

Driving Efficiency in Drug Discovery

70% of molecules fail discovery & preclinical development

90% of drugs fail clinical development

10-15 YEARS

Average time of drug discovery & development

\$160M-\$2B+

Total cost of drug discovery & development

TACKLE CHALLENGES WITH EFFICIENT TECHNIQUES

- ✓ Develop project-specific screening cascades
- ✓ Apply advanced early *in silico* techniques
- ✓ Invest in automation & analytics
- ✓ Screen compounds early in drug discovery
- ✓ Use laboratory information management systems (LIMS)
- ✓ Collaborate with expert CROs

CYPROTEX'S EXPERIENCE IN ADME-TOX SCREENING



20 YEARS
of Experience in
ADME-Tox Screening



80K+
Compounds
Tested Annually



3K+
Protocols
Used Annually



5.8 M
Samples
Analysed Annually

REASONS FOR INEFFICIENCIES

- ✗ Costly testing strategies
- ✗ Sequential rather than parallel optimisation
- ✗ Lack of expertise
- ✗ High ADME-Tox attrition rates

*In order to avoid costly late-stage delays and/or failure and increase the chances of success, the potential liabilities of new drugs should be identified earlier. **ADME** (absorption, distribution metabolism and excretion) is an important part of the screening cascade which ensures that concentrations in the body are at both safe and efficacious levels. With the development of more predictive cell-based models, toxicity can now also be included in these early testing cascades (**ADME-Tox**).*

ADME-TOX

ADVANTAGES OF ADME-TOX SCREENING AT CYPROTEX

- + Rapid turnaround
- + Scale-up according to demand
- + Flexibility in assays
- + Reduced risk of failure

"Speed and quality are the most critical aspects of the drug discovery and development process, influencing a drug's anticipated commercial value and success. We have built an impressively efficient facility through our knowledge of ADME-Tox, our investment in automation and a bespoke LIMS, and by listening to our customer needs. Through this platform, we are able to deliver robust, high quality data which meets the fast-paced demands of our client's decision-making cycles."

Laura Hinton PhD,
Director of Scientific Operations,
Cyprotex

Cyprotex is an Evotec company that specialises in *in silico* and *in vitro* ADME-Tox. Cyprotex's clients span a range of different industries. To find out more, visit www.cyprotex.com

Want to benefit from Cyprotex's experience in *in silico* and *in vitro* ADME-Tox and boost your drug discovery success?
Get in touch with the experts here: enquiries@cyprotex.com

Sources

ASPE, U.S. Department of Health & Human Services
Drug Discovery World
Nature Reviews
Cyprotex
Evotec