



## **Applied Materials Achieves 300mm Endura PVD Milestone with 300 Systems Shipped**

October 12, 2004

SANTA CLARA, Calif.--(BUSINESS WIRE)--Oct. 12, 2004--Applied Materials, Inc. (Nasdaq:AMAT) continues its leadership in PVD (physical vapor deposition) technology with the shipment of its 300th Applied Endura(R) PVD system for advanced 300mm wafer processing. The Endura is the industry's benchmark system for all types of PVD applications, and is used by every 300mm fab worldwide -- from leading-edge copper logic and microprocessor fabs to aluminum-based high-speed memory chip manufacturers.

"The Applied Endura PVD system's advanced technology and cost-effectiveness maximize our customers' profitability for the critical PVD steps while providing multi-generational capabilities ranging from today's 90nm production to 45nm and beyond chip development," said Dr. Farhad Moghadam, senior vice president and general manager of Applied Materials' Thin Films Group. "Our new Endura2(TM) platform has generated tremendous customer acceptance, dramatically lowering operating costs, while maintaining all of the key Endura processes. The Endura 300mm system is well-positioned to extend Applied's PVD leadership far into the future."

The Applied Endura PVD 300mm system offers the industry's widest array of metallization applications. The Applied Endura CuBS(TM) system is used by every copper chip maker to deposit the critical sequence of TaN barrier and copper seed layers, where the quality and precision of these films play a key role in determining the speed and performance of the finished chip. The Endura PVD is also the industry's leading system for conductor and barrier applications in the latest memory devices, for transistor and contact-level metallization layers, and under bump and bondpad applications.

Building on the strength of over 3,500 Endura systems sold for all wafer sizes, in February, Applied Materials introduced the Endura2 platform, a re-design of its renowned Endura system, featuring greater than 20% improvement in serviceability and overall equipment efficiency for 300mm high-volume manufacturing. Endura2 processes have already been qualified for 90nm and 65nm device nodes and are in development for 45nm, where its exceptional mechanical defect performance (less than 0.04 defects/cm<sup>2</sup> at greater than 0.09micron) exceeds requirements. The Endura2 is already well-accepted by chip manufacturers with systems in production at 10 major customer sites for all PVD applications.

Applied Materials, Inc. (Nasdaq:AMAT) is the largest supplier of equipment and services to the global semiconductor industry. Applied Materials' web site is [www.appliedmaterials.com](http://www.appliedmaterials.com).

CONTACT: Applied Materials, Inc.  
Betty Newboe, 408-563-0647 (editorial/media)  
Paul Bowman, 408-563-1698 (financial community)

SOURCE: Applied Materials, Inc.