Leveraging Regulations to support Product Development and Commercialisation

Dr Dianne Jackson-Matthews

ERA consulting

ERA Consulting und Pharmaberatungs GmbH	Postfach 1249 D-29652 Walsrode, Germany	Tel.: +49-5161-9890-0 Fax: +49-5161-9890-18
ERA Consulting (UK) Ltd	London Gas Museum Twelvetrees Crescent London E3 3JH, UK	Tel.: +44-20-7510-0200 Fax: +44-20-7510-0218
ERA Consulting (USA) LLC	741 3rd Street NE Washington, DC 20002, USA	Tel.: +1-202-234-9378 Fax: +1-202-237-2172
ERA Consulting (Australia) Pty Ltd	Level 3, 88 Jephson Street Toowong, QLD 4066, Australia	Tel.: +61-7-3331-3900 Fax: +61-7-3870-0048

Introduction

1. Global regulatory strategy – why and when?
2. Regulatory intelligence?
3. What's new in Australia?
4. Fundamental issues in pre-clinical development
5. Strategies to reduce risk when approaching clinical trials

1. Developing a global regulatory strategy

- Understanding the regulatory basis for the product
- Validation of the regulatory strategy through scientific advice meetings with regulatory agencies
- Cost-effective and shorter routes to approval
  - Orphan designation and accelerated/rapid approvals
- Documentation system
  - Compatible with international expectations

Regulatory Basics

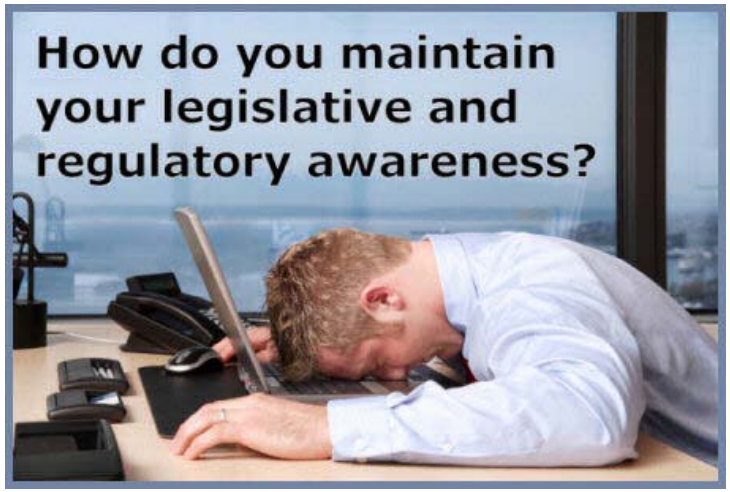
- Define the target indication(s)
- Plan product development for each stage
  - Manufacturing and testing (CMC) requirements
  - Nonclinical testing strategy
  - Clinical studies (beyond the ‘intended stage’)
- Compile regulatory ‘knowledge base’
  - Regulatory requirements (regulations = laws)
  - Guidelines (including drafts)
- Avoid waste and backward steps!!

Validation of a Regulatory Strategy

- Consultations with regulatory agencies can validate (or amend) a strategy
  - US FDA has scheme for meetings ('pre-IND' etc)
  - European scientific advice (European Medicines Agency in London)
  - TGA consultations
- Minutes of scientific advice meetings serve to document progress and future requirements
  - Significant value in due diligence discussions!!

2. Regulatory intelligence – what and why?

- **Regulatory intelligence** = coordinated application of current knowledge to gain a competitive advantage for product development and approval
- Understanding the regulatory status on a particular issue, such as the US *versus* European position
  - Pro-active approach, allowing issues to be anticipated



3. What's new in Australia?

- **Biologicals Framework** = DOB midnight May 31 2011
- "Biological" = product containing human cells or tissues, used for a medical purpose (long definition in the Act)
  - Autologous and allogeneic products not distinguished, *per se*
- New group of therapeutic goods, distinct from medicines and medical devices
- Excludes recombinant proteins – i.e. **diverges** from the US and European "biologics" classifications

What else is new in Australia?

- **TGA's Streamlined Submissions** = new dossier evaluation process for prescription medicines since November 1 2010
- Enjoying a "teething period".....
- Captures novel products (e.g. new small molecule drugs or therapeutic proteins such as monoclonal antibodies), biosimilar products (e.g. cytokines and monoclonal antibodies), as well as new generic drugs

4. Fundamental issues in pre-clinical development

- Common question:
  - *What pre-clinical do we need to proceed to the next stage of clinical development?*
- Better question:
  - ***What is the most efficient pre-clinical approach to support clinical development?***

For example:

- For a first study in man (single-dose), a 2-week toxicity study may be the minimum requirement
- However, a 4-or 6-week toxicity study may be the limit for repeat-dose testing in animals, due to immunogenicity of the product

The incremental cost and timeline for a 6-week study *versus* a 2-week study may be relatively modest and add value later on

Standard pre-clinical studies are often not appropriate for biological products

5. Reducing risk when approaching clinical trials

- Have an overall clinical development plan, including likely regulatory requirements
- Use draft product labelling as a steering tool
- Wherever possible, discuss early-stage clinical studies with regulators in key regions
- Take into account **regulatory opportunities** (orphan drug designation and accelerated pathways) to expedite the clinical program
- Ensure the approach is compatible with international practice – maintain your value!!

In summary ……

- The challenge - reduce risks and add value in early product development, without significant outlay or delay
- Experience shows a comprehensive regulatory assessment can create focus, expedite forward progress and avoid unnecessary R&D work
- Implement a suitable documentation system – it provides intrinsic value
- Sanity checks facilitate success!!

Questions?

dianne.jackson-matthews@eraconsulting.com

Tel: 07 3331 3900 / Fax: 07 3870 0048