

**Deloitte.**

# **Product Architecture**

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# Agenda

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Leading practices in Product Management

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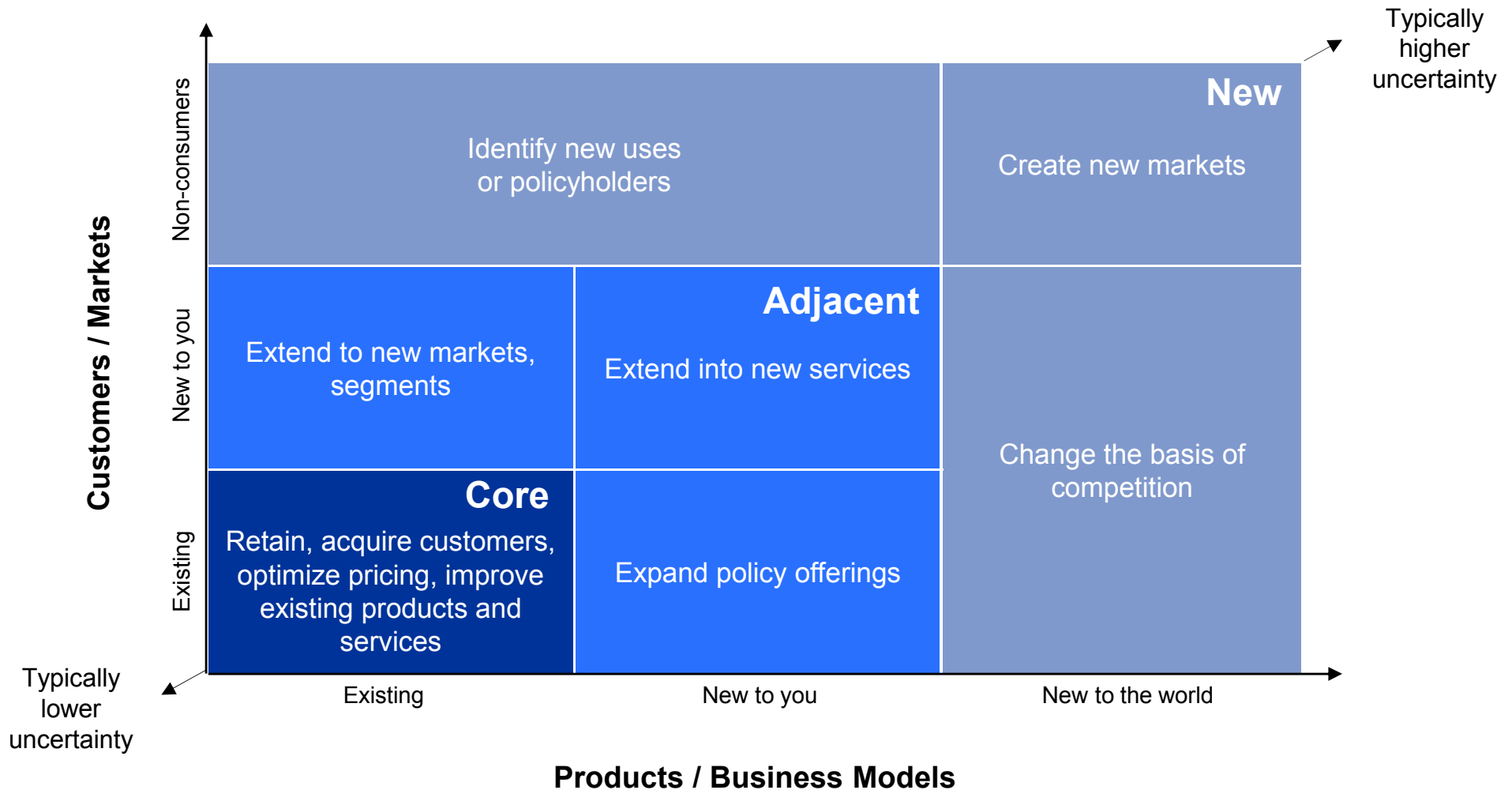
What is Product Architecture?

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Examples

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# Strategic product objectives focus on top-line growth and profitability



**Insurers are reengineering and innovating rather than circling the wagons and defending the status quo**

# Three key underwriting trends driving the future state

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## Key Future State Drivers

## Common Barriers to Change

- Ease of Doing Business
- Data-driven risk evaluation through predictive models
- Rethinking the operating model

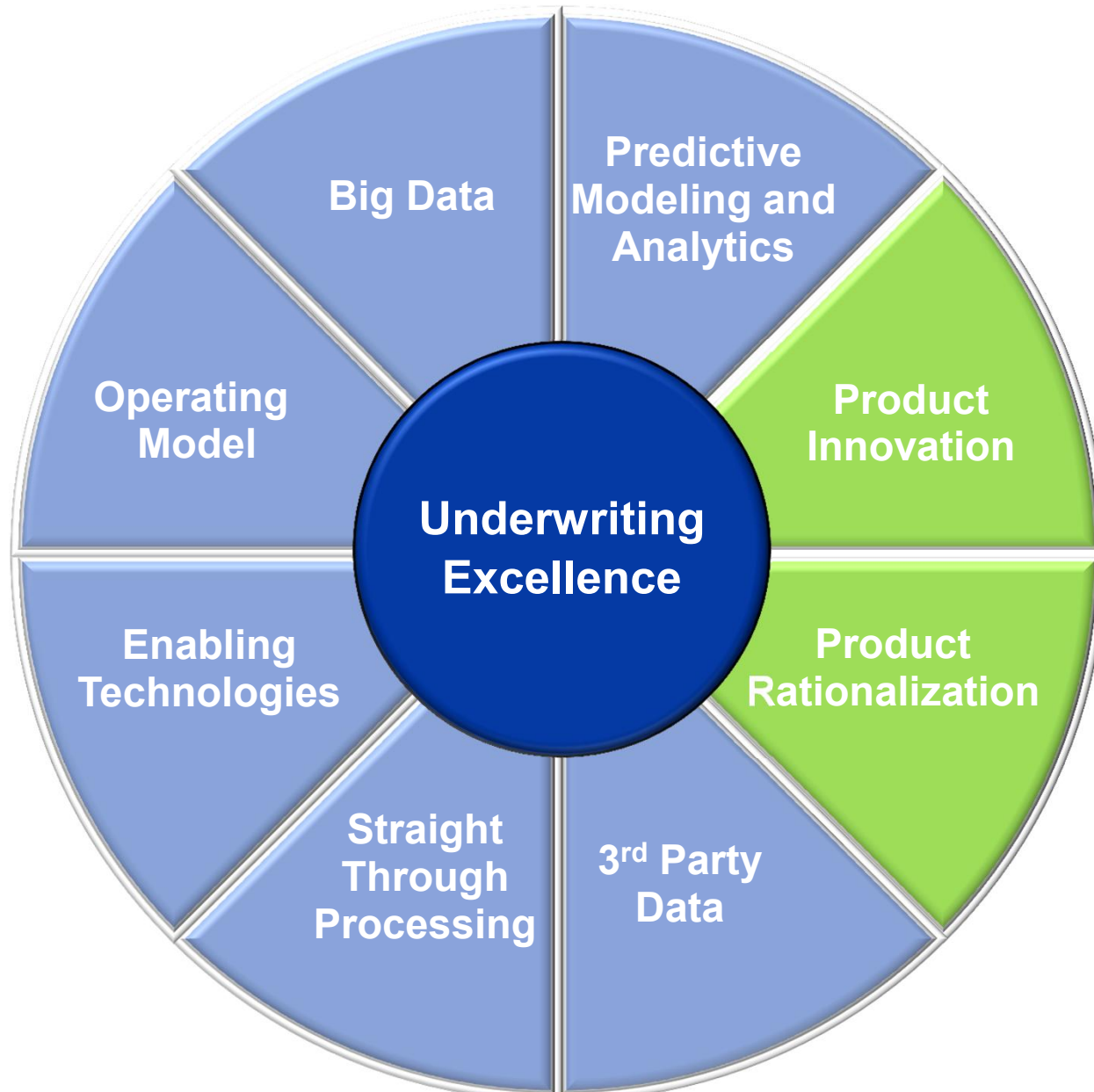
Cost to build new capabilities, limiting transformative enhancements

Resistance to change and adoption of model-based Underwriting

Failure to fully mine the benefits of tech or organizational changes

**Building of most new distribution and underwriting capabilities starts with product. Focusing on how product architecture can create speed and agility is critical.**

## Capability areas impacting the future of underwriting



# Trends in Product Innovation

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## Today

- New products to meet evolving needs of customers
- Increased packaging and bundling to allow flexibility
- Product modifications driven by regulatory change
- Barrier for speed to market is legacy system environments

## Tomorrow

- Customer expectations will drive the need for new and modified products
- Data sources and expert resources to drive product design is a key to success
- Fact-based business case will aid in securing allocation of scarce product development resources
- Maximizing use of existing products to create new market offerings can help manage budgets
- Effective monitoring of products post-launch requires early planning for data and capability needs

# Trends in Product Rationalization

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## Today

- Product proliferation resulted in redundancy, increasing business and IT costs
- M&A also drives duplication in product portfolios
- Maintenance costs and enhancement timelines are also driven higher and longer
- Lack of an organized framework stands in the way of product component reuse

## Tomorrow

- Product managers develop product architectures, allowing transparency into reuse opportunities
- Carriers streamline product portfolios by ridding them of redundant or seldom used products
- Product architecture frameworks organize product components into “true products” or abstract products vs. “market offerings”
- True products leveraged to create new market offerings at a lower cost and on faster timelines
- Maintenance can be streamlined by allowing updates to flow through to all applicable market offerings



# What is product architecture?

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A comprehensive mapping of the components, dimensions, and rules of an insurance product with a focus on isolating the reusable assets

Typically, a product architecture for a P&C product would consist of the following:

## Components

- Lines of Business
- Coverages
- Subcoverages

## Dimensions

- Deductibles
- Limits
- Exposure Basis
- Rating
- Forms

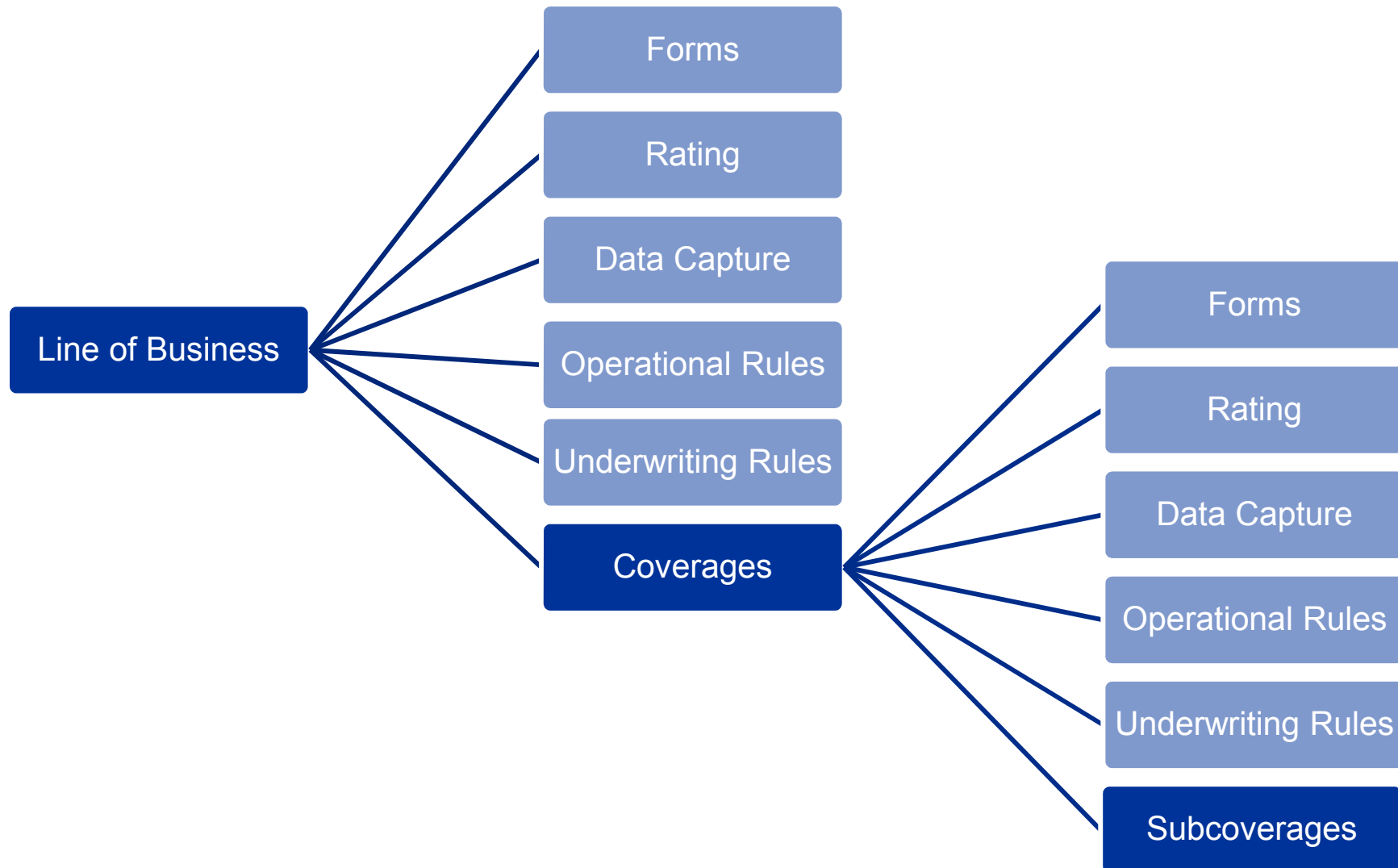
## Rules

- UW rules
- Rating rules
- Pricing rules
- Form rules
- Workflow rules
- Booking rules

# What is product architecture?

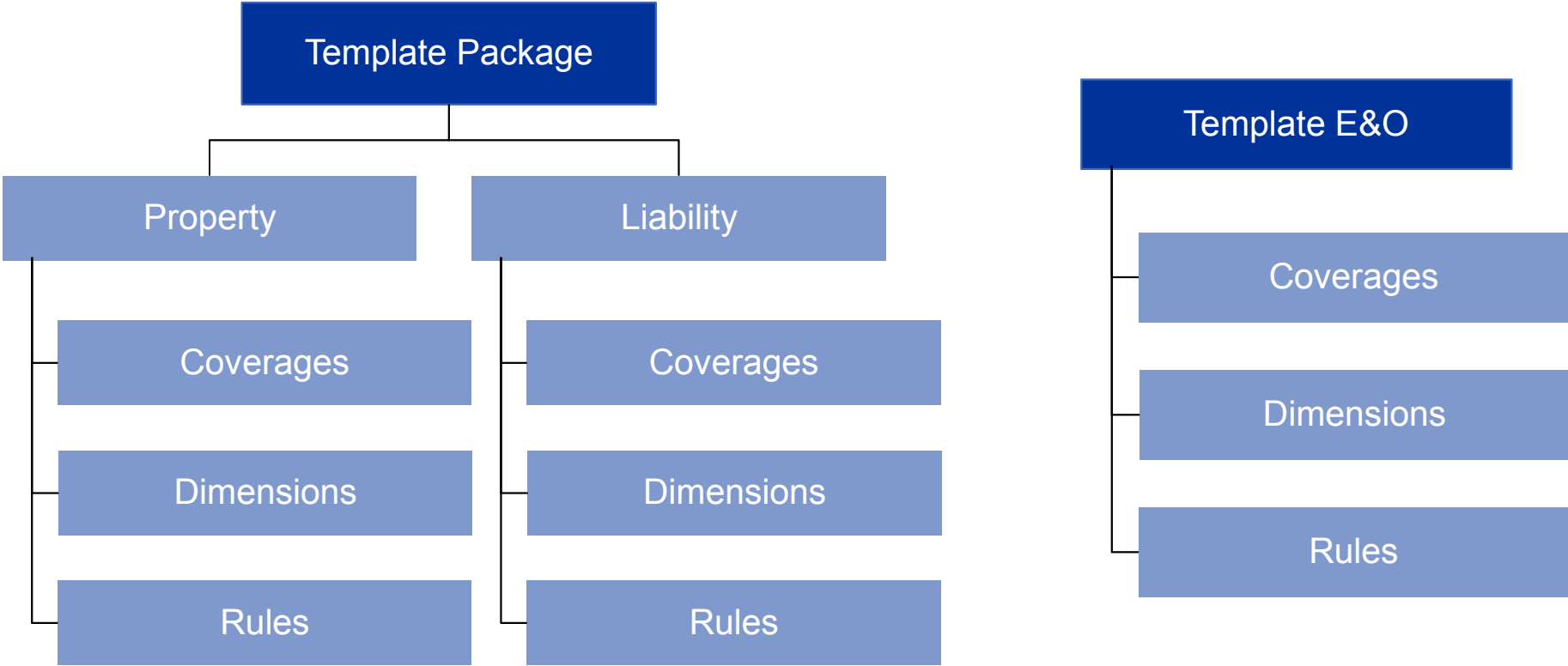
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Product information is organized so that the elements can be reused to create new market offerings or to facilitate product updates



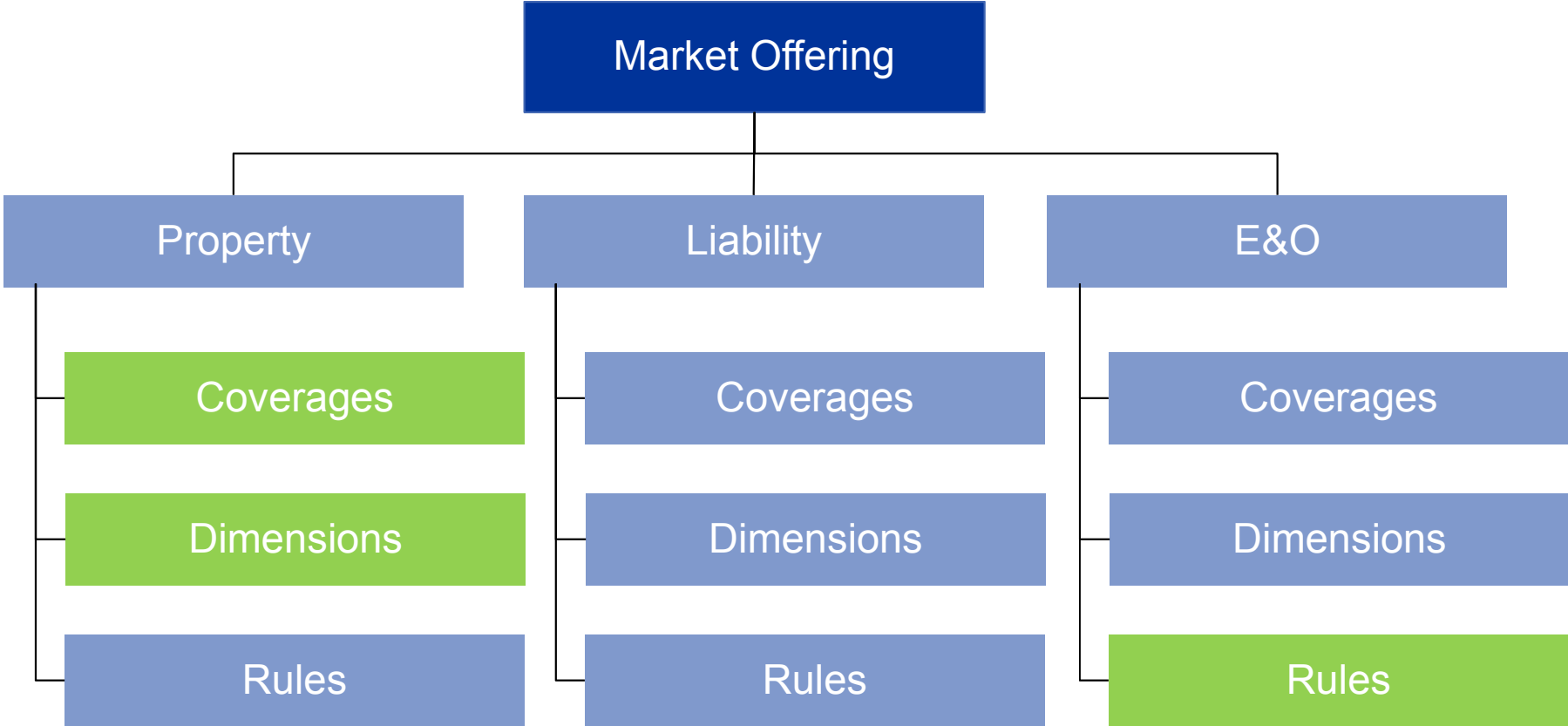
# Example: product development

New market offerings can be created by leveraging abstract products to create tailored market offerings



# Example: product development

New market offerings can be created by reusing or modifying any of the components, dimensions or rules for unique risk characteristics of target market



# Example of how a new product can be built from existing products

## Small Commercial Package for Optometrists

### *Current Inventory (written as stand alone policies):*

- Basic BOP Abstract
- EPLI Abstract
- E&O Abstract

### *Proposed New Market Offering:*

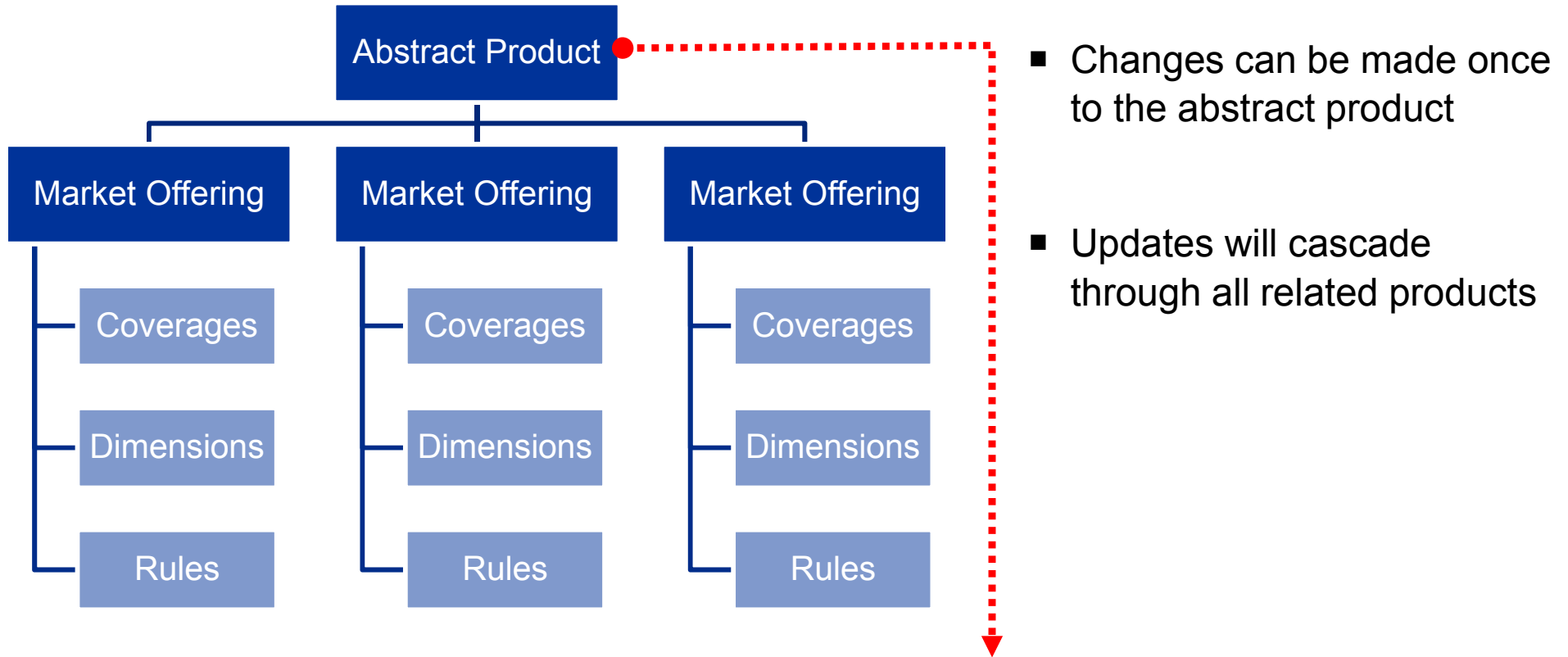
- BOP for Optometrists with built in EPL and E&O
- Property and E&O to be dialed back to fit target market (optometrists working in kiosks, e.g. Costco)

### *Solution – a new Optometrists Product:*

- Reuse property with less coverages and restricted limits
- Reuse EPLI as an added coverage by endorsement rather than a separate policy
- Reuse E&O with restricted limits and coverage by endorsement
- **Significantly reduced development time (business and IT) as only the differences need to be supported**

# Example: product maintenance

Product maintenance processes can be streamlined, minimizing errors and aiding compliance



## Example:

SC Windstorm credits need to be invoked on all property products. Develop a solution at the line of business level and let it be reused by every property rating plan.

# Benefits of a modular product architecture

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## ■ Business Benefits:

- Creates a clear view of the existing products, and their construct, to promote reuse across distinct businesses
- Eliminates redundant work in creating new products
- Reduces the workload associated with product maintenance and enhancements
- Provides a streamlined means for ensuring compliance with product filings
- Creates a framework for defining business intelligence requirements early in the process – proactive, not reactive

## ■ IT Benefits:

- Creates an organized structure to communicate requirements to IT
- Serves as a tool to mine opportunities for reuse of existing IT assets, significantly reducing time to build solutions (new products, enhancements and maintenance)

# Steps in developing a product architecture

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## Inventory

- Review and potentially rationalize products to identify go-forward product portfolio
- Deconstruct products
  - Lines of business
  - Coverages & sub-coverages
  - Rating plans
  - Target markets
  - Forms
- Create a product inventory to map products to various components, dimensions, and rules

## Design

- Review product inventory to identify commonalities
- Design a product architecture structure that allows for reuse
- Identify or create “abstract” products which can be used as templates to build market offerings

## Implement

- Configure the product on the system using the product architecture
- Collect specifications for each go-forward product and populate the system, defining only the required differences to construct new market offerings
- Conduct change management, communication, and training activities



# Sample Product Inventory

## Property Example

Product Name		Coverages									
		1.1	1.2	1.3	1.4	1.5	1.6	1.7	1.8	1.9	1.10
		Bldgs & Structures	Arson or Fraud	Personal Property	Boiler & Machinery	Building Glass	Debris Removal	Business Income	Earthquake	Computer Fraud	Valuable Papers
1	Product A	Y	O	Y	Y	Y	Y	Y	O	Y	O
2	Product B	Y	O		Y	Y	Y	Y			
3	Product C					Y					
4	Product D	Y		Y	Y		Y				
5	Product E			Y							O

## Liability Example

Product Name		Coverages									
		2.1	2.2	2.3	2.4	2.5	2.6	2.7	2.8	2.9	2.10
		Premises	Completed Products & Ops	Employment Practices	Personal & Advertising	Electronic Data Liab.	Punitive Damages	D&O	E&O	Architects & Engineers	Worldwide Coverage
1	Product F		Y						Y	Y	Y
2	Product G				Y	Y	O	Y			
3	Product H	Y		Y	O			Y			O
4	Product I	Y	Y	Y	Y						
5	Product J	Y					Y	O	Y	Y	O

Key	Y	Included Coverage
	O	Optional Coverage

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