## VisiGen Receives Patents for Real-Time Single-Molecule DNA Sequencing



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Industry: Biotech

Press Release Summary: VisiGen Biotechnologies, Inc., was awarded US Patent No. 7,329,492, "Methods for Real-time Single Molecule Sequence Determination", in addition to European and Australian counterparts.

Press Release Body: HOUSTON, TX - February 15, 2008 - VisiGen



Biotechnologies, Inc., was awarded US **Patent** No. 7,329,492, "Methods Real-time Single Molecule Sequence Determination", European and Australian counterparts have also

issued. **VisiGen's President, Dr. Susan Hardin, Ph.D.** said, "We have the real path to the \$1,000 human genome." **VisiGen**'s

sequencing methodology can be used to sequence the genome of a human or any other life form.

**VisiGen's DNA sequencing machines** will enable low cost comprehensive genome analysis such as a one day, \$1,000 human genome. VisiGen's patented technology is scalable. **VisiGen's nanosequencing machines** are designed to monitor massively parallel arrays to produce a **DNA sequencing platform** that will be capable of collecting **DNA sequence data** at the rate of 50 million bases per second or greater. VisiGen plans to offer a DNA sequencing service in late 2009 and to sell **DNA sequencing machines** and reagents 18 to 24 months later.

VisiGen has bioengineered polymerases and nucleotides to act together as direct molecular sensors of **DNA sequence information** during **DNA replication**. **VisiGen**'s novel platform uses singlemolecule DNA detection, fluorescent molecule chemistry, computational biochemistry, and biomolecule engineering purification. VisiGen's method tags the terminal phosphate of a nucleotide with a fluorophore that is naturally released during nucleotide insertion into the growing **DNA strand**, thereby enabling a non-cyclical approach to **DNA sequencing.** 

"We believe that our newly issued patent pre-dates certain other sequencing methodologies based on the use of terminal phosphate labeled nucleotides," Dr. Hardin said, "so not only do we have to be mindful of the medical and pharmaceutical implications of our technology, but we must also be mindful of our own patent position in this fast developing field."

About VisiGen Biotechnologies VisiGen is a privately owned company located in Houston, Texas. VisiGen was founded in 2000 by the inventors of this revolutionary technology: Drs. Susan Hardin, Xiaolian Gao, Jim Briggs, Richard Willson, and Shiao-Chun (David) Tu. VisiGen is a spin-off from the University of Houston.

The company has received undisclosed investments from Applied Biosystems and SeqWright, and also is supported by grants from the Defense Advanced Research Projects Agency, the National Human Genome Research Institute, and the National Institute of General Medical Sciences.

**VisiGen** is a contender for the **Archon X-Prize for Genomics**, which will award a \$10 million prize to the first entrant to sequence 100 human genomes in 10 days for no more than \$10,000 per genome.

Web Site: <a href="http://visigenbio.com">http://visigenbio.com</a>

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