

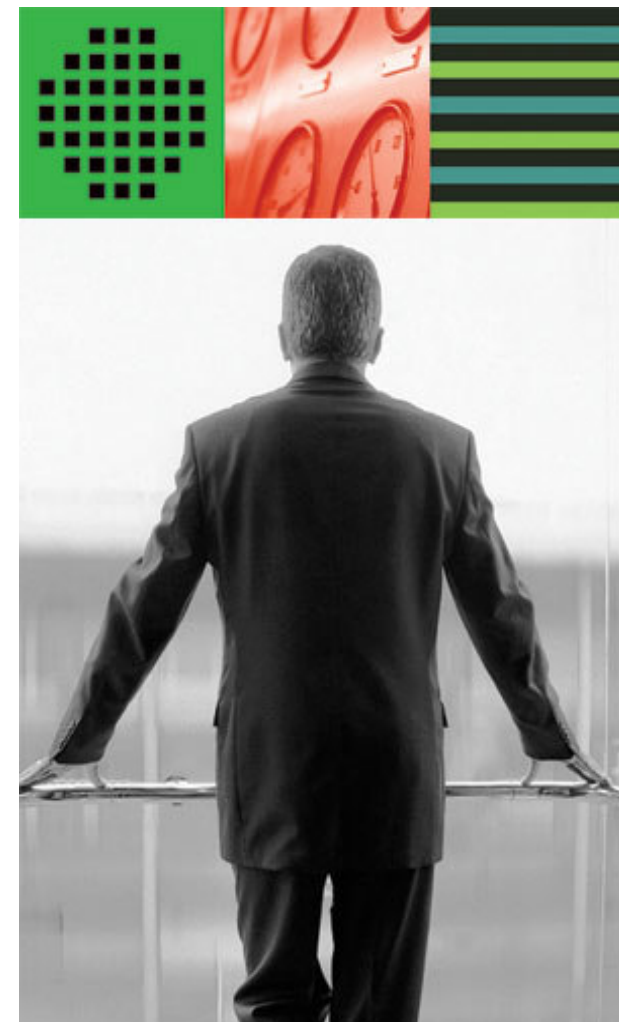


IT Service Management and System z

David Caddis, Director
IBM Tivoli Market Management

Agenda

- IT Challenges and System z
- IBM System z and IT Service Management
- IT Service Management solutions from IBM
- Next steps to realizing the value of ITSM



“What matters is how satisfied customers are, how costs are being saved on the supplier side, and how to allow for more creativity and added value at all levels of the organization.”
--Erik Brynjolfsson, Director of the Center for eBusiness at MIT

IT Service Management and System z

- ITSM: Logical evolution of Systems Management:
 - Management focus shifting from IT resources to business services
 - Resources becoming more autonomic
 - Processes need to be more than just paper
 - instantiated as automated workflows to ensure compliance and consistency
- No better foundation for ITSM than System z
 - In the face of constant change, System z remains an effective and efficient platform
 - High availability ...resiliency....transactional performance and security
 - Low total cost of ownership
- We're committed to bringing System z solutions that:
 - Expand System z capabilities while enhancing its proven strengths
 - Reduce the costs associated with operations and systems management



IT Organizations Face Tremendous Challenges

Challenges are coming from many fronts:

- **Change:** Market demands, workloads, service levels
- **Compliance:** Regulations, security, audit capabilities
- **Complexity:** Heterogeneous resources, organizational silos, composite applications
- **Cost:** Management and administration



“We’re trying to resolve a huge morass of IT complexity, while demand for our services keeps going up. We’re getting hit from both sides. So what are we doing about it? We’re delivering an adaptive IT organization that provides services on demand to support the needs of the business.” — *George Surdu, Director, Global Information Technology Infrastructure, Ford Motor Company, September 2005*

Reasons Behind the Revolt:

Compliance Initiatives Stress IT / Business Linkage

- IT is completely intertwined with business processes

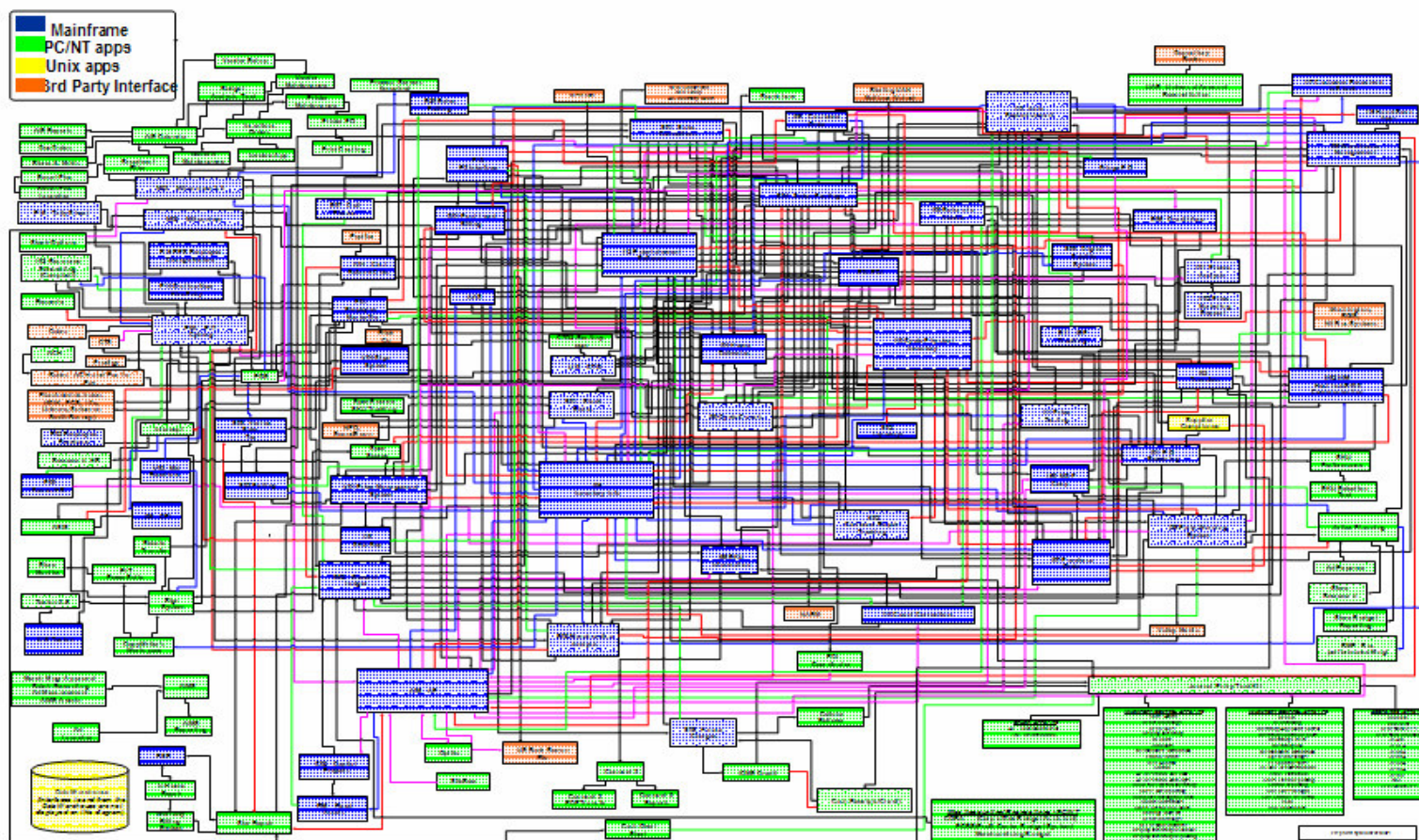
- Compliance initiatives demonstrate increased reliance on IT
 - Identity and access management
 - Data protection, retention and archiving
 - Change management

- Serious consequences increase focus
 - Sarbanes-Oxley
 - Basel II Accord
 - Patriot Act
 - HIPAA



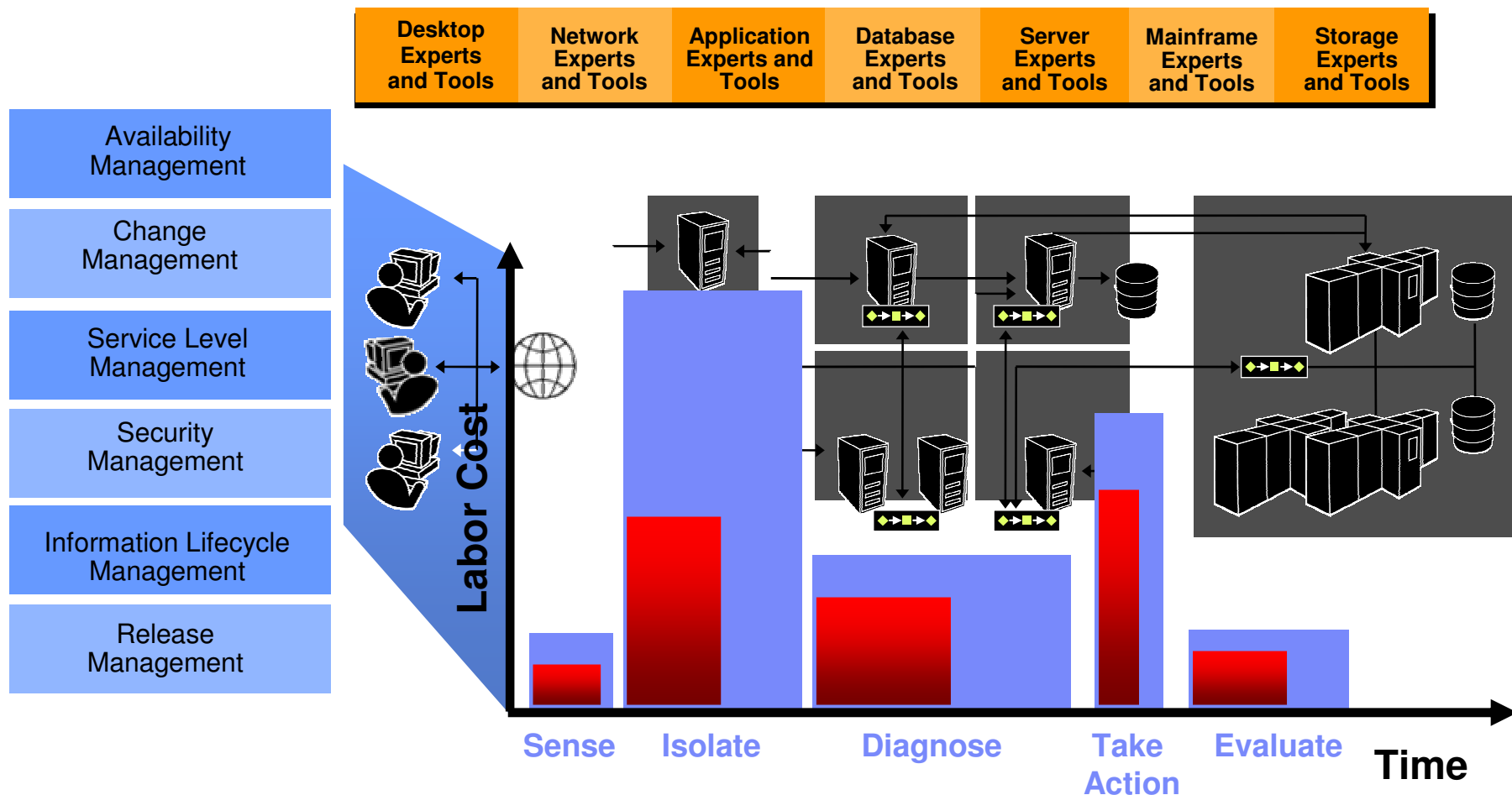
Reasons Behind the Revolt:

Architectural Complexity Reduces IT Efficiency and Effectiveness and Exposes Organizational Complexity



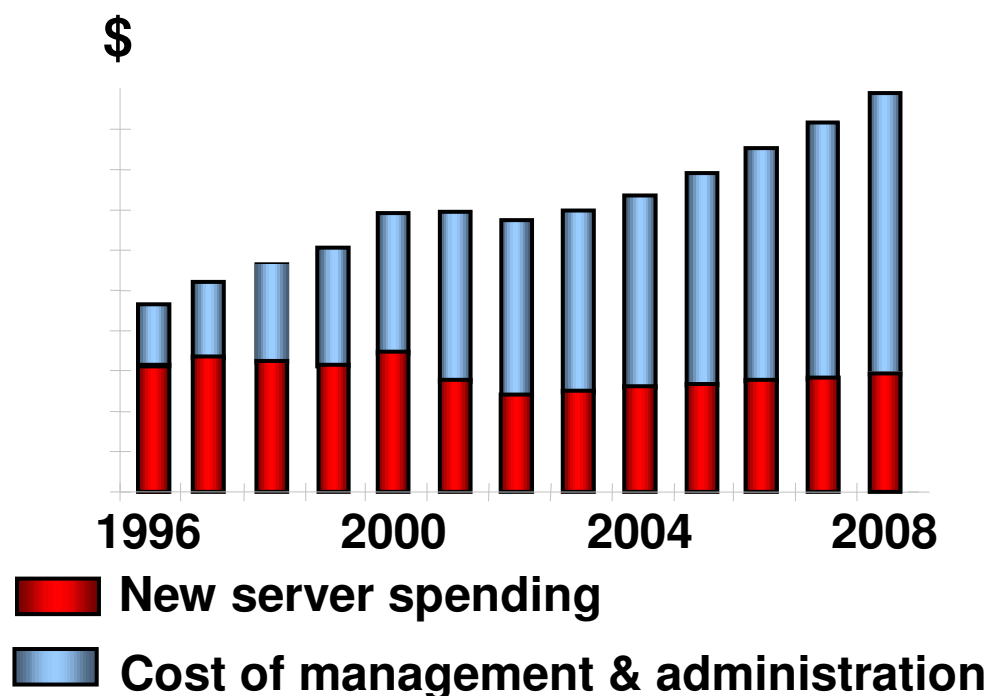
Organizational Complexity Compounds the Problem

Managing composite applications across IT silos is major challenge



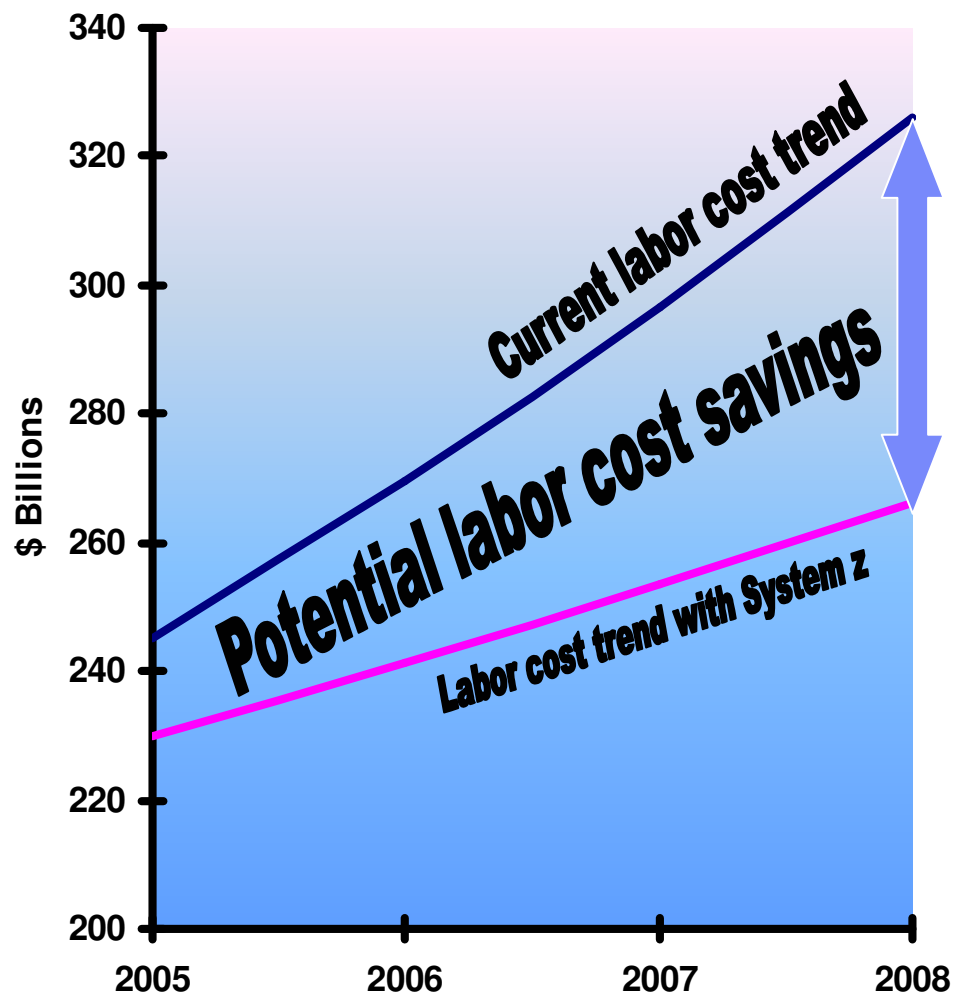
IT Infrastructure Trends – Rising Operational Costs

Managing volatility, complexity and compliance measures have boosted operational costs ... at the expense of new initiatives.



- **70% of CIO budget is labor**
- **\$325B in operations labor by 2008**
- **Application development will decline at -10% CGR to 2008**

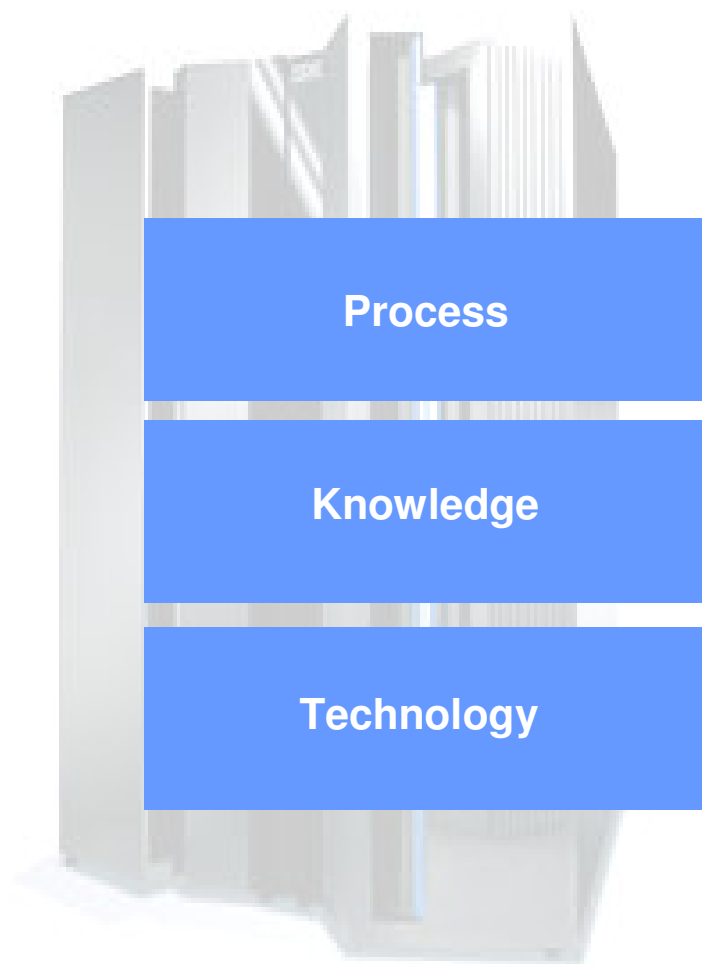
Pulling Down the Labor Cost Curve with System z



How can we reduce the cost of operational labor, and refocus the investment for the benefit of the business?

- **Process** - System z has historically encouraged and embraced process automation
- **Knowledge** – 40 years of experience and discipline
- **Technology** – World class technology delivering resilience, security and transactional performance

System z Core Competencies



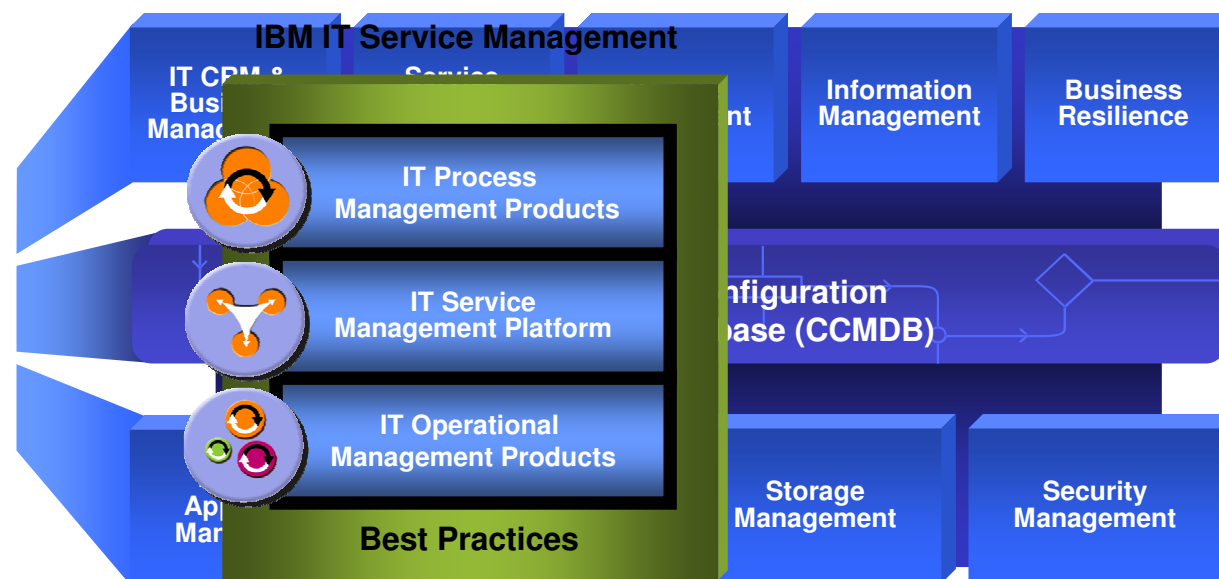
Process is part of the System z DNA. The automation of business processes has been performed with System z for decades.

With 40 years of experience, no other platform embodies the discipline, knowledge and skills of System z

System z has established itself as the most available, secure and capable platform ever deployed

IBM IT Service Management – Innovation that Matters

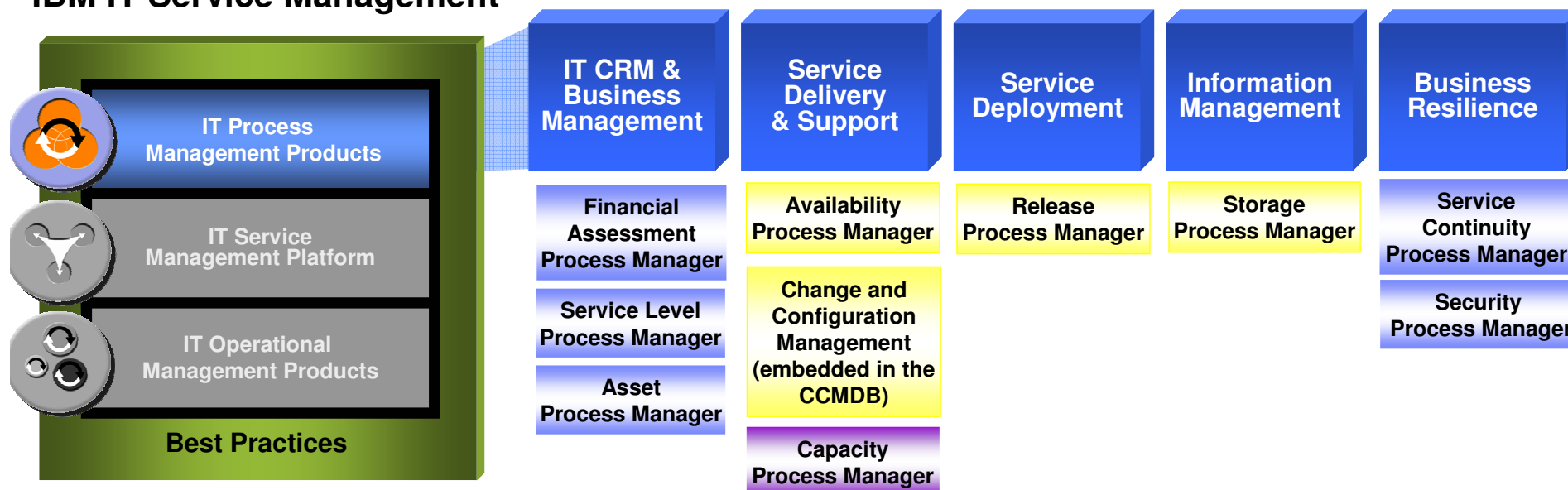
The industry's most comprehensive set of products, services and solutions



- Open and federated Change and Configuration Management Database (CCMDB)
- Proven technology for integrating 'Process to Product' -- including third-party vendors
- Based on self-managing autonomic technologies and best practices such as ITIL and eTOM
- Built on an SOA architecture, and can manage and secure SOA environments

IT Process Managers Bridge Organizational Silos

IBM IT Service Management



Available Now!

Available in 2H 2006!

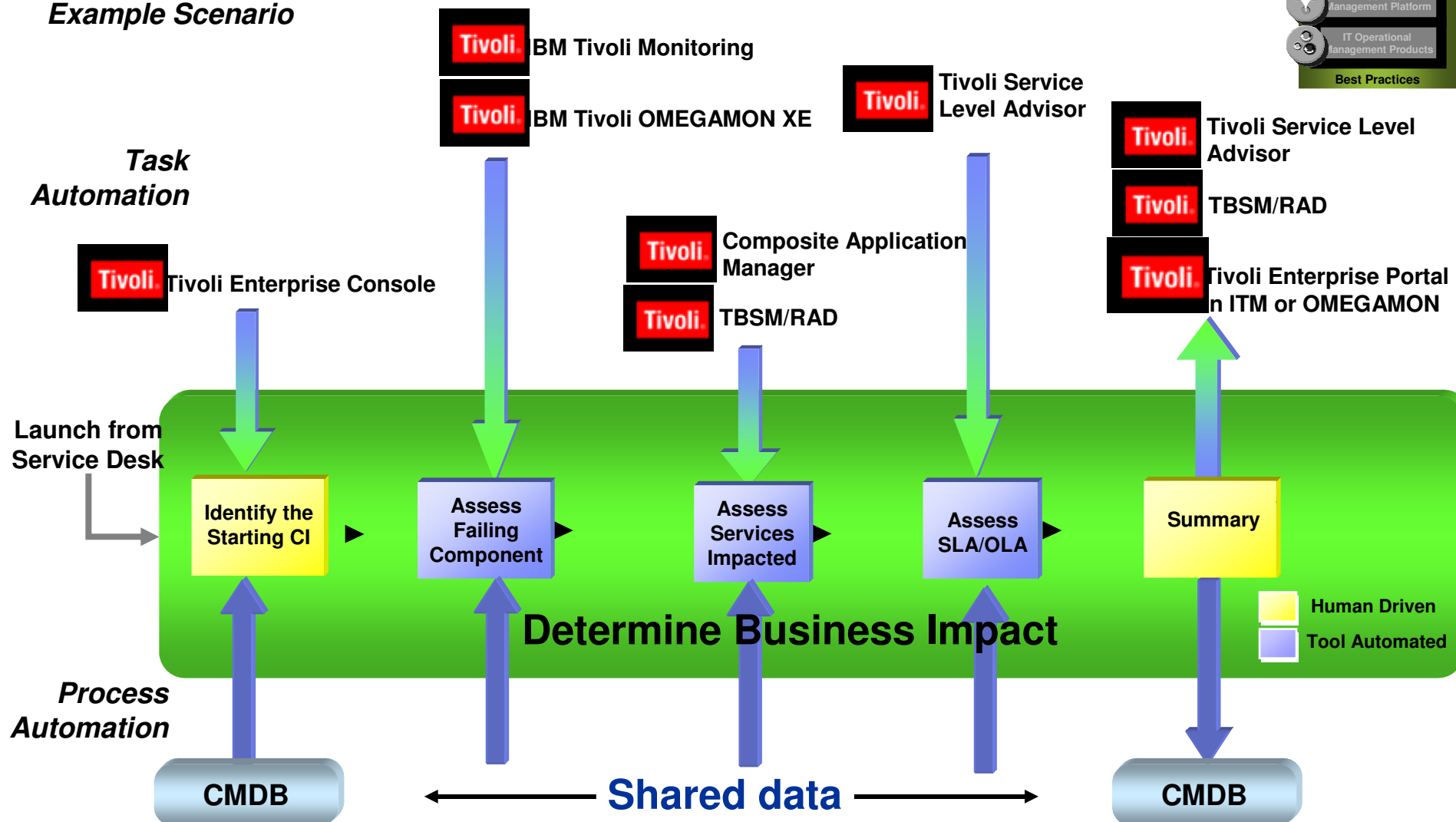
Future Directions

- Automates IT management processes for rapid responsiveness and greater flexibility
- Based on experience applying ITIL, eTOM, CoBIT and CMMI in customer environments
- Extends autonomic computing technology experience to people, processes and information



IBM Tivoli Availability Process Manager

Example Scenario



IT Operational Management Products

Integrated across silos through the ITSM platform to the IT process management products

IBM IT Service Management



Tivoli Product Portfolio Available TODAY!

Tivoli Products in Technology Preview Announcement

Business Application Management	Server, Network & Device Management	Storage Management	Security Management
<p>Products include:</p> <ul style="list-style-type: none"> ▪ Tivoli Composite Application Manager Family ▪ Tivoli Business Systems Manager ▪ Tivoli Intelligent Orchestrator ▪ Tivoli Service Level Advisor ▪ Tivoli Contract Compliance Manager ▪ Tivoli License Compliance Manager Family ▪ Netcool/Impact ▪ Netcool/RAD 	<p>Products include:</p> <ul style="list-style-type: none"> ▪ Tivoli Enterprise Console ▪ Tivoli Monitoring Family ▪ Tivoli OMEGAMON Family ▪ Tivoli NetView Family ▪ Tivoli Remote Control ▪ Tivoli System Automation Family ▪ Tivoli Workload Scheduler Family ▪ Tivoli Provisioning Manager ▪ Tivoli Configuration Manager ▪ Tivoli Decision Support for z/OS ▪ Netcool/OMNibus ▪ Netcool/Proviso ▪ Netcool/Precision ▪ Netcool/Monitors 	<p>Products include:</p> <ul style="list-style-type: none"> ▪ Tivoli Storage Manager ▪ Tivoli Continuous Data Protection for Files ▪ TotalStorage Productivity Center 	<p>Products include:</p> <ul style="list-style-type: none"> ▪ Tivoli Access Manager Family ▪ Tivoli Identity Manager Family ▪ Tivoli Federated Identity Manager Family ▪ Tivoli Directory Server ▪ Tivoli Directory Integrator Family ▪ Security Compliance Manager ▪ Tivoli Security Operations Manager

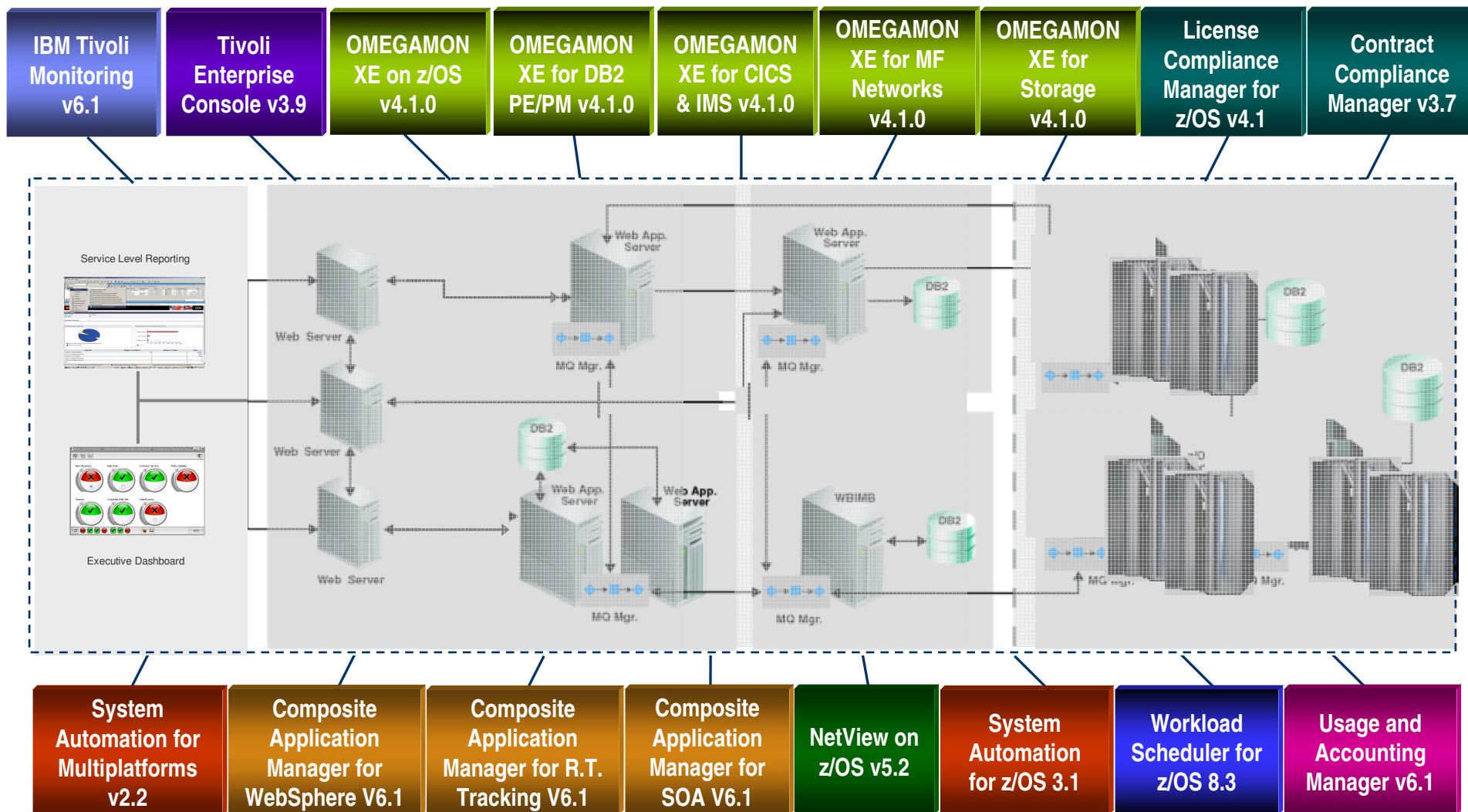
CCMDB and System z: System z Discovery

- Tivoli Enterprise Portal Discovery Library Adapter
 - Resources: All managed systems, including distributed agents and OMEGAMON XE mainframe agents
 - Attributes such as URL for context sensitive launch into TEP
 - Designed to be as easy as possible to deploy and run.
 - No special customization needed.
 - Leverages ITM V6.1 common shared services

- z/OS Discovery Library Adapter (Beta)
 - Resources: System z Machine, LPAR, z/OS, Address Spaces including IMS, DB2, CICS, MQ, WAS
 - Attributes such as Release, MSU Capacity
 - Designed to be as easy as possible to deploy and run.
 - No special customization needed.
 - No special prerequisites just a working z/OS system

End to End Management from Tivoli

System z Portfolio



IBM Best Practices and Implementation Support



IBM Tivoli Unified Process

- IBM Process Reference Model for IT incorporates ITIL, COBIT, and IBM best practice processes in a complete, cohesive model
- Tools Mentor - make ITIL actionable!

Open Process Automation Library (OPAL)

- Comprehensive online catalog of more than 300 validated product extensions

IBM Global Technology Services

- Innovation Workshops
- Infrastructure Services Readiness Engagement
- IT Service Management Design
- Implementation Services

Ecosystem of System Integrators and Business Partners

- Vision Creation Workshops and Readiness Assessments
- ITIL Process Design
- Consulting and outsourcing services
- Implementation and deployment services

Summary

- **IBM Tivoli is committed to bringing System z solutions that:**

- Expand System z capabilities while enhancing its proven strengths
- Reduce the costs associated with operational and systems management

- **Integrate and Interoperate**

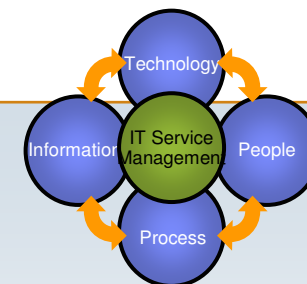
- Maintaining our leadership in enhancing System z hardware and software to integrate and interoperate with new platforms and applications

- **End-to-End Solutions**

- Providing End-to-End management solutions to find and fix problems quickly, leveraging System z and Tivoli solutions

- **ITSM Solutions**

- Delivering ITSM solutions that can meet your key IT challenges cost effectively



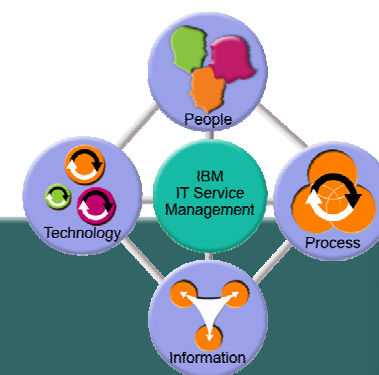
Call to Action

- Reaffirm the value of System z with your Decision Makers
- Identify the role of System z for your company's ITSM strategy
- Leverage the investment in the System z portfolio
- Take the leadership role in your company's ITSM deployment



BACKUP

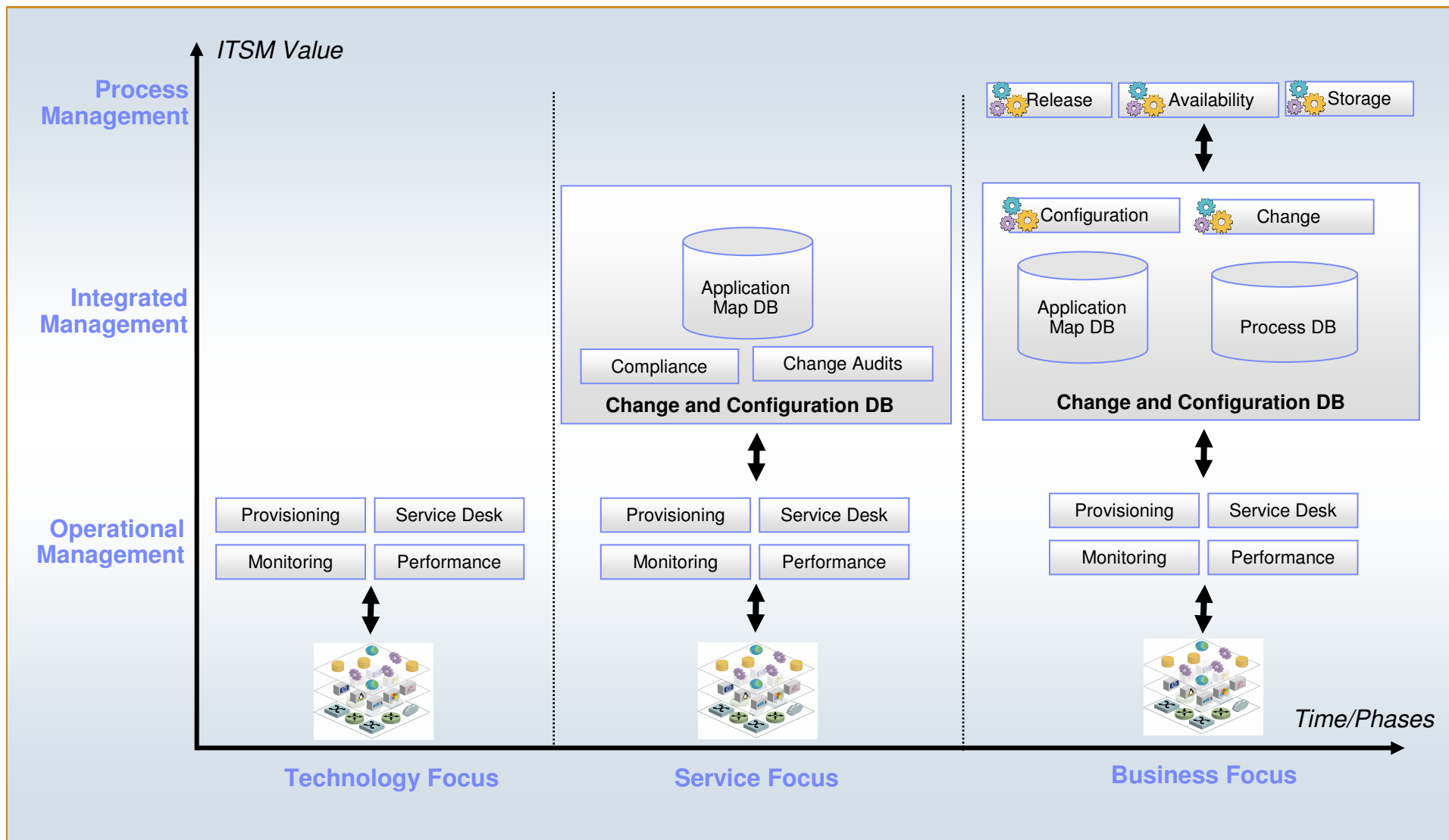
IBM IT Service Management



A Better Way to Manage the Business of IT

- **Effectively and Efficiently Deliver IT Services** – Aligned with business priorities
- **Quantifiable process performance** – End-to-end process measurements and quantification
- **Extract Greater Value of Existing Investments** – Tighter Integration across technology, information and people
- **Increase IT Organizational Productivity** – Alignment of IT silos through data and workflow integration

Taking a Modular Approach to IT Service Management



ITUP Today

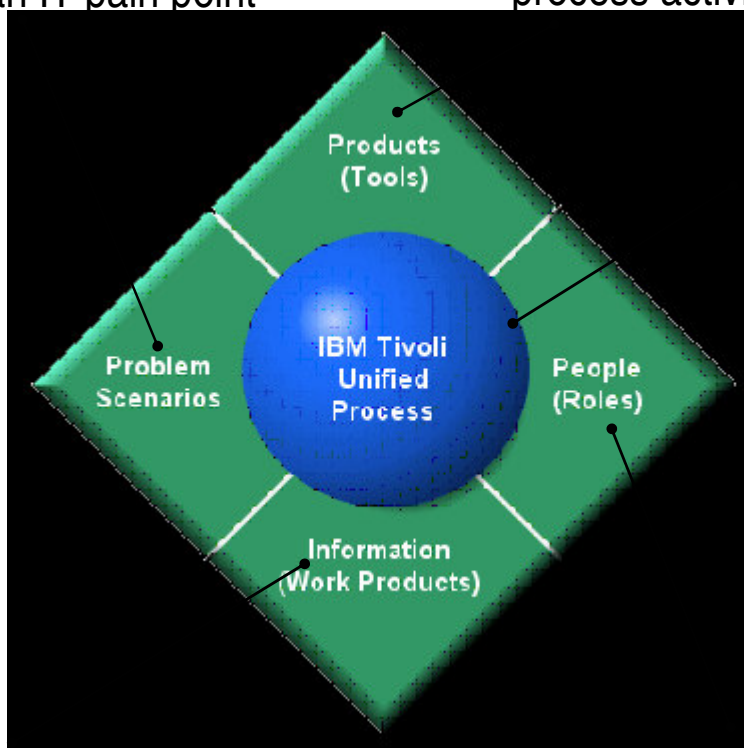
<http://www.ibm.com/software/tivoli/features/it-serv-mgmt/itup/tool.html>

Scenarios

- How various elements of ITUP work together to solve an IT pain point

Tool mentors

- How to use specific tools to implement process activities



Processes

- ITIL-aligned** processes for managing IT (down to activity)

Roles

- Roles performed and detailed responsibilities

Work products

- What is consumed and produced by each process activity

ITUP is based on IBM's Process Reference Model for IT (PRM-IT). PRM-IT was developed jointly by IGS and Tivoli experts based on the experience from hundreds of customer engagements and the best practices in industry process methodologies. In the area of ITSM, the focus of ITUP & PRM-IT is strongly aligned with the Information Technology Infrastructure Library (ITIL)

ITUP: Mapping Process to Products

The screenshot displays the IBM Tivoli Unified Process web application in a Microsoft Internet Explorer browser window. The browser's address bar shows the URL: `C:\Program Files\IBM\IBM Tivoli Unified Process\index.html`. The page features a navigation menu on the left with sections for 'Getting Started', 'ITUP Method Content', 'Process Mappings', 'FAQs', and 'ITUP Site/ Updates'. The main content area is a hierarchical diagram of IT processes:

- Service Management** (top-level category)
 - Service Delivery**
 - Availability Management
 - Capacity Management
 - IT Service Continuity Management
 - Service Support**
 - Problem Management
 - Change Management
 - Release Management
 - Service Level Management** (vertical bar on the left)
 - Incident Management** (vertical bar on the right)
 - Service Desk** (vertical bar on the right)
 - Financial Management for IT Services
 - Configuration Management
- Asset Management (Hardware and Software)**
 - Core
 - Logistics
 - Verification & Compliance
 - Relationship Management
- Application Management**
 - Requirements
 - Design
 - Build
 - Deploy
 - Operate
 - Optimize
- ICT Infrastructure Management**
 - Design and Planning
 - Deployment
 - Operations
 - Technical Support
- Security Management** (bottom-level category)

ITUP: Tool Mentors

The screenshot shows the IBM Tivoli Unified Process website. The browser window title is "IT Unified Process - Microsoft Internet Explorer". The address bar shows the URL: "C:\Program Files\IBM\IBM Tivoli Unified Process\index.html". The website header includes the IBM Tivoli Unified Process logo and navigation links for "Feedback" and "About".

The main content area is a table with three columns: Tool Name, Category, and Tutorial Title. The table lists various tools and their associated management and execution topics.

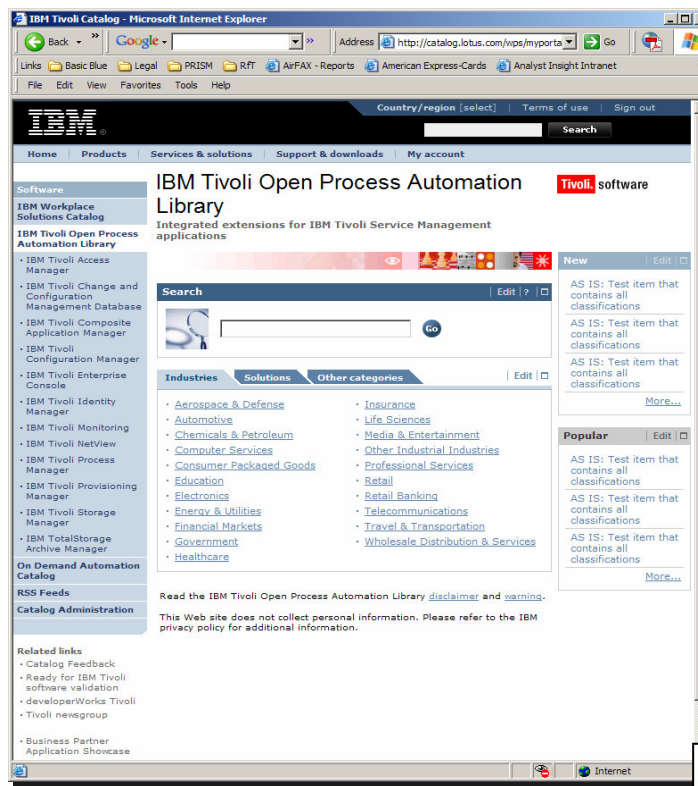
Tool Name	Category	Tutorial Title
	Problem Management	How to Use IBM Tivoli Monitoring to Investigate and Diagnose a Problem (TM072)
	Service Execution	How to Use IBM Tivoli Monitoring to Monitor Service Operation (TM046)
NetView	Configuration Management	How to Use NetView to Identify Configuration Items (TM101)
	Service Execution	How to Use NetView to Monitor a Service (TM039)
OMEGAMON	Incident Management	How to Use OMEGAMON to Investigate and Diagnose an Incident (TM017)
		How to Use OMEGAMON to Automatically Recover a Service (TM015)
	Problem Management	How to Use OMEGAMON to Investigate and Diagnose a Problem (TM041)
	Service Execution	How to Use OMEGAMON to Monitor a Service (TM040)
Performance Modeler for z/OS	Capacity Management	How to Use Performance Modeler for z/OS to Model and Size Capacity Requirements (TM093)
IBM Tivoli Privacy Manager	Security Management	How to Use IBM Tivoli Privacy Manager to Operate Security Protection Mechanisms (TM065)
		How to Use Tivoli Privacy Manager to Assess and Report Security (TM045)
TotalStorage Productivity Center	Capacity Management	How to Use TotalStorage Productivity Center to Initiate Service and Resource Tuning (TM038)
		How to Use TotalStorage Productivity Center to Model and Size Capacity Requirements (TM036)
	Data and Storage Management	How to Use TotalStorage Productivity Center to Manage Storage Resources (TM037)
		How to Use TotalStorage Productivity Center to Monitor, Analyze and Report Data and Storage Activity (TM033)

The left sidebar contains navigation links for "Getting Started", "ITUP Method Content" (IT Processes, Roles, Work Products, Scenarios, Tools), "Process Mappings" (ITIL@ Process Mapping, CobIT Process Mapping, RUP@ Process Mapping, Six Sigma Alignment), "FAQs", and "ITUP Site/ Updates".

OPAL – Partnering for Your Success

Online ecosystem for sharing IT Service Management best practices and new capabilities

- Comprehensive online catalog of more than 300 validated product extensions
- Automation packages, integration adapters, agents, documentation and more
- Helps customers get more value from Tivoli products ... and faster!
- For information about OPAL: <http://www.ibm.com/software/tivoli/opal>



CMDB Federation Open Standards

- Multi-vendor collaboration
- Industry-wide specification for CMDB federation
- Enables clients to share information between CMDBs and other data repositories across heterogeneous IT environments
- Submission to standards body later this year
- Endorsed by itSMF



Tivoli. software



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