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**TOSHIBA ANNOUNCES HYBRID DRIVE  
COMBINING NAND FLASH AND HARD DRIVE EXPERTISE**

*Hybrid Drive transforms user experience with extreme speed and capacity, giving a “best-of-both-worlds” approach to personal computing*

**IRVINE, Calif., September 25, 2012** – Toshiba’s Storage Products Business Unit of Toshiba America Electronic Components, Inc., a committed technology leader, today announced customer shipments of its first Hybrid Drive, the MQ01ABDH series. The series provides the ideal combination of performance found in solid state disks (SSDs) and the capacity and cost-effectiveness of hard disk drives (HDDs) with capacities up to 1 terabyte<sup>2</sup> (TB).

Developed to enhance the PC user experience, the new 2.5-inch 9.5mm high SATA Hybrid Drive series features “self-learning” caching algorithms that learn the system user’s data access patterns to optimize performance. The self-learning caching algorithms also manage which user data is stored to the NAND Flash for quick response to the near future access from the host, as well as how the data in the NAND Flash is updated based on intelligent access pattern learning.

“Hybrid Drives represents a significant innovative technology for Toshiba in combining the high-performance features of NAND Flash, with the key HDD attributes of large capacity and cost-effective data storage,” said Joel Hagberg, vice president of marketing at Toshiba’s Storage Business Unit. “As the only storage company which designs and manufactures HDDs as well as NAND flash, Toshiba is in a unique position to capitalize on these benefits because the expertise on how these technologies function resides within Toshiba.”

Toshiba’s MQ01ABDH series transforms the user experience with extreme responsiveness and breakthrough performance enabling faster system boot-up times and data access. Available in 1TB and 750GB<sup>1</sup> capacities, the MQ01ABDH 100 and MQ01ABDH 075 drives are ideally suited for ultrathin and standard-sized notebooks, gaming PCs, all-in-one and slimline desktops

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and other digital computing applications where a no-compromise approach to system performance and storage capacity is desired.

The MQ01ABDH series will be featured in various notebook PCs, with the first systems shipping in time for the holiday season.

For more information on Toshiba's line of industry-leading SSDs, HDDs and Hybrid Drives, visit [www.toshibastorage.com](http://www.toshibastorage.com). To connect with Toshiba Storage, visit the corporate blog at <http://storage.toshiba.com/corporateblog/> and follow [@ToshibaStorage](https://twitter.com/ToshibaStorage) on Twitter.

### Product Specifications:

Model Number	MQ1ABD075H	MQ01ABD100H
Maximum Capacity (Formatted) <sup>1</sup>	750GB	1TB
Number of platters	2	
Areal density (max)	858.1 Mb/mm <sup>2</sup> (553.6Gb/in <sup>2</sup> )	1153.4Mb/mm <sup>2</sup> (744.1Gb/in <sup>2</sup> )
Average seek time	12 ms	
Rotational speed	5400 RPM	
Buffer memory	32 MiB*	
NAND Flash Size	8GB	
Interface	Serial ATA 3.0 (ATA-8)	
Interface transfer rate	6 Gb/s	
External dimensions (WxDxH; mm)	69.85 mm x 100.0 mm x 9.5 mm	
Weight (g)	117 g (max)	
Shock resistance:		
Operating	3,920m/s <sup>2</sup> (400G) 2ms	
Non-operating	8,820m/s <sup>2</sup> (900G) 1ms	
Acoustics:		
Idle (average)	23 dB	
Seek (average)	24 dB	

\* One Mebibyte (1MiB) is calculated as 1,048,576 bytes.

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### About Toshiba Storage Products

Toshiba Corporation and its affiliates offer one-of-a-kind global storage solutions, offering hard disk drives (HDDs), solid state drives (SSDs) and NAND flash memories – technologies that drive a wide range of consumer electronics, computer and automotive applications, as well as enterprise solutions for the global marketplace. Toshiba is a leader in the development, design and manufacture of mobile, consumer and enterprise hard disk drives and solid state drives. In North America, the Storage Products Business Unit of Toshiba America Electronic Components, Inc. markets high-quality storage peripherals to original equipment manufacturers, original design manufacturers, value-added resellers, value-added dealers, systems integrators and distributors worldwide. Inherent in the Toshiba storage family are the high-quality engineering and

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manufacturing capabilities that have established Toshiba products as innovation leaders worldwide. For more information, visit [www.toshibastorage.com](http://www.toshibastorage.com)

### **About Toshiba Corp. and Toshiba America Electronic Components, Inc. (TAEC)**

Through proven commitment, lasting relationships and advanced, reliable electronic components, Toshiba enables its customers to create market-leading designs. Toshiba is the heartbeat within product breakthroughs from OEMs, ODMs, CMs, VARs, distributors and fabless chip companies worldwide. A committed electronic components leader, Toshiba designs and manufactures high-quality flash memory-based storage solutions, solid state drives (SSDs), hard disk drives (HDDs), discrete devices, advanced materials, medical tubes, custom SoCs/ASICs, imaging products, microcontrollers and wireless components that make possible today's leading smartphones, tablets, MP3 players, cameras, medical devices, automotive electronics, enterprise solutions and more.

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1. One Gigabyte (1GB) means  $10^9 = 1,000,000,000$  bytes using powers of 10. A computer operating system, however, reports storage capacity using powers of 2 for the definition of  $1GB = 2^{30} = 1,073,741,824$  bytes and therefore shows less storage capacity. Available storage capacity (including examples of various media files) will vary based on file size, formatting, settings, software and operating system, such as Microsoft Operating System and/or pre-installed software applications, or media content. Actual formatted capacity may vary.
2. One Terabyte (1TB) means  $10^{12} = 1,000,000,000,000$  bytes using powers of 10. A computer operating system, however, reports storage capacity using powers of 2 for the definition of  $1TB = 2^{40} = 1,099,511,627,776$  bytes and therefore shows less storage capacity. Available storage capacity (including examples of various media files) will vary based on file size, formatting, settings, software and operating system, such as Microsoft Operating System and/or pre-installed software applications, or media content. Actual formatted capacity may vary.