December 2007

Volume 12 · Numbers 23/24 pp. 995–1086





Cover Story

The keynote review in this issue of Drug Discovery Today, by Esther Schmid and Dennis Smith, discusses how, despite very significant investment into research into treatments for disease, in some areas, at least, relatively little, or no, progress has been made. They discuss that this lack of progress is not just in neglected "third world" diseases, but many of the major diseases of the developed world are also poorly served. The article investigates the reasons underlying unmet medical need and how addressing these is a critical societal obligation.

REVIEWS

KEYNOTE

998 Pharmaceutical R&D in the spotlight: why is there still unmet medical need?

Esther F. Schmid and Dennis A. Smith

GENE TO SCREEN

1007 Unfinished business: target-based drug discovery

David Brown

INFORMATICS

1013 Multi-dimensional QSAR in drug discovery

Markus A. Lill

POST SCREEN

1018 The role of mechanism-based pharmacokinetic-pharmacodynamic (PK-PD) modelling in translational research of biologics

Balaji M. Agoram, Steven W. Martin and Piet H. van der Graaf

1025 One target – multiple indications: a call for an integrated common mechanisms strategy

Ulrich Nielsch, Stefan Schäfer, Hanno Wild and Andreas Busch

1032 Integration of fragment screening and library design

Gregg Siegal, Eiso AB and Jan Schultz

- 1040 Combating cardiovascular disease with angiogenic therapy

 Jack Jacobs
- 1046 An overview of automated systems relevant in pharmaceutical salt screening

Lokesh Kumar, Aeshna Amin and Arvind K. Bansal

1054 Pharmacogenetics of EGFR and VEGF inhibition

Jan Pander, Hans Gelderblom and Henk-Jan Guchelaar

1061 Status of terpenes as skin penetration enhancers

Mohammed Aqil, Abdul Ahad, Yasmin Sultana and Asgar Ali

1068 Solid dispersions as strategy to improve oral bioavailability of poor water soluble drugs

Teófilo Vasconcelos, Bruno Sarmento and Paulo Costa

1076 The highly permeable blood-brain barrier: an evaluation of current opinions about brain uptake capacity

Urban Fagerholm