NETLIST INC
Form 10-K
February 28, 2007

UNITED STATES
SECURITIES AND EXCHANGE COMMISSION

Washington, D.C. 20549

FORM 10-K

(Mark One)

x ANNUAL REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934

For the fiscal year ended December 30, 2006

or

o TRANSITION REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934

For the transition period from to

Commission file number 001-33170

NETLIST, INC.

(Exact name of registrant as specified in its charter)

Delaware	**95-4812784**
State or other jurisdiction of incorporation or organization	(I.R.S. employer Identification No.)

475 Goddard, Irvine, CA 92618

(Address of principal executive offices) (Zip Code)

(949) 435-0025

(Registrant s telephone number, including area code)

Securities registered pursuant to Section 12(b) of the Act:

Title of each class	**Name of each exchange on which registered**
Common Stock, par value $0.001 per share	The NASDAQ Global Market

Securities registered pursuant to Section 12(g) of the Act:

None

(Title of class)

Indicate by check mark if the registrant is a well-known seasoned issuer, as defined in Rule 405 of the Securities Act. Yes o No x

Indicate by check mark if the registrant is required to file reports pursuant to Section 13 or Section 15(d) of the Act. Yes x No o

Indicate by check mark whether the registrant (1) has filed all reports required to be filed by Section 13 or 15(d) of the Securities Exchange Act of 1934 during the preceding 12 months (or for such shorter period that the registrant was required to file such reports), and (2) has been subject to such filing requirements for the past 90 days. Yes o No x

Indicate by check mark if disclosure of delinquent filers pursuant to Item 405 of Regulation S-K is not contained herein, and will not be contained, to the best of registrant s knowledge, in definitive proxy or information statements incorporated by reference in Part III of this Form 10-K or any amendment to this Form 10-K. o

Indicate by check mark whether the registrant is a large accelerated filer, an accelerated filer, or a non-accelerated filer. See definition of accelerated filer and large accelerated filer in Rule 12b-2 of the Exchange Act. (Check One):

Large Accelerated Filer o Accelerated Filer o Non-accelerated filer x

Indicate by check mark whether the registrant is a shell company (as defined in Rule 12b-2 of the Act). Yes o No x

The initial public offering of the registrant s shares of common stock, par value $0.001 per share, took place on November 30, 2006, and its common stock began trading on The NASDAQ Global Market on that same date. As such, the registrant s common equity was not publicly traded as of July 1, 2006, the last day of the registrant s most recently completed second fiscal quarter. The aggregate market value of the registrant s common stock held by non-affiliates, based on the closing price of the registrant s common stock as reported on The NASDAQ Global Market on February 15, 2007, was approximately $79.0 million. For purposes of this calculation, it has been assumed that all shares of the registrant s common stock held by directors, executive officers and shareholders beneficially owning five percent or more of the registrant s common stock are held by affiliates. The treatment of these persons as affiliates for purposes of this calculation is not conclusive as to whether such persons are, in fact, affiliates of the registrant.

The number of shares outstanding of each of the registrant s classes of common stock, as of the latest practicable date:

Common Stock, par value $0.001 per share

19,616,987 shares outstanding at February 15, 2007

DOCUMENTS INCORPORATED BY REFERENCE

Portions of the definitive Proxy Statement for the registrant s Annual Meeting of Stockholders for 2007 have been incorporated by reference into Part III of this Annual Report on Form 10-K.

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PART I

Item 1. Business of Netlist, Inc.

Overview

We design and manufacture high performance memory subsystems. We sell our subsystems to original equipment manufacturers, or OEMs, in the server, high performance computing and communications markets. We target applications within these markets in which memory plays a key role in enabling overall system performance requirements. Our memory subsystems are incorporated into multiple platforms at IBM, Dell, Gateway and Hewlett-Packard and other OEMs. Our subsystems are designed and manufactured to specifically address the high-performance needs of these customers systems.

We collaborate with our OEM customers in the earliest stages of their new product design cycles. This collaboration provides us with unique insight into the OEM s system architecture and performance requirements and expands our existing systems expertise. In addition, we have developed a portfolio of proprietary technologies and design techniques to meet OEM needs, including efficient planar design, alternative packaging techniques and custom semiconductor logic. As a result, we are able to design application-specific memory subsystems with optimal combinations of high memory density, small form factor, high signal integrity, effective heat dissipation and low cost per bit. We also offer our OEM customers flexible order fulfillment and rapid turnaround times.

We were incorporated in Delaware in June 2000 and commenced operations in September 2000.

Our Solution

We provide high performance memory subsystems to the server, high performance computing and communications markets. We utilize our innovative and proprietary technology, as well as our extensive systems expertise, to bridge the gap between industry standard approaches and the requirements of complex OEM systems. Our application-specific solutions provide customers with the following key benefits:

Highly Differentiated Memory Solutions Through Deep Customer Engagement. We work closely with our OEM customers, from the earliest stages of new product definition through the ramp up to mass production, to develop and deliver application-specific memory subsystems which address the full range of system architecture and performance requirements. Our close, collaborative relationship with our OEM customers give us early insight both into their current needs and into future technology trends. In addition, our in-depth systems expertise, coupled with our ability to customize solutions, enables our OEM customers to offer differentiated products that feature high levels of performance while improving reliability and, in some cases, reducing cost.

High Performance Through Proprietary Technologies and Design Techniques. We have developed a portfolio of proprietary technologies and design techniques to achieve optimal electronic signal strength and integrity, high memory density and improved heat dissipation. For example, our innovative printed circuit board, or PCB, designs enhance electronic signal integrity, allowing our customers to design and market products that operate at the highest commercially available speeds, such as the DDR2 specification, which is designed to operate at speeds up to 800 MHz. Another technique we utilize is to embed passive devices within the PCB, thereby freeing valuable board space to reduce form factors and improve signal integrity. Our solutions also address the system-level thermal issues encountered at high operating speeds via such innovations as planar designs and proprietary heat dissipation technologies that allow us to minimize heat concentrations within the system.

High Quality and Reliability. We perform a full range of product reliability testing and share the results with our customers on an on-going basis. We use advanced design tools to accurately simulate the

system performance targets of our customers and to ensure that our products comply with our customers specifications. All of our memory subsystems undergo both functional and system burn-in testing prior to delivery to our customers. We complement our test capabilities with advanced imaging technology to inspect the quality of our micro ball grid array, or microBGA, assemblies. We believe that our testing procedures significantly enhance the quality and reliability of our products.

Rapid Order Fulfillment Capability. We operate our manufacturing facility in a manner that maximizes our ability to meet changing customer demand. Our turn-around times are typically one week or less, and in some cases as few as two days, which allows us to match unforeseen customer demand and to provide our OEM customers with timely access to products.

Cost-Effective Memory Solutions. We provide high performance memory subsystems at what we believe to be the lowest cost per bit for many applications. Our portfolio of proprietary technologies and design techniques allow us to use cost-effective, current generation dynamic random access memory integrated circuits, or DRAM ICs, and in some cases avoid additional costs from chip-stacking to significantly lower the cost of our memory subsystems. Additionally, the superior thermal characteristics and electronic signal integrity of our subsystems helps OEMs reduce costs through simplified system design.

Our Products

We are currently designing, manufacturing and selling memory subsystems with speeds up to 667 MHz, densities up to 8 gigabytes, and form factors as small as 0.72 inches, or 18.3 millimeters, in height. Our products for the server market address a broad variety of memory capacity and configuration requirements, as well as a broad range of server types, including tower, rack-mounted, and blade servers. Our current products primarily support double data rate, or DDR, and DDR2, DRAM technologies.

The following table lists representative products from our major families of high performance memory subsystems:

DDR2 Registered Dual In-line Memory Module

Density	Height	Speed (MHz)	Applications
256MB	30mm	400/533	RAID Memory
512MB	30mm	400/533/667	Blade Servers
512MB	18.3mm	400/533/667	Blade Servers
1GB	18.3mm	400/533/667	Blade Servers
1GB	30mm	400/533/667	1U, 2U+ Servers, Networking
2GB	30mm	400/533/667	1U, 2U+ Servers, Networking
2GB	18.3mm	400/533/667	Blade Servers, Networking
4GB	30mm	400/533/667	1U, 2U+ Servers, Workstations
4GB	18.3mm	400/533	Blade Servers

DDR2 Fully Buffered Dual In-line Memory Module

Density	Height	Speed (MHz)	Applications
1GB	30mm	400/533/667	1U, 2U+ Servers, Workstations
2GB	30mm	400/533/667	1U, 2U+ Servers, Workstations
4GB	30mm	400/533	1U, 2U+ Servers, Workstations

DDR2 Unbuffered Dual In-line Memory Module

Density	Height	Speed (MHz)	Applications
256MB	30mm	400/533/667	Workstations
512MB	30mm	400/533/667	Workstations
1GB	30mm	400/533/667	Workstations
2GB	30mm	400/533	Workstations

DDR2 Small Outline Dual In-line Memory Module

Density	Height	Speed (MHz)	Applications
1GB	30mm	400/533/667	Notebooks, Networking
2GB			