



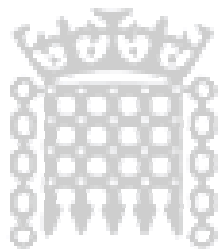
Parliamentary ICT

Enterprise Architecture & the Houses of Parliament

Presented by:

Joan Miller

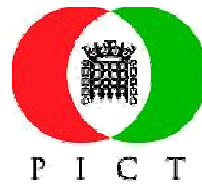
Director of Parliamentary ICT



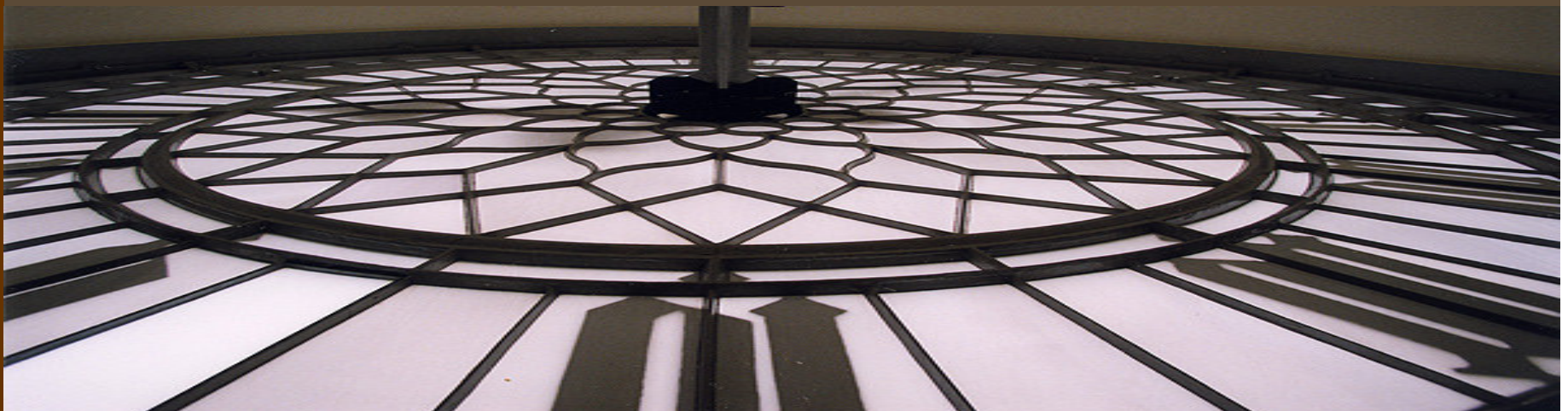
P I C T

Parliamentary ICT

PICT is a joint service for the Houses of Parliament and we aspire to give an excellent professional service to both Houses.



We are Business Partners building the Information Technology Services, Communication and the Infrastructure to enable Parliament to work effectively and Connect with the Public.



A Member's day ...



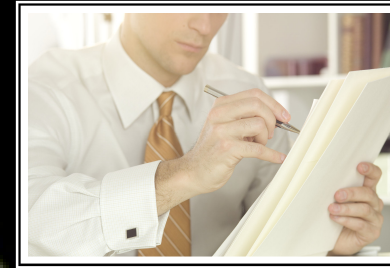
...arrives at parliament, (& uses the Security Pass Access System)



Attends Chamber or Committee, where proceedings are recorded and transmitted (using Hansard Reporting applications & webcasting)



buys a cup of coffee, and makes payment (using the EPOS system, which in turn integrates with the stock control systems)



collects Official Report, Order Paper, and Vote Bundle for day's proceedings, (created overnight using Procedural Applications)



Goes in office, equipped with facilities and furniture (maintained using Accommodation Systems), sends emails, asks PQs, tables EDMs and makes telephone calls (using equipment provided & maintained by PICT and Procedural Applications such as e-Tabling)

Meanwhile...

- ❖ Researchers may be using Library Applications
- ❖ Constituency staff may be connected remotely to the Parliamentary Network and systems
- ❖ A Member's staff may be receiving IT training.
- ❖ Finance is processing a Member's expenses
- ❖ A Member can be receiving email communications via new Mobile PDA technology.
- ❖ The General Public may be accessing publications via the Parliamentary website.

PICT Services

Procedural Services (Clerks & Official Report)

PQs, EDMs,
Vote Bundle, Bills,
Hansard,
Select Committee Reports

(Modernisation
Committee
Outcomes)

Knowledge Services (Libraries)

Research,
Papers,
Statistics,
Public Information,
Education facilities

Direct ICT Services (PICT Service Desk & Members' Computer Officers)

Estate & Constituency
Connectivity & equipment
Mobile PDA Devices
IT Training
Fault Reporting

Corporate Services (Serjeants, Refreshments, Works, Finance & HR)

Accommodation & Repairs
Security
Refreshments
Expenses & Finance
Occupational Health, HR

(Refreshment &
Accommodation
Committee outcomes)

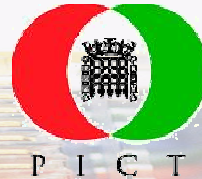
Provided by ICT applications:

**Framemaker,
Hansard Application,
Microsoft Templates
Web Apps for PQs**

**PIMS, Lexis Nexis,
Internet website**

**Network, PCs, Laptops,
MS Desktop, Printers,
VPN, Citrix, Telecoms**

**PAD, Archibus,
Access Control System,
Agresso**



Parliament in Context

- Old Institution
 - 1295 Edward 1 - Model Parliament (711 year old business processes)
- Structure
 - Commons
 - ❖ Clerks
 - ❖ Library
 - ❖ Serjeant at Arms
 - Lords
 - ❖ Clerks
 - ❖ Library
 - ❖ Black Rod
- PICT = 9 IT & IS departments into 1
- PICT 'central' but Business 'federal'
- Some parliamentary procedure in "Norman" French

What Braithwaite said....

- "IT – a source of considerable dissatisfaction..."
- "Quality of IT Service has a direct and increasing influence on the ability of the house administration to perform effectively..."
- "...Difficult to deal with issues of organisation, given the constraints of the federal structure"
- "The current management arrangements are complex..."
- "Progress has been painfully slow under the federal structure"





... and what happened until today

Parliamentary ICT – The timeline

Braithwaite1



1999

Braithwaite 2



2001

Cummins



2003/4

ICT Change Programme



2004

PICT Launch



2006

Transformation Benefits



2007

What Braithwaite did not address:



- ✘ Strategic management at a Board level
- ✘ Model acceptable for Both Houses
- ✘ Unification of Departmental and Central Systems
- ✘ Therefore... the need for the **Cummins Review**



1999

Decentralised provision of Desktop Equipment



2001/2

Centralised provision of kit
Extended Helpdesk Hours



2003

Windows 2000 Upgrade
ISP/VPN - Broadband



2004

E-mail Spam Filtering
Web casting
SSL/VPN – via Internet



2005/6

Members IT PC/Laptop refresh



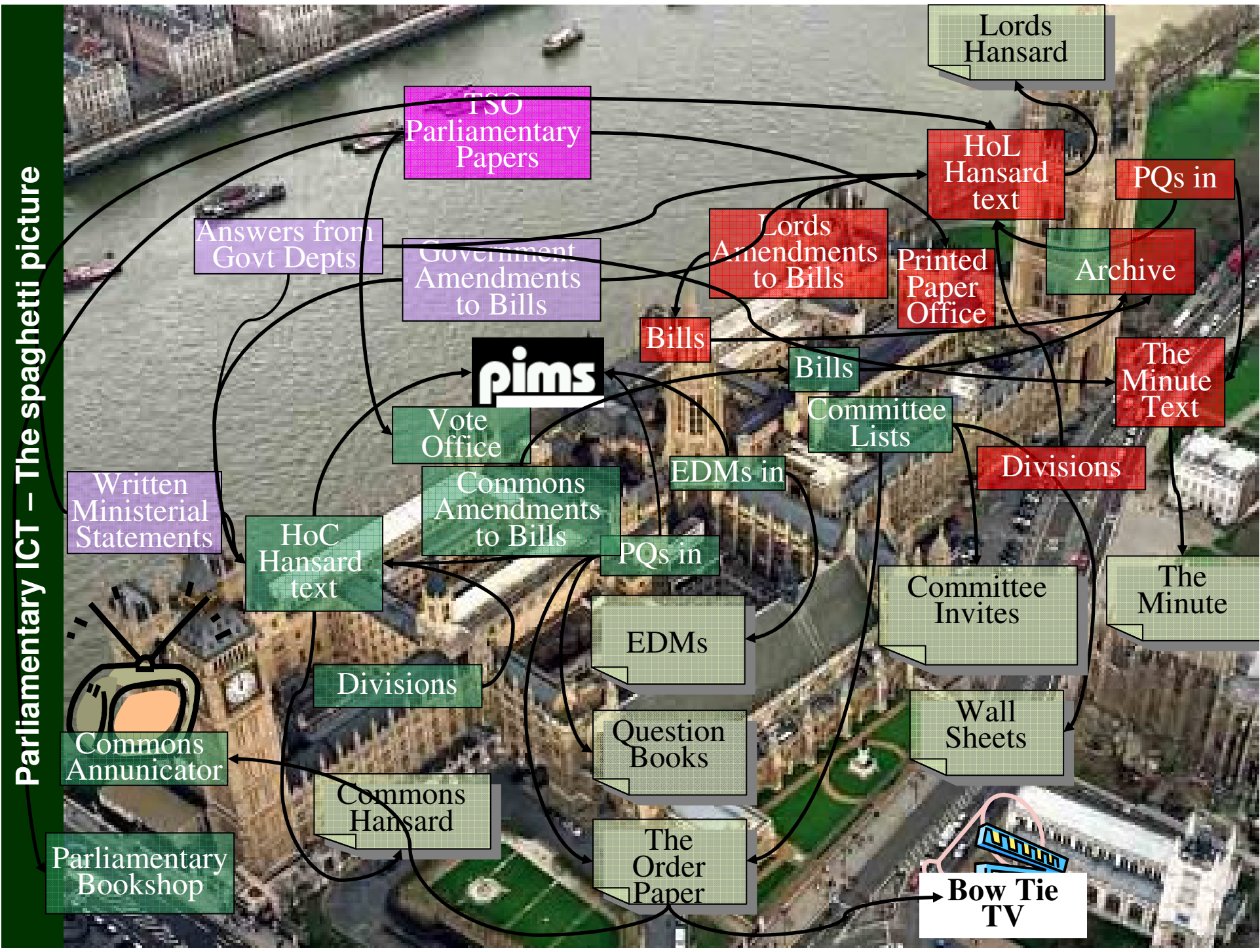
2006

Mobile computing
Wireless Network



2007

Extended hours support constituency services



Parliamentary ICT - The spaghetti picture

Lords Hansard

TSO Parliamentary Papers

HoL Hansard text

PQs in

Answers from Govt Depts

Government Amendments to Bills

Lords Amendments to Bills

Printed Paper Office

Archive

pims

Bills

Bills

The Minute Text

Vote Office

Commons Amendments to Bills

EDMs in

Committee Lists

Divisions

Written Ministerial Statements

HoC Hansard text

PQs in

Committee Invites

The Minute

Commons Annunciator

Divisions

EDMs

Question Books

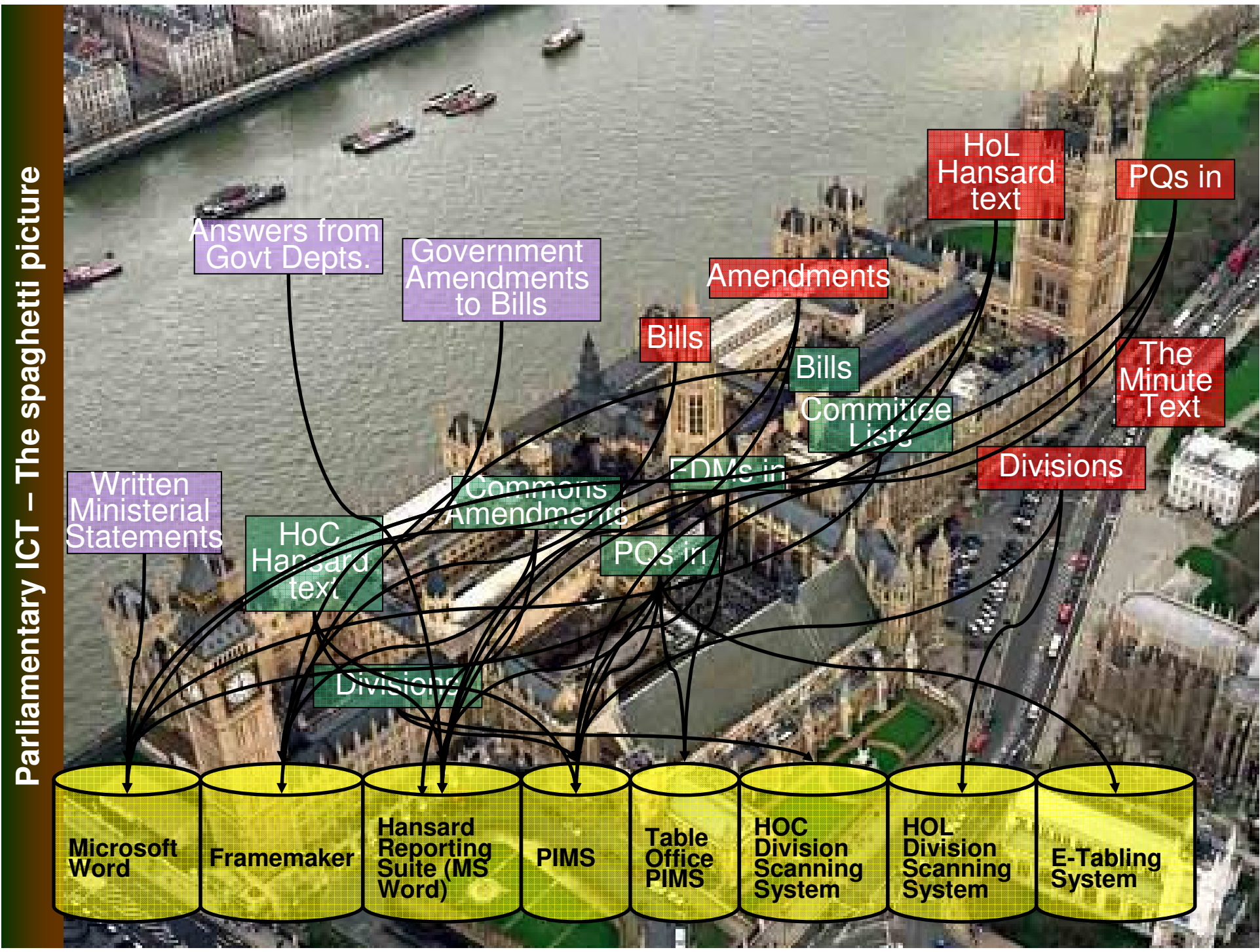
Wall Sheets

Commons Hansard

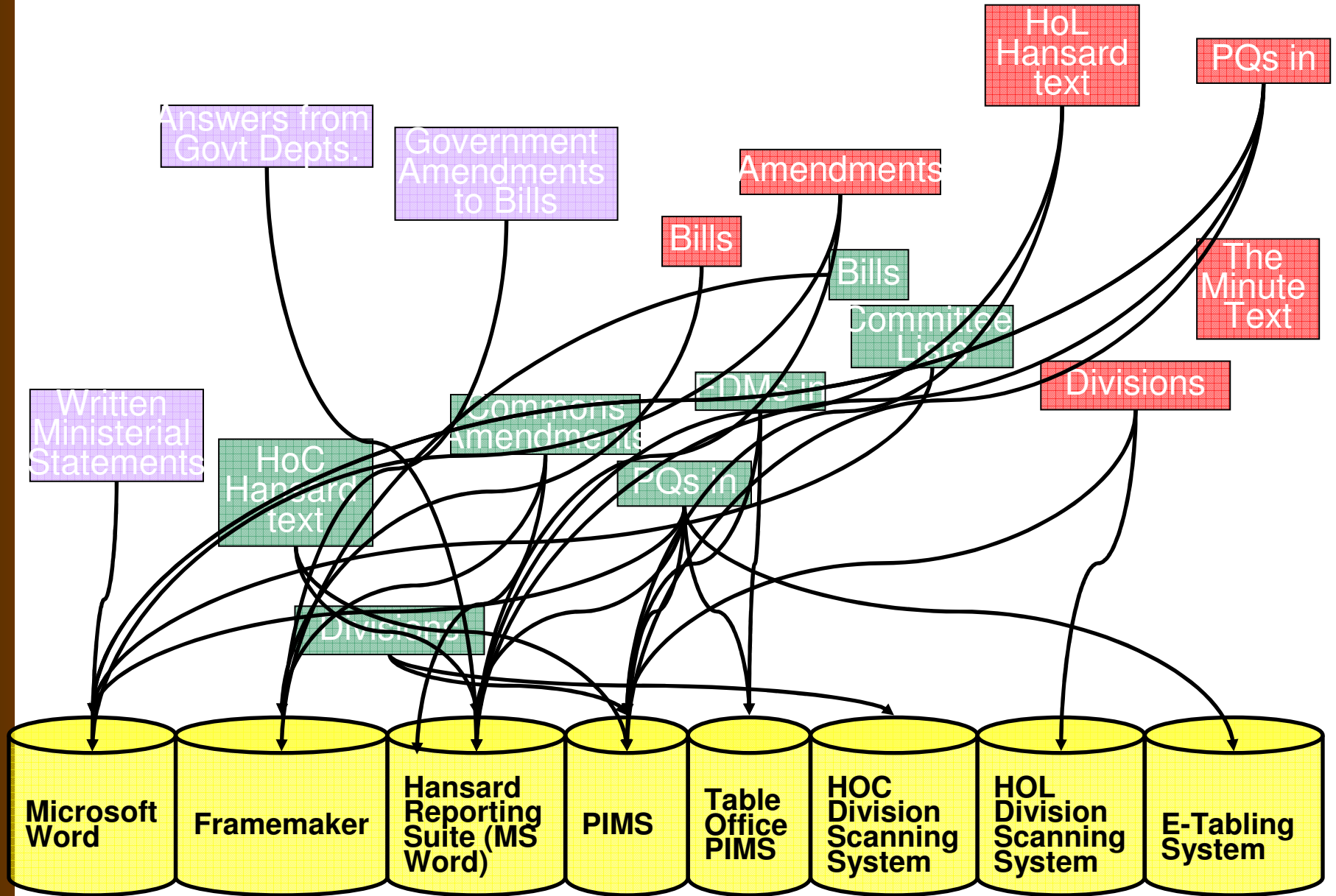
The Order Paper

Bow Tie TV

Parliamentary Bookshop



Parliamentary ICT – The spaghetti picture



Problems for IT in Parliament

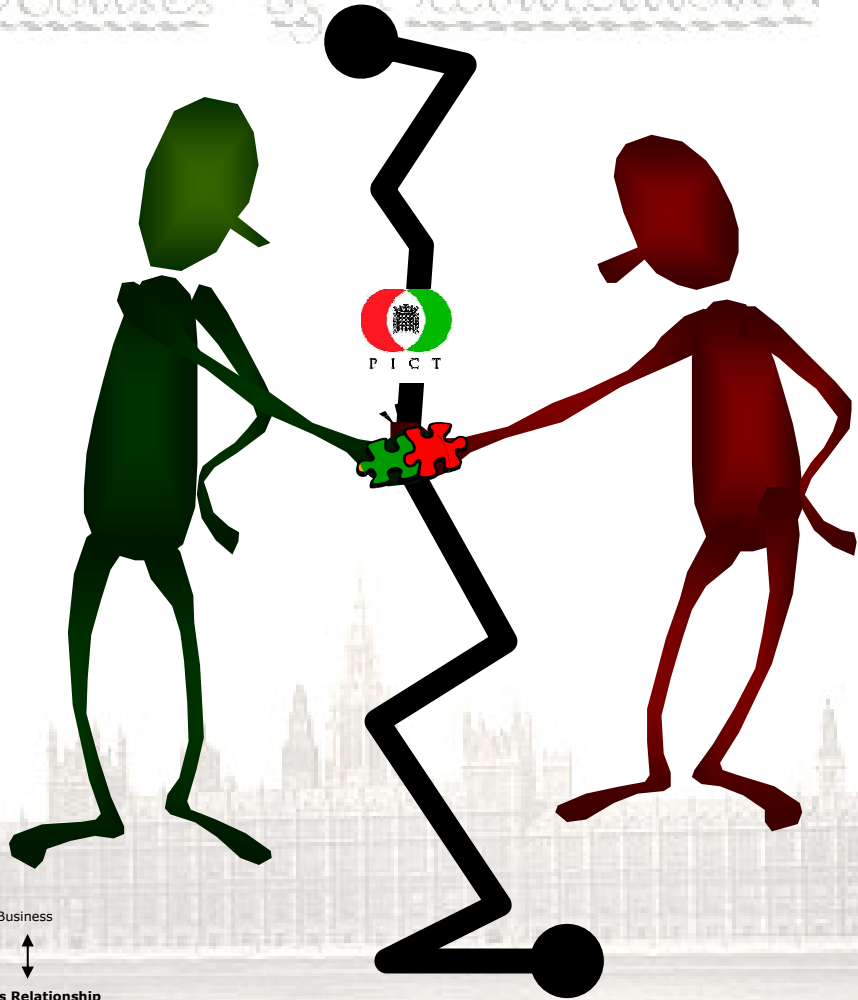
- ❖ Duplicate, re-keyed & redundant data
- ❖ Everyday language v parliamentary language - not intuitive
- ❖ Search for information problematic – ‘where do I look?’
- ❖ Inadequate & difficult search capability on intranet & internet
- ❖ Everyday language v parliamentary language - not intuitive
- ❖ Metadata patchy, incomplete and from different schemas
- ❖ Many ‘stovepipe’ systems – each bit of the stovepipe solving a different problem
- ❖ Internet infrastructure 5yr old SW & HW
- ❖ Non existent or inadequate & inappropriate documentation
- ❖ Inadequate knowledge spread – too much in few individuals
- ❖ Inconsistent user interface design
- ❖ Lack of appropriate resources
- ❖ Unpredictable effects of change
- ❖ Poor communications
- ❖ Little standards compliance
- ❖ Immature configuration management
- ❖ Inadequate development environment



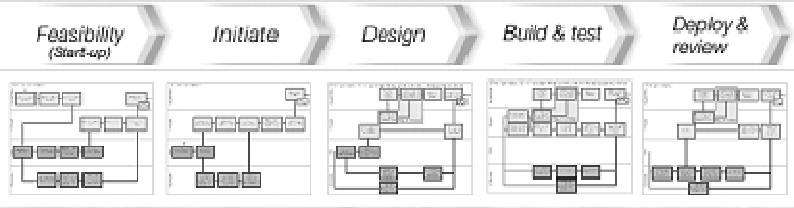
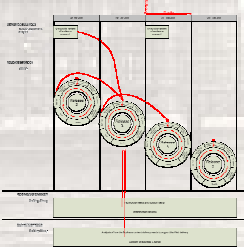
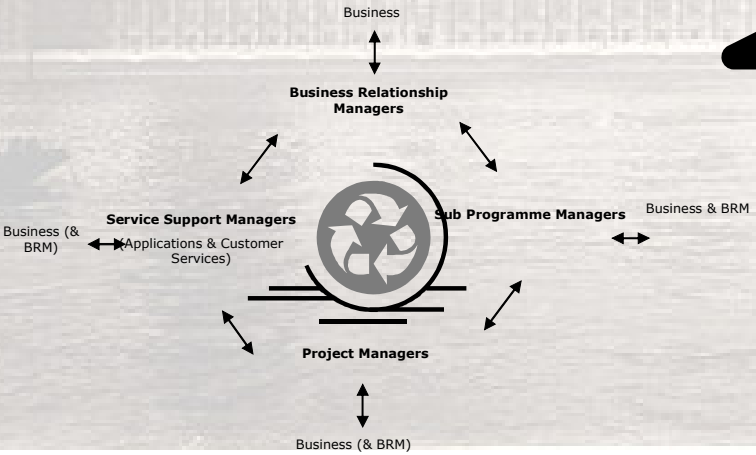
Supporting Separate & Conjoint Objectives...

Houses of Parliament

- I. To provide the advice and services that enable the House and its committees to conduct their business effectively.**
- II. To provide the advice and services that enable individual Members (and their staff) to perform their parliamentary duties effectively.**
- III. To promote public knowledge and understanding of the work and role of Parliament through the provision of information and access.**



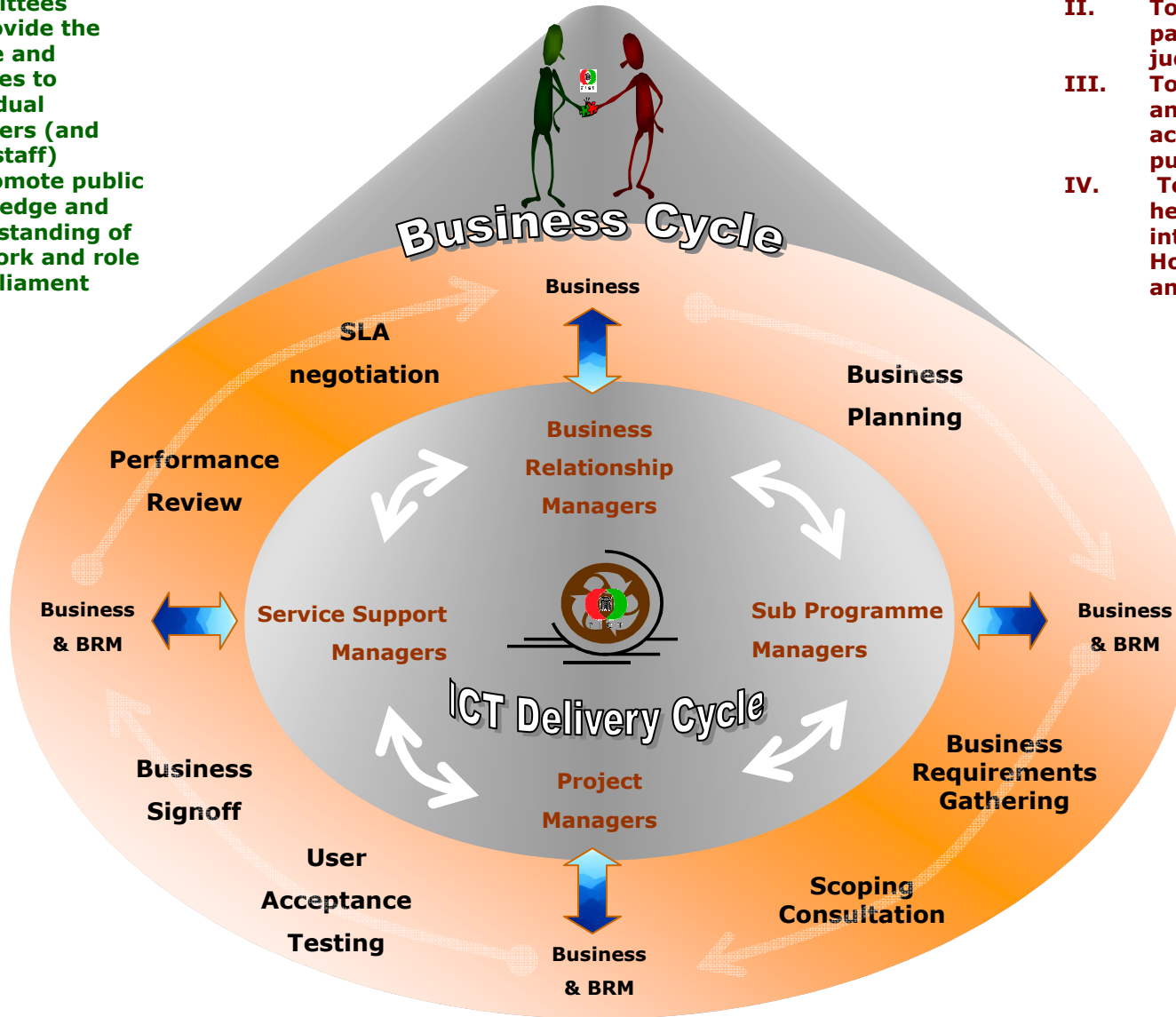
- I. To meet the needs of the House and its committees.**
- II. To meet the parliamentary and judicial needs of individual Members regardless of party or office.**
- III. To make the House and its work accessible to the public.**
- IV. To maintain the heritage and integrity of the House's buildings and collections.**



The Planning Cycle

- I. To provide the advice and services to the House and its committees
- II. To provide the advice and services to individual Members (and their staff)
- III. To promote public knowledge and understanding of the work and role of Parliament

- I. To meet the needs of the House and its committees.
- II. To meet the parliamentary and judicial needs
- III. To make the House and its work accessible to the public.
- IV. To maintain the heritage and integrity of the House's buildings and collections.



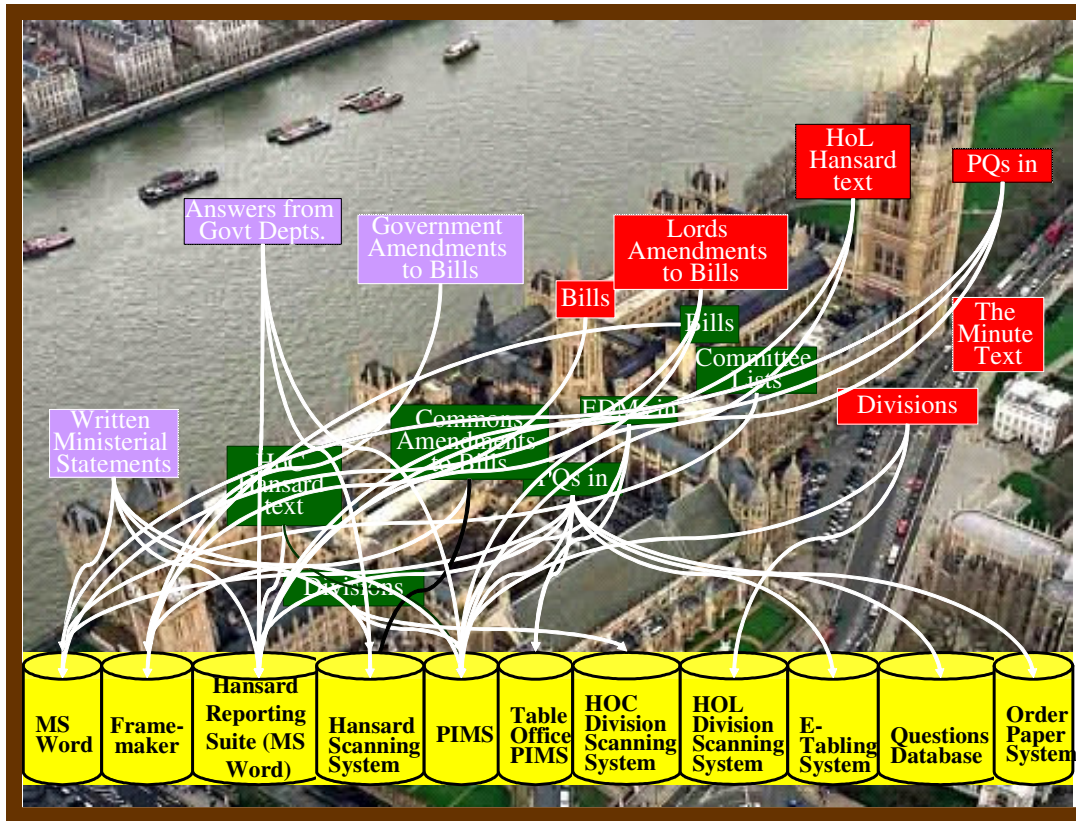
What we need to know:

- ❖ Is the current architecture supporting and adding value to Parliament?
- ❖ How might our architecture be changed to add more value to Parliament?
- ❖ Will the current architecture support or hinder what Parliament wants to accomplish in the future?

Questions, questions, questions...



As-Is Model



The Future Model

- ❖ Untangles the Spaghetti
- ❖ Shows requirements being met using tested components from the EA component portfolio, each of which delivers business value
- ❖ Demonstrates increasing maturity of the capability to deliver what is required



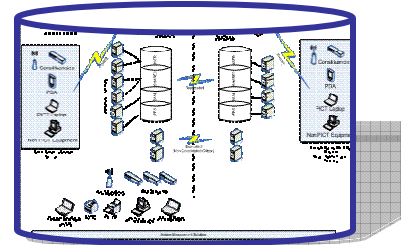
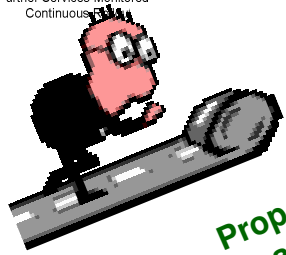
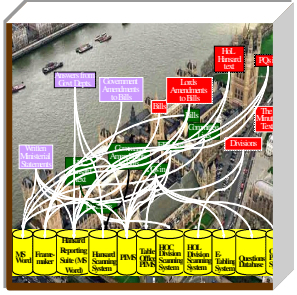
The Migration Plan:

- ❖ A road map from As-Is to the Future Model
- ❖ Implement incrementally
- ❖ Deploy technical infrastructure as needed to meet business requirements
- ❖ Implement across all 4 architectures



Improving the Infrastructure...

	2006	2007	2008
<i>Technical Infrastructure Strategy</i>	☺ Initial Strategy In Place		
<i>Constituency Network & Support</i>		☺ First Phase Rollout Commences	☺ Continued Service Take Up
<i>Wireless Network (Inc RD WIFI)</i>	☺ Strategic PN WIFI & Guest WIFI In Place		
<i>Rationalisation Project</i>	☺ Rationalisation Pilot Completed		☺ Desktop, AD & Server Rationalisation Complete
<i>Telecommunications Dual Parenting</i>	☺ Resilient Parliamentary Voice Network in Place		
<i>Telecommunications Resilience Contract</i>	☺ Telephony Switch Recovery Contract in Place		
<i>Server Virtualisation</i>		☺ Server Virtualisation Work Commences	☺ Server Virtualisation Work Complete
<i>Remote Data Centre & Full Disaster Recovery Solution</i>		☺ Commence Procurement of Remote Data Centre	☺ Disaster Recovery Solution in Place
<i>Remote & Mobile Enhancements</i>		☺ Commence Enhancements to Remote & Mobile Solution	☺ Enhanced Services Available
<i>Parliamentary Estate Cabling</i>	☺ Initial Upgrades to Parliamentary Cabling Complete	☺ Further Enhancements to Parliamentary Estate Cabling to Support Strategy & Designs	
<i>Voicemail & Operator Bureau</i>	☺ New Voicemail & Operator Bureau Solutions in Place		
<i>Service Monitoring</i>	☺ Basic Service Monitoring In Place	☺ Further Services Monitored – Continuous	
<i>IT Asset Management</i>	☺ IT Asset Management in Place & up to date		
<i>PN3 Stage 4</i>	☺ Complete		
<i>Single PN</i>	☺ Complete		



... It's a big project

We're undertaking a big re-organisation...

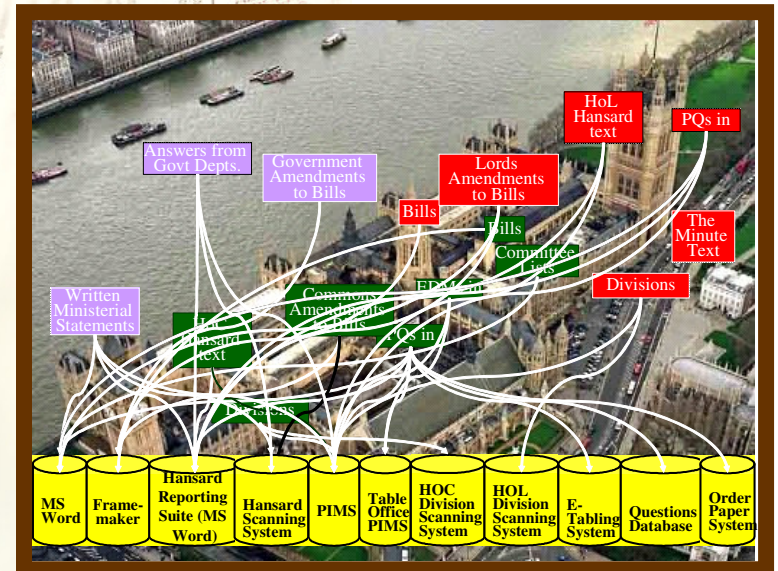
Parliament is **complex**

Disjointed ICT across Parliament

Working in **silos** within Departments & Houses

A **confused** matrix of responsibilities

But... with a clear vision
of implementing
ICT Excellence and Efficiency



Parliament's Architectural Principles

- ❖ Principles are relevant to the business objectives and strategy
- ❖ They are constantly evolving, evaluated and refined
- ❖ The Enterprise Architecture will be built in accordance with our values:

Respect, Excellence, Accountability and Learning



What is a Principle?

- ❖ A principle has a name and description
- ❖ A principle has a rationale to be adhered to
- ❖ A principle has implications to be considered if followed
- ❖ A principle supports our values



Key Parliamentary Business Information Requirements

- ❖ Business Processes
 - ❖ Agile and flexible output
 - ❖ Cater for required timeliness
 - ❖ Highly diverse but low volume
 - ❖ Facilitate exposure of knowledge from silos

- ❖ Data
 - ❖ Single point of entry
 - ❖ Local representation catered for
 - ❖ Value appreciated

- ❖ Application
 - ❖ Interactive capability especially for facilities and asset management
 - ❖ Intranet based transactions
 - ❖ Timely and transparent transactions



Key Parliamentary Business Information Requirements

- ❖ Skills
 - ❖ Cater for skills and support availability
 - ❖ Facilitate the management of knowledge

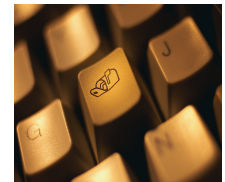
- ❖ Others
 - ❖ Ensure value for money
 - ❖ Ensure legal compliance
 - ❖ Exploit the niche of Parliamentary business and processes



Parliamentary Information Technology Requirements

- ❖ Platform
 - ❖ Open standards based
 - ❖ Legacy adaptors for integration services
 - ❖ Web services
 - ❖ XML metadata
 - ❖ Publishing framework
 - ❖ Development and test environment

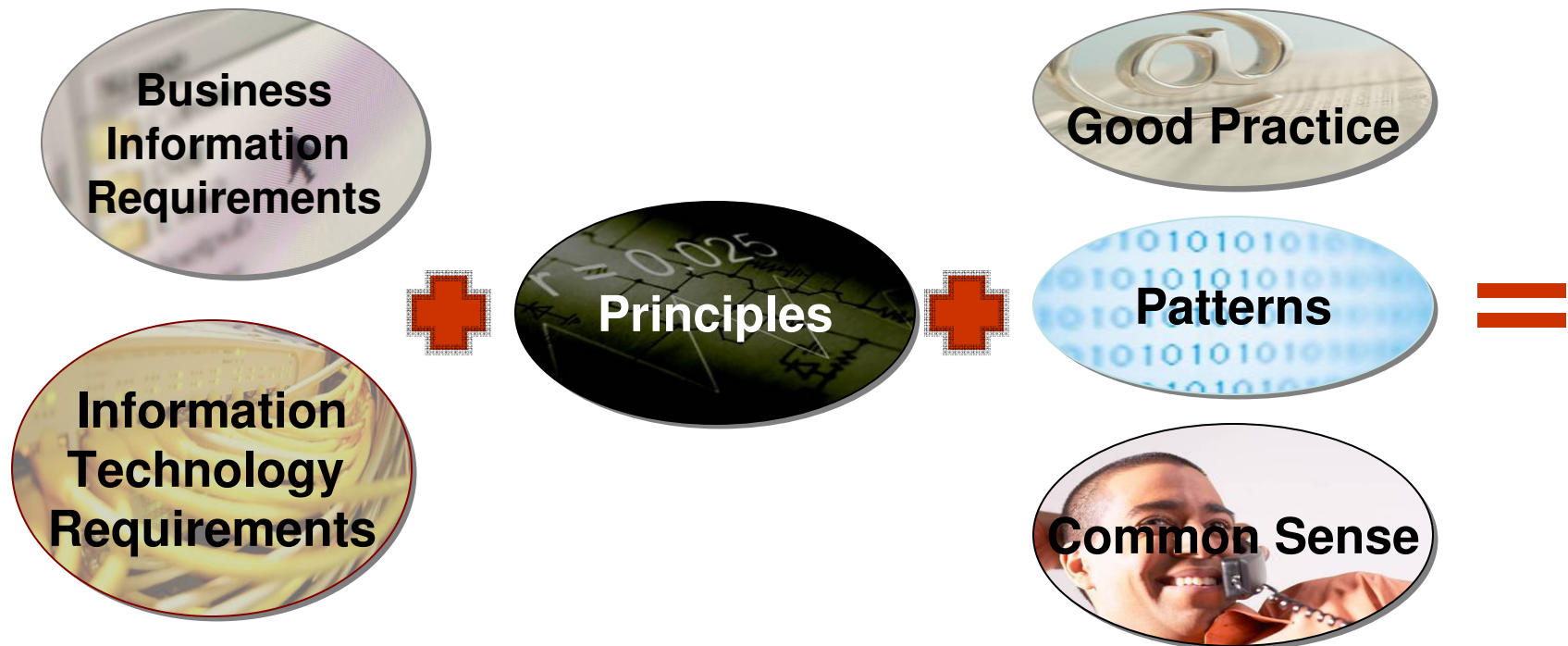
- ❖ Functionality
 - ❖ Coherent and consistent security
 - ❖ In excess of 95% availability
 - ❖ Validated and timely access to data, anytime, anywhere
 - ❖ Requirements management
 - ❖ Data replication and warehousing



...and then something happened

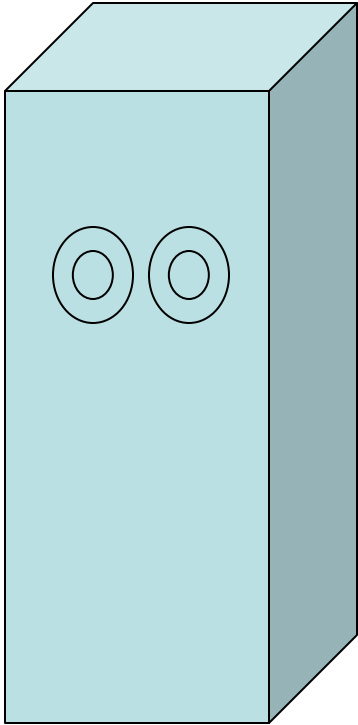
- ❖ Business Information Requirements
- ❖ Information Technology Requirements
- ❖ Principles
- ❖ Good practice, patterns & common sense

Add some magic...

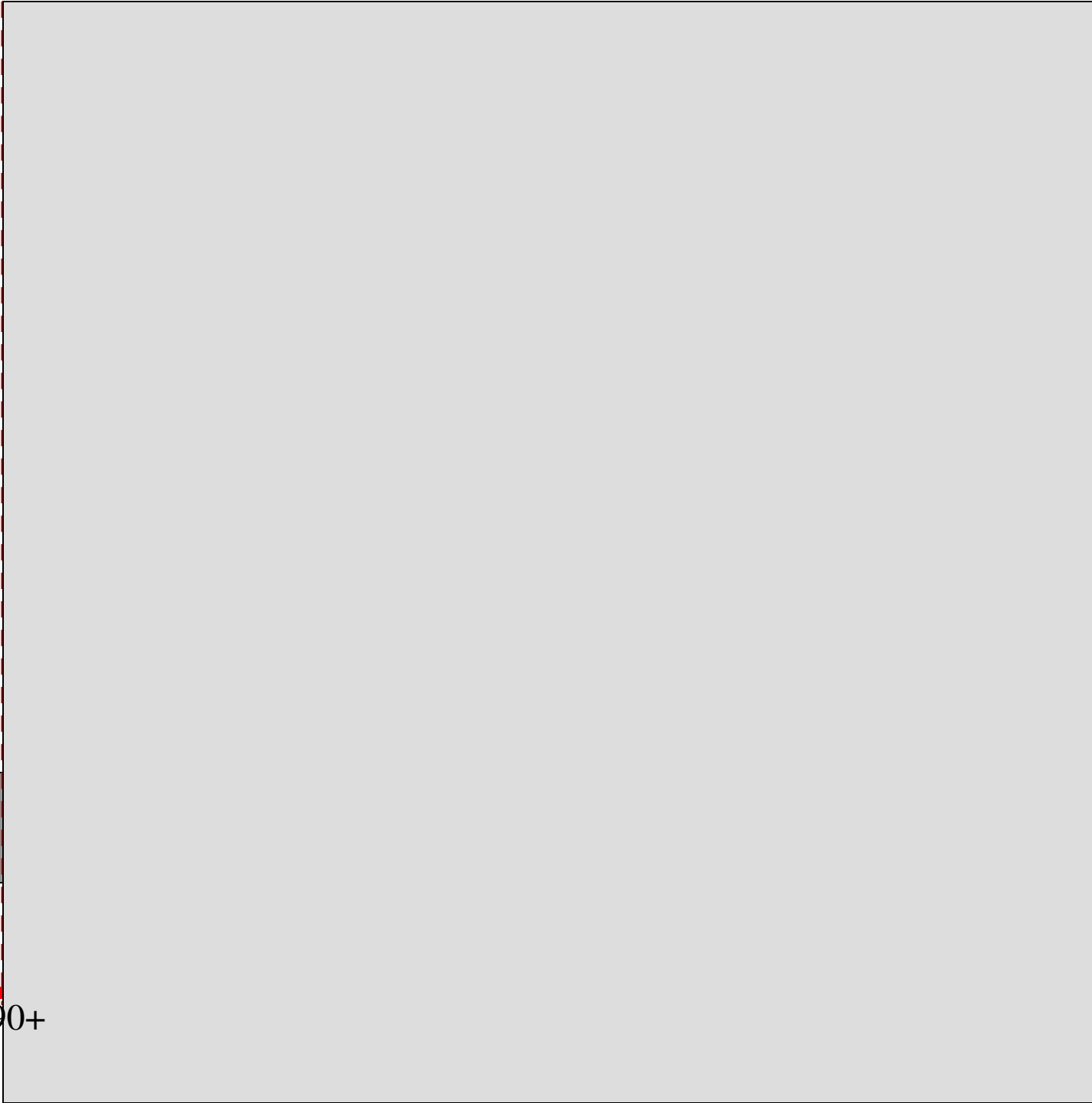


A bit of computer history...

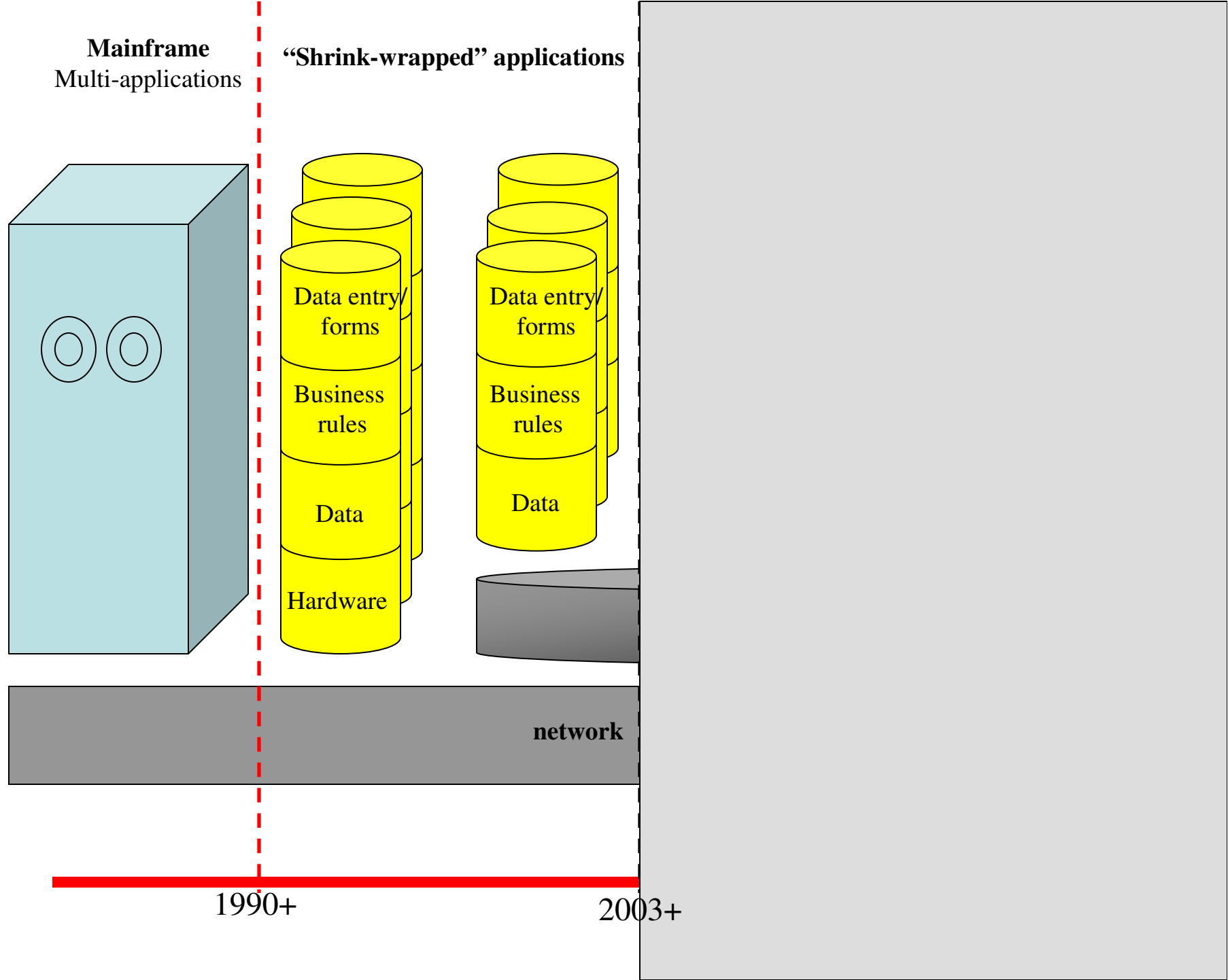
Mainframe
Multi-applications



1990+

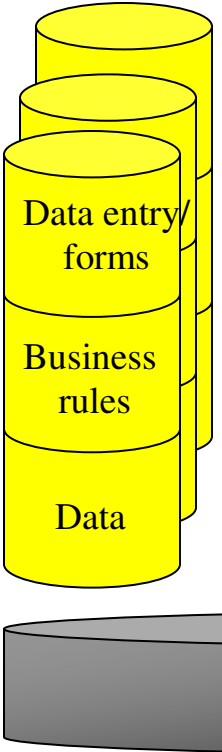
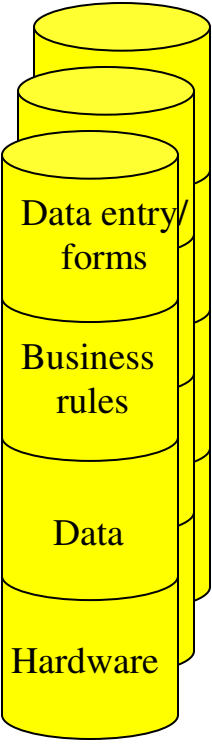
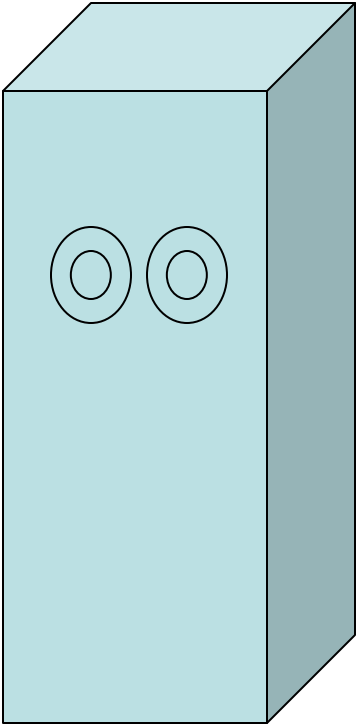


A bit of computer history...



Mainframe
Multi-applications

“Shrink-wrapped” applications



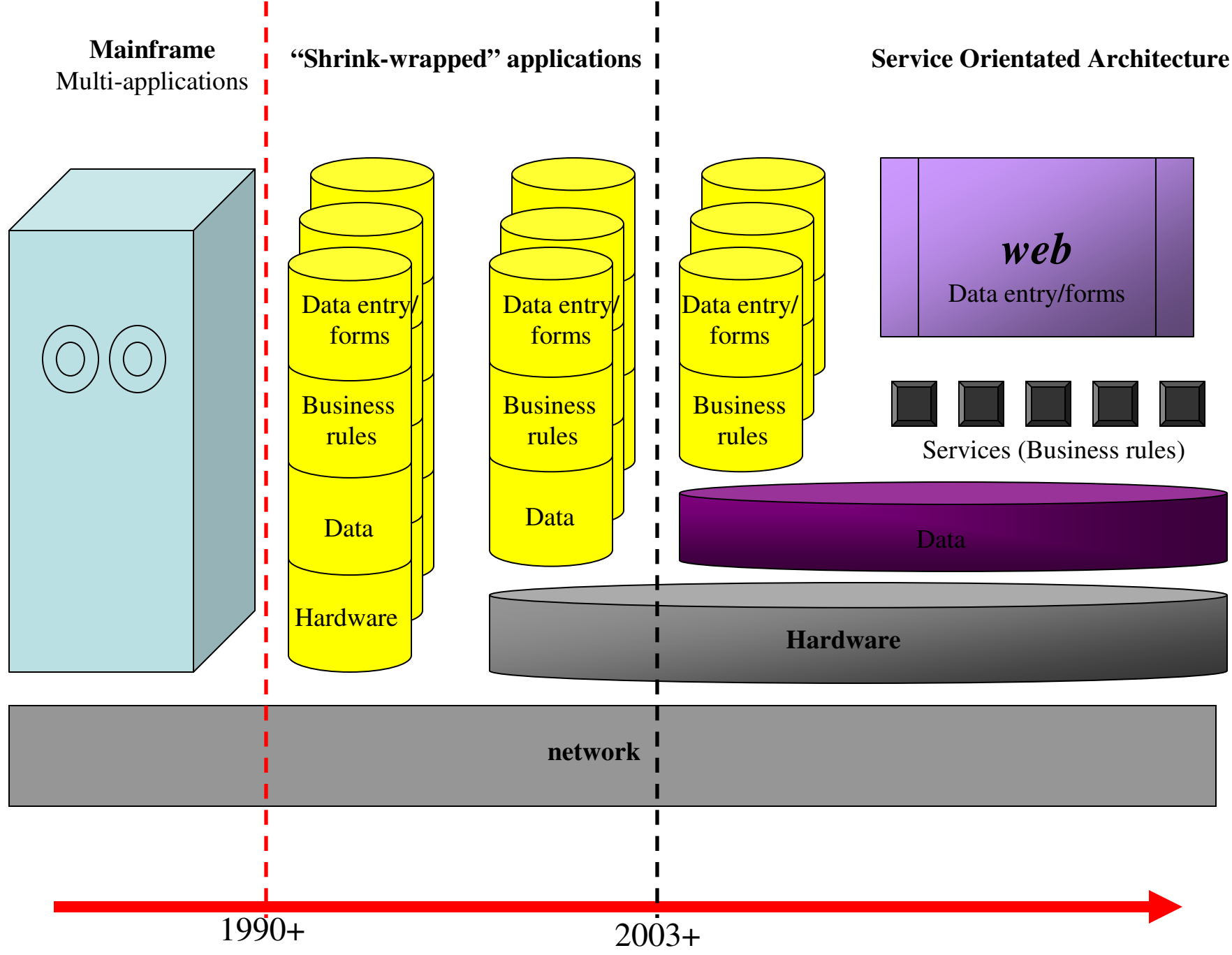
network



1990+

2003+

A bit of computer history...

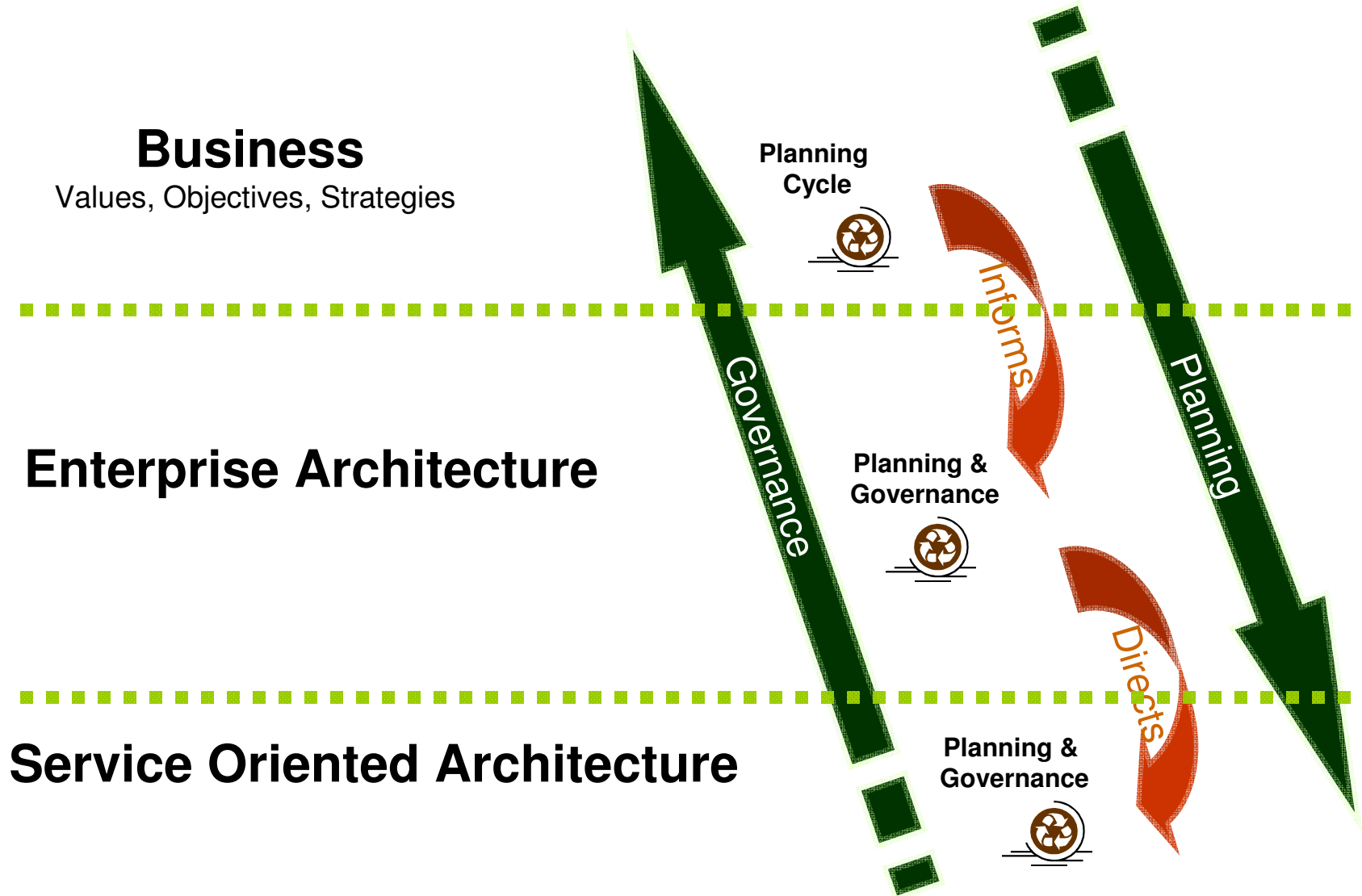


What is Service Oriented Architecture?

- ❖ A business process delivers combinations of services in pursuit of business objectives
- ❖ Some of these services involve the use of IT systems
- ❖ Usage of IT services may be made:
 - Person to person (e.g. by telephone – service desk)
 - Person to machine (e.g. over the internet)
 - Machine to machine (e.g. a scheduled file upload)
- ❖ Services are the components of a business process
- ❖ SOA – An architecture that manages & supports the service lifecycle
- ❖ SOA enables delivery of the EA – it is built with components from the EA portfolio
- ❖ SOA services monitor themselves and supply performance metrics - enables Business Activity Monitoring
- ❖ SOA facilitates Business Process Management

Putting it all together ...

Parliament, EA & SOA





Vision & Timescale

2007

- Key EA Infrastructure & Artefacts
- Requirements Management
- Key Web Services
- Initial Technical Services

2008

- SOA Business System Integration
- Enterprise Service Bus – Specification, selection, migration & deployment
- Services identified & specified

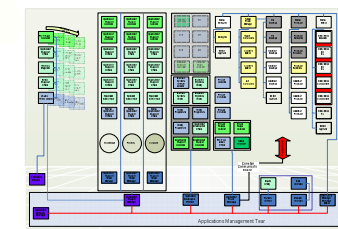
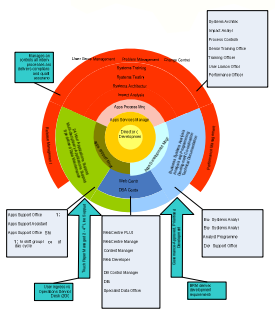
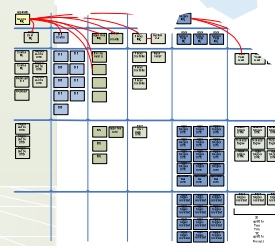
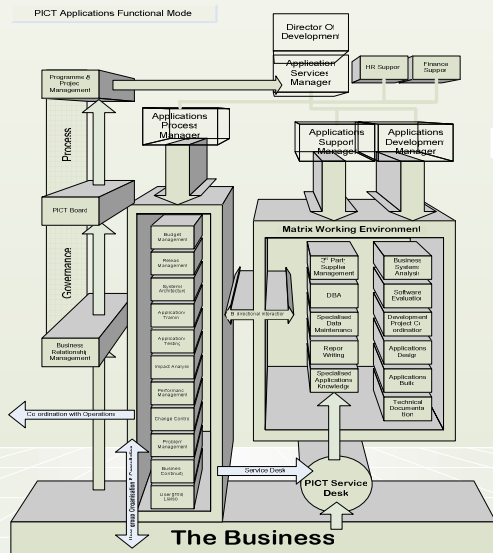
Mid 2009

- Complete SOA technical infrastructure
- Service lifecycle management
- EA integrated into the planning lifecycle
- An 'actionable architecture'
- Maturing EA, SOA & development capabilities



... application's resilience improvements

- 👏 Understanding the inherited organisation
- 👏 Evaluated the need to bring the teams together
- 👏 Managed a transition project
- 👏 Created a functional based model
- 👏 Creating a flexible future proof applications layer



- Generalist, hands-on support for the specialised functions, assisting in all incident resolution and scheduled tasks
- Maintaining applications support on a hands-on basis, resolving software issues and alleviating user problems
- Ensuring the resolution of all on-site hardware-related incidents
- On-hand network specialist to identify, analyse and resolve essential connectivity issues
- To allocate and manage the incidents and scheduled tasks and to report status

Connecting with the Public

<http://www.publications.parliament.uk/pa/cm200304/cmselect/cmmodern/368/36802.htm>

Collaborating in the **business led Internet Strategy** to **Inform, Promote Parliament, Listen.**

Developed a **Business Case*** based on the Voice of the Customer, segmentation of audiences, usability research and Customer satisfaction tracking studies

Designed a **programme of agile service** delivery with a flexible and clear project governance structure

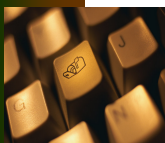
Identified and implemented **Short Term Benefits** to respond to the most immediate needs and planned Interim Improvements

We worked in **close partnership** with other Parliamentary teams to develop a vision and a long term process of continuous improvement

We proactively keep looking for ways to explore new trends and **technological advances** such as Personalisation, and User knowledge management including acceptable channels to Listen to the Public

We have implemented a **plan of Measurements** and continual review of objectives, risks, evolving priorities, audience research, flexibility of releases and **Management of Benefits**

[*http://pdvnsco.parliament.uk/webcentre/documents.htm](http://pdvnsco.parliament.uk/webcentre/documents.htm) @ Nov 2006



Governance, People, Performance, Plan

Governance

PICT Governance established:

- ✓ JBSB
- ✓ PICT Forum
- ✓ PICT Board
- ✓ Performance Board
- ✓ Programme Board
- ✓ Legislation

People

- ✓ Values & Culture
- ✓ Structure
- ✓ Development
- ✓ Skills Gap
- ✓ IiP accreditation

Performance

- ✓ Zero Base Budget
- ✓ Forward Plan
- ✓ Performance Dashboards
- ✓ Gartner Benchmarking
- ✓ Service Level Agreements
- ✓ Action and risk logs

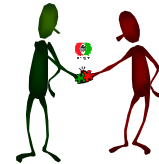
The Plan

Business plan 2006/2007

Business plan 2007/2008

Identify what to do first:

- ✓ Develop Programme
- ✓ CSII: Improve customer service
- ✓ CSII2: Improve service response
- ✓ Improve PICT internal processes
- ✓ Design Architecture
- ✓ CSII3 – ITIL, Change Control
- ✓ Business Continuity
- ✓ Disaster Recovery
- ✓ Internet
- ✓ Strategy for Members' services
- ✓ Inventory
- ✓ Procurement
- ✓ 24/7 Support

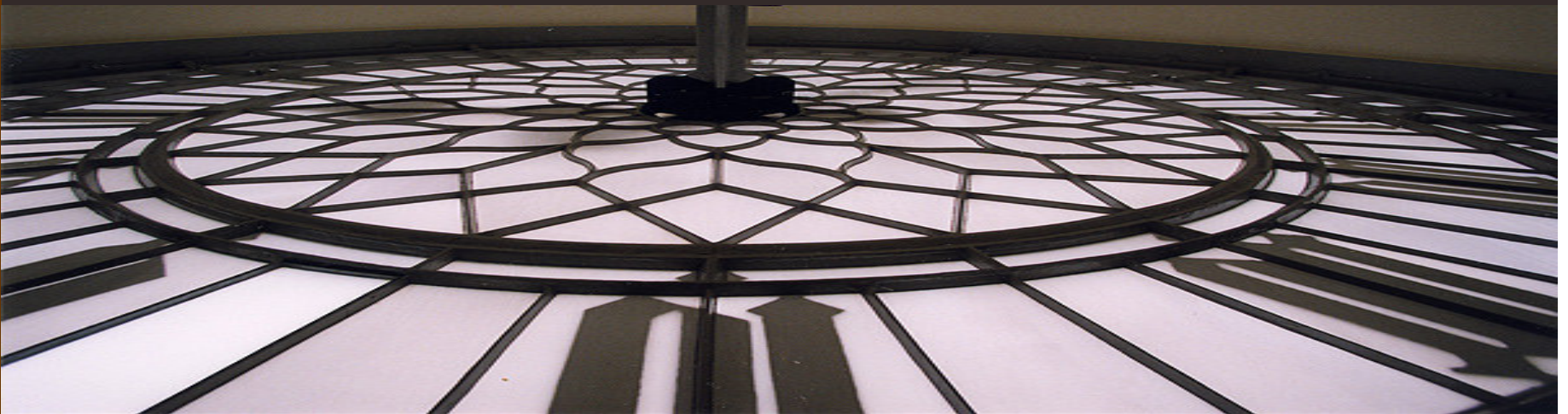


Priorities:

- Completing the structure
- People into posts
- Construct budget
- Monitor, Learn, Improve



**PICT aims to attain best practice in
delivery, support and exploitation of ICT
in Parliament**

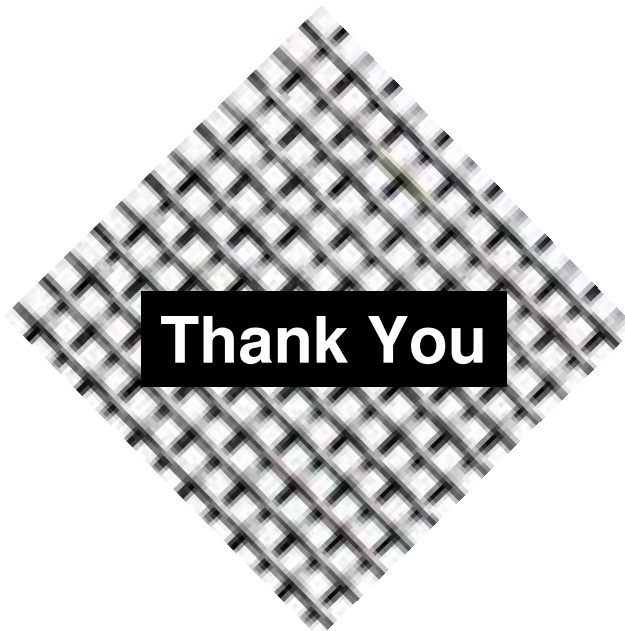


**Enabling Parliament to work effectively and connect
with the Public**



Parliamentary ICT

Enterprise Architecture & the Houses of Parliament



Thank You

