



Astex Technology acquires novel robotic technology for high throughput x-ray crystallography.

Cambridge, UK, 27th June 2001 - **Astex Technology**, the structure-based drug discovery company, today announced that it will receive the first ACTOR (automated crystal transport, orientation and retrieval) system from Rigaku/MSC, Inc (The Woodlands, TX). The ACTOR automated crystal mounting and data collection technology will dramatically increase the throughput of Astex's x-ray crystallography for rapid protein structure determination and drug discovery.

The ACTOR system, manufactured and marketed by Rigaku/MSC in collaboration with Oceaneering Space Systems (Houston, TX) increases the efficiency of the protein structure determination process by automating steps traditionally carried out by hand. It is estimated that incorporation of the ACTOR technology will increase the throughput of x-ray crystallography by 3-5 times compared to manual systems.

Harren Jhoti, PhD, Founder and Chief Scientific Officer of Astex, commented, "Astex is the first company to acquire this powerful new automated system. We anticipate that the use of ACTOR, in combination with the Jupiter CCD for data collection, also from Rigaku/MSC, will significantly increase the speed of our high-throughput approach to 3D protein structure determination and drug discovery."

Obtaining information about a protein's 3D structure typically requires manual mounting of crystals of the protein into a beam of x-rays. The x-rays bombard the crystal and are scattered in a specific pattern, which is stored and analysed using data collection software. The crystal is then removed and a new crystal sample mounted. The ACTOR system applies robotics and motorization of the crystal mounting process, taking crystals from cold-storage, into the X-ray beam and back without the need for manual intervention. The system can run continuously and maximizes the use of the X-ray source by changing crystals as soon as the data have been collected.

Paul Swepston, PhD, President of Rigaku/MSC commented, "Rigaku/MSC, Inc and Rigaku Corporation (Tokyo, Japan) is committed to developing and commercializing high throughput products for the protein crystallographic market. The ACTOR robot system is the first in a series of products that we will introduce this year for the purpose of improving the speed of crystallographic research. We are pleased that Astex Technology shares our vision for improving

the speed of crystallographic tools so that protein crystallography can become a much more important aspect of the drug discovery process.”

Astex Technology is a structure-based drug discovery company pioneering the use of high throughput X-ray crystallography (HTX™) technology for the rapid identification of novel drug candidates. HTX™ technology is part of an integrated drug discovery platform that includes cutting-edge technologies covering all aspects of structure-based research, including protein production, crystallization, structure determination, bioinformatics and computational and medicinal chemistry. Astex is using this drug discovery platform to identify novel lead compounds and has established strategic collaborations with major pharmaceutical companies. Astex was formed by leading industrial and academic scientists and is based at the Cambridge Science Park, UK.

Contact Details:

Astex Technology
Dr Harren Jhoti
Founder and Chief Scientific Officer
Email: h.jhoti@astex-technology.com

Dr Emma Southern
Communications Manager
Email: e.southern@astex-technology.com
Tel: +44 (0) 1223 226200
Web: www.astex-technology.com

Noonan Russo Ltd
Fiona Beckman
Email: fiona.beckman@noonanrusso.co.uk
Tel: +44 (0) 207 726 4452
Web: www.noonanrusso.com