
FW   USB

SPECIFICATIONS:
Disk Drive: Hitachi Travelstar™ 5400 or 7200 RPM 3Gbit SATA drive with 8MB cache
Interface: (2) FireWire 800 (FireWire 400 via included cable), (1) USB 2.0
Size: (LxWxH) 4.9375" x 3.1875" x.875"
  125 x 81 x 22mm (500GB - 25.4mm)
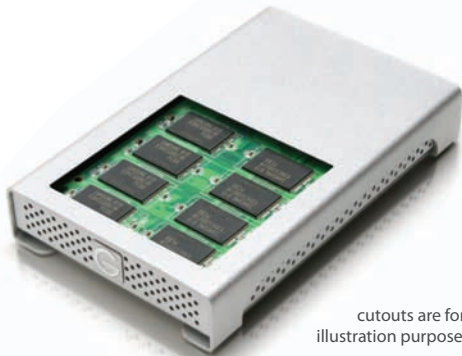**Weight:** .55 lbs / .25 kg

SYSTEM REQUIREMENTS:
Mac® OS X 10.3 +
Windows® Vista/XP/2000

G|DRIVE mini *SSD*

Rugged Solid State Drives for Demanding Applications

Extremely durable and compact, the G-DRIVE mini *SSD* comes in 128GB and 256GB capacities and features FireWire 800, FireWire 400* and USB 2.0 to provide fast access to HD video, audio, and other dense multimedia files. Data rates top 60MB/sec write and 75MB/sec read when using FireWire 800. Weighing in at just 8.5 oz, G-DRIVE mini *SSD* can be literally thrown into a gear bag for "grab n' go" ease. No external AC power supply is required as it is USB or FireWire bus-powered.

cutouts are for illustration purposes only

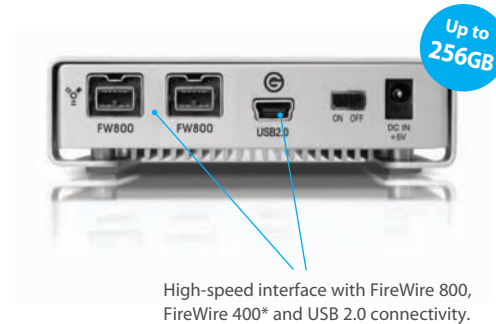*via included FireWire 800 to FireWire 400 cable

The SSD Advantage

High-Performance – Faster than a standard HDD

Faster seek time – .2ms vs 12ms for a HDD, perfect for multi-stream editing

Low power – cooler operation

Silent operation – perfect for audio editing

No moving parts – very reliable, can withstand 1500G shock

Up to 256GB

High-speed interface with FireWire 800, FireWire 400* and USB 2.0 connectivity.

Solid State Drives use high-performance Flash Memory and have no moving parts

THREE YEAR WARRANTY **3**

MAC   PC   FW   USB

SPECIFICATIONS:
Disk Drive: Solid State Drive (SSD)
Controller: Oxford 934
Interface: (2) FireWire 800
(FireWire 400 via included cable), (1) USB 2.0
Size: (LxWxH) 4.9375" x 3.1875" x.875" /
125 x 81 x 22mm
Weight: .53 lbs / .24 kg

SYSTEM REQUIREMENTS:
Mac® OS X 10.3 +
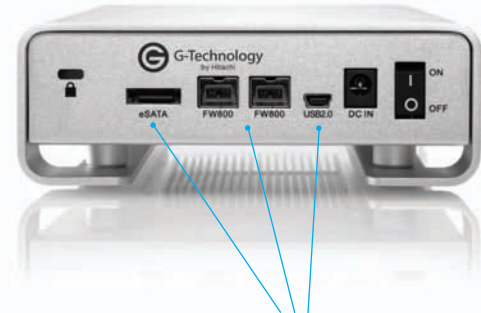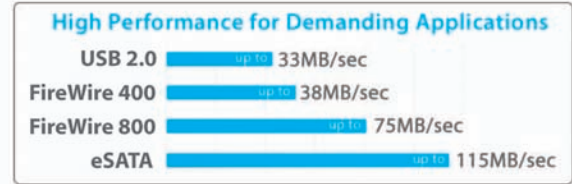Windows® Vista/XP/2000

G|DRIVE

Professional Strength External Hard Drive

G-DRIVE storage solutions offer the ultimate in flexibility by providing high-speed 3Gbit eSATA, FireWire 800, FireWire 400* and USB 2.0 connec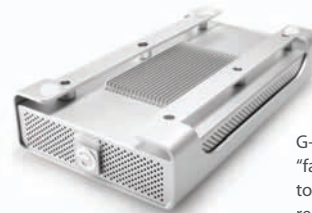tivity all in a single desktop unit. G-DRIVE is the perfect high-performance solution for storage intensive applications including audio/video editing, digital photography, music libraries and high-speed data backup. The system features a fan-less cooling system and the latest technology Hitachi 7200 RPM 3Gbit SATA drive with up to 32 MB of cache. G-DRIVE supports professional audio/video music production tools including Final Cut Studio®, Logic Studio® and Pro Tools®.

hard drive by HITACHI

Up to 2TB

**7200 RPM
Time Machine® Ready!**

*via included FireWire 800 to FireWire 400 cable

High Performance for Demanding Applications

USB 2.0	up to 33MB/sec
FireWire 400	up to 38MB/sec
FireWire 800	up to 75MB/sec
eSATA	up to 115MB/sec

High-speed professional interface with 3Gbit eSATA, FireWire 800, FireWire 400* and USB 2.0 connectivity

G-DRIVE incorporates a unique "fan-less" cooling system designed to silently dissipate heat for superior reliability and data integrity.

THREE YEAR WARRANTY 3

MAC   PC

eSATA   FW   USB

SPECIFICATIONS:
Disk Drive: Hitachi Deskstar™ 7200 RPM 3Gbit SATA drive with up to 32MB cache
Interface: (1) eSATA, (2) FireWire 800 (FireWire 400 via included cable), (1) USB 2.0
Size: (LxWxH) 9.25" x 5.125" x 1.82"
   235 x 130 x 46 mm
Weight: 2.6 lbs / 1.18 kg

SYSTEM REQUIREMENTS:
Mac® OS X 10.3 +
Windows® Vista/XP/2000

G|RAID mini

Portable Storage Solutions with High-Speed Interface and Selectable RAID 0 / RAID 1 Operation

The all-new G-RAID mini from G-Tech now features software selectable RAID 0 or fail-safe RAID 1 operation. It

Software Selectable
RAID 0 Performance **RAID 1** Protected

is the ideal portable storage solution for safe-guarding content downloaded from professional tapeless video cameras. Production houses and creative studios will appreciate its compact size and tough, all-aluminum enclosure, which make it perfect for capturing and editing on the go or while working on location. G-RAID mini is capable of delivering an unprecedented 120+ MB/second transfer rate when used with eSATA in RAID 0. G-RAID mini is FireWire bus-powered even when connected via eSATA.

hard drive by **HITACHI**

Up to **1TB**

3Gbit eSATA, FireWire 800, FireWire 400* and USB 2.0 for universal connectivity to Mac's and PC's

G-RAID mini is equipped with a small and quiet cooling fan to ensure reliable operation and data integrity.
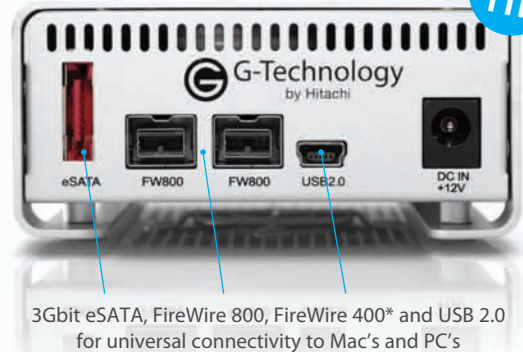
Tapeless Workflow? Protect your content with G-RAID mini

Transfer content from solid state media to the G-RAID mini for the ultimate data protection in the field

*via included FireWire 800 to FireWire 400 cable

3 THREE YEAR WARRANTY

MAC   PC
eSATA   FW   USB

SPECIFICATIONS:
Disk Drives: (2) Hitachi Travelstar™ 5400 or 7200 RPM 3Gbit SATA drives each with 8MB cache
Controller: Hardware RAID 0/1 - Oxford 936DS
Interface: (1) eSATA, (2) FW 800 (FireWire 400 via included cable) and (1) USB 2.0
Size: (LxWxH) 5.9" x 3.25" x 1.5" /149 x 82.6 x 38 mm
Weight: 1.1 lbs/.5 kg

SYSTEM REQUIREMENTS:
Mac® OS X 10.3 +
Windows® Vista/XP/2000

G|RAID

Professional High-Performance Dual-Drive Storage System

The new G-RAID from G-Tech features 3 Gbit eSATA, FireWire 800, FireWire 400*, and USB 2.0 for universal connectivity and industry leading performance. It uses the latest generation Oxford 936 chipset and supports the simultaneous playback of multiple layers of HDV, DVCPRO HD and ProRes 422 HQ with the leadi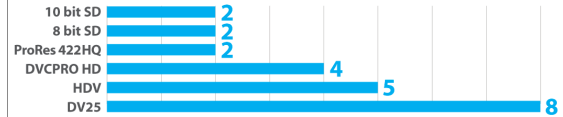ng video editing applications including Final Cut Pro®. G-RAID is capable of delivering over 200 MB/second transfer rate when connected to any Mac or PC via eSATA. The thermo-regulated "smart" fan keeps G-RAID cool and the editing suite quiet.

hard drive by **HITACHI**

Up to 4TB

*via included FireWire 800 to FireWire 400 cable

Minimum number of real-time video streams*

10 bit SD	2
8 bit SD	2
ProRes 422HQ	2
DVCPRO HD	4
HDV	5
DV25	8

*when attached via eSATA

G-RAID is specifically designed to support professional multi-stream video editing applications like Apple Final Cut Pro and Adobe Premiere Pro.

G-RAID is equipped with a thermo-regulated, "smart" fan to ensure quiet and reliable operation and data integrity.

3Gbit eSATA, FireWire 800, FireWire 400*, and USB 2.0 ports

Soft touch power switch

SPECIFICATIONS:
Disk Drives: (2) Hitachi Deskstar™ 7200 RPM 3Gbit SATA drives each with up to 32MB cache
Controller: Hardware RAID 0 - Oxford 936
Interface: (1) eSATA, (2) FW 800 (FireWire 400 via included cable) and (1) USB 2.0
Size: (LxWxH) 9.25" x 5.125" x 2.875" 235 x 130 x 73 mm
Weight: 3.85 lbs/1.75 kg

SYSTEM REQUIREMENTS:
Mac® OS X 10.3 +
Windows® Vista/XP/2000

G|SAFE

High-Performance RAID Protected Storage System

G-SAFE is the ideal storage solution to safeguard your important digital photos, audio and video libraries and documents. G-SAFE offers the ultimate in peace of mind by simultaneously writing to two 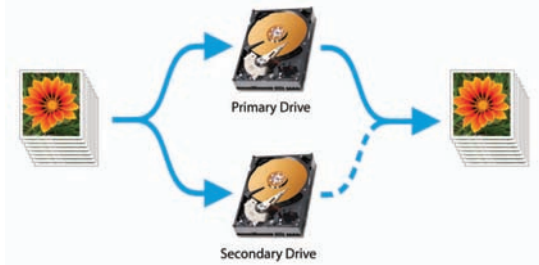independent hard disk drives providing instant back up of files as you save them. And unlike single drive backup systems, if a drive failure occurs your data is safe and accessible. G-SAFE features two removable drive modules for easy replacement of disk drives and off-site backup of data. High-speed 3Gbit eSATA, FireWire 800 and USB 2.0 interfaces provide universal connectivity and a sophisticated hardware RAID 1 (mirroring) engine ensures 24x7 data protection. A front panel LCD is used to control and monitor the health of the system.

hard drive by HITACHI

Additional G-SAFE drive modules are available and come with a protective leather carrying case

During operation G-SAFE writes data to (2) independent disk drives simultaneously.

Primary Drive

Secondary Drive

If a drive failure occurs, your data is safe. G-SAFE will alert you of the failure and automatically begin reading data from the good drive. Simply replace the bad drive and G-SAFE will copy your data from the good drive to the new drive and return to protected mode.

Removable cooling fan to ensure reliable operation and data integrity

Internal AC power supply reduces cabling clutter

3Gbit eSATA, FireWire 800 and USB 2.0 ports for universal connectivity to Mac's or PC's

Up to 2TB

3 THREE YEAR WARRANTY

MAC   PC

FW   USB

SPECIFICATIONS:
Disk Drives: (2) Hot-swappable Hitachi Deskstar™ 7200 RPM 3Gbit SATA drives each with up to 32MB cache
Controller: Hardware RAID 1 (Oxford 924)
Interface: (1) eSATA, (2) FireWire 800, (1) USB 2.0
Size: (LxWxH) 4" x 4.9" x 7.6" / 102 x 127 x 193mm
Weight: 10 lbs/4.5 kg

SYSTEM REQUIREMENTS:
Mac® OS X 10.3 +
Windows® Vista/XP/2000

G|SPEED eS

Cost-Effective eSATA RAID Storage for SD/HD Production

G-SPEED eS RAID solutions provide professional content creators with outstanding performance, high storage capacity and fail-safe operation at an unprecedented low cost per gigabyte. The compact and whisper quiet G-SPEED eS sports a 3Gbit eSATA interface and features four hot-swappable Hitachi 7200 RPM 3Gbit SATA drives. When used with the G-Tech RAID controller, a single G-SPEED eS in performance mode (RAID 0) supports uncompressed 8-bit,1080/60iHD video capture and playback. Two G-SPEED eS units in fail-safe mode (RAID 5) support 10-bit, 1080i and more! As many as four G-SPEED eS enclosures can be 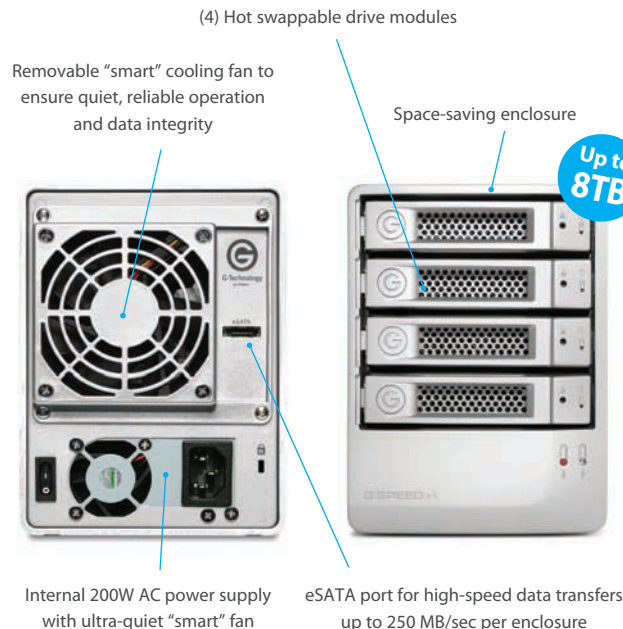attached to a single workstation to support up to 32TB of storage with speeds in excess of 600MB/second! Storage for multi-stream uncompressed SD and HD production has never been easier or more affordable!

G-SPEED eS is configured and monitored through a web based GUI

(4) Hot swappable drive modules

Removable "smart" cooling fan to ensure quiet, reliable operation and data integrity

Space-saving enclosure

Up to 8TB

Internal 200W AC power supply with ultra-quiet "smart" fan

eSATA port for high-speed data transfers up to 250 MB/sec per enclosure

The optional 4-port eSATA PCIe x4 RAID controller supports RAID 0,1,5 and JBOD configurations. Up to (4) G-SPEED eS enclosures can be attached to each workstation for performance well over 600 MB/sec! G-SPEED eS can also be attached to third-party port multiplier aware host bus adapters.

MAC PC

eSATA

17

G|SPEED *eS* PRO

High-Performance, Fail-Safe RAID Solutions for HD/2K Production

G-SPEED *eS* PRO from G-Tech provides professional content creators better than Fibre-Channel performance for demanding post production applications at a fraction of the cost. The compact and whisper quiet G-SPEED *eS* PRO features mini-SAS connectivity to a high performance PCIe x8 RAID controller that supports RAID levels 0,1,3,5 and RAID 6. A single G-SPEED *eS* PRO enclosure with four hot-swappable Hitachi 7200 RPM 3Gbit SATA drives in RAID 0 mode supports multi-stream ProRes 422 HQ playback and a single-stream of uncompressed 10-bit HD. Two units in protected mode (RAID 5) support two simultaneous streams of uncompressed 10-bit HD or a single 2K DPX sequence. G-SPEED *eS* PRO is simply the most cost-effective desktop RAID storage solution designed specifically for high-end post.

hard drive by HITACHI

G-SPEED *eS* PRO is configured and monitored through a web based GUI

(4) Hot swappable drive modules

Removable "smart" cooling fan to ensure quiet, reliable operation and data integrity

Space-saving enclosure

Up to 8TB

Internal 200W AC power supply with ultra-quiet "smart" fan

mini-SAS port for high-speed data transfers

The G-Tech PCIe x8 RAID controller supports RAID levels 0, 1, 3, 5 and 6 configurations. Two G-SPEED eS Pro enclosures can be attached to the RAID controller for up to 16TB of storage capacity and performance over 800MB/sec!

THREE YEAR WARRANTY **3**

MAC   PC   mini-SAS

SD HD 2K

SPECIFICATIONS:
Disk Drives: (4) Hot-swappable, Hitachi Deskstar™ 7200 RPM 3Gbit SATA drives each with up to 32MB cache
Interface: (1) 12Gbit mini-SAS
RAID Controller: 2-port PCIe x8 IOP with 512MB RAM and support for RAID levels 0,1,3,5 & 6
Size: (LxWxH) 8.25" x 4.9" x 6.5" / 210 x124 x 166 mm
Weight: 12.5 lbs / 5.7 kg

SYSTEM REQUIREMENTS:
G-Tech RAID Controller:
Mac Pro (Intel processor) or PC with available PCIe x8 slot,
Mac® OS X 10.3 +
Windows® Vista/XP/2000

G|SPEED eS PRO XL

High-Performance, Expandable Fail-Safe RAID Solutions for uncompressed HD and 2K Production

G-SPEED eS PRO XL from G-Tech is a cost-effective, expandable storage solution designed for content creation professionals working with multi-stream uncompressed HD and 2K workflows, and digital intermediate (DI) film applications. G-SPEED eS PRO XL easily expands by simply daisy-chaining 12- or 16-bay enclosures using locking mini-SAS cables. A total of (8) enclosures can be connected to the system for up to 256TB of incredibly fast online storage! It features the same IOP RAID controller used in the G-SPEED eS PRO system with (2) 12Gbit mini-SAS ports and performance over 800MB/sec. A single12-bay G-SPEED eS PRO XL can support real-time multi-stream 10-bit 1080/60i and 2K DPX video files. Adding high-performace storage has never been so simple - or cost effective.

The new G-Tech PCIe x8 IOP RAID controller supports RAID levels 0,1,3,5,6, and features (2) 12Gbit mini-SAS ports.

Up to 32TB

The G-SPEED eS PRO XL is easily expandable up to 256TB by simply daisy-chaining units using locking mini-SAS cables.

Adding high-performance storage has never been so simple - or cost effective.

---

3 YEAR WARRANTY

MAC   PC   mini-SAS

SD   HD   2K

SPECIFICATIONS:
Disk Drives: (12 or 16) Hot-swappable, Hitachi Deskstar™ 7200 RPM 3Gbit SATA drives each with up to 32MB cache
Size: (LxWxH)19.5" x 19" x 5.25"/495x483x133mm
Weight: 73 lbs/33 kg
RAID Controller: 2-port PCIe x8 IOP with 512MB RAM and support for RAID levels 0,1,3,5 & 6

SYSTEM REQUIREMENTS:
G-Tech RAID Controller:
Mac Pro (Intel processor) or PC with available PCIe x8 slot,
Mac® OS X 10.3 +
Windows® Vista/XP/2000

G SPEED FC/XL

High-Performance, SAN-Ready Storage Solutions for SD and HD

G-SPEED FC is the perfect solution for multi-stream, multi-user SD and uncompressed HD work flows - including real-time playback of 2K DPX sequences. G-SPEED FC features 4Gbit Fibre Channel connectivity and is available in a compact desktop enclosure with 6 drives (G-SPEED FC) and dual channel, 2U or 3U rackmount enclosures (G-SPEED FC XL12/XL16) with 12 or 16 drives. G-SPEED FC's built-in RAID controller can be configured as RAID 0, 1, 3, 5 or 6 via the front LCD panel or the easy to use web GUI. G-SPEED FC is "SAN Ready" and is an affordable and simple way to deploy a fail-safe SAN or add additional high performance RAID storage to existing XSan2, FibreJet or metaSAN networks. G-SPEED FC was designed to support the latest and greatest professional video editing equipment from AJA®, Avid®, Blackmagic Design®, Matrox® and more.

G-SPEED Web GUI

G-SPEED can be configured and monitored via the system's front panel LCD.

G-SPEED features hot-swappable Hitachi Deskstar™ 7200 RPM 3Gbit SATA disk drive modules each with up to 32MB of cache.

SAN READY! G-SPEED XL12/16 feature dual channel 4Gbit connectivity and utilize SFP to LC optical transceivers. The system connects to your workstation or network using thin optical cabling.

Up to 32TB

Ethernet Port

Dual, redundant 460W power supplies

MAC **PC** **Fibre Channel**

SD **HD** **2K**

SPECIFICATIONS (G-SPEED FC):
Disk Drives: (6) Hot-swappable, Hitachi 7200 RPM 3Gbit SATA drives with up to 32MB cache
Controller: Hardware RAID 0, 1, 3, 5, 6 and JBOD
Interface: 4Gbit Fibre Channel, SFP to LC
Size: (LxWxH) 11.3" x 6.5" x 13.6"/235 x 130 x 73mm
Weight: 35 lbs/16 kg

SPECIFICATIONS (G-SPEED FC XL12/16):
Disk Drives: (12 or 16) Hot-swappable, Hitachi 7200 RPM 3Gbit SATA drives with up to 32MB cache
Controller: Hardware RAID 0, 1, 3, 5, 6 and JBOD
Interface: Dual 4Gbit Fibre Channel, SFP to LC
Size: (LxWxH) 17.5" x 19.5" x 5.25"/446x495x133mm
Weight: 73 lbs/33 kg

SYSTEM REQUIREMENTS:
Fibre Channel equipped computer or switch, Ethernet port and Web Browser for GUI connection

G-Technology
by Hitachi

Performance. Style. Reliability.