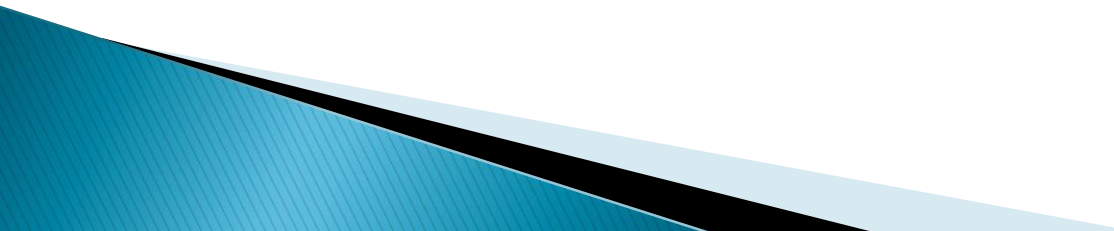


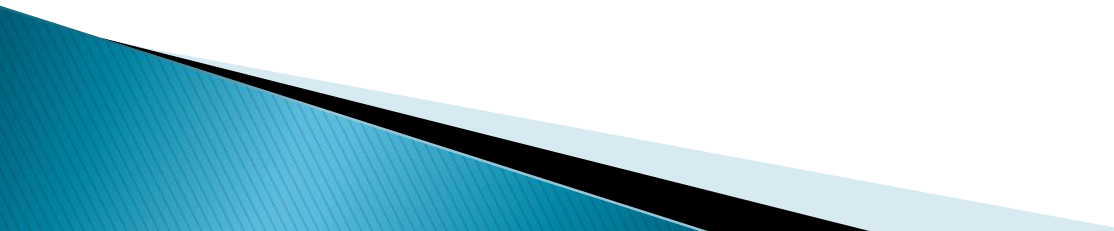
The Strategic Role of Regulatory Affairs within the Biopharmaceutical Business

Lorella Garofalo, PhD
Director Regulatory Affairs
Worldwide Safety & Regulatory – International
Pfizer Canada Inc.

Disclaimer

- ▶ Lorella Garofalo is an employee of Pfizer Canada Inc.
 - ▶ The content as well as views and opinions expressed in this presentation are those of the presenter and do not necessarily reflect those of Pfizer Inc. or CAPRA
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Overview

- ▶ “Traditional” role of regulatory
 - ▶ Continuous evolution of the regulatory function within dynamic internal and external environments
 - ▶ How a strategic, high performing regulatory organization adds great value to the business
- 

Regulatory Affairs: Fundamental “Raison d’être”

- ▶ Secure market approval for medicines and maintain their lifecycle

- Quality
- Safety
- Efficacy



- ▶ Compliance



What most understand about Regulatory Affairs: prepares and submits regulatory dossiers to authorities

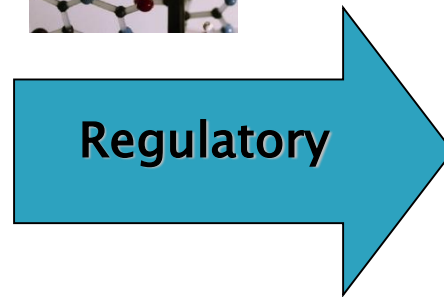
Scientific data

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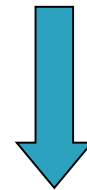
Guidelines

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Legislation



Regulatory
Submissions

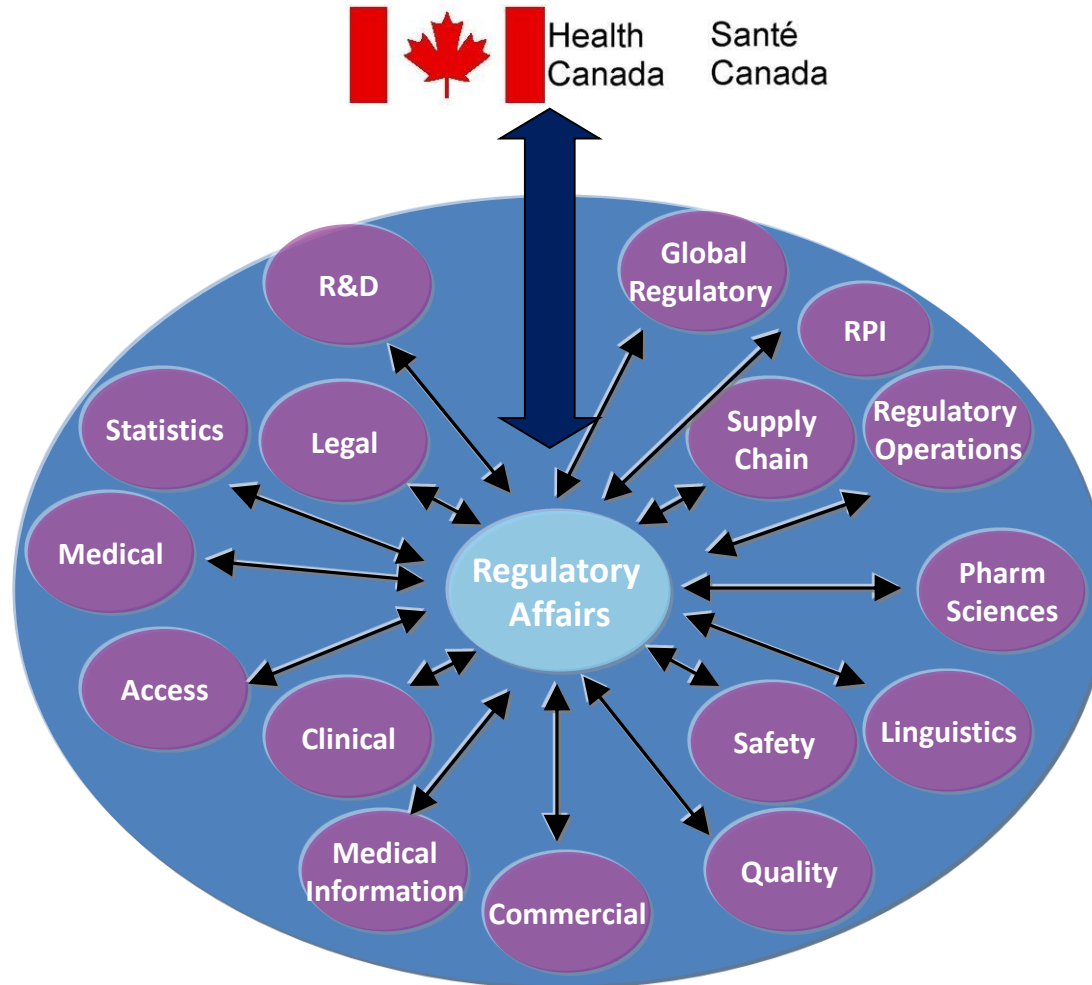


Approval

eCTD File Structure

File Name	File Type	File Size	Last Modified
01 - Administrative Information	Folder		
02 - Chemistry	Folder		
03 - Pharmacology and Toxicology	Folder		
04 - Clinical Data	Folder		
05 - Quality	Folder		
06 - Summary	Folder		
07 - Other	Folder		
08 - Regulatory Submissions	Folder		
09 - Approval	Folder		

Regulatory Affairs is the Company's "face" to Health Canada



Broad Scope and key member of cross functional teams

A Biopharmaceutical company's value and corporate decision points are dependent on critical regulatory milestones

- ▶ Underscores the importance of regulatory's strategic contribution to the business
- ▶ Corporate success relies on achievement of product:
 - development milestones
 - manufacturing
 - registration milestones
 - and many additional factors....
- ▶ Driven by achievement of regulatory goals
 - Importance of precision planning



Regulatory is increasingly recognized as a central role and as a strategic partner to several business functions



Commercial



Clinical / Medical



HEOR / Access



Legal



Others..

Product
Development
and Lifecycle

Regulatory
Policy and
intelligence

Intellectual
Property
Protection

A Dynamic Environment: Internal and External Pressures

INTERNAL

- Focus on Continuous Improvement
- Resource limitations
- Trend towards centralization and outsourcing (contractors/Alliance Partners/CROs)
- Dynamics of Product Portfolio
- Complexity of Products

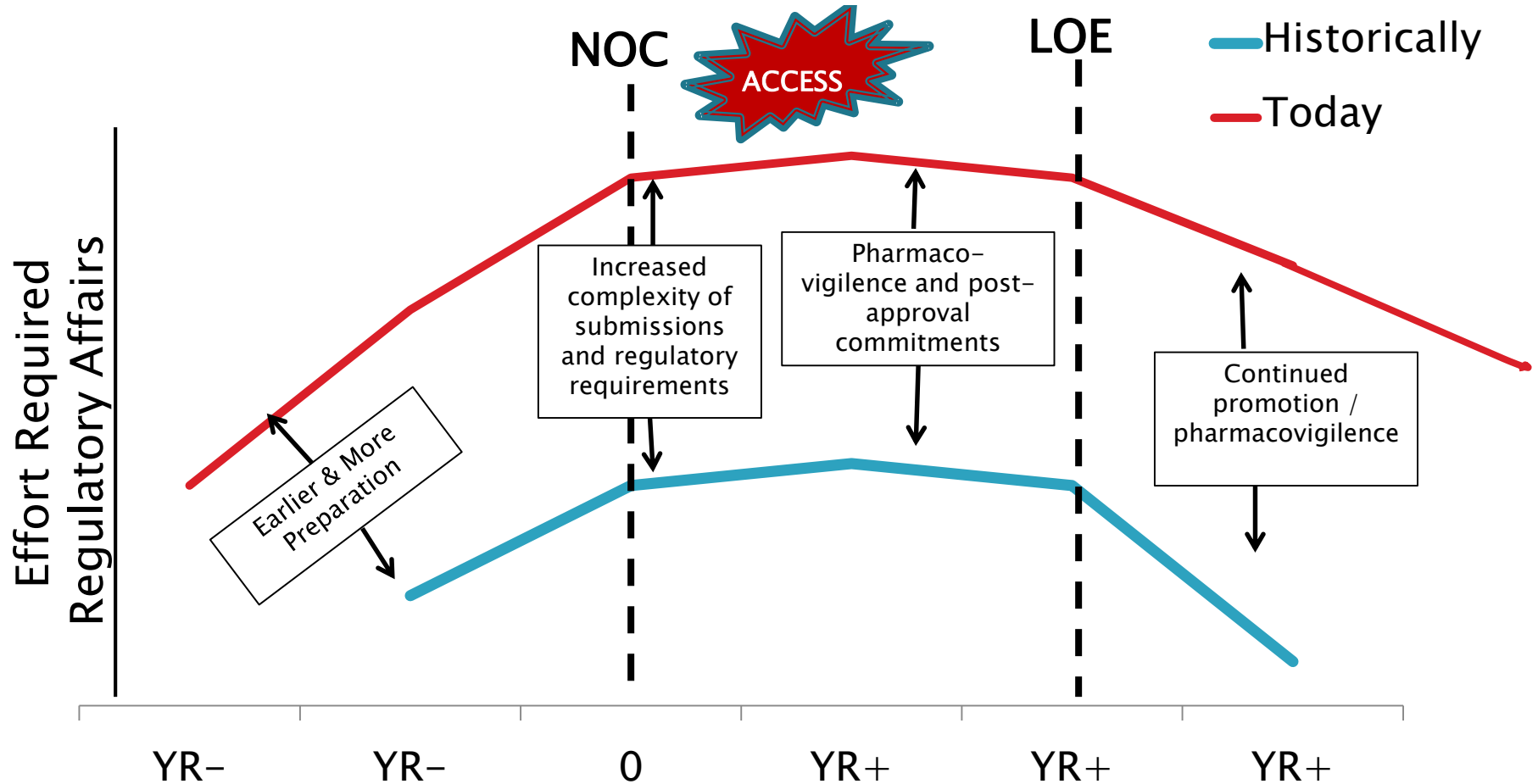


Biopharmaceutical
company

EXTERNAL

- Rapidly evolving regulatory environment (Bill C-17; transparency, etc..)
- Increasing Regulatory Hurdles
- Greater Public and Media Scrutiny
- Proliferation of Policy Issues
- Developing / Competing Submission and Data Standards

Lifecycle Portfolio Management



Challenging and Complex Path to Access in Canada



NOC: Market Authorization

HTA: Market Commercialization

Development programs need to address HTA requirements to ensure best opportunity for early, positive reimbursement decisions and optimize commercial success

Regulatory: Adds Knowledge and Value Across the Lifecycle

DISCOVERY/ PRE-CLINICAL

Preparing
regulatory strategies

- Identity potential regulatory risks
- Create mitigation plans

RESEARCH



Regulatory: Adds Knowledge and Value Across the Lifecycle

DISCOVERY/ PRE-CLINICAL

Preparing and communicating regulatory strategies

- Identity potential regulatory risks
- Create mitigation plans

▶ PHASE I-III

- Filing and maintaining CTAs
 - Raise awareness /ensure alignment of business re: clinical programs in Canada
- Health Authority meetings to obtain regulatory advice
- Leading provision of regulatory guidance to project teams
- Label development
 - Cross-functional discussions (medical, commercial, access)
- Licensing drug due diligence
- NDS filing strategies

RESEARCH

DEVELOPMENT



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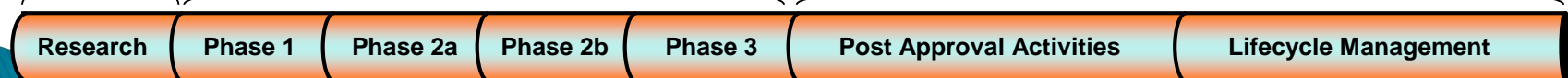
▶ REGISTRATION

- Pre-submission meetings with Health Authorities
- Delivery of Marketing Applications
- Submissions coordination
- Rapid Response teams
- Labelling discussions
- QA review of submissions
- Trend analyses on regulatory review practices & competitors

RESEARCH

DEVELOPMENT

COMMERCIAL



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▶ PHASE I-III

- Filing and maintaining CTAs
- Ensuring business is aware of clinical programs in Canada
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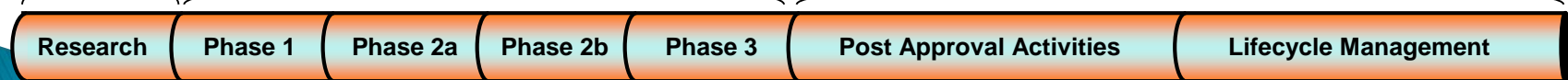
▶ POST-APPROVAL

- Supplemental submissions for line extensions (new indications, new formulations)
- Responses to Health Authority queries
- Product lifecycle management
- Maintenance of market authorization (Safety Updates, CMC enhancements/changes)

RESEARCH

DEVELOPMENT

COMMERCIAL



Regulatory: Adds Knowledge and Value Across the Lifecycle

DISCOVERY/ PRE-CLINICAL

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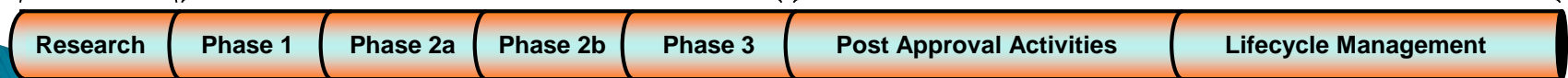
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- Submissions to Health Authorities
- Trend analyses on regulatory review practices & competitors
- Trend analyses on submissions
- Trend analyses on market surveillance (Safety updates, CMC enhancements/changes)

Policy Development and Advocacy

RESEARCH

DEVELOPMENT

COMMERCIAL



POLICY



- ▶ Regulations and guidelines are constantly evolving, increasing in number and importance.
- ▶ The regulatory environment is becoming ever more complex, more challenging.
- ▶ Health Canada recognized as a key regulatory authority globally – influence increasing
- ▶ The companies that are best positioned to understand the uncertainties, anticipate and plan for evolving changes, plus *influence* the environment, will have a competitive edge

Regulatory Policy: Significantly impacts the business

▶ Regulatory

- monitors external environment
 - changes in regulatory guidelines, requirements, policy shifts, competitive intelligence
 - analyzes impact and provides timely communication to company stakeholders
 - is the internal advisor on interpretation of regulations, guidelines, agency policies
- coordinates the development of company positions/comments to shape appropriate content of draft guidelines/regulations
 - communicates views to regulatory agencies and trade associations and works to ensure continued favorable regulatory environment for the business
- represents company on key trade association regulatory committees

Communication to key internal stakeholders regarding anticipated changes in industry trends, policies, and regulations that could have a local/global impact on the development and lifecycle strategies of company products is of great strategic value to the business



Important Changes to Canadian Regulatory Environment

Bill C-17

HC Openness and Transparency Framework

Disclosure submission information

Summary of actions (PAAT) posted

Safety reviews initiated & SSRs posted

Label Safety Updates posted

Inspection Reports (GMP, GCP, GVP) posted

Advertising Compliance disclosed

Drug Shortages – mandatory reporting

Orphan Drug Regulations

- Increased need for regulatory to anticipate issues and manage risk
- Proactively update local and global business on important emerging information
- Advise cross-functional teams of information disclosed about our products and that of key competitors
- Partner with Communications team and other cross functional team members to address media/public enquiries
- Enhance competitive intelligence

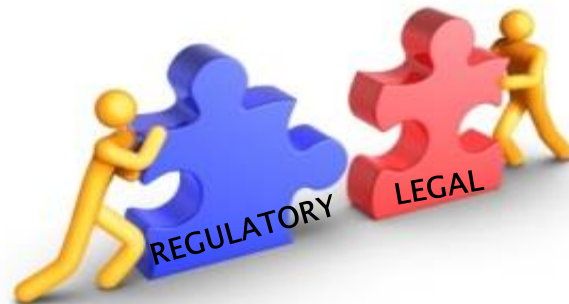
Life-Cycle Management and Post-marketing

- ▶ Strategic input to product lifecycle optimization
 - Define regulatory pathway and prioritization
 - New indications, formulations, dosages
- ▶ Pro-active risk minimization and management
- ▶ Support competitive product differentiation
 - Maintenance of optimal product information and labeling
 - Ensure competitive promotional/advertising materials that meet regulatory requirements



Intellectual Property Protection

- Patent protection only becomes effective once the patent is listed on the Health Canada Patent Register (as per PM(NOC) Regulations)
- Ensuring pediatric exclusivity data protection
 - An additional 6-month period is available for innovative drugs that have been the subject of clinical trials designed and conducted for the purpose of increasing the knowledge of the use of the drug in pediatric populations, filed within the first 5 years from NOC.



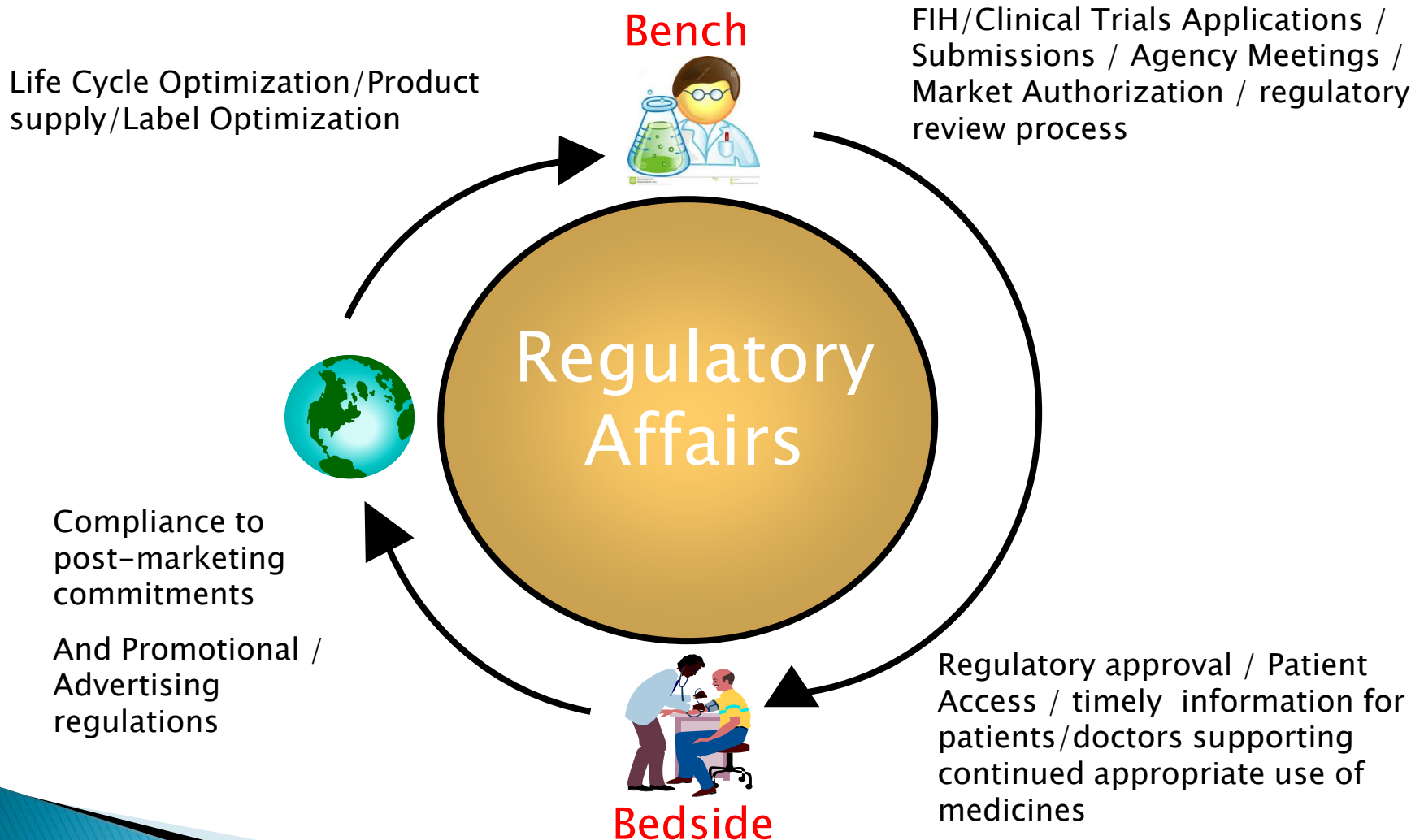
Regulatory Affairs: Critical partner to advance business strategy

1) Enables corporate strategy by working within the company at local and global levels and manages external environment

2) Actively manages portfolio through strategic partnering with cross-functional teams

3) Strong focus on proactive risk management

Regulatory has a strategic role From Bench to Bedside and Beyond...



Thank you !

