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## **BIONANOMATRIX AWARDED NEW NIH GRANT TO SPEED DEVELOPMENT OF THIRD GENERATION NANOSCALE WHOLE GENOME ANALYZER**

***--Second NIH Grant Awarded to BioNanomatrix This Year to Advance  
Breakthrough Nanoscale Single Molecule Imaging Technology—  
-- Recognizes Revolutionary Potential of Ultra-High Resolution Analysis  
Platform Being Developed for Biomedical Research and New Drug R&D--***

**Philadelphia, PA, September 27, 2006** – BioNanomatrix LLC, an emerging company developing a breakthrough nanoscale whole genome imaging and analytic platform, today announced receipt of a new grant from the National Human Genome Research Institute of the U.S. National Institutes of Health (NIH). The two-year \$397,750 Small Business Investment Research (SBIR) grant was awarded under the NIH BioEngineering Nanotechnology Initiative, an interdisciplinary, multi-institutes consortium with the stated goal of supporting the development of nanotechnologies critical for enabling essential breakthroughs that may have tremendous potential for affecting biomedicine.

“We are delighted that the NIH has again recognized the potential of our revolutionary whole genome analysis technology by awarding us this second major grant explicitly intended to support the development and commercialization of our integrated nanofluidics platform,” said Michael Boyce-Jacino, Ph.D., president and CEO of BioNanomatrix. “This support will enable us to accelerate the development of our platform, which we believe represents a breakthrough in genomic analysis capabilities with broad utility and large commercial potential.”

BioNanomatrix is developing pioneering integrated systems that enable nanoscale single molecule identification and analysis of the entire genome, delivering single molecule sensitivity with haplotyping capability in a highly parallel format. The company’s patented analytic platform based on this breakthrough technology provides ultra-high resolution analyses of DNA, RNA and other proteins that are more rapid, comprehensive and cost effective than currently available approaches.

“The nanochannel technology we are developing with this funding will permit direct visualization and analysis of megabase fragments of DNA at the single molecule level with high feature resolution, allowing researchers to visualize mutations, haplotypes, epigenetic features and even DNA-protein binding events,” said Han Cao, Ph.D., chief scientific officer of BioNanomatrix and the principal investigator on this grant. “We believe our technology represents a major advance beyond what is available today, and we are pleased that this new grant will help speed its development.”

The ability of the BioNanomatrix technology to deliver single molecule sensitivity in a highly parallel format with minimal processing also significantly reduces the cost and time needed for the extensive data and integrative analyses that have hindered widespread use of whole genome studies to date. The BioNanomatrix technology platform is expected to have broad application in systems biology, pathogen detection, drug development and clinical research.

### **About BioNanomatrix**

BioNanomatrix is an emerging company developing its breakthrough nanoscale whole genome imaging and analytic platform for applications in clinical genetics, cancer diagnostics and other biomedical applications. The company is applying its expertise in nanochips, nanodevices and nanosystems to develop its patented technology platform with capabilities to provide fast, comprehensive, and low-cost analysis of genomic, epigenomic and proteomic information with sensitivity at the single cell/single molecule level. BioNanomatrix' patented technologies are exclusively licensed from Princeton University. Founded in October 2003, the company is headquartered in Philadelphia, PA, with its research and design laboratories co-located at Princeton University. For more information, visit: [www.BioNanomatrix.com](http://www.BioNanomatrix.com).