

White Paper

Effective digital transformations

To enable delivery of digital services, government departments face significant changes reaching into their culture and behaviours, their suppliers and the wider public - forming complex environments that are significant sources of risk. Meeting challenges such as integration, governance, over-optimism and benefits realisation needs a wider management perspective of ICT management than just changing the digital infrastructure. This wider approach helps prioritise digital change portfolios, manage tensions and dependencies, and support departments in becoming intelligent investors in digital services.



Introduction

Creating and delivering a portfolio of digital services is not just about defining the information and communications technology. Digital services require significant changes that not only reach into the heart of the organisation, but also need the integration of internal and external environments, a balance to be struck between governance and agility, and above all achieving confidence in making the right investment decisions.

Success in delivering changes based around ICT, whether they are in internal business systems or online services, is dependent on overcoming challenges associated with complex environments such as integration, behaviours, governance, over-optimism and actually achieving the intended benefits. These can be addressed by understanding a wider perspective beyond the future technical state, and embracing the most appropriate combination of techniques to address all of the factors affecting the change itself.

In this way BMT Hi-Q Sigma has been successful in supporting various clients in the development and understanding of their digital changes. Clients have benefited from informed portfolio decisions, robust commercial engagement with suppliers, and development of integrated solutions suited to their environment and culture. BMT Hi-Q Sigma's independent and inclusive approach has transferred skills and expertise to teams, increasing their capability to serve as intelligent clients for digital services.

Embracing the digital strategy

In 2013 the UK Government launched its digital strategy (see sidebar). This strategy is aimed not only at increasing efficiencies and delivering savings, but fundamentally changing how Government departments, agencies and other organisations deliver services.

In order to move to delivering digital services, government organisations face undertaking transformational changes in Information (& Communication) Technology infrastructure, with resulting impacts to processes and practices, related personnel issues and information handling.

These can be significant changes that will reach into the culture and behaviours of the organisation, forming complex environments that are significant sources of risks.

However the history of initiatives to implement new IT-based services in the public sector is marked by a number of well-reported failures. Issues have decreased the public confidence that such changes can be implemented successfully and deliver the required service.

UK Government Digital Strategy

According to the 2013 digital strategy, the UK Government will:

- Improve departmental digital leadership
- Develop digital capability throughout the civil service
- Redesign transactional services to meet a new Digital by Default Service Standard
- Increase the number of people who use digital services
- Broaden the range of those tendering to supply digital services including small and medium sized enterprises
- Build common technology platforms for digital by default services
- Remove unnecessary legislative barriers
- Base service decisions on accurate and timely management information
- Collaborate with partners across public, private and voluntary sectors to help more people go online

Source: Cabinet Office, Government Digital Strategy, [www.gov.uk]

“The first lesson is that there is no such thing as an IT project; there are only business projects that involve IT”

Ian Watmore, Public Accounts Committee IT Landscape Review 2011

IT projects in the public eye

Numerous reports have been published on the reasons for the success or failure of past IT projects - including those from the Parliamentary Office for Science and Technology¹, the National Audit Office², and the Committee of Public Accounts³.

A consistent theme across this well-documented landscape is the need to ensure that IT projects are not regarded as just being about the technology. They are activities that are typically seeking to change behaviours and practices both inside government and with the wider society. IT projects consider different operational aspects from online services to back office systems, but they also have to be in-line with policies and strategies, enable appropriate governance over activities and, most importantly, interact with people. Complexity in IT projects is as likely to come from these sources as from technical integration.

As IT developments are typically part of a wider complex change programme, they therefore also need to address wider government challenges such as integration⁴, over-optimism⁵ and realisation of benefits⁶.

IT project challenges

Challenges to IT project success are by no means limited to the public sector. A McKinsey report in 2012 which looked at 5,400 IT projects⁷ found that on average 45% of large IT projects run over budget and 7% run over time while 56% deliver less benefit than expected. Of the projects that ran over budget, over half attributed the cause to project management-related issues. Technology issues were seen as a lesser cause, a result seen in other surveys.

Conditions for IT project success

The National Audit Office has previously reported² on key success factors for IT projects in the public and private sectors, as well as recommending a strengthening of the processes and structures within government. The key success factors identified were:

- Ensuring senior level engagement
- Acting as an intelligent client
- Realising the benefits of change

In addition, the McKinsey study⁷ in 2012 recommended a ‘value assurance’ assessment of IT projects based on success factors across 4 groups:

- Managing strategy and stakeholders
- Building teams and capabilities
- Excelling at project management practices
- Mastering technology and content

How then do we build on these factors to achieve a successful portfolio of digital services?

¹ Parliamentary Office of Science and Technology – Government IT projects, 2003, POST Report 200

² National Audit Office – Information and communication technology in government: Landscape review, 2011, HC757

³ Public Affairs Committee – Delivering successful IT-enabled business change, 2007, HC113

⁴ National Audit Office – Integration across government, 2013, HC1041

⁵ National Audit Office – Over-optimism in government projects, 2013

⁶ National Audit Office – Review of the final benefits statement for programmes previously managed under the National Programme for IT in the NHS, 2013

⁷ Bloch M, Blumberg S, Laartz J – Delivering large-scale IT projects on time, on budget and on value, McKinsey 2012

Managing IT change

Adopting a holistic approach to change

IT projects do not exist in isolation. The introduction of new digital-based services (whether for internal or external use) are part of a change that has to interact with a wider context to be successful. Key influences, constraints, threats and opportunities will arise from beyond any narrow technology focus. Any portfolio of IT projects has to extend its change horizon to embrace these sources and recognise means of identifying and addressing them, and ensure that this principle extends to all projects in the portfolio.

Managing a portfolio of complex changes

The ability to act as an intelligent client relies on understanding the true nature of the challenges and developments facing your portfolio from across the wider environment and from the supply chain. A holistic approach means ensuring that the challenges are not localised, and that sources of complexity are identified and addressed as part of the change design.

A lack of up-front investment into exploring different options, issues and potential sources of risk in a project discovery phase will invariably result in downstream problems and threats to project success. Conversely, too much time spent on initial detailed analysis is also unlikely to be beneficial when the eventual services are dependent on emergent solutions. Therefore it is imperative that portfolio management supports the individual IT programmes and projects by establishing a business-wide foundation for optimal discovery phases.

A wider perspective will also identify the scale and skills of resources needed to address the challenge, and support the overall requirements balancing across the portfolio.

Effective change leadership

A holistic approach recognises the importance of leadership in change success. Leadership is a combination of senior management commitment and sponsorship, a strong vision with stakeholder alignment, a clear strategy, the application of appropriate governance with effective controls, taking robust and timely decisions, and a continual focus on why the change is needed and that the activities are being effective. By understanding, integrating and managing the wider perspectives of the change, leadership can be clear in its direction and decisions.

“The ability to deliver the expected benefits from a change is key to delivering a successful digital service”

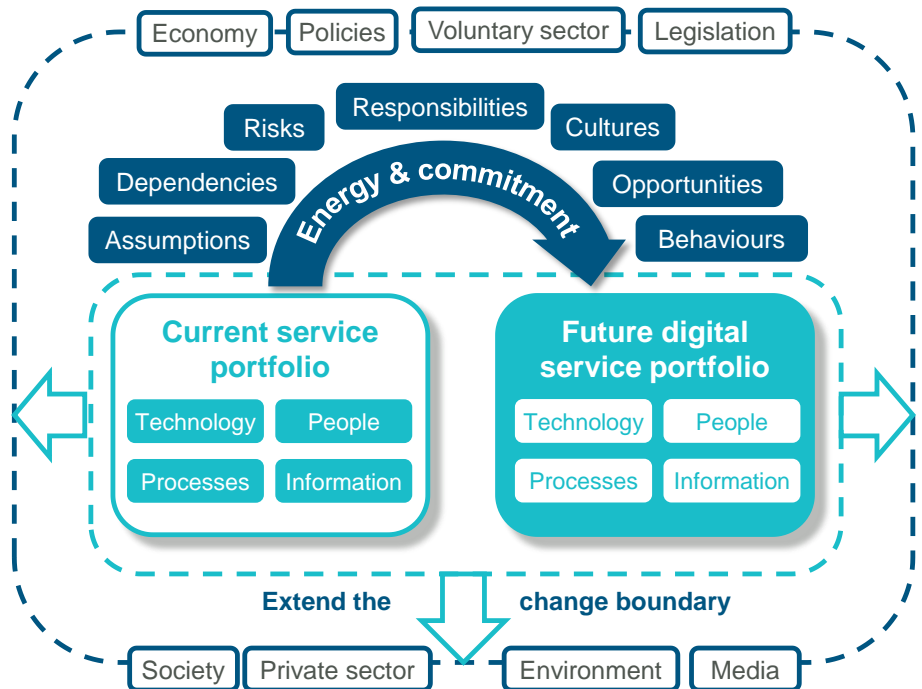
Deliver the benefits

The ability to deliver the expected benefits from a change is key to delivering a successful digital service. An understanding of all potential benefits (and dis-benefits) and needs of users will underpin the relationships with stakeholders; identify quick wins to provide momentum; help plan an effective handover to working practices; embed the change in the new environment, and help provide ex-post evaluation evidence.

Communication with key stakeholders is easier when the wider challenge is recognised - the influence of these stakeholders to that challenge is addressed and future pitfalls can be avoided.

Embracing development methodologies

Taking an integrated holistic approach to creating new digital services does not contradict any employment of agile methods for solution development⁹. It can provide the foundations for an environment in which an agile approach can flourish and reach full effectiveness. Programme and project management methods do not have to be bureaucratic or linear, but they can provide discipline and rigour whilst retaining flexibility. They can then underpin the service solution design and ensure the service meets the criteria of the Digital by Default Service Standard¹⁰.



It's not just about where you start and where you finish, but also about how you get there.

Ensure that the change boundary encompasses all factors that will influence the change, not just the start and finish states.

⁹ National Audit Office – Governance for agile delivery, 2012

¹⁰ GOV.UK Digital by Default service standard- Government service design manual, 2013

Transforming digital services

Managing the transformation tensions

IT-driven change programmes can typically introduce a complex set of tensions that interact with each other. Change management at a programme level will be focused on the balance of benefits, risks and the scope of change. Individual projects within the programme will seek to satisfy their specific ('traditional') time, cost and scope targets, whilst any activity following agile development methodologies will attempt to balance the trade-offs between scope, rigour and the iterative tempo. All of these tensions will be attempting to pull the overall change portfolio in different directions, or will build up resistance to any significant progress. A successful approach to Digital Service transformations will recognise these tensions and purposely set out to address them.

Use the vision

The reason for change needs a credible vision that communicates a better future. To be credible it needs to capture how the change will transform the "as is" organisation to a new future. This firm vision can then bring together disparate elements under tension and therefore drive and focus the entire team on

- The changes that the transformation requires,
- The integration between different elements that is needed for the transformation.

Create the right spaces

The organisation needs to create and manage the appropriate environment for the chosen delivery mechanism.

- An agile development environment requires a greater degree of customer and user interaction and an output that is well suited to an iterative delivery approach.
- A sequential delivery approach is better suited to an output that has been delivered before and is well understood by all involved.

Whilst it is entirely feasible to manage a change programme composed of projects that follow these different philosophies, allowing these two environments to overlap will undermine the respective behaviours and exacerbate tensions.

Focus on value

Change is only successful if the beneficiaries of the digital service see value in what they receive. Ownership of external value is often difficult to achieve in government programmes. But ensuring that both internal and external value is appropriately defined and prioritised will allow the digital transformation to

- Remove waste and nugatory work
- Focus only on what is truly needed – and no more.
- Ensure the users and beneficiaries perceive the value of the digital transformation as early as possible.

Governance of delivery mechanisms

To deliver an integrated digital service in to an uncertain environment, clear governance is required to assure

- All parts of the delivery align to the ever changing backdrop the digital service is being integrated in to.
- Manage the tension between the facets of the programme to allow the projects to focus on delivery.

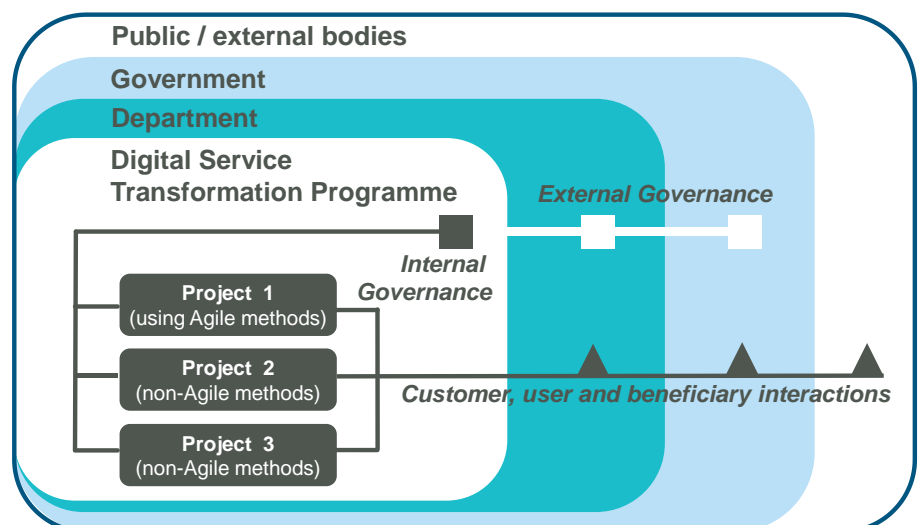
Manage the human interactions

To deliver a digital service the programme team delivering the service and the team that will be operating the service on a day to day basis must work together to:

- Ensure the programme team understand the current operations
- Make sure the operators receive what they need to realise the benefits required
- Align the rollout of the change with current user needs
- Keep stakeholders informed and onside

No digital service programme is an island

Put in place projects with the right delivery approaches but ensure that they manage their relationships and consider cultural clashes between different development environments.



Delivering value

Taking a strategic approach to integration

BMT Hi-Q Sigma were asked by the Valuation Office Agency, an executive agency within HMRC, to provide strategic guidance and support across their portfolio of change programmes, including the modernisation of the IT infrastructure and the flow of data in and out of the Agency.

Our approach included:

- Understanding the business: vision, strategy, financial plans, cultures, stakeholders, supply chain and ICT support requirements
- Mapping the portfolio landscape: projects, milestones, benefits, assumptions and resource distributions
- Defining the portfolio management capability: identifying gaps, the levels required to transform the team and bring about an enduring Portfolio Management Office for IT modernisation

As a result the VOA Board gained an understanding of dynamics and decision-making processes to support informed investment decisions. Skills transfer to the core team meant that the organisation is better equipped to sustain change and further improve IT capability in the future.

Understanding the internal and external scope of need

As part of the redevelopment of the Defence Medical Service, BMT HQS supported the development of the DMS Education Local Area Network (DMEL), the backbone of the information service within the internationally renowned training centre. Working with the user community, ongoing onsite facility developments and early engagement with potential DMEL suppliers, we were able to rapidly implement a strategy which saw the definition of a focussed and appropriate commercial route to market.

Once Cabinet Office endorsement was achieved, robust commercial engagement was achieved within a short timeframe – a result of the upfront work with external suppliers, internal security accreditation staff and forward thinking on service delivery management.

Past activities for BMT HQS clients have achieved:

- Improved decision making
- Shorter commercial engagement timescales
- Integrated delivery solutions
- Improved stakeholder engagement
- Tailored governance for agile environments
- Robust business cases
- Reduction in risks and improved assurance
- Increased confidence of delivery

Combining techniques to achieve maximum effectiveness

In its work looking at IT infrastructure for both SABMiller and recently the Ministry of Justice, BMT HQS has demonstrated its ability to utilise and combine different approaches to address integration across complex IT environments.

- Application of systems thinking to portfolio and programme management
- Agile solution development techniques occurring within a programme framework
- Incremental and iterative architectural modelling of business process integration

The appropriate combinations of methodologies reduces the time it takes to achieve benefits and obtain value whilst maintaining an overall confidence in delivery.

Our familiarity with different methodologies provides the means to ensure that the right cultures and behaviours can be in the right place to ensure successful outcomes.

Supporting the intelligent client

BMT HQS has supported UK Defence Logistics with the definition of the Future Logistic Information Service (FLIS) as it sought to appoint a delivery partner to sustain the current IT environment and enable future transformation. Through this work with the team and stakeholders, we provided the client with a robust understanding of

- Future operational use of the information service that underpinned the business case
- A 'single view of the truth' governance model which became the benchmark against which bids were assessed
- Expected services to be provided by potential bidders for a £1bn contract, and how they would interact with the client
- Specified outputs to reduce risks to both the client and supplier and ensure that the right services will be delivered in the future

Clients can become intelligent customers through our experience in designing business change, securing supplier relationships, understanding risks and integrating elements of the solution.



BMT Hi-Q Sigma can help prioritise digital change portfolios, manage tensions and dependencies in transformations, and support clients in becoming intelligent investors in digital services.