

Mapping Your Data

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Privacy and Data Governance Officer

Data Tagging for Data Governance's Sake

Data tagging (in all of its various iterations) is simply a means to an end.

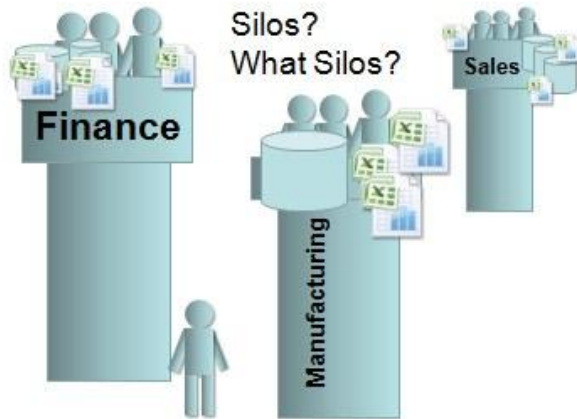
We use it so that we may more effectively govern our data.

So the larger question is: Why do we want to govern our data, how do we go about it, and how can data tagging help?

Data Governance – The Basics

- Data Governance is the collection of policies, procedures and control mechanisms that allows a business to both have full knowledge as to the scope and nature of its data as well as apply appropriate protections to that data.
- Every company struggles with understanding their own data. First and foremost you have to ask yourself the following:
 - Do I know where my data is?
 - Do I know what my data is?
 - Do I know where my data came from and where it goes?
 - Do I know who is in control of my data?
 - Do I know who “owns” my data (is it the same person that controls it?)?
 - Do I know when my data is created, when it’s destroyed and what happens in-between?
- Usually the answer is NO.

Common Data Problems



Data Silos

Ownership



Distributed Data

Data Tagging as a Solution

- Data tagging can help to simplify or eliminate a number of these problems.
- What information do we want to apply to our data?
 - Records Management Information
 - Owner
 - Information Security Classification (including PII)
 - Source Application
 - Internal/External

What Does Data Tagging Get You?

- A simplified view of your data
- An understanding of the sources and recipients of your data
- An understanding of the nature of your data, including:
 - How long are you supposed to keep it?
 - Are you required to store it in a particular manner?
 - Who can access the data?
 - When can you destroy it?
 - Who is granted the authority to make decisions about it?

Mapping Your Data

Alex Zadrozny CISA,CRISC

Zmen Systems LLC

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Alex Zadrozny CISA, CRISC

- 35 years overall IT experience
- 9 years Regulatory / Compliance experience
- Insurance / Finance / Energy verticals
- Practical approach to compliance
- Translator of Audit-speak to IT terms

Problem Statement(s)

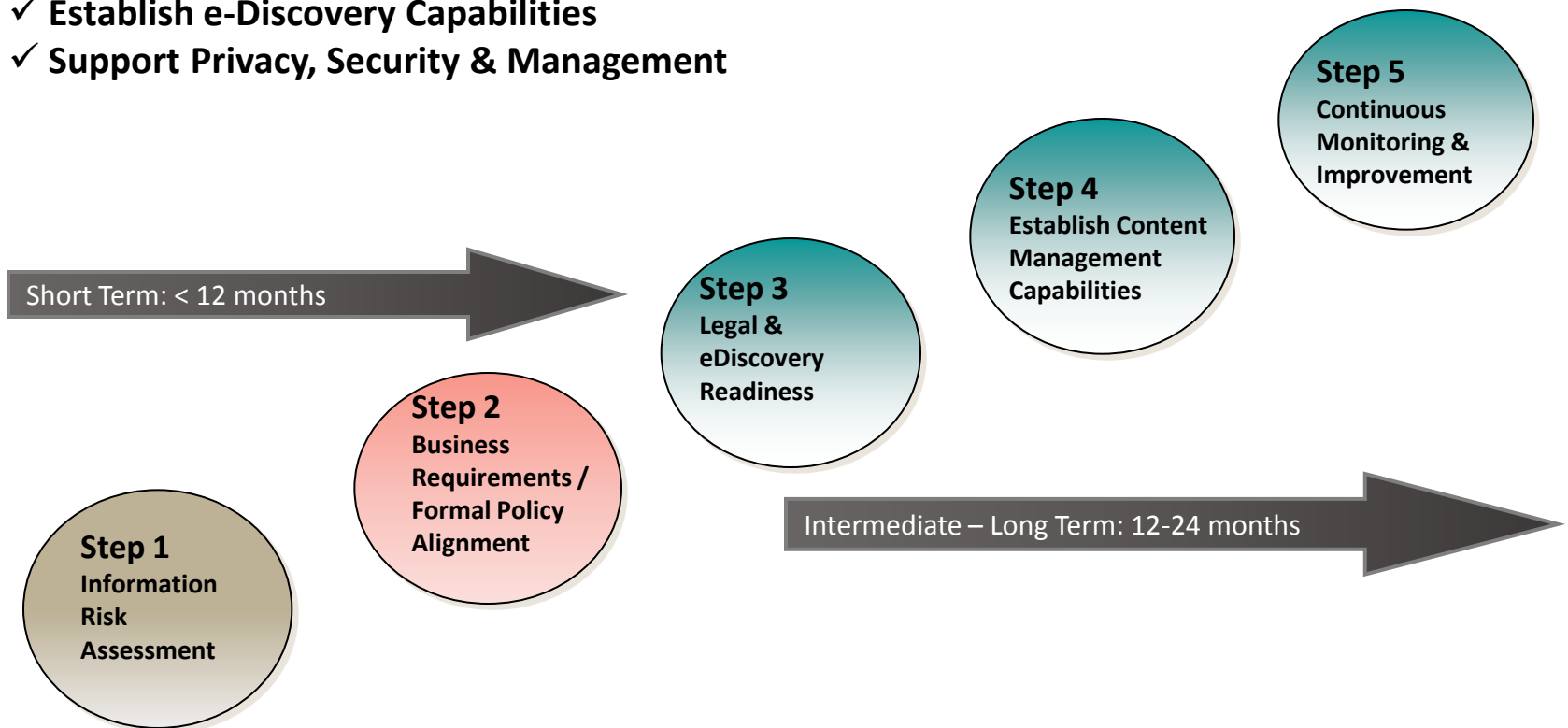
Ensure that all Personally Identifiable Information (PII) and sensitive information is identified, stored and secured in alignment with the defined Data Privacy controls and governance processes

Develop a scalable file management framework that is based upon business requirements

Provide the business community with easy access to critical business documents that are part of the normal workflow

Program Roadmap

- ✓ Implement Content Management
- ✓ Establish e-Discovery Capabilities
- ✓ Support Privacy, Security & Management



Information Risk Assessment

Risk Assessment

- What data is really out there
- Who has access to the data
- What regulations are applicable to the business
- Identify process owners
- What 3rd party relationships exist
- Does staff understand what private / confidential data is (training)
- Identify policies / procedures that require PII elements
- Does data classification scheme consider privacy

Deliverables

- PII Risk Assessment
- Review vendor contracts for PII management
- Establish PII Incident Response procedures
- Implement PII Training

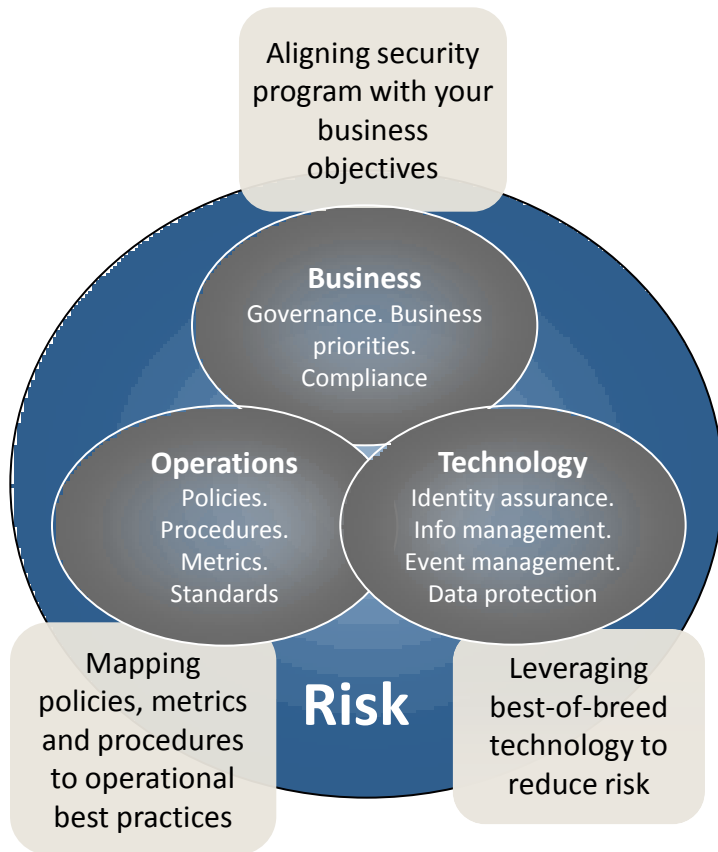
Risk Assessment Questionnaire

Who is providing the information:	Recipient:	Identifiable Information to be Collected and Nature / Source:	Method of information collection:	Why is the information being provided or gathered? Purpose:	How is the information being exchanged?	Does system derive / create new data about individuals through aggregation:	Where is the information stored:	Information Stored Format:	Opportunities to object to collection or consent to the specific uses and how consent is granted:	Direction or Flow of Information:
Producer Licensing	Pilgrim Insurance	Individual's name, address, SSN, zip code, Broker name, FIEN, phone #	Internet or Mail	Used to submit changes to Mass. auto brokers	Internet	NO	Q:/, e-mail archive	N/A	N/A	Internal outbound
Producer Licensing	CMO (Cash Management Oper.)WAVES	Individual's name, mailing address, SSN, email address, zip code, account numbers, Broker name, FIEN, bank account name, routing #, bank contact person and	Internet or Mail	Used to submit new or amended broker payment type information	Internet and Mail	NO	Internet, e-mail archive	N/A	N/A	Internal outbound
Producer Licensing	WAVES	Individual's name, address, telephone number, SSN, email address, zip code, address, account numbers, Broker name, FIEN, bank account name, bank contact person and phone #, routing #	Web or Mail	Information needed for a broker to be paid commission	Mail	NO	E-mail archive, internet ()	N/A	N/A	Internal outbound
Broker	Producer Licensing	Individual's name, address, SSN, zip code, address, Broker name, FIEN	Web or Mail	Documentation used to verify a name change	Not exchanged	NO	File cabinets, e-mail archive, internet ()	Printed then filed	N/A	External inbound
Agents and Brokers	Producer Licensing	Individual's name, address, zip code, license numbers, Broker name, picture	Web or Mail	Used to process appointments	Not Exchanged	NO	File cabinets, e-mail archive, internet ()	Printed then filed	N/A	External inbound

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Business Requirements / Policy Alignment



- Update policies for privacy management
- Establish a strategy for content & records management
- Define requirements for content management
- Develop security classification framework

Define and map data security policies to best practices, business requirements, and regulations.

Legal & e-Discovery Readiness

- Document current Systems of Record (SOR)
- Develop a Litigation Response Protocol
- Identify content management solution
- Develop an Architecture for information classification, handling
- Develop a framework for discovery of unstructured data
- Implement discovery scans

Secure critical data and applications through a structured process for understanding how to protect information according to its business value

Establish Content Management Capabilities

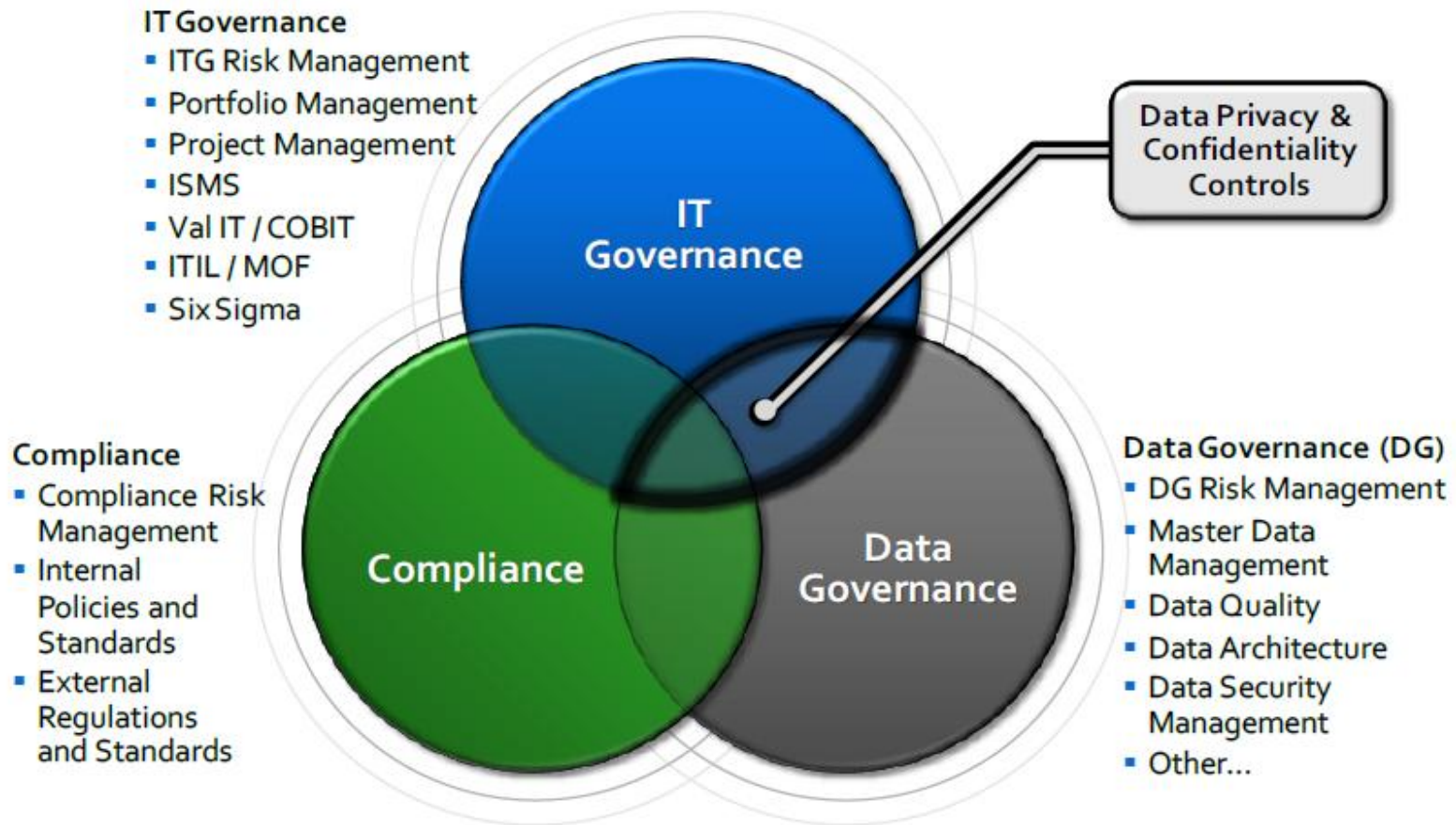


- Extend RIM methodology to include E-Mail
- Define a meta-data framework for unstructured data classification

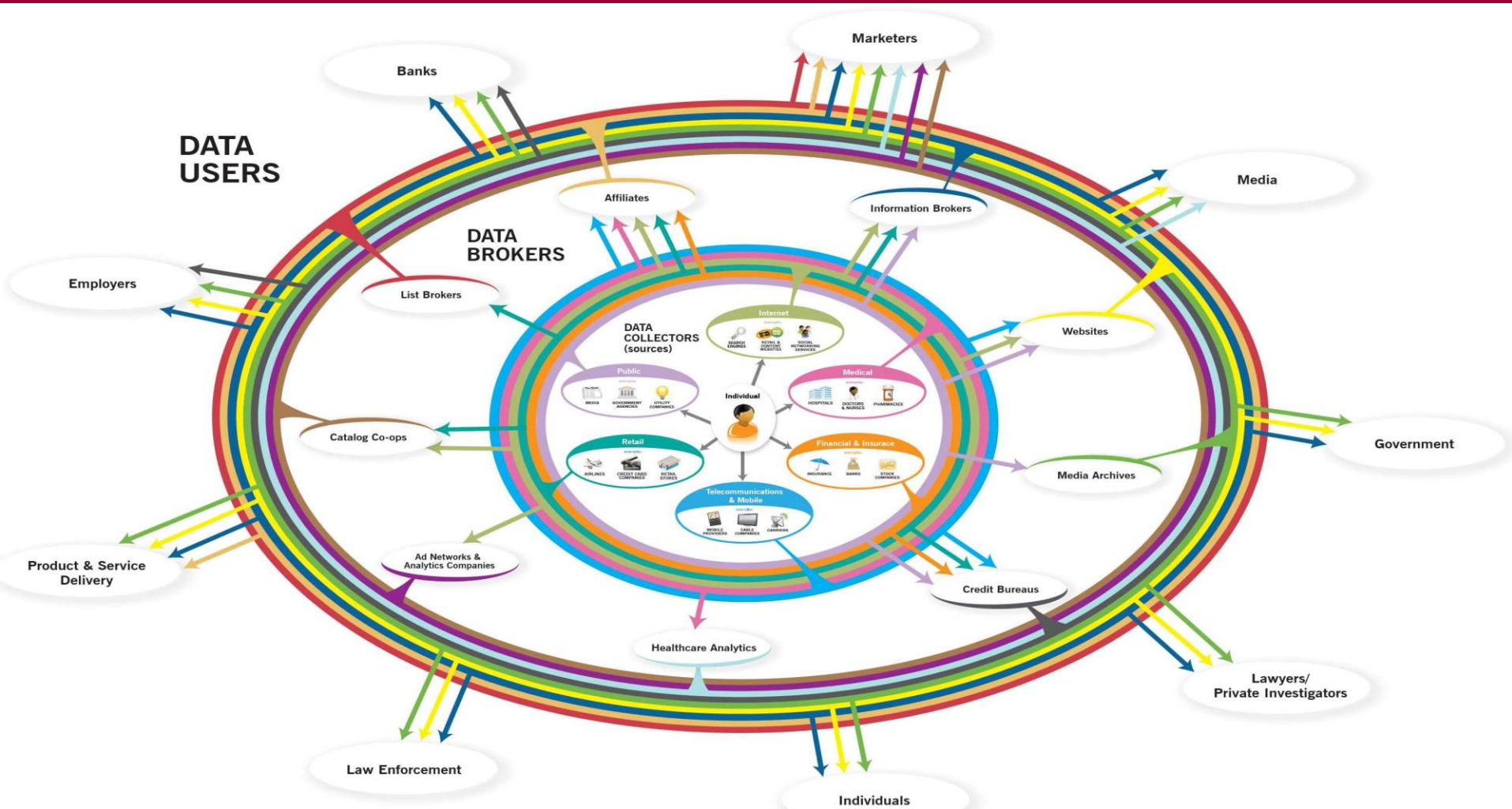
- Define and formalize periodic review and purge schedule
- Identify and implement a storage archive

- Implement content management platform

Intersection of Data Governance & Compliance



Personal Data EcoSystem FTC - March 2012



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Data Mapping

Barbara Latulippe

EMC

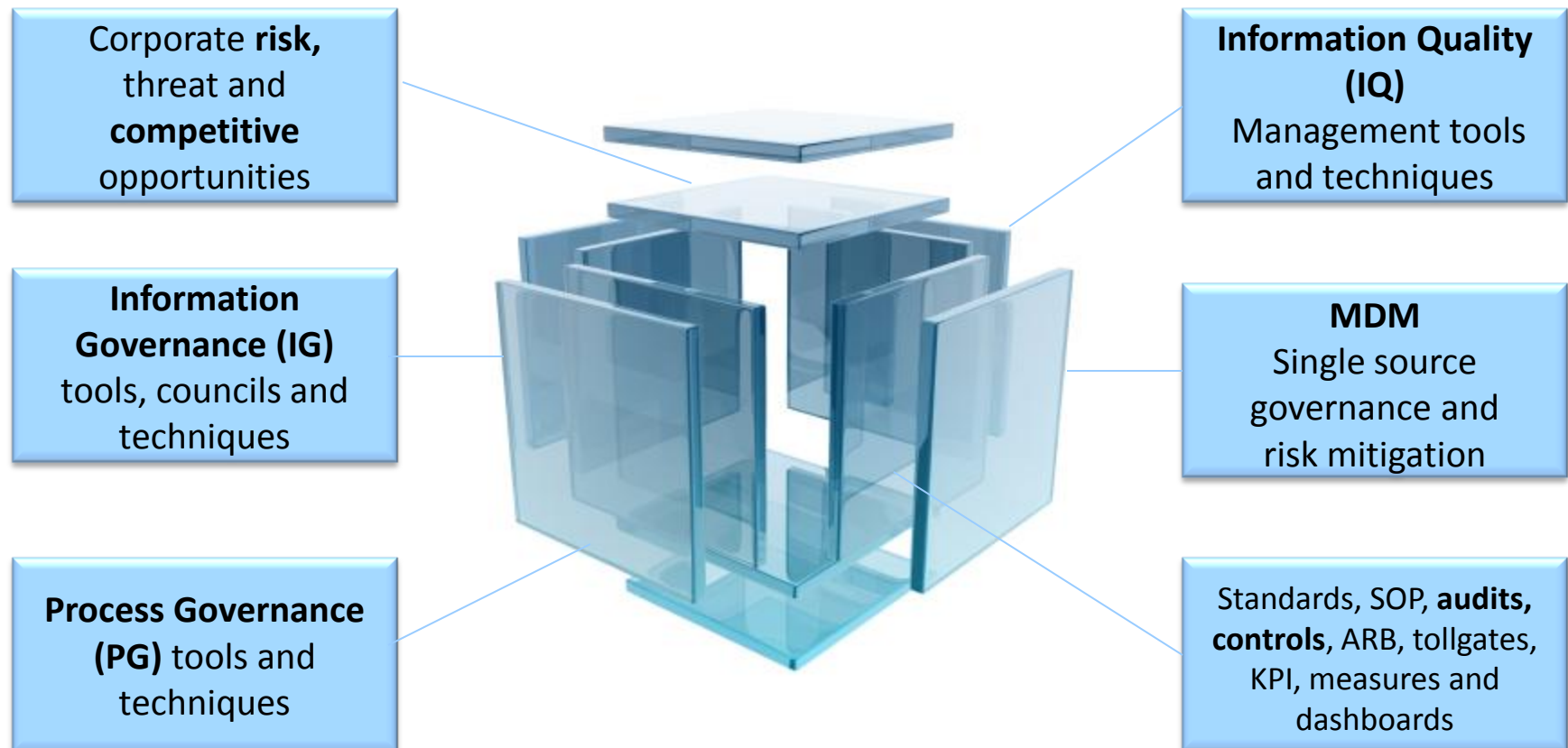
Senior Director

Enterprise Information Management



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Understanding the Layers of Risk, IQ, IG, PG and MDM



Leverage Information Governance as a enabler for data mapping

- Imagine if you were able to identify all exceptionally **high payback/ high penalty** risk, PG DG/DQ/ MDM opportunities within a **few weeks**
- Plus, have the **confidence of having business engagement**, and reliable financial calculations, in developing your recommendations



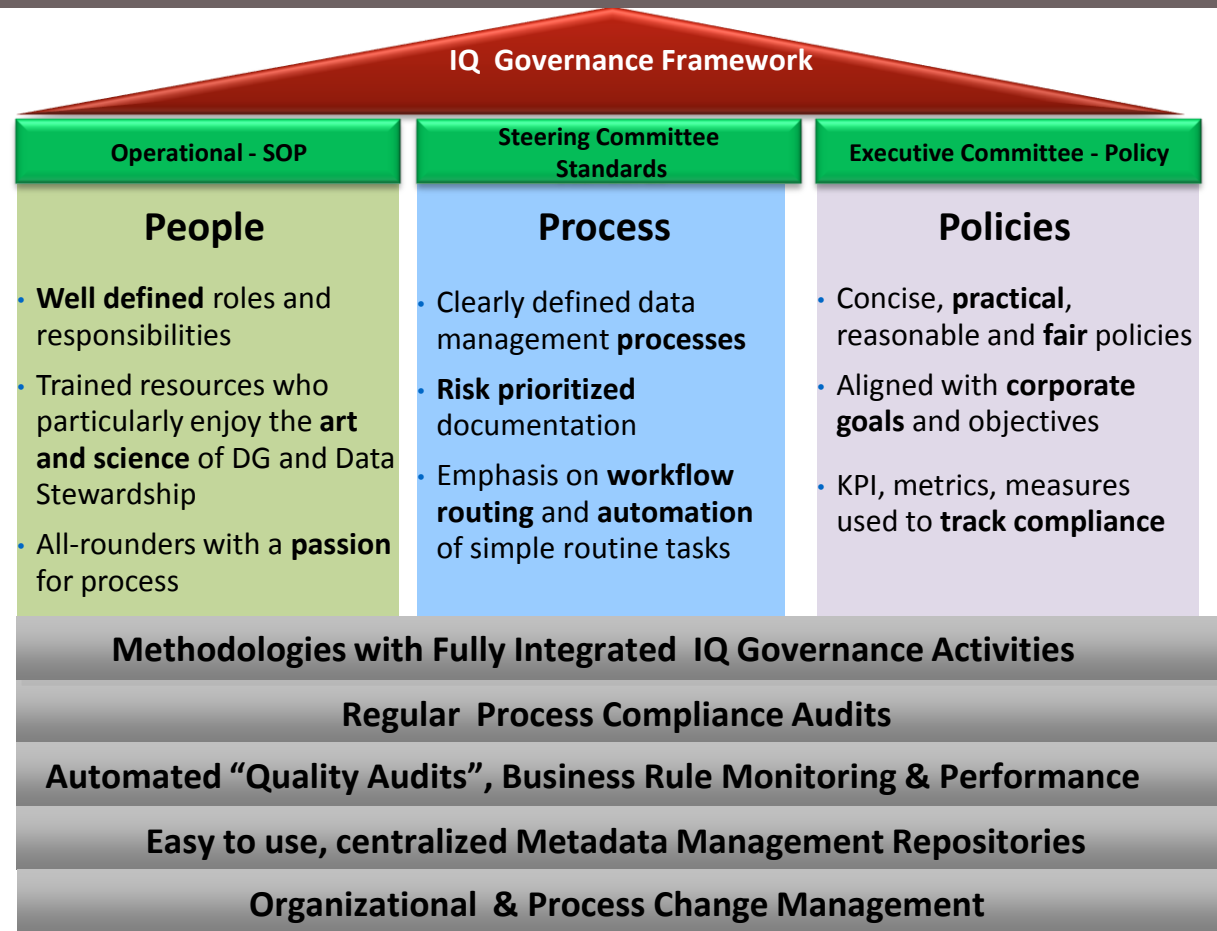
Prioritization

- **Rapid identification and review** of DG, DQ, MDM, risks, threats, revenue and cost saving opportunities
- **Cost and savings estimation** using business process examples for financial and ROI calculations
- **Prioritization of candidate initiatives** – Identification of quick payback, low cost, high revenue initiatives
- Identification of business and IT **stakeholders and owners**
- **Accountability**
- Cross-functional and **consensus based decision** making

Information Governance Framework

The ultimate in DG best practices, is to **prevent data problems** from happening in the first place

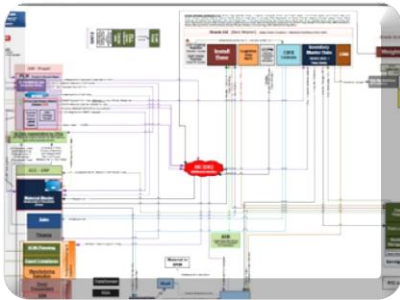
- Proactively** find problems
- Build quality into processes**
- Stewardship**
- **Quality at the point of entry**



EIM Core Competencies

Information Integration

Data Flows
Data Triggers
Data Synchronization
Data models
Data Authoring & Publishing



Governance

Accelerate Decisions
Policies & Standards
Quality & Compliance
Access management
Stewardship
Attribute Ownership and Definitions



Enterprise Business Process Integration

Change Management
Process Optimization
Root Cause Analysis
Issue Resolution
Business Readiness
Projects & MA

Business Stages, Process Improvements.

- ✓ Analyze
- ✓ Assess
- ✓ Implement



Quality

Metrics
Business Rules Mgmt
Scorecards
3rd Party Enrichment
Data Standards
Matching Logic
Trust Rules
BI Optimization



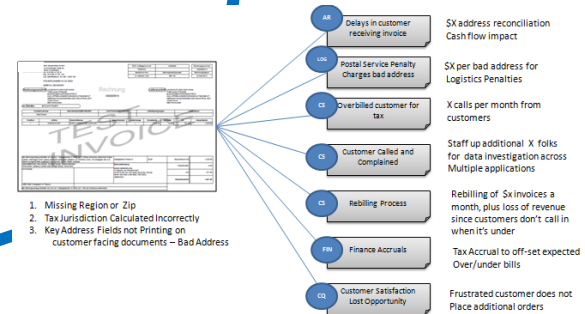
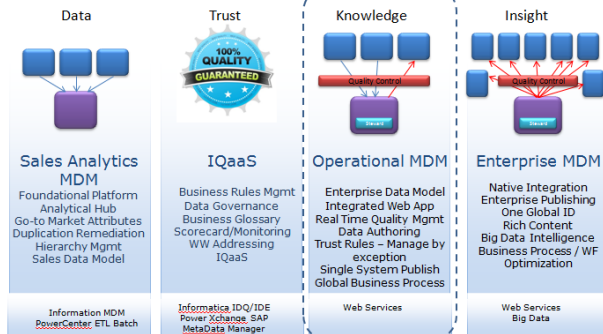
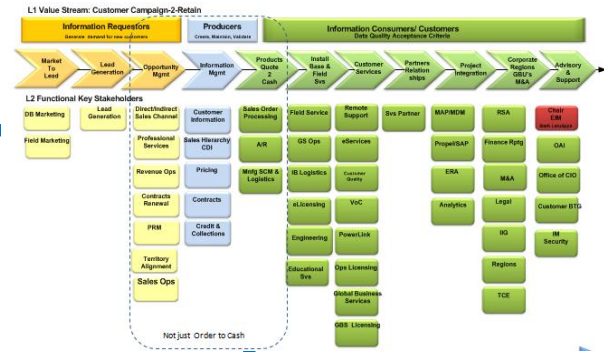
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Approach

Quality vs. Governance



Process Stakeholders

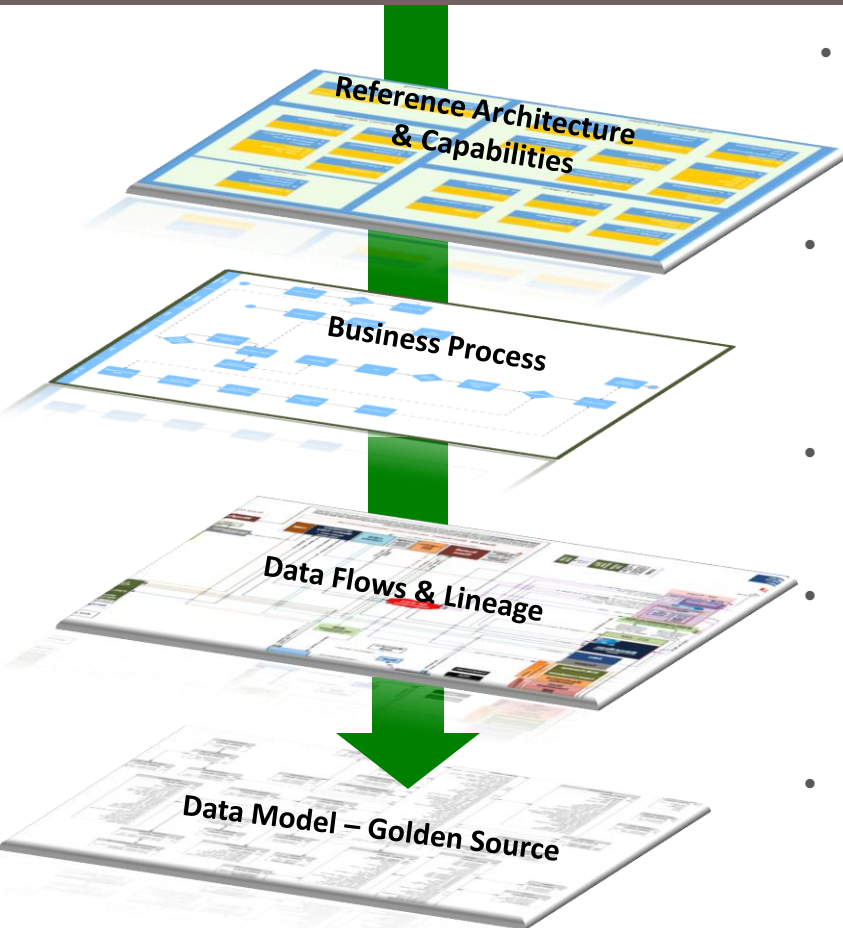


Tools, Techniques & Roadmap

Financial & Risk Impact

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Information 'Data' Mapping



- **Process mapping and analysis (BPM)**: A business process centric view of the **people, roles, processes** and activities relating to the **care and feeding of transactions**, data and business activities
- **Source system analysis**: To determine the “**golden source**” (primary data source) and “**System of Record**” (Trusted repository of data from golden sources e.g. EDW) for master, transaction and reference data types
- **Data flow mapping and analysis**: Define the paths and mechanisms that **transfer and integrate** corporate data. Use data flows or activity diagrams to document flows
- **Data Lineage**: Analysis and documentation of **data sources, transformations, and filtering** of data mapped from its **original source to its final destination(s)** mapped to a database/ data feed/ document/ transaction record
- **Data modeling and analysis**: To determine the **structure/ content** and mappings to the physical database location of DB/ repositories and the critical fields to be governed & published

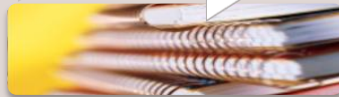
Audit & Risk Compliance

Information quality provides a trusted view of the data upon which to make key business and compliance decisions. Data governance is a framework for ensuring continuous improvements and IQ audits ensure that processes and controls are followed



- Focus information quality and governance efforts on high-priority shared data elements (HVA: High Value Attributes)
- Collaborate on definitions of quality standards and acceptable quality levels
- Publish Scorecards/KPI's to understand and analyze data trustworthiness
- Data governance councils for attribute insight, accelerate problem resolution and new policies

Benefits



Eliminate Process Breakdowns



Operational Efficiencies



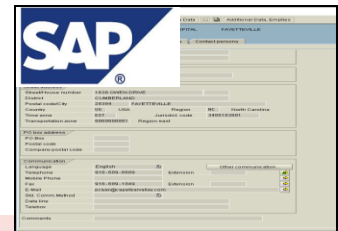
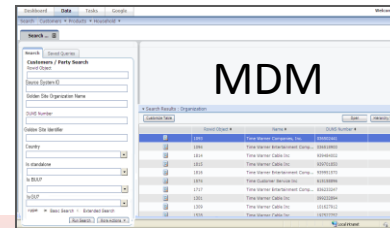
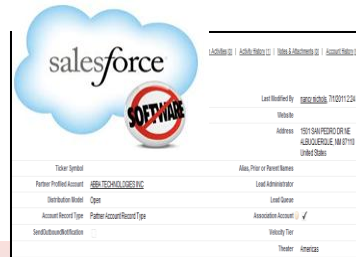
Integration & Risk Mitigation



Improved reporting and predictive analytics

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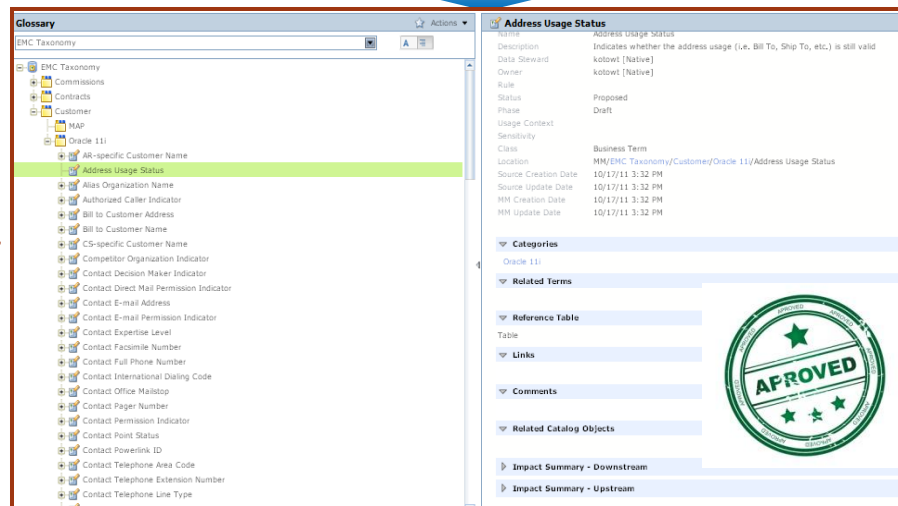
Value of a Business Glossary & Lineage



What is a customer

Build business and IT alignment in Master Data Management, Data Knowledge, Business Intelligence, Enterprise Integration and Data Science

Starting point for information governance programs, Data owners & accountability



Metadata :
Disciplined gathering of data definitions (glossary), business rules and calculations, acronym definitions, golden and reference data sources, data models, data lineage. Critical to keep the discipline, as bad metadata can rapidly degrade stakeholder trust and participation

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Change Management & Controls

Policies Documented “Why”

1.5 Sample Policy / Standard Request Form
New / Change Policy or Standard Request
Data Governance Program

Policy / Standard Name:		Request Date:	
Requestors Name:		New / Change	[New, Change to Existing]

Policy / Standard Description (Brief)

Impacted LOB(s)

Impact Level

[Critical, High, Med, Low]

Policy / Standard Description (Detailed)

Data Governance Steering Committee use

Approved: [Y/N] Priority: [Critical, High, Med, Low]
Approval Date: Assigned to:

Change Request Justification & Impact

Enterprise Data Governance

INSTRUCTIONS – Request for Attribute Change/Add

Please use this form when requesting an add, change or deletion to a material master attribute. Attributes are valuable data assets and their proprietary properties should be managed for the benefit of the organization. Submission of this form will start the request for review by a Data Quality expert who will manage the changes thru the lifecycle in support of your request and support the analysis through the Data Governance Council.

ATTRIBUTE REQUEST FORM

Requestor's Name: Telephone #: Email: BP Data Steward Project Name Role:

Additional Requested: (Check one):
If requesting a CHANGE, note in Definition section what is required and how it should be corrected.
If requesting a DELETION, provide the reason for deletion in the impact section.
Business Definition of Attribute and Attribute Owner (who will maintain):

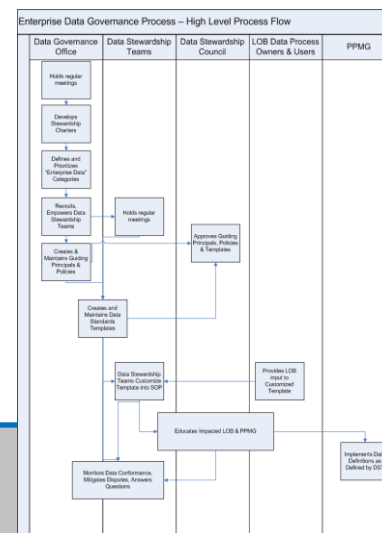
Business Impact:

Applications Impacted: ☐ All ☐ Partial ☐ None ☐ Minimal Base Mass Change Request? ☐ No ☐ Yes

#	Attribute Name	Attribute Value	Table Name (BTG)	Reason for Change/Deletion	Inventory Impact	Governance Approval
1					Y/N	Y/N
2					Y/N	Y/N
3					Y/N	Y/N
4					Y/N	Y/N
5					Y/N	Y/N
6					Y/N	Y/N
7					Y/N	Y/N
8					Y/N	Y/N

Recommendation: Enterprise Data Steward Reviewer: ISTM Ticket # if Applicable: COMMENT & Additional Information: Questions: Contact Barbara Lathippe at the Enterprise Governance Office

Process Change Management



Knowledge Management

Address Usage Status

Active Address Usage Status

Description Indicates whether the address usage (i.e. Bill To, Ship To, etc.) is still valid

Data Steward kolowel [Native]

Owner kolowel [Native]

Rule kolowel [Native]

Status Proposed

Phase Draft

Usage Context Business Term

Sensitivity Location

Class MM[MM Taxonomy/Customer/Order 11]Address Usage Status

Location MM[MM Taxonomy/Customer/Order 11]Address Usage Status

Source Creation Date 10/17/11 3:32 PM

MM Update Date 10/17/11 3:32 PM

MM Creation Date 10/17/11 3:32 PM

MM Update Date 10/17/11 3:32 PM

Categories Oracle 11i

Related Terms Table

Reference Table Table

Links Links

Comments Comments

Related Catalog Objects Impact Summary - Downstream
Impact Summary - Upstream

Information Quality Councils

Key Takeaways

- Ask the business, they understand the ‘context’ & ‘usage’
- Question ‘why’ the data is needed
- Understand the processes which consumes the information
- Document data in motion – event triggers
- BI & Big Data is just as critical – access management
- Start small – leverage a project
- Try to automate where possible – manually intensive
- Revisit Frequently
- Share with Architects & Business Partners
- IQ Governance Reviews & Access Management
 - AIM (Accountability, Impact & Mitigation)

A **data** map can provide an easily accessible reference to determine where and how **data** is stored—particularly sensitive data.

A map is a simple and comprehensive method to identify the multiple business units and information systems where such **data** may reside .
