



EPA Extends Asterand's Role in ToxCast™ Program

BioMAP® predictive models to screen compounds for environmental and human health impact

South San Francisco, CA, USA -- Asterand plc (LSE: ATD), a leading human-based solutions provider to pharmaceutical companies engaged in drug discovery research, today announced that the United States Environmental Protection Agency (EPA) has extended its Phase II funding commitment to Asterand's subsidiary BioSeek LLC under the agency's ToxCast™ screening program. This extension is for an additional \$1.5 million, to profile the biological properties of chemical compounds, and is in addition to the \$1.7 million commitment for Phase II announced in June, 2009. BioSeek remains eligible to participate in further phases of the program and its eventual implementation.

The current Phase II project expands upon the successful completion of the proof of concept Phase I study, which began in 2007 with BioSeek, Inc., prior to its merger with Asterand. The Phase I program utilized the unique BioMAP® Systems to assess the potential of in vitro human primary cell-based assays to predict the impact of environmental chemicals on human health. Under the Phase II project, approximately 750 compounds and nanomaterials will be screened. The long-term goal of the ToxCast™ program is to identify in vitro assays that can predict the toxicity of chemical compounds and other materials in humans and animals.

Asterand's CEO, Martyn Coombs, commented:

"We view the EPA's efforts to develop improved methods of predicting the potential health risks of environmental chemicals through its ToxCast™ program as being of vital importance. The BioMAP® System offers a unique platform to analyze chemicals and predict potentially adverse toxicology and help prioritize further safety tests. We are delighted that the EPA has chosen to expand its contract with BioSeek and look forward to continuing our support of this important program."

BioMAP® Systems, a biological compound profiling and drug discovery platform is Asterand's newest offering through the recent acquisition of BioSeek LLC. BioMAP® screening platform uses complex human primary cell cultures to replicate the intricate cell and pathway interactions observed in vivo, and in this way provides meaningful in vitro biology data which directly relate to human pharmacology and toxicology.

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About ASTERAND

Asterand plc is a leading supplier of high quality human tissue and tissue-based services. Our comprehensive approach to human tissue and research services offers pharmaceutical, biotech and diagnostic companies the unique opportunity to have one Company meet all of their human biomaterial needs along the continuum of drug discovery and development. Our mission is to accelerate target discovery and compound validation and enable pharmaceutical and biotechnology companies to take safer and more effective drugs into the market.

For more information on Asterand or BioSeek, go to www.asterand.com.

About the EPA ToxCast™ Program

The U.S. EPA ToxCast™ Program is developing approaches to predict chemical toxicity using data from high-throughput and high content in vitro assays. The goal of ToxCast™ is to develop and verify "toxicity signatures," which are algorithms using in vitro and in silico data to predict in vivo toxicities. Phase I of ToxCast™ has produced data from >300 chemicals, ~500 in vitro assays and ~100 in vivo endpoints, providing a powerful dataset for evaluating the applicability of various analytic approaches for predicting the potential for an adverse response. The initial results from Phase I of the ToxCast™ program were presented on May 14-15, 2009 at the First ToxCast™ Data Analysis Summit held in Research Triangle Park, NC. Phase II of the ToxCast™ program will expand on and verify the ability of this approach to predict potential human toxicity. In Phase III, ToxCast™ will expand the list to thousands of environmental chemicals, delivering an affordable, science-based system for decision-makers to prioritize chemicals for more detailed toxicological evaluations.