

4233202 - TKTI



TA 2024/2025

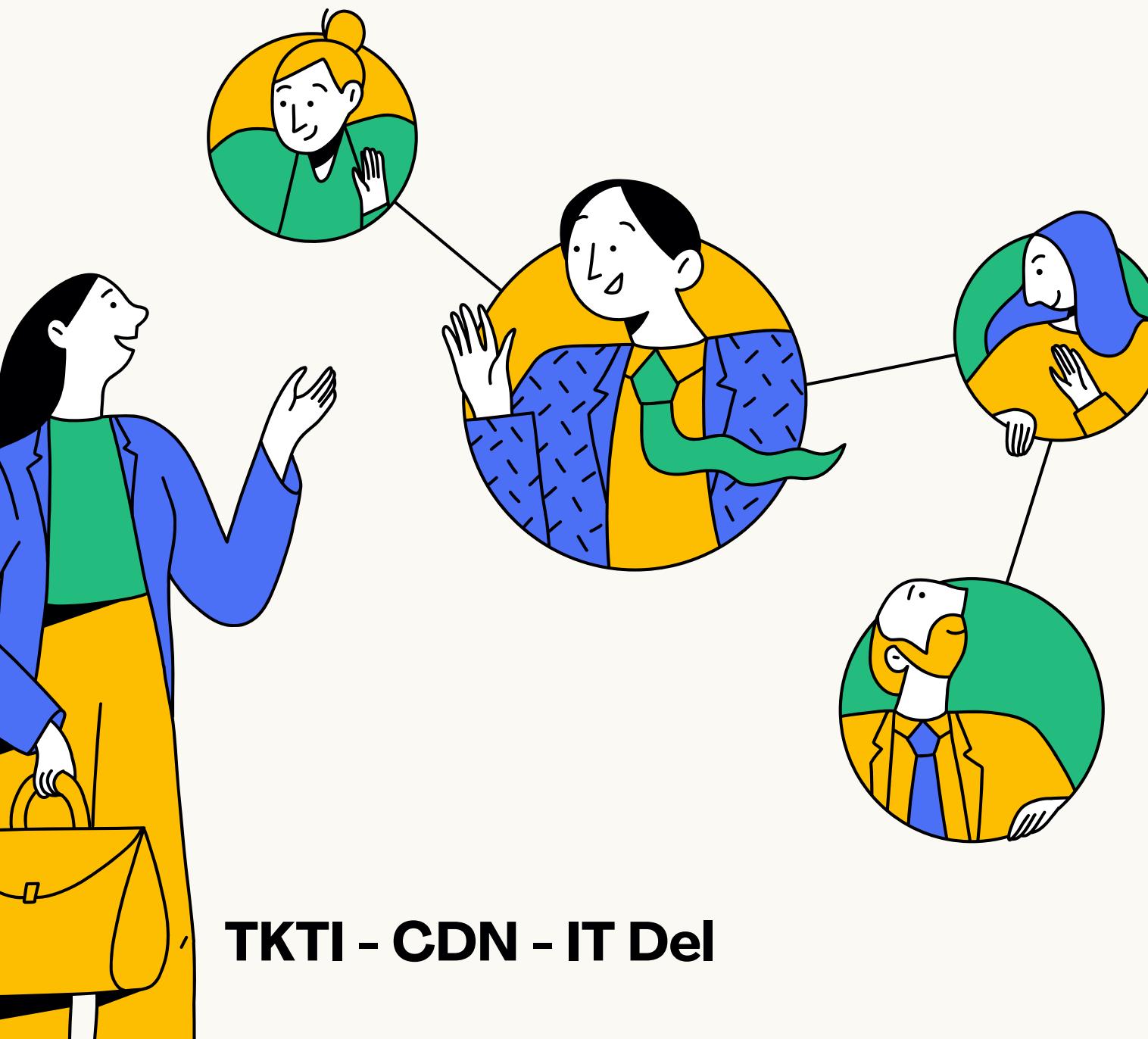
Overview of IT Governance Frameworks

Fakultas Vokasi | D3 TI
Institut Teknologi Del

Presented by
Cynthia Deborah Nababan, M.Kom



Konten Perkuliahan



Effective IT Governance Frameworks



**Key Domains Of IT Governance
Framework**



**Choosing the Right IT Governance
Framework**



**Implementation and Benefit of the
IT Governance Framework**

Governance Humour

'Sometimes, In organizations or governments, governance, which should make the system better, often feels difficult, while success may occurs when wrong rules/policies are removed."



What Is The IT Governance Framework?

“A structured system that outlines how an organisation’s IT resources are managed and controlled.”
It provides clear guidelines for decision-making, accountability, and the alignment of IT with business objectives.



COBIT

(CONTROL OBJECTIVES FOR INFORMATION AND RELATED TECHNOLOGIES)

TKTI - CDN - IT Del

A governance framework to steer and manage enterprise IT so it supports business goals and delivers value.

Functions

1. Strategic Alignment: keeps IT goals tied to business objectives.
2. Maximize the value of IT investments: focuses work and spending so IT investments pay off.
3. Risk Management: finds, rates, and treats IT risks to protect the organization's assets and reputation.
4. Resource Management: guides efficient use of people, processes, and technology.
5. Performance Measurement: supplies metrics to drive continuous improvement.

KEY COMPONENTS

- **Governance & management objectives:** a structured set of processes, roles, and policies.
- **Control objectives:** targets like data integrity, protection, and service continuity.
- **Maturity models:** assess current capability and plan improvements.



(CONTROL OBJECTIVES FOR INFORMATION AND RELATED TECHNOLOGIES)

TKTI - CDN - IT Del

Best Fit

COBIT is ideal for organisations with enterprise-level governance ambitions – those that need a consistent model across multiple business units, risk domains, or regulatory boundaries. It's particularly well-suited for industries where transparency, accountability, and formal oversight are non-negotiable, such as financial services, healthcare, and public sector entities.

Use Case/ Getting started:

- Define governance objectives linked to business goals
- Set up roles/policies by process
- Use control objectives to design procedures and risk practices
- Review progress with maturity assessments.



ISO/IEC 38500

TKTI - CDN - IT Del

A high-level standard for governance of IT—guidance for boards and executives on responsible, effective use of IT—positioning it alongside financial, legal, and operational oversight.

Where COBIT offers structure and control, ISO/IEC 38500 offers principles and posture.

Functions

- Governance Principles: accountability, transparency, ethical behavior.
- Leadership and Organizational Structure: clarifies roles and oversight for IT decisions.
- Decision-Making Framework: ensures IT decisions support business strategy.



Six Principles/ Component

1. **Responsibility** – Clear definition of roles and responsibilities for IT decisions.
2. **Strategy** – IT must support the organisation's current and future strategy.
3. **Acquisition** – IT investments should be justified and made for valid reasons.
4. **Performance** – IT should deliver measurable value.
5. **Conformance** – IT must comply with all policies, laws, and regulations.
6. **Human Behaviour** – Consider the human factors in IT decisions and use.

ISO/IEC 38500

TKTI - CDN - IT Del

Best Fit

ISO/IEC 38500 is best suited for executive and board audiences, especially in organizations seeking to unify IT governance with enterprise governance. It offers a strategic lens for organizations experiencing digital transformation, M&A activity, or pressure to modernize governance across C-suite.

Use Case/ Getting started

- Establishing board-level awareness of IT governance
- Integrating IT governance with corporate governance
- Creating policy-level accountability frameworks
- Educating non-technical stakeholders on governance responsibilities



(INFORMATION TECHNOLOGY INFRASTRUCTURE LIBRARY)

Unlike COBIT and ISO/IEC 38500, ITIL operates not in the boardroom but on the ground—where services are delivered, tickets are resolved, and systems are maintained.

But don't mistake it for a tactical tool:

ITIL is a governance framework for service value, ensuring that every service the IT function delivers contributes to business goals.

Functions

- Service Strategy: decide which services to offer and why.
- Service Design: plan processes, SLAs, and policies for quality and efficiency.
- Service Transition: move new/changed services into production safely.
- Service Operation: run day-to-day operations to meet expectations.
- Continual Improvement: raise service performance and satisfaction over time.

KEY COMPONENTS

- **Incident Management:** restore service fast.
- **Problem Management:** remove root causes.
- **Change Management:** control change with minimal disruption.
- **Service Level Management:** agree and meet service targets with the business.



(INFORMATION TECHNOLOGY INFRASTRUCTURE LIBRARY)

TKTI - CDN - IT Del

Best Fit

ITIL is the framework of choice for organizations that see IT as a service provider and need to manage demand, performance, and improvement systematically. It's particularly effective in large enterprises, managed services environments, and regulated industries where reliable service delivery is tied directly to business performance and risk posture.

Use Case

- Standardizing service delivery in complex IT environments
- Aligning IT operations with business demand
- Embedding continual improvement into governance routines
- Supporting DevOps, Agile, and hybrid delivery models



TOGAF

(THE OPEN GROUP ARCHITECTURE FRAMEWORK)

TKTI - CDN - IT Del

Every digital strategy is implemented through architecture—systems, processes, platforms, and data structures. TOGAF provides the governance to make sure that enterprise architecture—designing how business, data, applications, and technology fit together.

Functions

- Architecture Development: create architectures that support strategy.
- Business-IT Alignment: ensure technology design meets business needs.
- Integration and Standardization: reduce duplication and complexity.



Key Components

1. **Architecture Principles:** foundational guidelines for design choices.
2. **Architecture Governance:** processes and bodies that oversee architecture.
3. **Standards Compliance:** align with internal/external standards.

TOGAF

(INFORMATION TECHNOLOGY INFRASTRUCTURE LIBRARY)

TKTI - CDN - IT Del

Best Fit

TOGAF is best suited for organizations with mature or maturing enterprise architecture practices, particularly those managing legacy modernization, ERP landscapes, or cloud migration at scale. It offers the scaffolding to ensure that architecture evolves with the business—not around it.

Use Case/ Getting started

- Define architecture principles and the target state
- Apply TOGAF methods to design and plan
- Standardize and integrate processes/systems
- Use governance to keep execution on track



(CAPABILITY MATURITY MODEL INTEGRATION)

A model to improve how your organization works—processes, behaviors, and outcomes in software, product, or service delivery.

Functions

1. Process Improvement: raise quality and consistency.
2. Performance Management: measure and manage process capability.
3. Capability Development: strengthen areas like project and engineering.

Getting started

Assess current maturity → pick priority process areas → adopt best practices → re-assess and climb maturity levels.

TKTI - CDN - IT Del

KEY COMPONENTS

- **Maturity Levels:** from initial to optimizing (continuous improvement).
- **Process Areas:** e.g., QA, configuration management, supplier management.
- **Best Practices:** actionable practices for better outcomes.

NIST Cybersecurity Framework

TKTI - CDN - IT Del

A practical framework to assess and improve your ability to prevent, detect, respond to, and recover from cyber threats.

Functions

- Identify: Understand the organization's cybersecurity risks to systems, assets, data, and capabilities.
- Protect: Develop and implement appropriate safeguards to protect critical infrastructure services.
- Detect: Implement activities to identify the occurrence of a cybersecurity event.
- Respond: Take action regarding a detected cybersecurity incident.
- Recover: Develop and implement plans for resilience and recovery from cybersecurity events.



Six Principles/ Component

1. **Risk assessment:** understand threats, vulnerabilities, and impact.
2. **Access control:** manage who can do what.
3. **Incident response:** plans, roles, and playbooks.
4. **Training & awareness:** people know how to reduce risk.

Getting started

Profile current posture against the framework
→ prioritize gaps → implement protections and detection/response → rehearse recovery and update the profile regularly.

FAIR

(FACTOR ANALYSIS OF INFORMATION RISK)

TKTI - CDN - IT Del

A framework to quantify information risk in financial terms, so leaders can compare options and justify investments.

Functions

- Risk Assessment: structured analysis of loss events.
- Decision Support: show potential losses and prioritize spend.
- Risk Communication: clear, consistent language for stakeholders.

KEY COMPONENTS

- **Risk Taxonomy:** common categories for causes and effects.
- **Quantitative Analysis:** likelihood \times impact in money terms.
- **Scenario Modeling:** test “what if” situations for better choices.

Getting started

Map key risks using the taxonomy → run quantitative scenarios (frequency \times magnitude) → use results to prioritize treatments and explain choices in business language.

COSO

(COMMITTEE OF SPONSORING ORGANIZATIONS OF THE TREADWAY COMMISSION)

TKTI - CDN - IT Del

Guidance for internal control, enterprise risk management, and fraud deterrence to strengthen performance and governance.

Functions

1. Internal Control: Helps organizations establish controls that protect assets and reliable reporting.
2. Enterprise Risk Management (ERM): Provides a holistic approach to identify and manage risks across the enterprise.
3. Corporate Governance: Strengthens governance practices to reinforce accountability, transparency, and compliance.

KEY COMPONENTS

- **Control Environment:** tone at the top and culture.
- **Risk Assessment:** understand risks to objectives.
- **Control Activities:** policies/procedures to mitigate risk.
- **Information & Communication:** timely, relevant data flows.
- **Monitoring:** verify controls keep working.

Getting started

Establish the control environment → assess risks → implement controls → communicate clearly → monitor and refine continuously.

Overview of the Major Frameworks

TKTI - CDN - IT Del

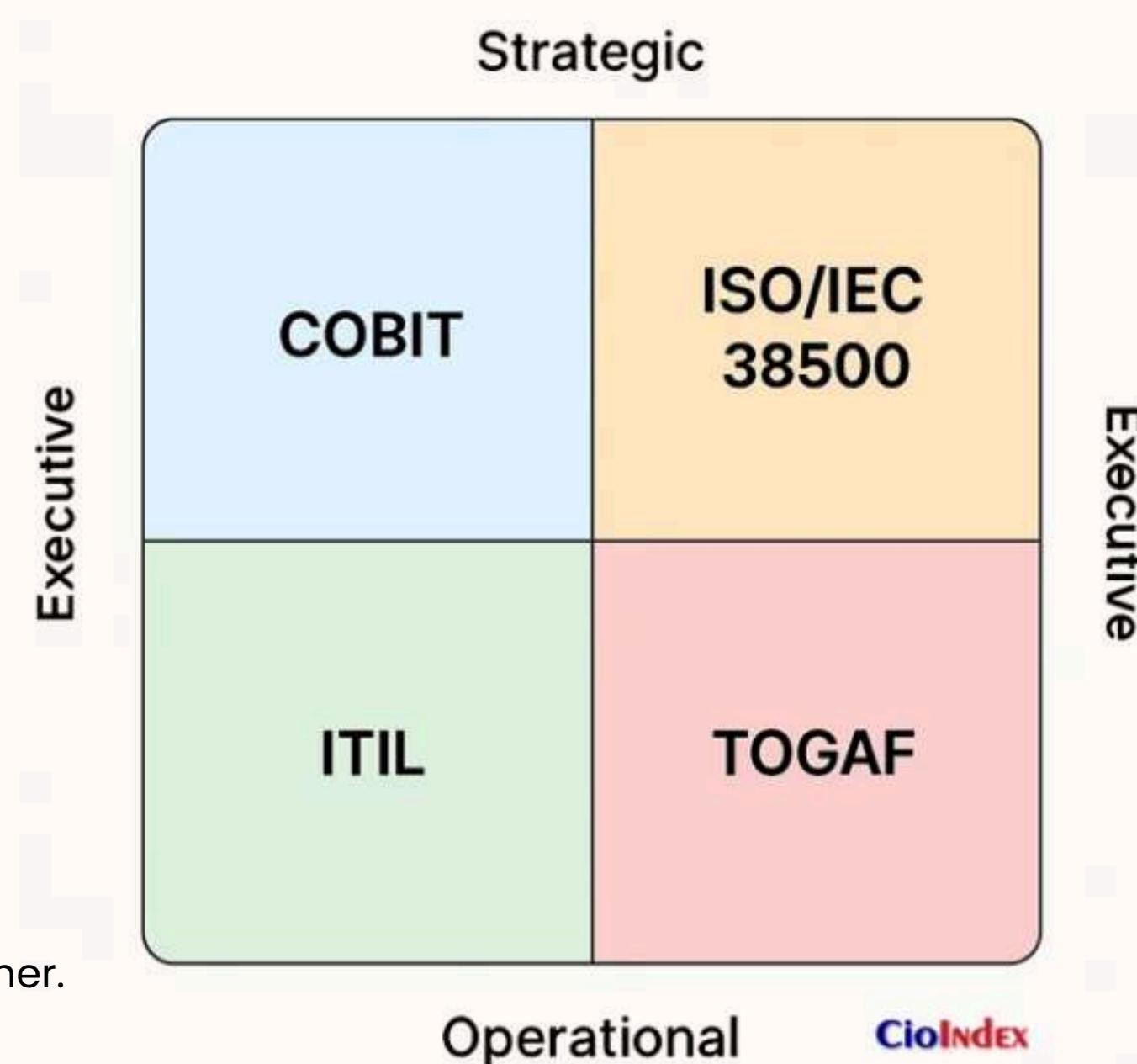
Frameworks don't govern your organisation—you do.

*Use them not to standardise for the sake of compliance,
but to build the clarity, control, and cohesion that
modern digital enterprises demand.*

Putting It Together (How to choose)

- If you need board-level direction: start with **ISO/IEC 38500** and **COBIT**.
- If services must run reliably: adopt **ITIL** for ITSM and measure with SLAs/KPIs.
- If security is central: build an ISMS (**ISO 27001**) and use **NIST CSF** for posture and playbooks; use **FAIR** to quantify risk.
- If architecture is messy: use **TOGAF** to design and govern the target state.
- If processes vary by team: apply **CMMI** to lift capability and maturity.
- If you need enterprise-wide control & assurance: use **COSO** to tie it all together.

Framework Landscape Map



Operational

CioINDEX

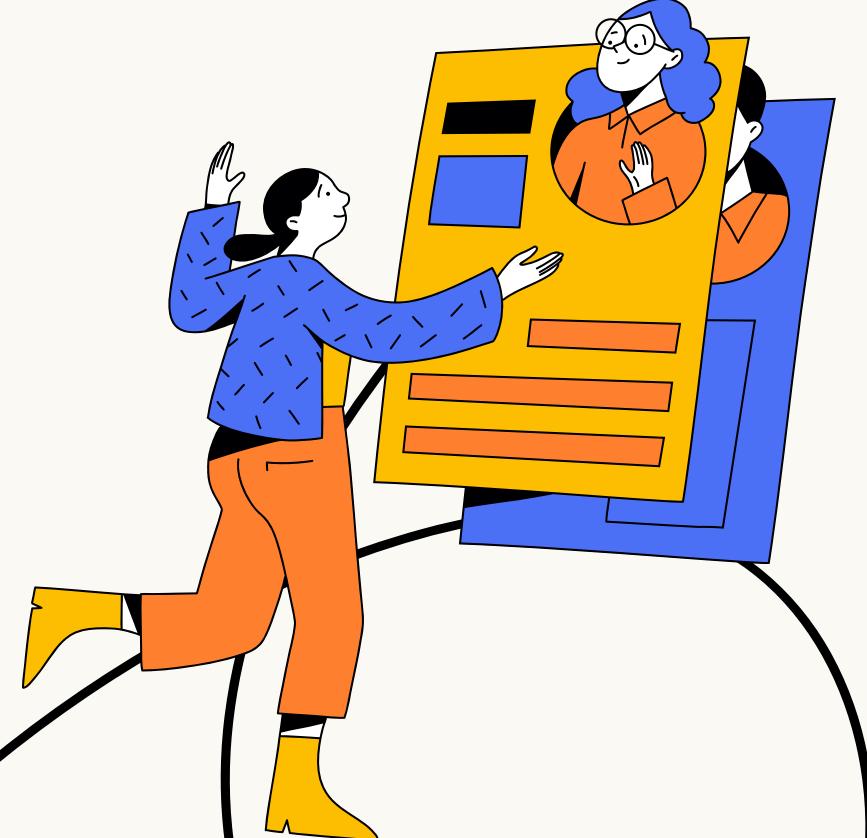
Choosing the Right IT Governance Framework

To make an informed choice, consider the following key aspects:

- **Assess Business Objectives and Needs:** Begin by understanding your organization's goals, industry-specific requirements, size, complexity, and risk tolerance.
- **Identify Relevant Standards and Regulations:** Research industry-specific standards and regulations that impact IT governance.
- **Review Available Frameworks:** Thoroughly examine the official documentation, guides, and case studies of potential frameworks.
- **Consult with Experts and Peers:** Engage with IT experts within your organization and seek input from industry peers who have experience with various frameworks.
- **Evaluate Resource Availability:** Consider the resources required for implementing and maintaining the chosen framework.
- **Conduct a Pilot Implementation:** Before committing to a full-scale implementation, conduct a pilot project to test the framework on a smaller scale.
- **Measure Success and Continuous Improvement:** Establish key performance indicators (KPIs) and metrics to evaluate the framework's effectiveness.

Implementing IT Governance Framework

Implementing and planning IT governance requires a tailored approach since every organization has its unique needs and structures.



TKTI - CDN - IT Del

Here are some practical tips to help us through the process:

- 1. Define the Role of IT Governance:** Understanding the role that IT governance will play in your organization is crucial.
- 2. Start with a Proven Framework:** Begin with a well-established IT governance framework or template.
- 3. Engage Other Team Members:** Once the IT governance framework is in place, involve your teams actively.

Benefits of Good IT Governance

TKTI - CDN - IT Del

Good IT Governance provides the following benefits:

- Standardized process and procedures to better manage the IT environment.
- Maximise return on IT investment.
- More effective IT because of a closer alignment with the business.
- Alignment with corporate objectives.
- Consistency with IT Strategy & Policy.
- Accountability and transparency in decision making that impacts on IT.

Managing IT governance complexities is crucial for organisations aiming to align technology strategies with business goals. Each frameworks provide effective approaches for managing IT resources, mitigating risks, and ensuring compliance with industry standards and regulations.



Link of Interests

- **The IT Governance Institute :** <http://www.itgi.org/>
- **Information's Systems Audit and Control Association :**
<https://www.isaca.org/Pages/default.aspx>
- **IT Governance Network :** <http://www.itgovernance.com/00/index.php>
- **ITIL Forum :** <http://www.itilcommunity.com/modules.php?name=Forums&file=viewforum&f=8>
- **Best Management Practice :** <http://www.best-management-practice.com/>
- **Microsoft Operations Framework :** <http://technet.microsoft.com/en-us/library/cc506049.aspx>
- **Project Management Institute :** <http://www.pmi.org/Pages/default.aspx>
- **ISACA :** <https://www.isaca.org/Pages/default.aspx>

Comparison of IT Governance Frameworks

TKTI - CDN - IT Del

There is no shortage of frameworks in the IT governance ecosystem,

—each born from different priorities, serving different audiences, and evolving over time.

What distinguishes them is their point of entry:

- Strategic vs. operational,
- Principle-based vs. process-based,
- Broad vs. domain-specific.

Framework	Primary Focus	Scope	Best Used For	Primary Audience
COBIT	Enterprise IT governance	Strategic + tactical	Aligning IT with business strategy and risk	CIOs, Risk Officers, Auditors
ISO/IEC 38500	Corporate-level IT oversight	Executive + board level	Policy and accountability at the highest levels	Boards, Executives
ITIL	IT service delivery and management	Operational	Standardizing IT service performance	IT Ops, Service Managers
TOGAF	Enterprise architecture governance	Strategic + architectural	Business-aligned IT architecture design	Enterprise Architects, CIOs
NIST CSF	Cybersecurity governance	Risk and security	Managing cyber risk and security controls	CISOs, Compliance Teams
CMMI	Capability maturity & process quality	Process performance	Improving delivery performance and governance	PMOs, QA Leaders

i KESIMPULAN

- **IT governance frameworks** provide crucial structures for aligning IT with business goals, enhancing decision-making, and managing risks effectively, leading to improved resource allocation, operational efficiency, and compliance with regulations and standards.
- Their successful implementation hinges on **careful planning, stakeholder engagement, continuous improvement, and customization** to align with specific organizational needs and goals.



i REFERENSI

- 1.ISACA (2019). COBIT 2019 Framework: Governance and Management Objectives.
- 2.Weill, P., & Ross, J. W. (2004). IT Governance: How Top Performers Manage IT Decision Rights for Superior Results. Harvard Business School Press.
- 3.Top 9 IT Governance Frameworks in 2025 | ZLuri. (n.d.).
<https://www.zluri.com/blog/it-governance-frameworks#factors-to-consider-when-choosing-the-right-it-governance-framework>
- 4.IT Governance Frameworks Collection - CIO Portal. (n.d.). CIO Portal.
<https://cioindex.com/references/it-governance-frameworks/>



TERIMAKASIH

Stay Happy & Healthy

| TKI 2024/2025 |

| Fakultas Vokasi |

| Institut Teknologi Del |