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## PRESS RELEASE

### FOR IMMEDIATE RELEASE

## VYCON Receives Patent by the United States Patent and Trademark Office for its Energy Storage Flywheel.

**Cerritos, California, USA – August 2005** – VYCON Inc. has been awarded a patent on its energy storage flywheel by the United States Patent and Trademark Office, U.S. Patent #6,897,587. The patent titled “Energy Storage Flywheel with Minimum Power Magnetic Bearings and Motor/Generator” covers the VYCON flywheel energy storage system. Key components identified in the patent are a combination of magnetic bearing technologies, high speed permanent magnet motor/generation technologies, and an aerospace grade high-performance steel flywheel construction for energy storage. The VYCON flywheel patent may be viewed at [www.uspto.gov](http://www.uspto.gov) via their patents search directory.

The flywheel magnetic bearing system described includes a passive axis to support the rotor axially, thereby minimizing input power for the magnetic bearings to maximize bearing efficiency, as magnetic bearings have minimal rotating losses. This additional passive axis adds to the significant benefits already offered by 5-axis magnetic bearings over conventional mechanical ball bearings including minimal maintenance, high reliability, and smart controls. The permanent magnet motor/generator rotor is unique in that it is rigidly attached to the hub to form a stiff rotor assembly, allowing the high speed system to operate below its first bending mode for stable and robust operation. A metal sleeve over the magnet retains the magnet structure, preventing any possible damage to the magnetic source of the motor/generator for maximum reliability. In addition to the minimal losses offered by this type of motor/generator topology, the permanent magnet configuration with its passive magnetic field source is always available and does not require external power or control to excite it for providing output power; it is available immediately and reliably in support of the system.

This patent is the first of a number of patents in process at VYCON to protect the Company’s proprietary technology. “This patent issuance provides recognition of our unique flywheel technology, and the utilization of this technology demonstrates its phenomenal viability in the various energy storage markets today” stated VYCON’s Chief Technical Officer (CTO) Patrick McMullen. VYCON maintains a number of licenses to existing patents and software that encompass many aspects of the flywheel system. VYCON continues to develop new technologies as it strives to offer the most advanced products to better serve its customers.

**About VYCON, Inc.**

VYCON, Inc. is a manufacturer of flywheel based energy storage systems and was established in 2002 to address the needs and requirements of the power quality market. Specifically, VYCON serves both low cycle markets such as UPS industry for battery hardening, backup power/genset ride through, glitch protection and high cycle markets such as the rail and wind power industries for voltage sag, peak power shaving, and energy savings. VYCON's products provide a cost effective, reliable solution for a variety of applications through energy storage flywheel systems. For more information about VYCON, please visit the company's website at [www.vyconenergy.com](http://www.vyconenergy.com).

**About United States Patent and Trademark Office**

The United States Patent and Trademark Office is a federal agency in the Department of Commerce that promotes the progress of science and the useful arts by securing for limited times to inventors the exclusive right to their respective discoveries per Article 1, Section 8 of the United States Constitution. Through the issuance of patents, the office encourages technological advancements by providing incentives to invent, invest in, and disclose new technology worldwide.

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