

INTRODUCING **COBIT**²⁰¹⁹

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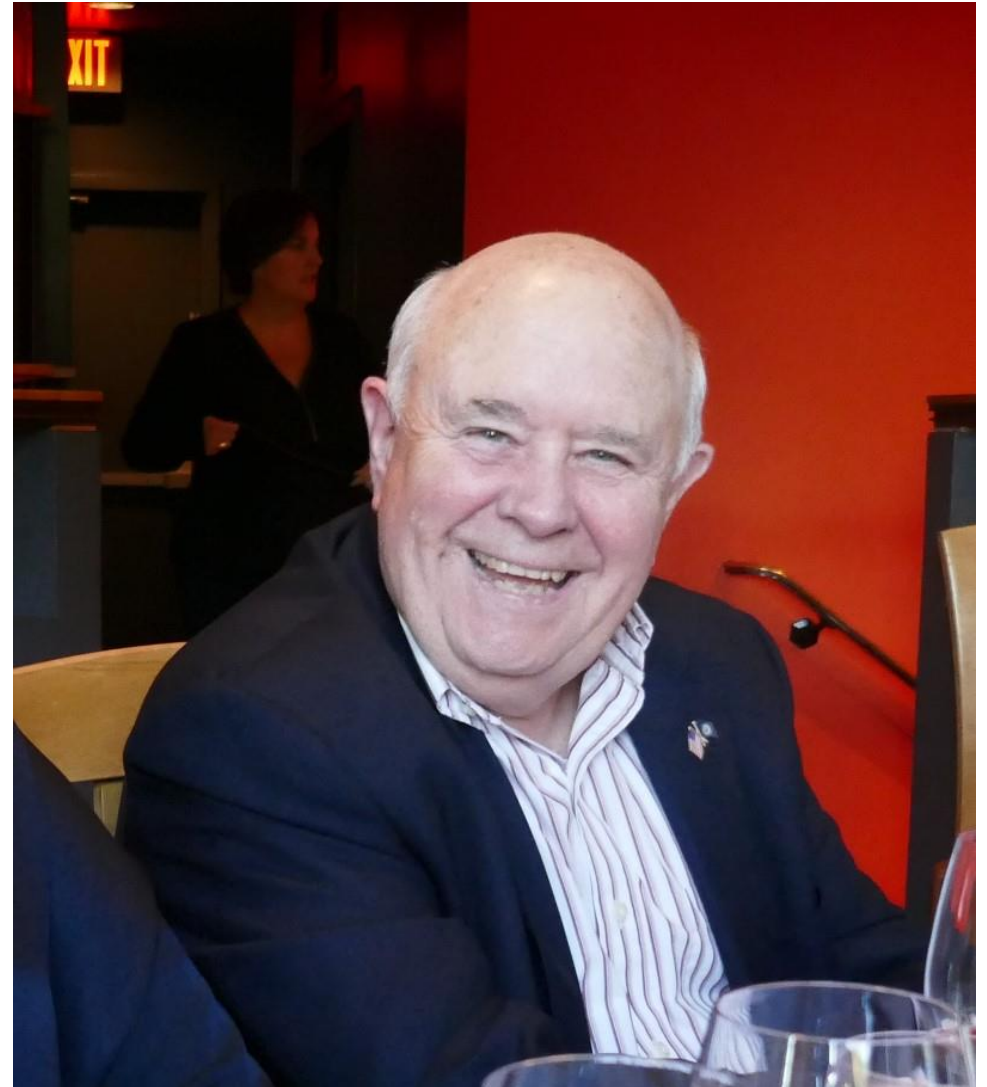
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COBIT® 2019

The globally recognized COBIT Framework, which helps ensure effective enterprise governance of information and technology, has been updated with new information and guidance, facilitating easier, tailored implementation—strengthening COBIT’s continuing role as an important driver of innovation and business transformation. This document sets the scene for the upcoming release of COBIT® 2019 guidance.

Remembering John Lainhart

- In dedication to John Lainhart, who was there from COBIT day -1 in 1995 until his passing in September 2018.
- John was the relentless support behind many COBIT related projects, including COBIT 2019 .
- ISACA is extremely grateful for John and his vision, and COBIT 2019 (and its progeny) are his legacy.

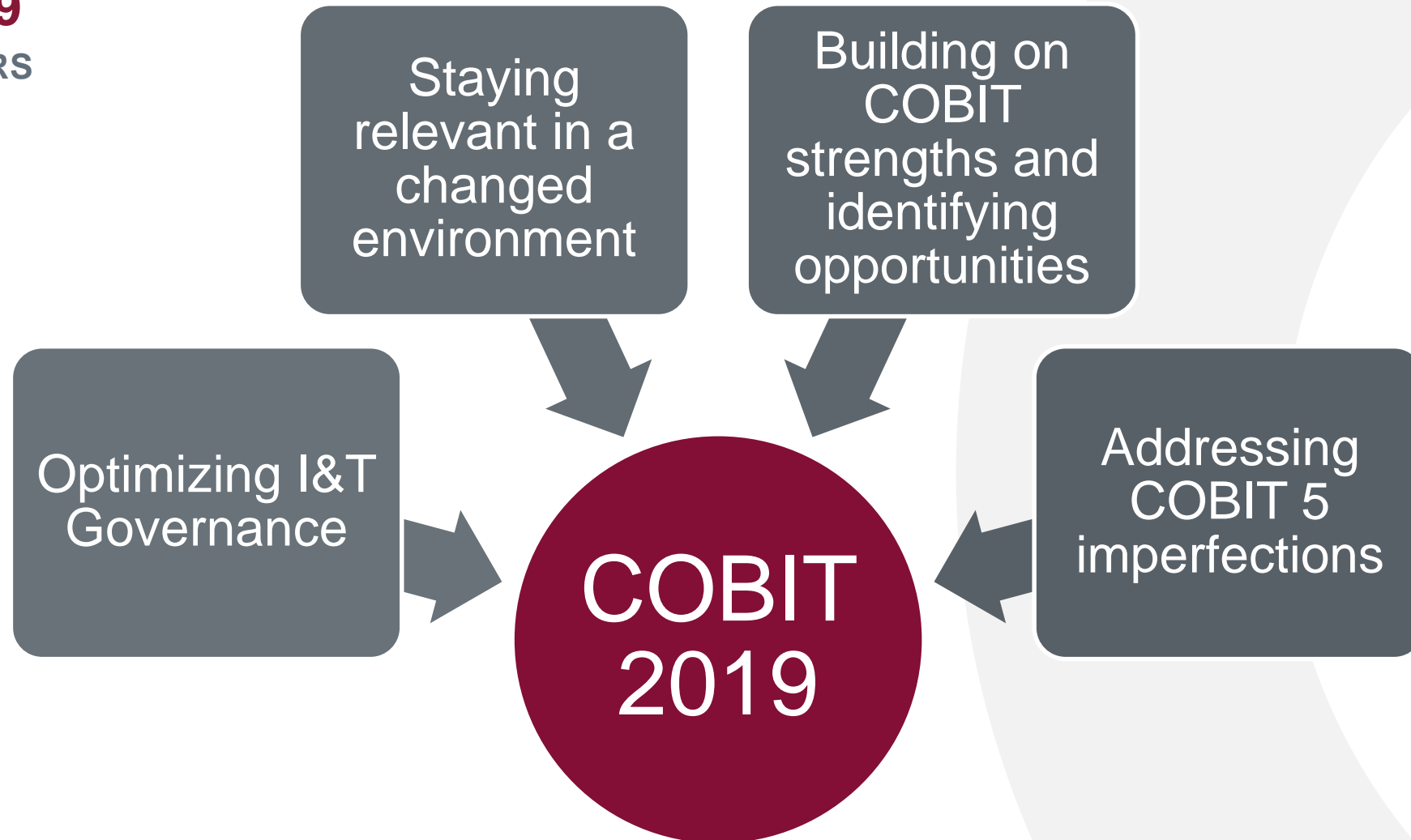


COBIT 2019

DRIVERS AND BENEFITS

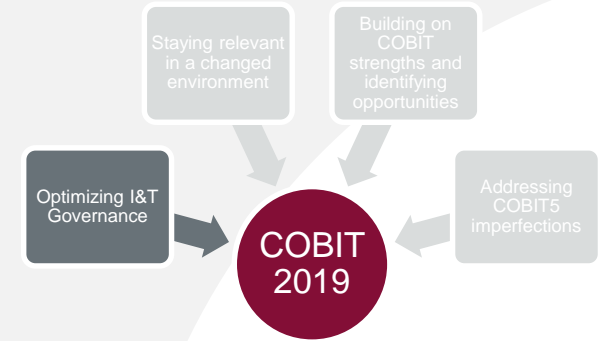
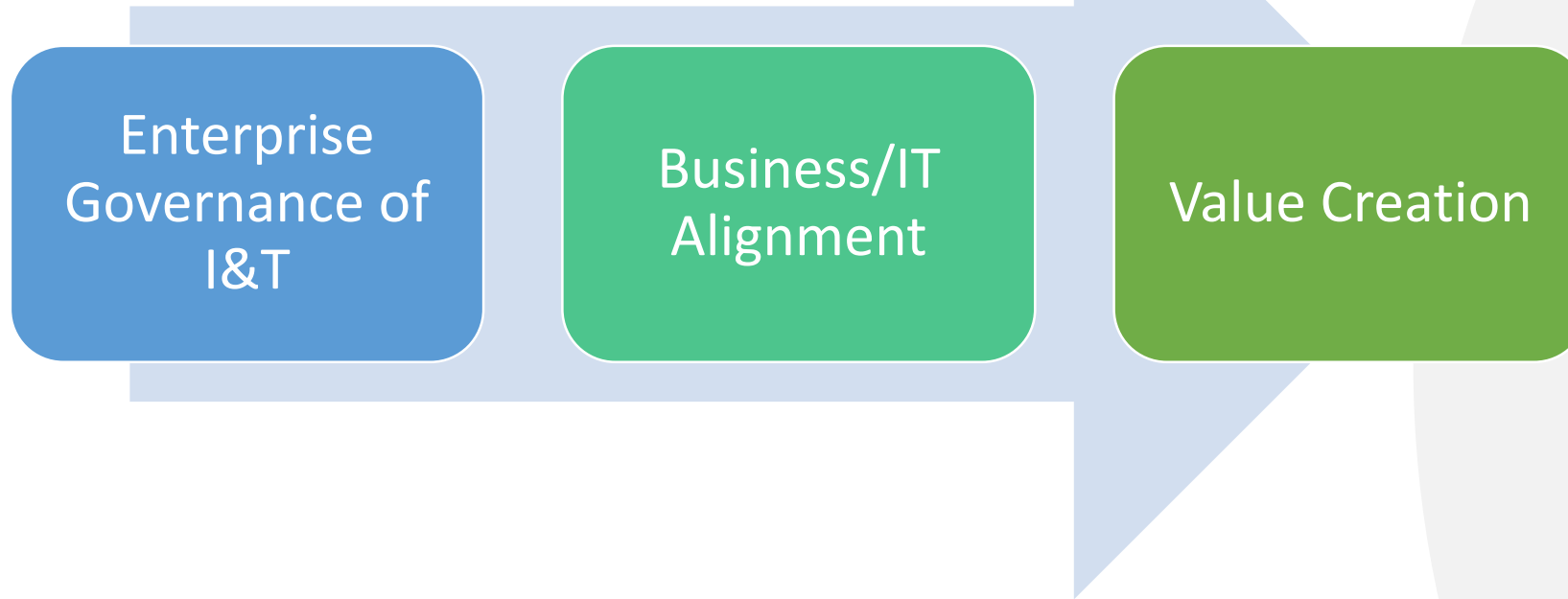
COBIT 2019

UPDATE DRIVERS



COBIT 2019

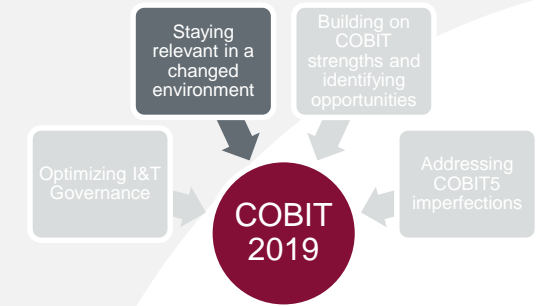
OPTIMIZING I&T GOVERNANCE



IT - used to refer to the organizational department with main responsibility for technology – versus **I&T** – all the information the enterprise generates, processes and uses to achieve its goals, as well as the technology to support that throughout the enterprise.

COBIT 2019

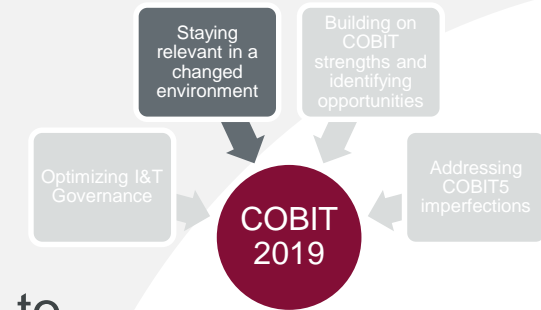
STAYING RELEVANT IN A CHANGED ENVIRONMENT



- COBIT 5 was published in 2012, making it almost 7 years old
- New technology and business trends in the use of IT (e.g. digitization) have not been incorporated into COBIT, requiring re-alignment
- The need for the integration of new insights from practitioners, science and academia in the domain of I&T governance creation
- Other standards have evolved, resulting in a different standards/frameworks landscape, requiring a re-alignment
- More fluid and frequent updates of COBIT required

COBIT 2019

STAYING RELEVANT IN A CHANGED ENVIRONMENT

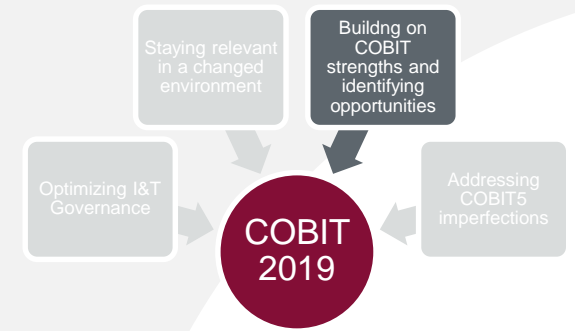


The COBIT 2019 development team looked at following standards/frameworks to align COBIT 2019 with:

- US National Institute of Standards and Technology (NIST) standards:
 - NIST Cybersecurity Framework v1.1
 - NIST SP 800 53 Rev 5
 - NIST SP 800 37 Rev 2 (Risk Management Framework)
- ISO/IEC 20000
- ISO/IEC 27000 family:
 - ISO/IEC 27001
 - ISO/IEC 27002
 - ISO/IEC 27004
 - ISO/IEC 27005
- ISO/IEC 31000:2018
- ISO/IEC 38500
- ISO/IEC 38502
- A Guide to the Project Management Book of Knowledge: PMBOK® Guide, Sixth Edition, 2017
- The TOGAF® Standard, The Open Group
- The Open Group IT4IT™ Reference Architecture, version 2.0
- CIS® Critical Security Controls, Center for Internet Security
- King IV Report on Corporate Governance™, 2016
- Scaled Agile Framework (SAFe®)
- Cloud standards and good practices:
 - Amazon Web Services (AWS®)
 - Security Considerations for Cloud Computing, ISACA
 - Controls and Assurance in the Cloud: Using COBIT® 5, ISACA
- Enterprise Risk Management (ERM)—Integrated Framework, Committee of Sponsoring Organizations of the Treadway Commission (COSO), June 2017
- The TBM Taxonomy, The TBM Council
- “Options for Transforming the IT Function Using Bimodal IT,” MIS Quarterly Executive (white paper)
- ITIL V3
- HITRUST® Common Security Framework, version 9, September 2017
- Change Management Methodology, Prosci
- Skills Framework for the Information Age (SFIA®) V6
- The Standard of Good Practice for Information Security, Information Security Forum (ISF), 2016
- CMMI V2.0
- The CMMI Cybermaturity Platform, 2018
- The Data Management Maturity Model, CMMI Institute, 2014

COBIT 2019

BUILDING ON COBIT STRENGTHS AND IDENTIFYING OPPORTUNITIES



STRENGTHS

- COBIT is a unique overarching IT Governance framework
- COBIT process guidance has matured and has reached its best quality level yet
- COBIT's business perspective on IT brings a unique opportunity to further expand its impact

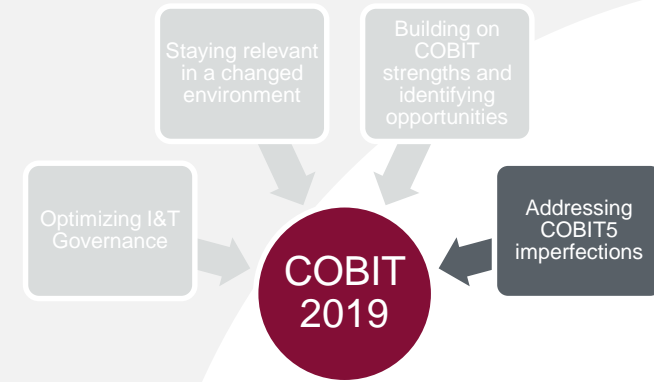
OPPORTUNITIES

- The current (target) audience for COBIT is still very much IT- and Assurance oriented
- There is an opportunity to re-discover or re-launch some of COBIT *hidden gems*
- More prescriptive implementation guidance such as incorporating specific design factors

COBIT 2019

ADDRESSING COBIT 5 IMPERFECTIONS

- COBIT users find it hard to locate relevant contents for their needs
- Perceived as complex and challenging to apply in practice
- The enabler model is incomplete in terms of development and guidance, and thus often ignored
- A challenging process capability model and general lack of support of performance management for other enablers
- The perceived reputation of IT Governance itself as an inhibitor of change and (administrative) overhead – not per se a COBIT weakness but an IT Governance problem at large



INTRODUCTION

ENTERPRISE GOVERNANCE OF INFORMATION &
TECHNOLOGY (EGIT) AND THE NATURE OF COBIT

INTRODUCTION

ENTERPRISE GOVERNANCE OF INFORMATION AND TECHNOLOGY (EGIT)

In the light of digital transformation, information and technology (I&T) have become crucial in the support, sustainability and growth of enterprises.

- Previously, governing boards and senior management could delegate, ignore or avoid I&T-related decisions → **In most sectors and industries, such attitudes are now ill advised**
- Digitized enterprises are increasingly dependent on I&T for survival and growth
- Stakeholder value creation is often driven by a high degree of digitization in new business models, efficient processes, successful innovation, etc.

INTRODUCTION

ENTERPRISE GOVERNANCE OF INFORMATION AND TECHNOLOGY (EGIT)

Fundamentally, EGIT is concerned with value delivery from digital transformation and the mitigation of business risk that results from digital transformation.

More specifically, three main outcomes can be expected after successful adoption of EGIT.



INTRODUCTION

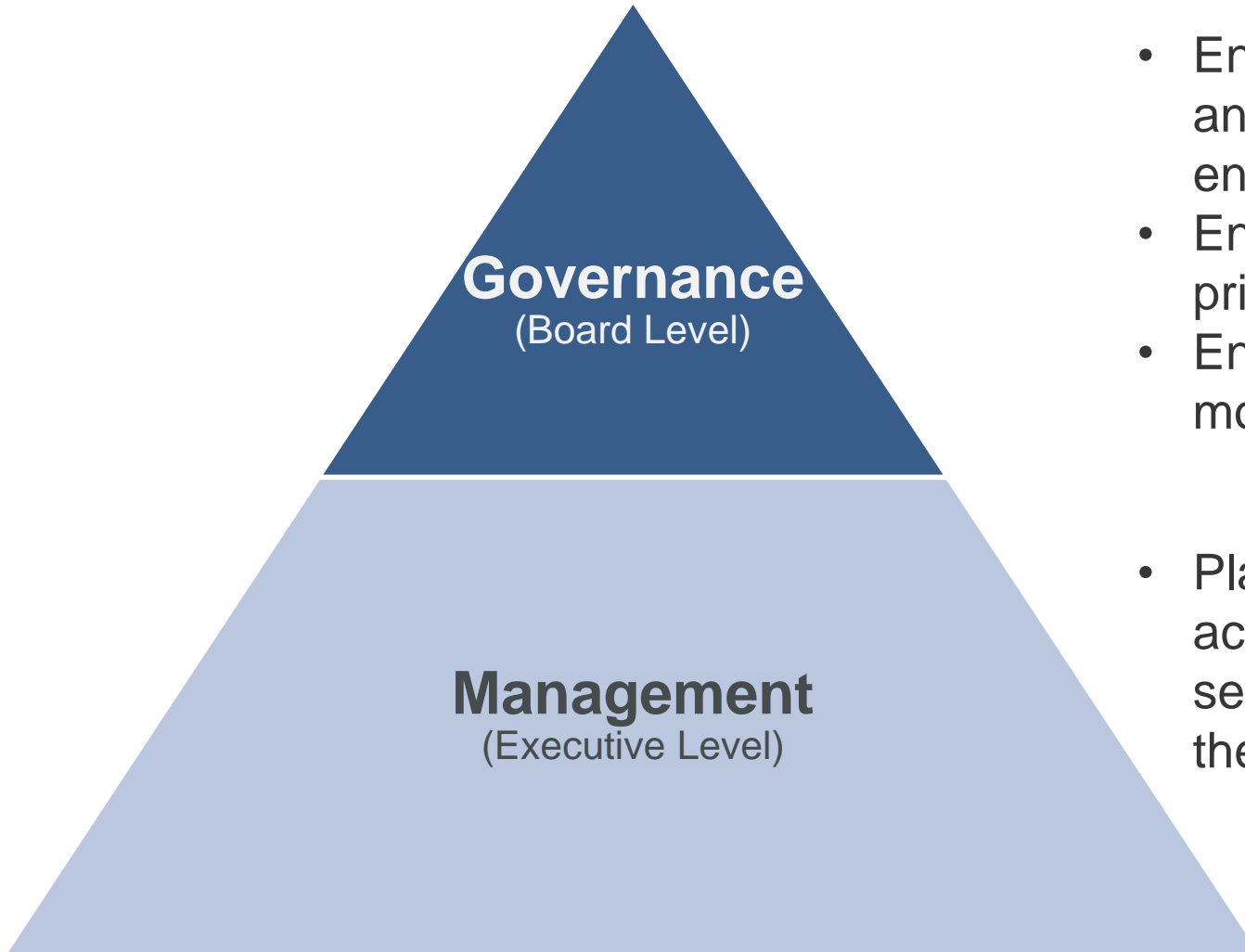
COBIT AS AN INFORMATION & TECHNOLOGY (I&T) FRAMEWORK

COBIT is a framework for the governance and management of enterprise information and technology, aimed at the whole enterprise.

- Enterprise I&T means all the technology and information processing the enterprise puts in place to achieve its goals, regardless of where this happens in the enterprise
- Enterprise I&T is not limited to the IT department of an organization, but certainly includes it

INTRODUCTION

GOVERNANCE AND MANAGEMENT DEFINED



- Ensure stakeholder needs, conditions and options are evaluated to determine enterprise objectives
 - Ensure direction is set through prioritization and decision making
 - Ensure performance and compliance are monitored against objectives
-
- Plans, builds, runs and monitors activities, in alignment with the direction set by the governance body, to achieve the enterprise objectives

INTRODUCTION

WHAT IS COBIT AND WHAT IT IS NOT: SETTING THE RIGHT EXPECTATIONS

COBIT IS



- A **framework** for the governance and management of enterprise I&T
- COBIT defines the components to build and sustain a governance system
- COBIT defines the design factors that should be considered by the enterprise to build a best fit governance system
- COBIT is flexible and allows guidance on new topics to be added

COBIT IS NOT



- A full description of the whole IT environment of an enterprise
- A framework to organize business processes
- An (IT-) technical framework to manage all technology
- COBIT does not make or prescribe any IT-related decisions

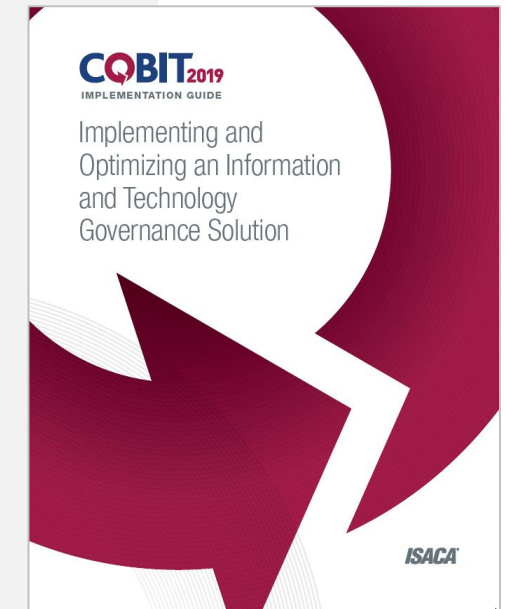
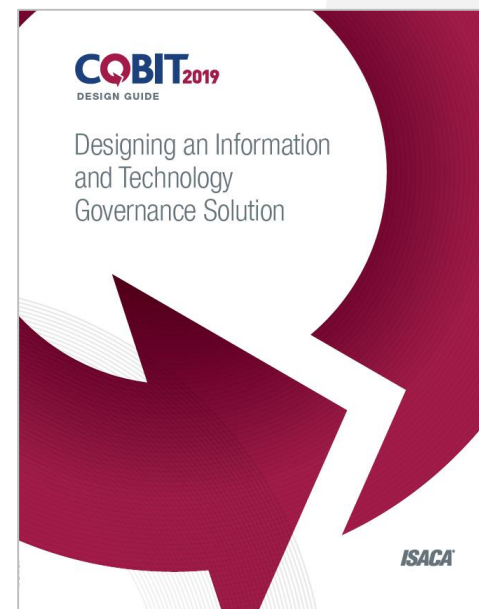
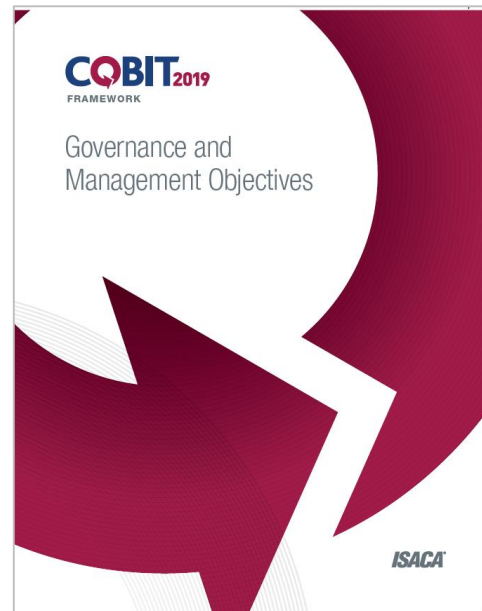
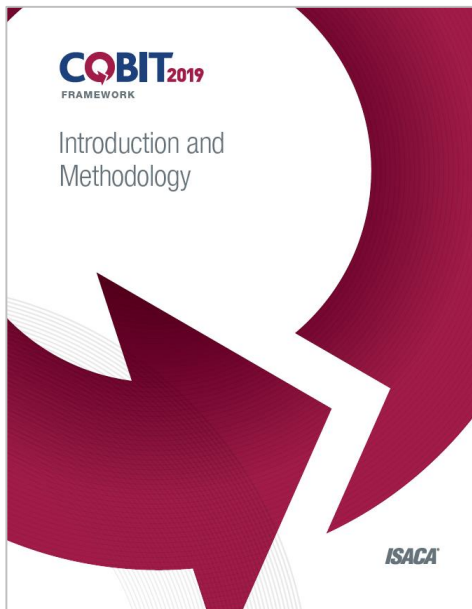
OVERVIEW

PRODUCT FAMILY ARCHITECTURE

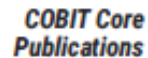
OVERVIEW

PRODUCT FAMILY

The COBIT 2019 product family is open-ended. The following publications are/will be available in Q4 2018.

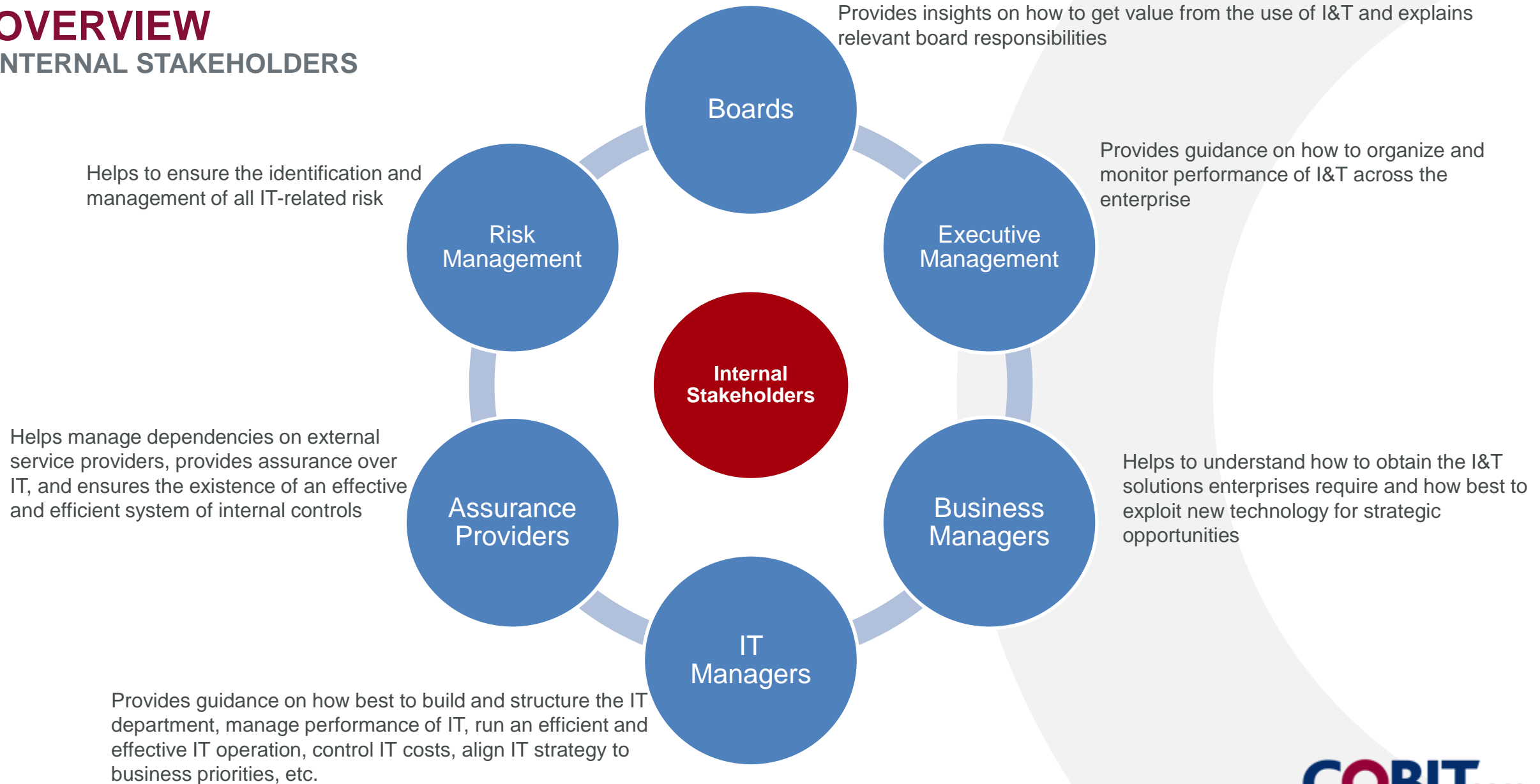


COBIT® 2019 Product Architecture



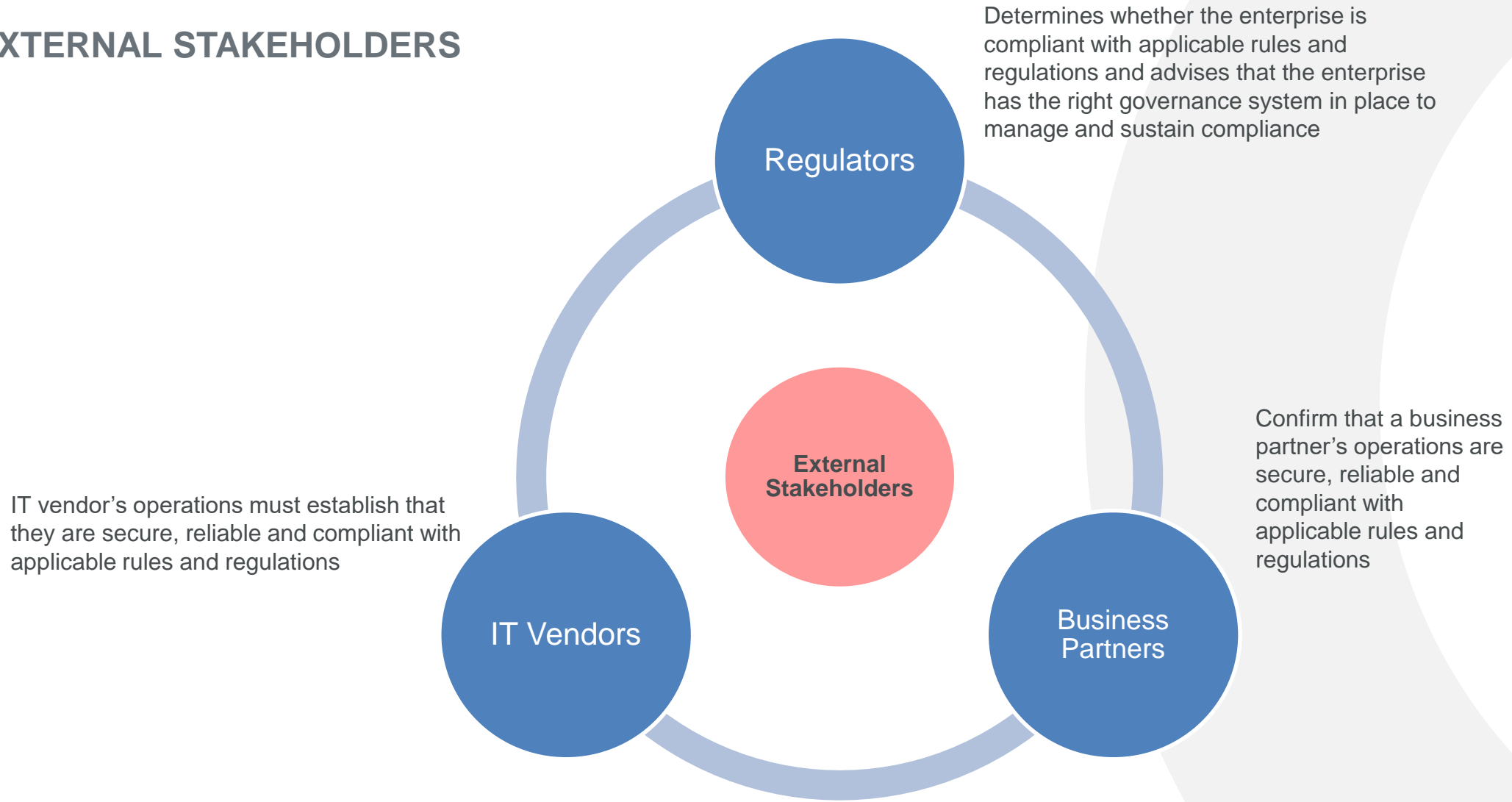
OVERVIEW

INTERNAL STAKEHOLDERS



OVERVIEW

EXTERNAL STAKEHOLDERS



KEY CONCEPTS

KEY CONCEPTS & CONCEPTUAL MODEL

KEY CONCEPTS

OVERVIEW



KEY CONCEPTS

PRINCIPLES

COBIT₂₀₁₉

PRINCIPLES Governance System

PRINCIPLES Governance Framework

1. Provide
Stakeholder
Value

2. Holistic
Approach

3. Dynamic
Governance
System

4. Governance
Distinct From
Management

5. Tailored to
Enterprise
Needs

6. End-to-End
Governance
System

1. Based on
Conceptual
Model

2. Open and
Flexible

3. Aligned to
Major Standards

KEY CONCEPTS

GOVERNANCE AND MANAGEMENT OBJECTIVES

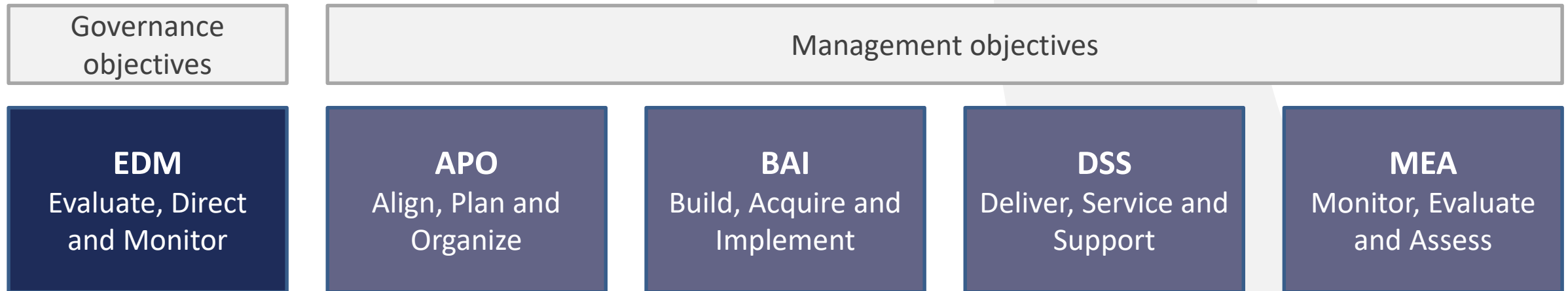
For information and technology to contribute to enterprise goals, a number of governance and management objectives should be achieved.

- A governance or management objective **always relates to one process** and a series of related components of other types to help achieve the objective
- A governance objective relates to a governance process, while a management objective relates to a management process.

KEY CONCEPTS

GOVERNANCE AND MANAGEMENT OBJECTIVES

Similar to COBIT 5, The governance and management objectives in COBIT® 2019 are grouped into five domains. The domains have names that express the key purpose and areas of activity of the objectives contained in them.



EDM01—Ensured
Governance
Framework Setting
and Maintenance

EDM02—Ensured
Benefits Delivery

EDM03—Ensured
Risk Optimization

EDM04—Ensured
Resource
Optimization

EDM05—Ensured
Stakeholder
Engagement

AP001—Managed
I&T Management
Framework

AP002—Managed
Strategy

AP003—Managed
Enterprise
Architecture

AP004—Managed
Innovation

AP005—Managed
Portfolio

AP006—Managed
Budget and Costs

AP007—Managed
Human Resources

AP008—Managed
Relationships

AP009—Managed
Service
Agreements

AP010—Managed
Vendors

AP011—Managed
Quality

AP012—Managed
Risk

AP013—Managed
Security

AP014—Managed
Data

BAI01—Managed
Programs

BAI02—Managed
Requirements
Definition

BAI03—Managed
Solutions
Identification
and Build

BAI04—Managed
Availability
and Capacity

BAI05—Managed
Organizational
Change

BAI06—Managed
IT Changes

BAI07—Managed
IT Change
Acceptance and
Transitioning

BAI08—Managed
Knowledge

BAI09—Managed
Assets

BAI10—Managed
Configuration

BAI11—Managed
Projects

DSS01—Managed
Operations

DSS02—Managed
Service Requests
and Incidents

DSS03—Managed
Problems

DSS04—Managed
Continuity

DSS05—Managed
Security
Services

DSS06—Managed
Business
Process Controls

MEA01—Managed
Performance and
Conformance
Monitoring

MEA02—Managed
System of Internal
Control

MEA03—Managed
Compliance With
External
Requirements

MEA04—Managed
Assurance

Known as the
Process Reference
Model, or PRM in
COBIT 5, COBIT®
2019 identifies this
as the **COBIT Core
Model**.

KEY CONCEPTS

GOVERNANCE AND MANAGEMENT OBJECTIVES



HIGH LEVEL INFORMATION

- Domain name
- Focus area
- Governance or management objective name
- Description
- Purpose statement



GOALS CASCADE

- Applicable Alignment goals
- Applicable Enterprise goals
- Example metrics



RELATED COMPONENTS

- Processes, practices and activities
- Organizational structures
- Information flows and items
- People, skills and competencies
- Policies and frameworks
- Culture, ethics and behavior
- Services, infrastructure and applications



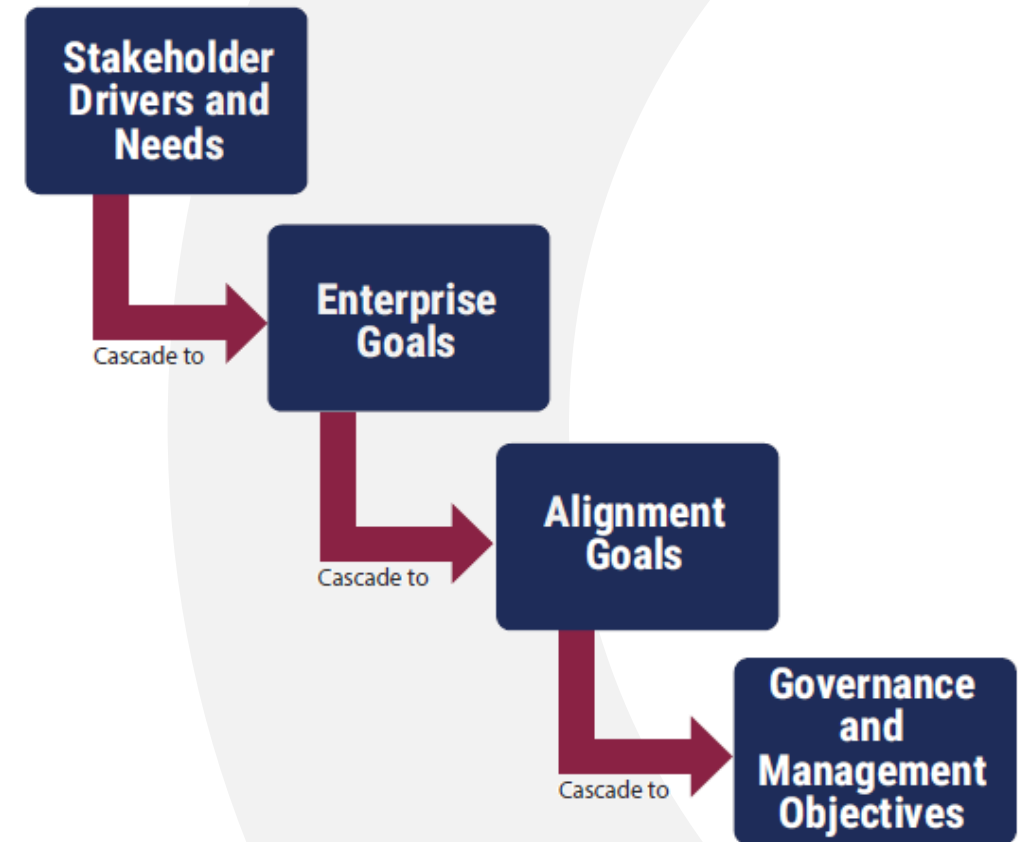
RELATED GUIDANCE

- Where applicable links and cross references are provided to other standards and frameworks for each of the governance components within each governance and management objective

KEY CONCEPTS

GOALS CASCADE

- Enterprise goals have been consolidated, reduced, updated and clarified.
- Alignment goals emphasize the alignment of all IT efforts with business objectives
 - These were IT-related goals in COBIT 5
 - The update seeks to avoid the frequent misunderstanding that these goals indicate purely internal objectives of the IT department within an enterprise
 - Alignment goals have also been consolidated, reduced, updated and clarified where necessary



Reference: COBIT® 2019 Framework: Introduction and Methodology, Chapter 4
Basic Concepts: Governance Systems and Components, Figure 4.16

KEY CONCEPTS

COMPONENTS OF A GOVERNANCE SYSTEM

- Each enterprise's governance system is built from a number of components
- Components can be of different types
- Components interact with each other, resulting in a holistic governance system for I&T
- These were known as enablers in COBIT 5



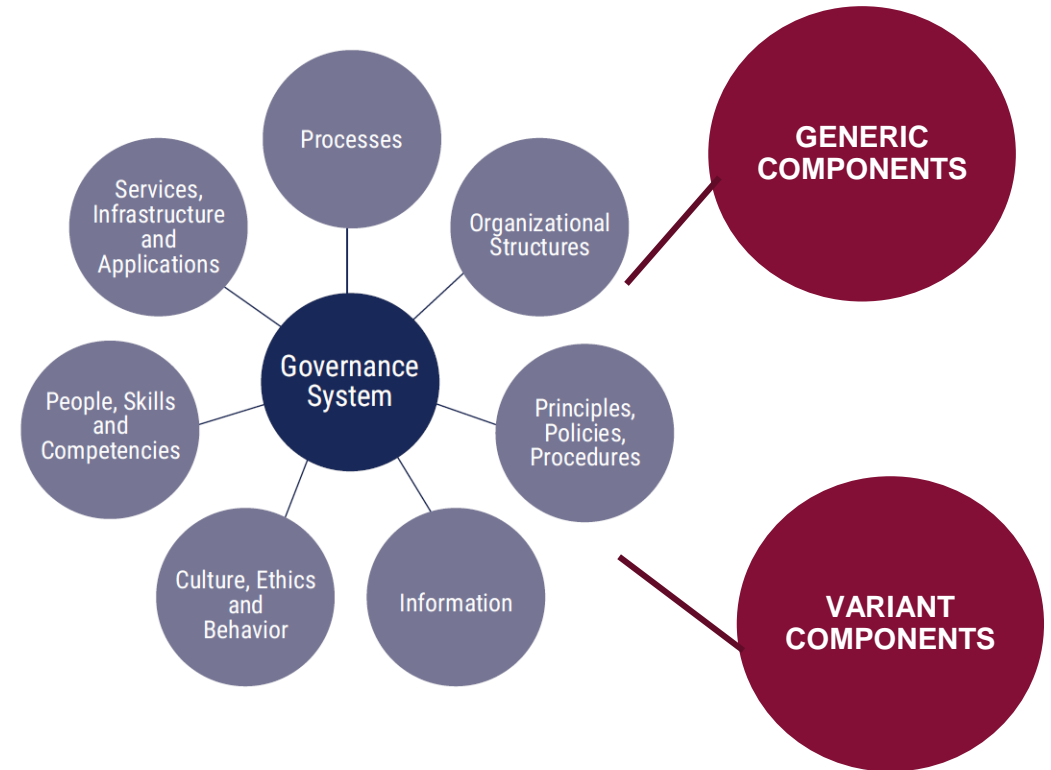
Reference: COBIT® 2019 Framework: Basic Concepts: Governance Systems and Components, Figure 4.3

KEY CONCEPTS

COMPONENTS OF A GOVERNANCE SYSTEM

Components can be generic or variants of generic components:

- **Generic** components are described in the COBIT core model
 - Apply in principle to any situation
 - However, they are generic in nature and generally need customization before being practically implemented
- **Variants** are based on generic components but
 - Tailored for a specific purpose or context within a focus area (e.g., for information security, DevOps, a particular regulation)



KEY CONCEPTS

FOCUS AREAS

A Focus Area describes a certain governance topic, domain or issue that can be addressed by a collection of governance and management objectives and their components.

Focus Areas can contain a combination of generic governance components and variants

The number of focus areas is virtually unlimited. That is what makes COBIT open-ended. New focus areas can be added as required or as subject matter experts and practitioners contribute.

EXAMPLES OF FOCUS AREAS

- Small and medium enterprises
- Information Security
- Risk
- DevOps

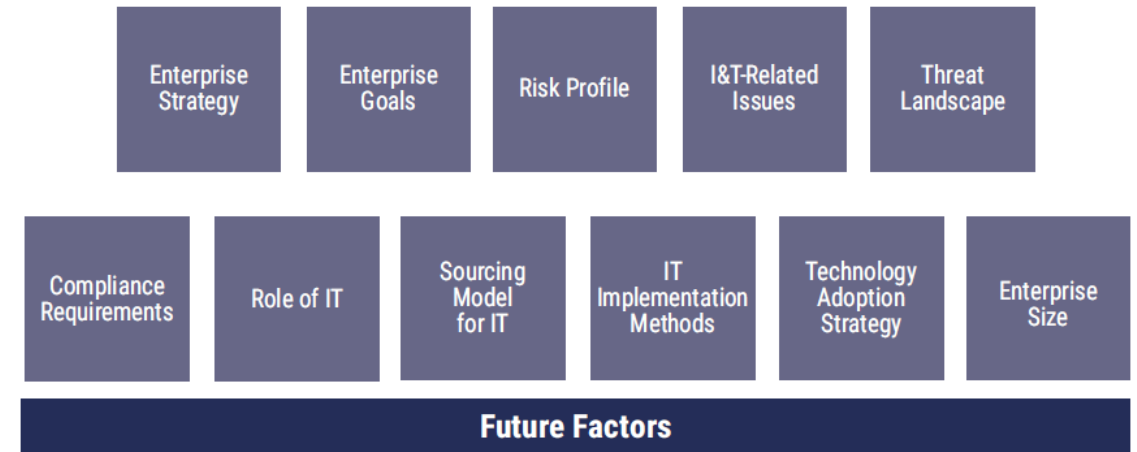
KEY CONCEPTS

DESIGN FACTORS

Design factors are factors that:

- Influence the design of an enterprise's governance system
- Position it for success in the use of I&T
- More information and detailed guidance on how to use the design factors for designing a governance system can be found in the *COBIT Design Guide* publication

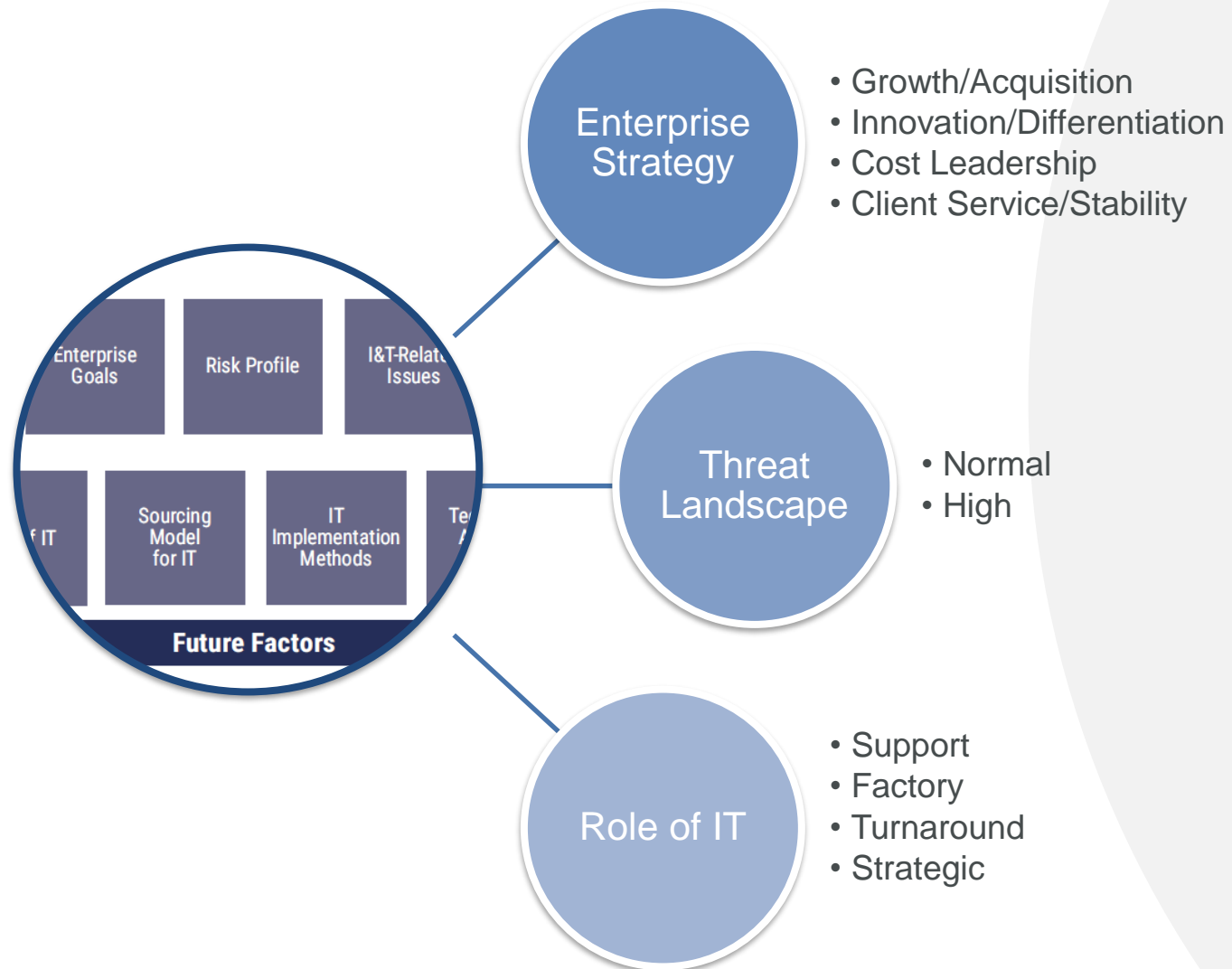
COBIT 2019 Design Factors



Reference: COBIT® 2019 Framework: Basic Concepts: Design Factors, Figure 4.4

KEY CONCEPTS

DESIGN FACTORS: EXAMPLES



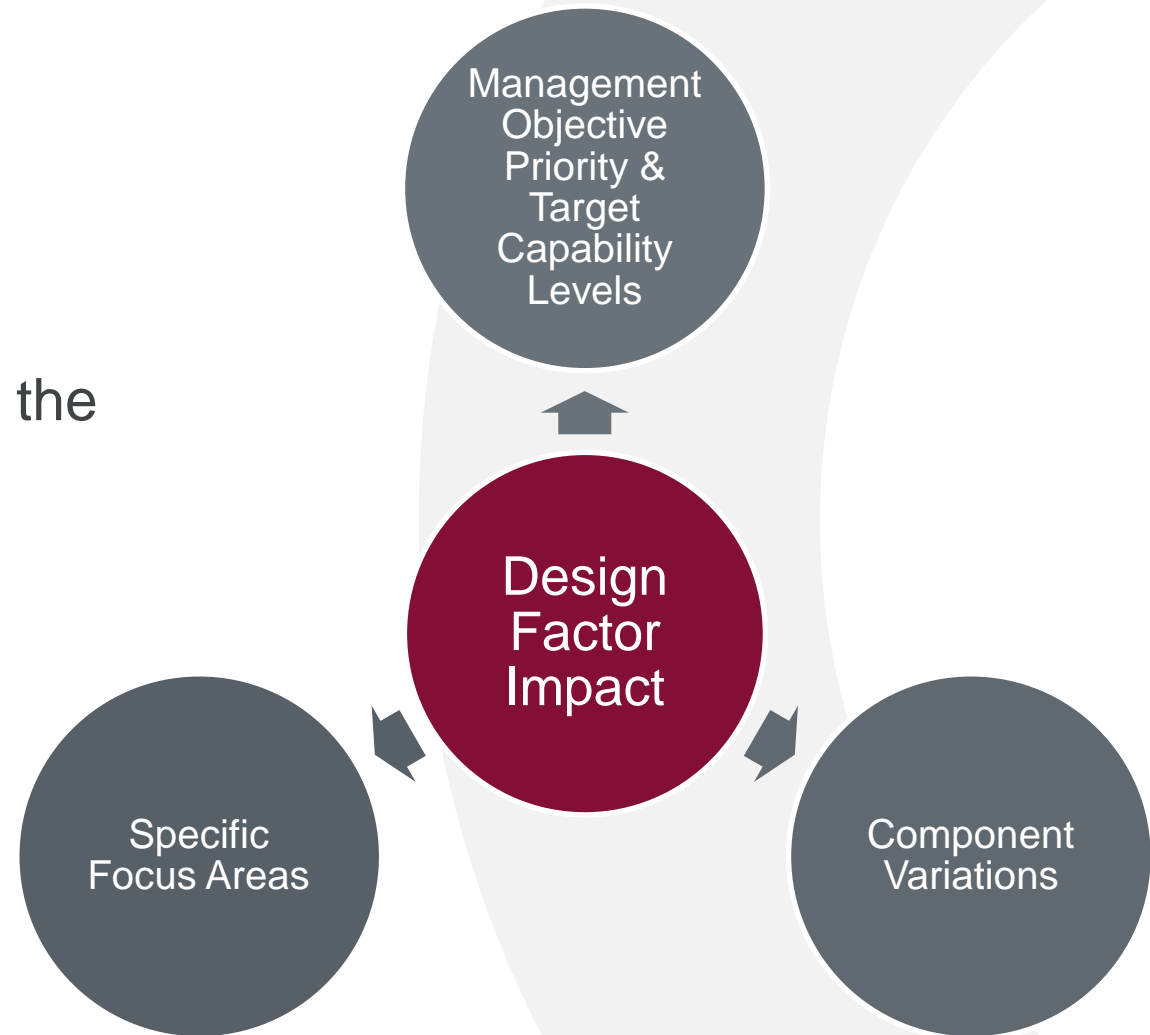
DESIGNING AND IMPLEMENTING A TAILORED GOVERNANCE SYSTEM

USING COBIT 2019

DESIGNING A TAILORED GOVERNANCE SYSTEM

IMPACT OF DESIGN FACTORS

Design factors influence in different ways the tailoring of the governance system of an enterprise.

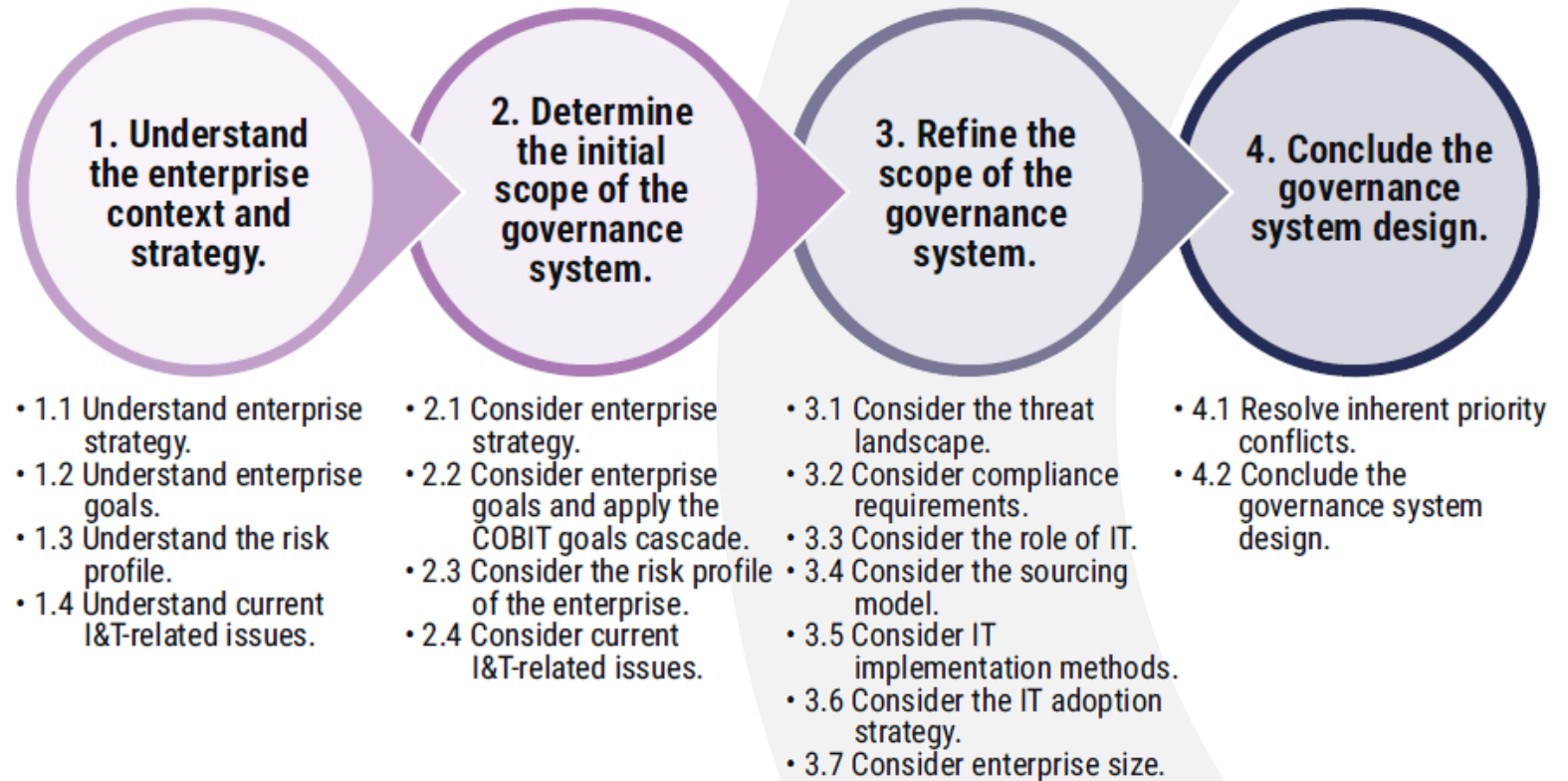


Reference: COBIT® 2019 Framework: Introduction and Methodology, Chapter 7 Designing a Tailored Governance System, Figure 7.1

DESIGNING A TAILORED GOVERNANCE SYSTEM

GOVERNANCE SYSTEM DESIGN WORKFLOW

The different stages and steps in the design process will result in recommendations for prioritizing governance and management objectives or related governance system components, for target capability levels, or for adopting specific variants of a governance system component.



Reference: COBIT® 2019 Framework: Introduction and Methodology, Chapter 7 Designing a Tailored Governance System, Figure 7.2

DESIGNING A TAILORED GOVERNANCE SYSTEM

GOVERNANCE SYSTEM DESIGN WORKFLOW

1. **Enterprise strategy**—Enterprises can have different strategies, which can be expressed as one or more of the archetypes shown in **figure 2.5**. Organizations typically have a primary strategy and, at most, one secondary strategy.

Figure 2.5—Enterprise Strategy Design Factor	
Strategy Archetype	Explanation
Growth/Acquisition	The enterprise has a focus on growing (revenues) ²
Innovation/Differentiation	The enterprise has a focus on offering different and/or innovative products and services to their clients ³
Cost Leadership	The enterprise has a focus on short-term cost minimization ⁴
Client Service/Stability	The enterprise has a focus on providing a stable and client-oriented service. ⁵

DESIGNING A TAILORED GOVERNANCE SYSTEM

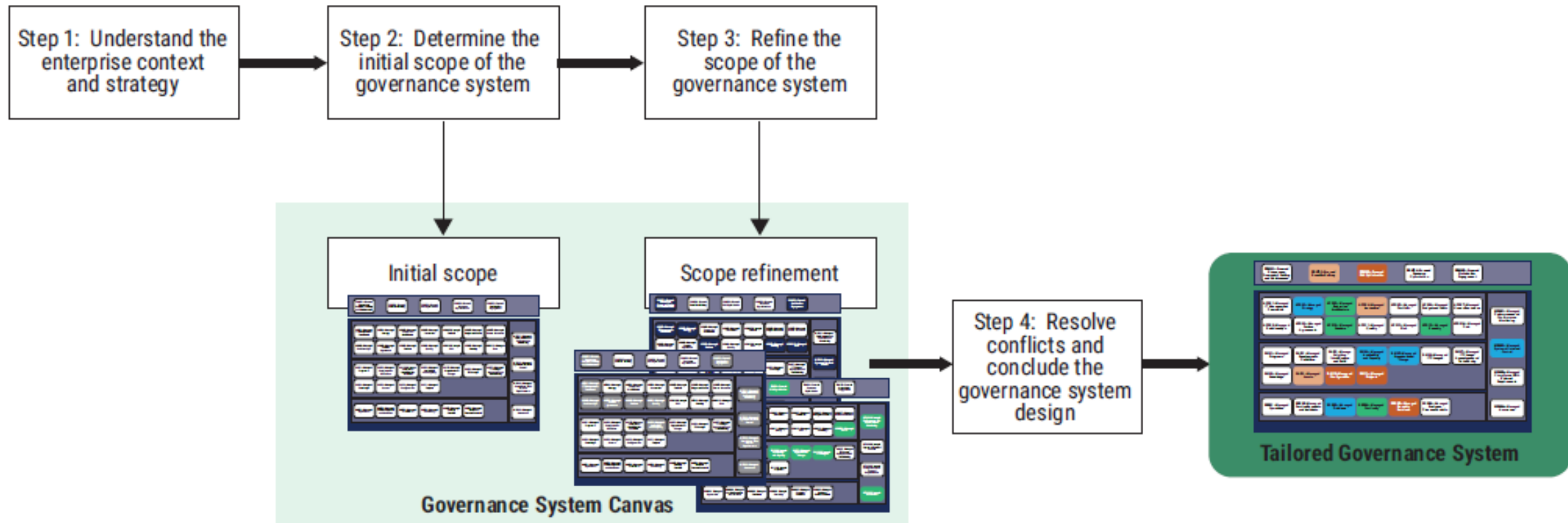
GOVERNANCE SYSTEM DESIGN WORKFLOW

Figure 4.2—Governance and Management Objectives Priority Mapped to Enterprise Strategy Design Factor

Design Factor Value	Governance and Management Objectives Priority	Components	Focus Area Variants
Growth/acquisition	Important management objectives ¹⁵ include: <ul style="list-style-type: none">● APO02, APO03, APO05● BIA01, BAI05, BAI11	Important components: <ul style="list-style-type: none">● Organizational structures<ul style="list-style-type: none">■ Support the portfolio management role with an investment office■ Enterprise architect● Services, infrastructure and applications<ul style="list-style-type: none">■ Facilitate automation and growth and realize economies of scale	COBIT core model
Cost leadership	Important governance and management objectives include: <ul style="list-style-type: none">● EDM04● APO06, APO10	Important components: <ul style="list-style-type: none">● Skills and competencies<ul style="list-style-type: none">■ Focus on IT costing and budgeting skills● Important influence of culture and behavior component● Services, infrastructure and applications component (e.g., for automation of controls, improving efficiency)	COBIT core model

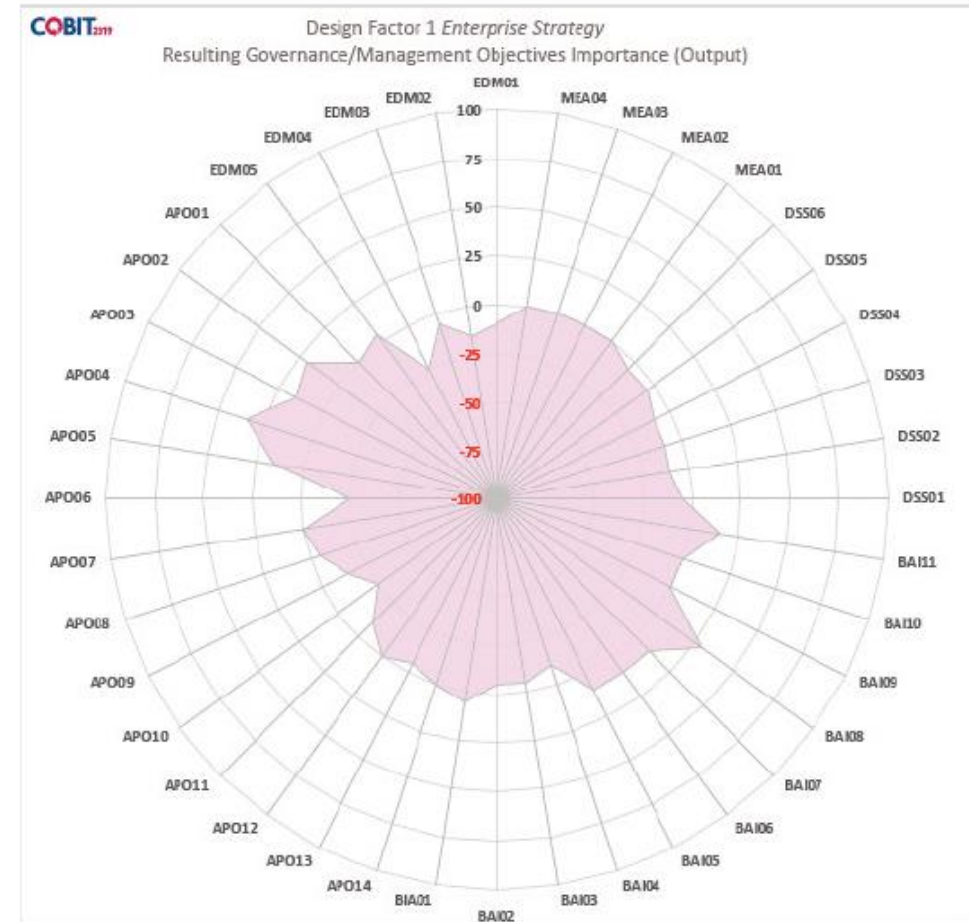
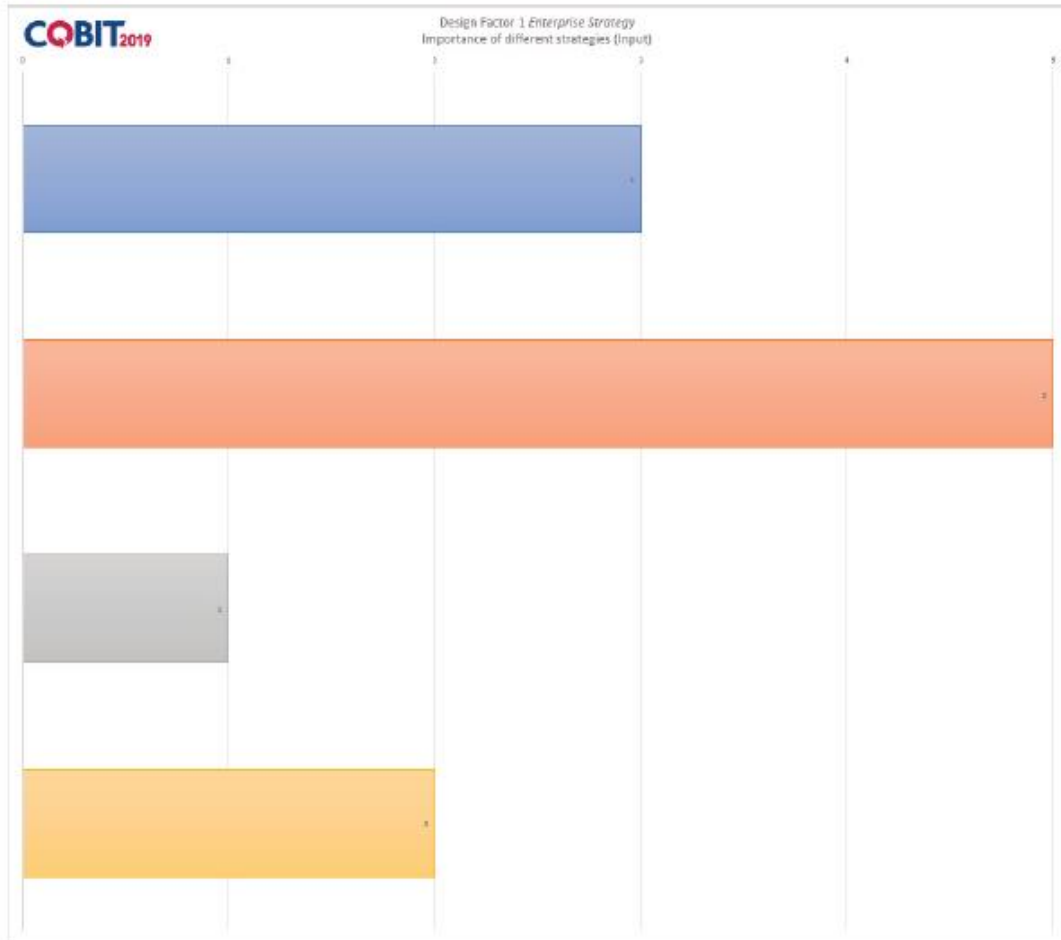
DESIGNING A TAILORED GOVERNANCE SYSTEM

GOVERNANCE SYSTEM DESIGN WORKFLOW



DESIGNING A TAILORED GOVERNANCE SYSTEM

GOVERNANCE SYSTEM DESIGN WORKFLOW



IMPLEMENTING A TAILORED GOVERNANCE SYSTEM

The implementation approach is based on empowering business and IT stakeholders and role players to take ownership of IT-related governance and management decisions and activities by facilitating and enabling change.

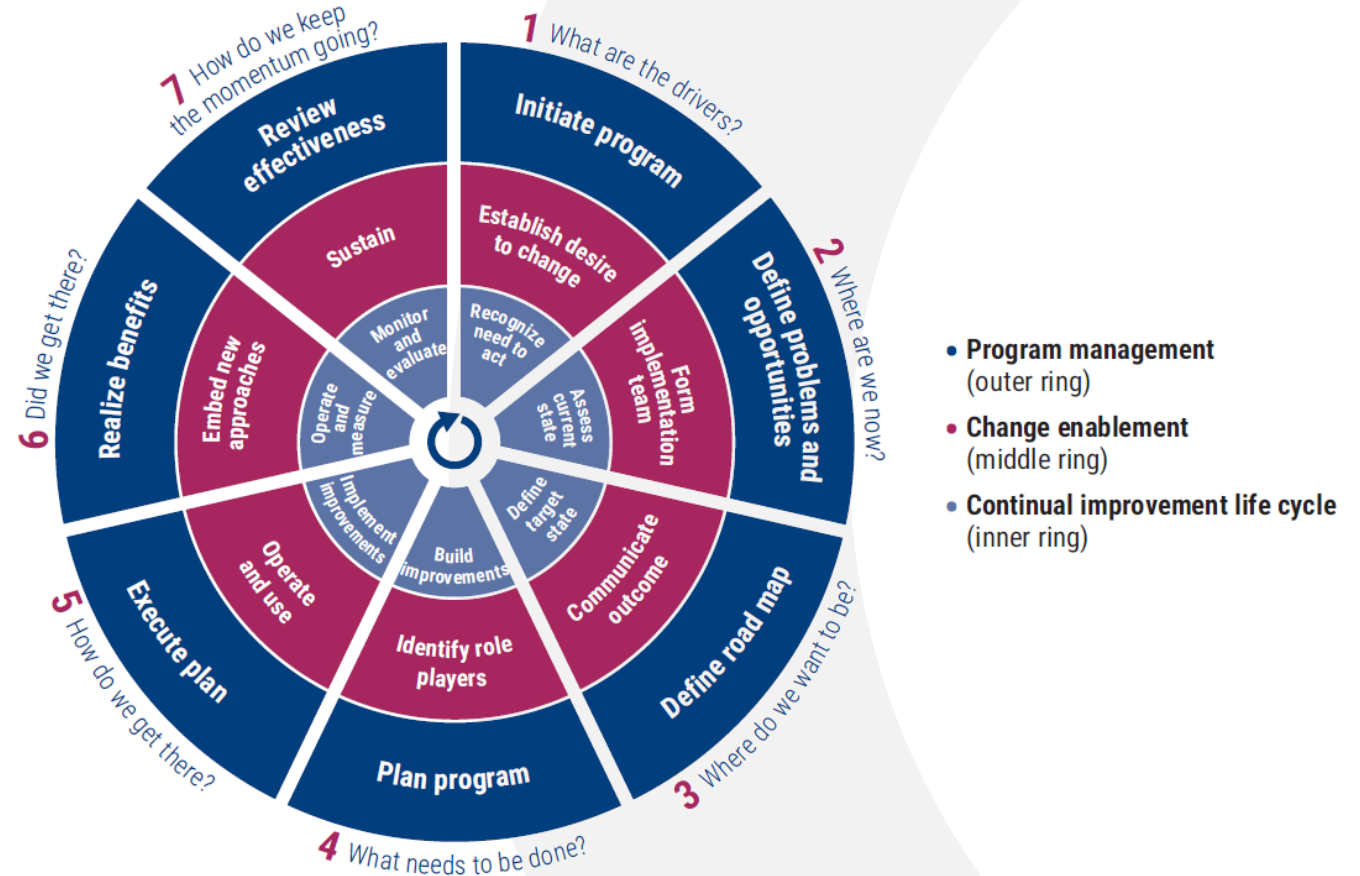
- Implementation guide is a phased approach with three perspectives
 - Continual Improvement
 - Program Management
 - Change Enablement

IMPLEMENTING A TAILORED GOVERNANCE SYSTEM

IMPLEMENTATION

The *COBIT® 2019 Implementation Guide* emphasizes an enterprise-wide view of governance of I&T.

It recognizes that I&T are pervasive in enterprises and that it is neither possible nor good practice to separate business and IT-related activities.



Reference: COBIT® 2019 Framework: Introduction and Methodology, Chapter 8 Implementing Enterprise Governance of IT, Figure 8.1

PERFORMANCE MANAGEMENT

CAPABILITY & MATURITY

PERFORMANCE MANAGEMENT

OVERVIEW

COBIT Performance Management (CPM) refers to how well the governance and management system and all the components of an enterprise work, and how they can be improved up to the required level. It includes concepts and methods such as capability levels and maturity levels.

COBIT 2019 is based on the following principles:

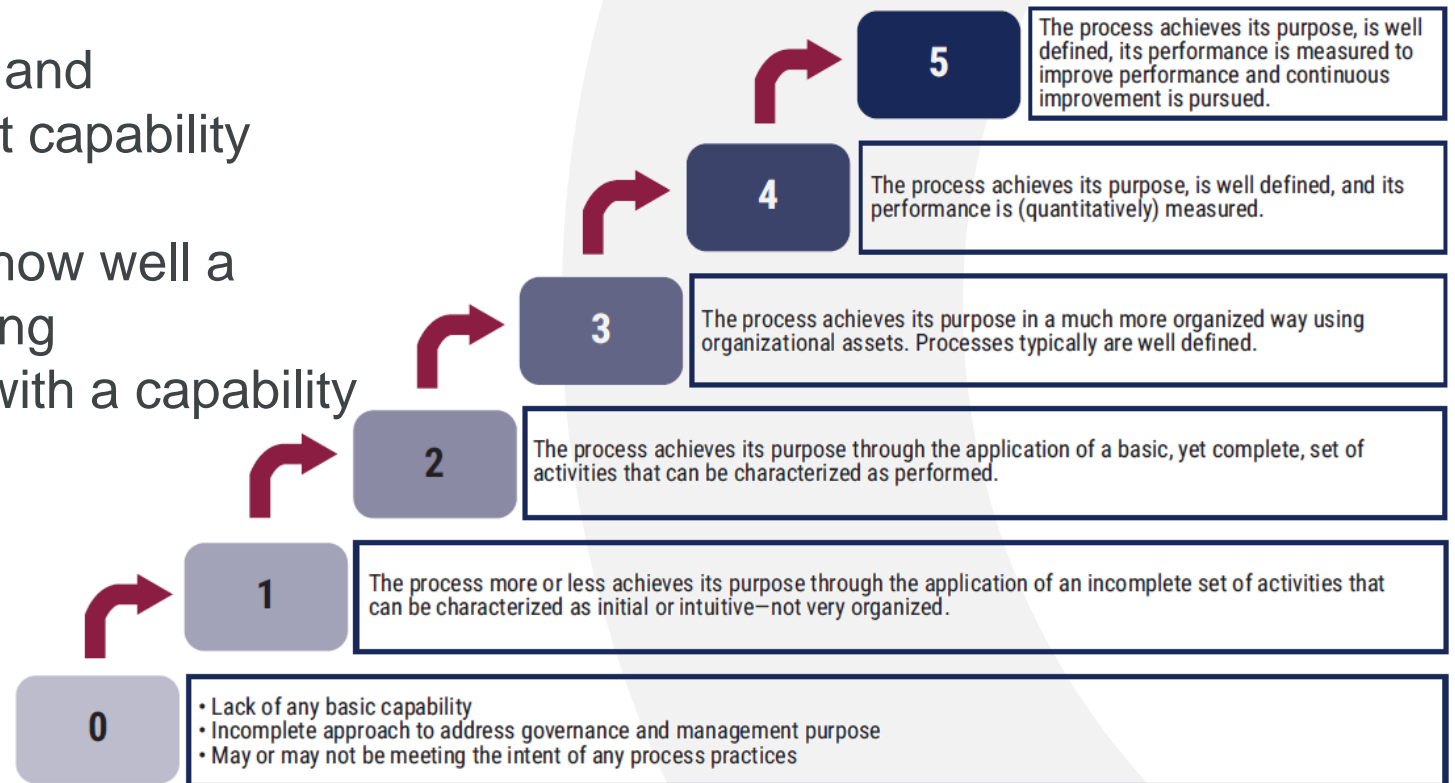
- Simple to understand and use
- Consistent with, and support the COBIT conceptual model
- Provide reliable, repeatable and relevant results
- Must be flexible
- Should support different types of assessments

The term “COBIT Performance Management” (CPM) is used to describe these activities, and the concept is an integral part of the COBIT framework.

PERFORMANCE MANAGEMENT

CAPABILITY AND MATURITY

- COBIT 2019 supports a CMMI-based process capability scheme
- The process within each governance and management objective can operate at capability levels, between 0 to 5
- The capability level is a measure for how well a process is implemented and performing
- Each process **activity** is associated with a capability level



Reference: COBIT® 2019 Framework: Introduction and Methodology, Chapter 6 Performance Management in COBIT, Figure 6.2

PERFORMANCE MANAGEMENT

CAPABILITY AND MATURITY

- Each process activity is associated with a capability level
 - Helps users implement processes at a foundational level
 - Identifies future activities to achieve a higher capability level

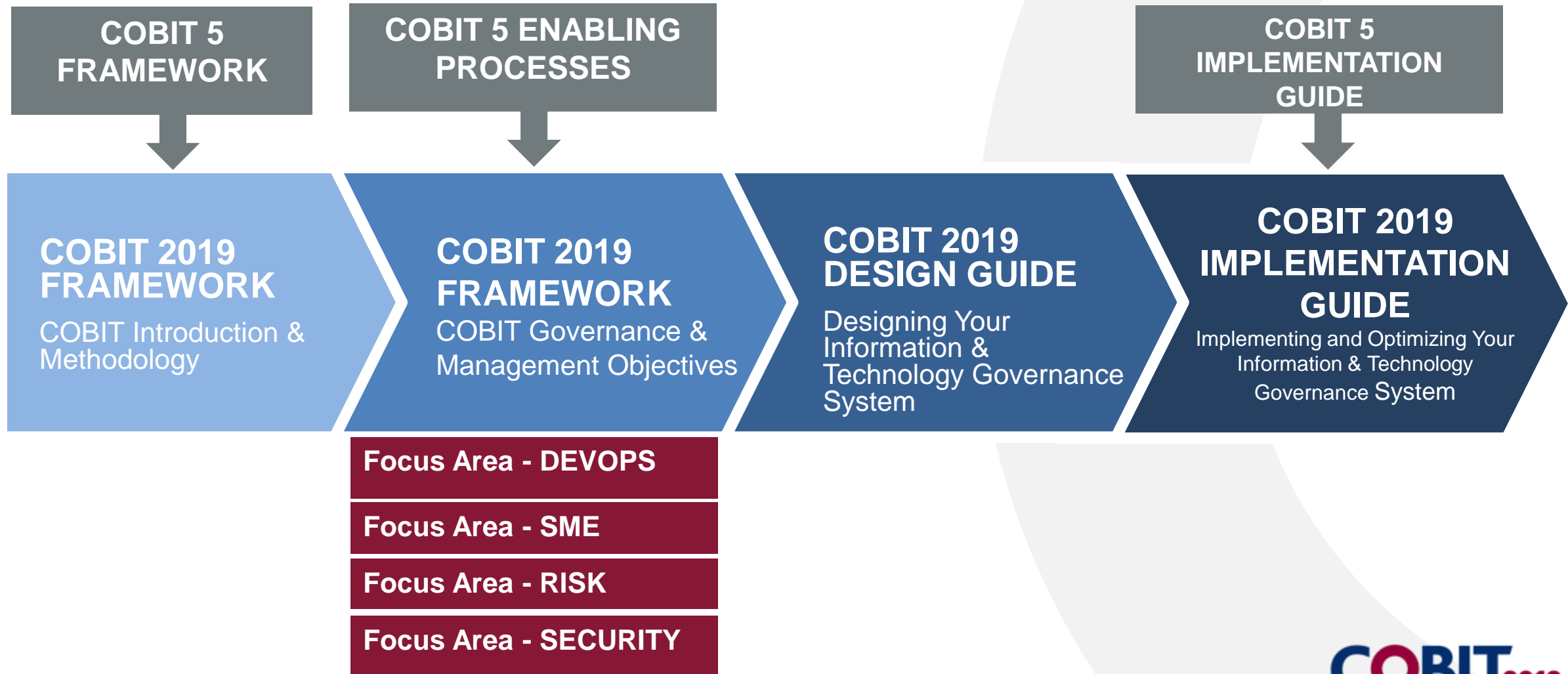
Activities	Capability Level
1. Establish a platform to share good practices and capture information on defects and mistakes to enable learning from them.	2
2. Identify examples of excellent quality delivery processes that can benefit other services or projects. Share these with the service and project delivery teams to encourage improvement.	3
3. Identify recurring examples of quality defects. Determine their root cause, evaluate their impact and result, and agree on improvement actions with the service and/or project delivery teams.	
4. Provide employees with training in the methods and tools of continual improvement.	
5. Benchmark the results of the quality reviews against internal historical data, industry guidelines, standards and data from similar types of enterprises.	4

MAJOR DIFFERENCES

COBIT 5 vs. COBIT 2019

MAJOR DIFFERENCES

ALIGNMENT TO COBIT 5



MAJOR DIFFERENCES WITH COBIT5

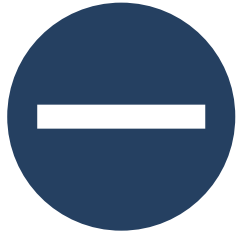
CONCEPTUAL MODEL



- COBIT 2019 has a fully elaborated conceptual model
 - All concepts used in the Framework
 - Relationships between the concepts
- The conceptual model exists as an UML model
- The conceptual model facilitates
 - Consistency when developing new contents
 - Automated solutions development for Governance of Enterprise I&T

MAJOR DIFFERENCES WITH COBIT5


THINGS REMOVED



- The generic enabler model has been removed from the Framework
 - Similar structures will still be part of the COBIT conceptual model, but will remain hidden and hence make COBIT look less complex
- The detailed 'Enabler Guidance' has also been removed, further simplifying COBIT
- Process Goals have been removed
 - Their role is taken over by the process practice statements
- The COBIT 5 PAM and the ISO15504 (now ISO33000) based process capability assessment model have been replaced by a CMMI inspired capability model.
 - **Note: those who want to keep using that model can do so, but there is no separate PAM publication provided with COBIT 2019**

MAJOR DIFFERENCES WITH COBIT5

THINGS RENAMED OR CHANGED

- 
- Enablers' have been renamed 'Components of the Governance System', better expressing what they are
 - The COBIT Principles for Governance Systems and for Governance Frameworks have been renamed and changed
 - 'IT Related Goals' have been renamed to 'Alignment Goals'
 - The structure of the 'process' guidance, now structured as 'Governance/Management Objectives', with process guidance being (only) part of it, complemented with other governance components

MAJOR DIFFERENCES WITH COBIT5

THINGS UPDATED OR REFRESHED



- The Goals Cascade
- Process related guidance (practices and activities) for most processes
- Standards cross-referencing
- COBIT Implementation Guide has been updated to work in conjunction with the Design Guide
- The COBIT Reference Model now contains 40 governance management objectives [processes] instead of 37 processes in COBIT 5
- I&T Related Risk Scenarios

MAJOR DIFFERENCES WITH COBIT5

THINGS THAT ARE NEW



- The Governance and Management Objectives concept
- 3 additional Management Objectives
 - APO14 – Managed Data
 - BAI11 – Managed Projects
 - MEA04 – Managed Assurance
- The Focus Area concept, making COBIT flexible and more practical
- The Design Factor concept, allowing to build better tailored governance systems
- Process Capability Assessment based on the CMMI approach, process activities assigned a capability level
- The COBIT® 2019 Design Guide

APPENDIX

COBIT 2019 TRAINING AND CERTIFICATE SCHEME

BRIDGE TRAINING

Prerequisites

COBIT 5 Foundation Certificate (through APMG or PeopleCert)

Duration

1-day workshop

Available Training

Instructor led (live or virtual live) through ATO or accredited trainer

Timing

January 2019

COBIT® 2019 FOUNDATION CERTIFICATE PROGRAM

PREREQUISITES

N/A

Duration

2-day or 3-day with exam prep

Available Training/Preparation resources

- Instructor led through ISACA, ATO or accredited trainer
- Self-study (COBIT® 2019 Framework and derivative publications)

Certificate exam

- Online proctored only
- Multiple choice

Timing

January 2019

COBIT® 2019 DESIGN / IMPLEMENTATION CERTIFICATE PROGRAM

Prerequisites

COBIT® 2019 Framework Certificate

Duration

2-day or 3-day with exam prep

Available Training

- Instructor led through ISACA, ATO or accredited trainer

Assessment (in development)

- Online proctored

Timing

Q2 2019

ABOUT ISACA

Nearing its 50th year, **ISACA**® (isaca.org) is a global association helping individuals and enterprises achieve the positive potential of technology. Today's world is powered by technology, and ISACA equips professionals with the knowledge, credentials, education and community to advance their careers and transform their organizations.

ISACA leverages the expertise of its 450,000 engaged professionals in information and cyber security, governance, assurance, risk and innovation, as well as its enterprise performance subsidiary, CMMI® Institute, to help advance innovation through technology. ISACA has a presence in 188 countries, including 217 chapters worldwide and offices in both the United States and China.