

Physiomics plc  
The Magdalen Centre  
The Oxford Science Park  
Robert Robinson Avenue  
Oxford  
OX4 4GA  
UK

Tel 01865 784980  
Fax 08701 671931

31 January 2012

Physiomics plc

(the “Company” or “Physiomics”)

**Physiomics to enter new therapeutic area with appointment of SAB member**

Physiomics plc (AIM: PYC), the Oxford, UK-based systems biology company, is pleased to announce its intention to increase the scope of its offering through the development of a new modelling service to predict the cardiac toxicity of drugs. The Directors believe that this new service will be of particular interest to biotechnology companies looking to streamline their drug discovery programmes and improve the success rates of potential drugs and drug combinations. Work on the new modelling service will commence immediately, using key calibration data from lab-based studies.

Potential drugs are now routinely screened for their toxicity in lab-based experiments, but the work is both costly and time-consuming. Nature Review Drug Discovery (2004) reports that clinical safety or toxicology problems cause over one-third of drug discovery failures. Furthermore, The Toxicologist (2010) reports that the most damaging of such failures to patients and the most costly to the industry are those that occur post-approval requiring withdrawal from the market. Cardiovascular toxicology is the single largest cause of this.

During 2012 Physiomics intends to develop, validate and provide as a service, computationally based tools that will integrate the predictive value of a range of early stage lab-based studies, to improve the quality of drug discovery decision making. Although this represents a new area of physiological application for Physiomics, it will use the simulation expertise the Company has developed over a decade.

In order to facilitate this, Physiomics also announces the appointment of Dr Jonathan Swinton, who today joins the Company’s Scientific Advisory Board. Dr Swinton will be working closely with the team to develop this new service.

Dr Swinton trained as a mathematician and researched computational models of biological processes at the universities of Oxford, Cambridge and London. Since 2001, he has worked in pharmaceutical companies large and small. Most recently he was responsible, at AstraZeneca, for the build of its systems biology capability. He is currently a director of the company Deodands Ltd, which provides consultancy in computational biology to a range of commercial and funding body clients. He is a Visiting Professor of Computational Biology at Oxford University.

Physiomics plc

Registered in England and Wales Number 4225086

Registered Office: The Magdalen Centre, Oxford Science Park, Oxford OX4 4GA, UK

Dr Mark Chadwick, CEO of Physiomics, commented: “We are delighted to be working with Dr Swinton to develop this new technology. This development represents a key step in our previously stated strategy to broaden our services beyond oncology and into new therapeutic areas. We look forward to launching the new service in due course.”

Jonathan Swinton, Deodands Ltd, commented: “These are exciting times for systems biology in drug discovery as we see an increasing number of concrete examples of physiological modelling speeding and simplifying drug discovery, reducing animal usage and ultimately saving money. In my judgement cardiac toxicity prediction is one of the most valuable problems current modelling technology can address. I believe Physiomics has one of the best track records in the industry of translating systems biology into projects of value to its clients, and I am pleased to join its Scientific Advisory Board to help offer a timely new service.”

Enquiries:

**Physiomics plc**

Dr Mark Chadwick, CEO

+44 (0)1865 784 980

**WH Ireland Limited (broker/nomad)**

Katy Mitchell

+44 (0) 161 832 2174

**Media enquiries:**

**The Communications Portfolio Ltd**

Ariane Comstive / Caolan Mahon +44 (0) 20 7536 2028 / 2029

ariane.comstive@communications-portfolio.co.uk

**About Physiomics plc**

Physiomics (AIM:PYC) is a computational systems biology services company applying simulations of cell behaviour to drug development to reduce the high attrition rates of clinical trials. 80-90 per cent of all clinical drug candidates fail to reach the market and estimates show that an overall ten per cent improvement in success rates could reduce the cost of one drug's development by as much as \$242 million, from the current estimate of around \$800 million<sup>1</sup>.

Physiomics develops computational systems biology models to predict and understand cancer drug efficacy from pre-clinical research to clinical development. Physiomics has created detailed mathematical models incorporating the most important molecular events taking place during the human cell cycle and apoptosis processes. The company's SystemCell® technology enables the simulation of populations of "virtual cells". The company has also developed a "Virtual Tumour" model to simulate the effect of anti-cancer drugs on tumour growth. The models are used to optimise compound design and to design drug schedules and combination therapies.

Physiomics, based in Oxford, UK, was founded in 2001, and floated on AIM in 2004. For further information, please visit [www.physiomics-plc.com](http://www.physiomics-plc.com)

SystemCell® is a registered trademark of Physiomics plc

<sup>1</sup>Tufts Centre Impact Report 2002