

# Enterprise Data Architecture

In this presentation, I will share my experience working with enterprise data architecture, highlighting best practices and industry standards. We will dive into DAMA-DMBOK, TOGAF, and ARIS tools, demonstrating their practical application through a real-world example.



# Overview of DAMA-DMBOK Framework

## 1 Data Management Body of Knowledge

The DAMA-DMBOK is a comprehensive guide to data management, encompassing the full data lifecycle.

## 2 Best Practices and Standards

It provides a standardized framework for addressing data-related challenges and ensuring data quality, integrity, and security.

## 3 Unified Approach

DAMA-DMBOK promotes a consistent approach to data management across organizations, fostering collaboration and efficiency.

## 4 Industry Recognition

This framework is widely recognized and adopted by data professionals globally, fostering knowledge sharing and best practice adoption.

# TOGAF methodology



## Applying TOGAF Methodology

1

### Architecture Vision

We had a vision for the data architecture, outlining its purpose and key objectives.

2

### Business Requirements

Defined the business requirements that the data architecture to address, ensuring alignment with organizational goals.

3

### Architecture Definition

I developed the detailed data architecture blueprint, including components, relationships, and standards.

4

### Implementation and Transition

Implemented the data architecture, ensuring a smooth transition and ongoing management.



# ARIS Tool for Enterprise Architecture

## Modeling Capabilities

ARIS helped us to support various modeling techniques, including data modeling, process mapping, and organization structure visualization.

## Data Integration and Analysis

It enabled us to integrate and make analysis of data from different sources, providing a comprehensive view of the enterprise data landscape.

## Collaboration and Communication

ARIS facilitated collaboration among stakeholders, promoting a shared understanding of data architecture and processes.

## Business Process Automation

ARIS supported business process automation, streamlining workflows and improving overall efficiency.



# Data Architecture at NAC Kazatomprom JSC

## Data Governance Framework

Implemented a data governance framework based on DAMA-DMBOK principles to ensure data quality and consistency.

## Data Modeling and Integration

Developed a comprehensive data model using ARIS to integrate data from various systems and provide a unified view.

## Data Warehouse and Analytics

Designed and implemented a data warehouse to support business intelligence and analytics, providing insights into key business metrics.

A photograph of three business women sitting around a white table in a meeting. The woman on the left is looking towards the center, the woman in the middle is looking directly at the camera, and the woman on the right is looking towards the center. They are all wearing professional attire. The background is a soft, out-of-focus office setting.

# Data Governance and Stewardship

1

## Data Policy and Standards

Established comprehensive data policies and standards to guide data management practices.

2

## Data Ownership and Accountability

Defined data ownership roles and responsibilities, ensuring data accountability throughout the organization.

3

## Data Access Control

Implemented access controls to protect sensitive data and ensure authorized access.

# Data Governance

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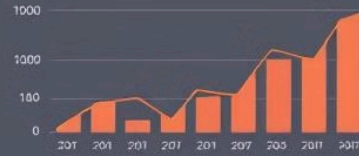
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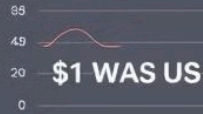


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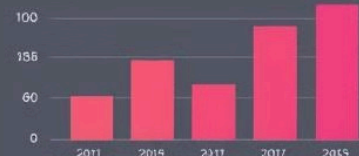
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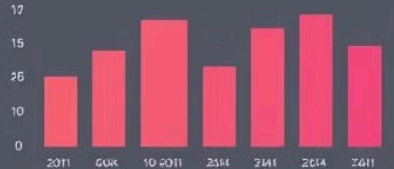
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# Data Quality Management



## Data Accuracy

Ensured data accuracy through data validation and cleansing processes.



## Data Completeness

Established mechanisms to ensure data completeness by addressing missing or incomplete data.



## Data Consistency

Implemented data consistency checks to eliminate conflicting or redundant data.



## Data Timeliness

Focused on data timeliness by ensuring data is updated regularly and made available in a timely manner.



# Thank you !

Questions?

