

## ABERDEEN CITY COUNCIL

---

COMMITTEE	Finance, Policy and Resources
DATE	20 September 2016
DIRECTOR	Richard Ellis
TITLE OF REPORT	Being Digital
REPORT NUMBER	CG/16/020
CHECKLIST COMPLETED	YES

---

### 1. PURPOSE OF REPORT

The purpose of this report is to seek Committee approval for the digital strategy, attached in Appendix 1, for Aberdeen City Council.

### 2. RECOMMENDATION(S)

It is recommended that Committee:

- i. Approves the digital strategy for the Council as outlined in Appendix 1.
- ii. Notes the investment of £4.5m already approved through the capital programme agreed at Council on 25<sup>th</sup> February 2016.
- iii. Delegates authority to the Head IT & Transformation to procure products and services as and when required, subject to budget processes.

### 3. FINANCIAL IMPLICATIONS

The estimated cost over four years is £4.5 million. This includes obtaining specialist services to transfer skills and expertise into the Council. Ongoing costs will be funded through transitioning current costs and rationalisation of existing systems across the Council.

The anticipated benefits of up to £5.5m per annum by year five are based on a mixture of reduced administration costs, lower technology costs and self-service. The costs need to be verified following procurement and a more in depth review of the benefits.

#### 4. OTHER IMPLICATIONS

This strategy brings all digital initiatives under one programme of work. This includes the following reports already presented to the Finance, Policy & Resources committee:

- a) Master Data Management on the 3<sup>rd</sup> December 2016.
- b) Building a Digital Future on the 19<sup>th</sup> April 2016.
- c) Digital Connectivity Strategy on the 19<sup>th</sup> April 2016.

#### 5. BACKGROUND/MAIN ISSUES

The digital world continues to transform the way we live our lives: the way we shop, socialise, travel and work. It has changed the way we look for information about public services, and has altered our expectations about how we can engage, access and influence services.

Being Digital sets out to enable wider outcomes by creating a digital organisation. The full report in Appendix 1 sets out a context, a core strategy, key themes, plans and targets. The report makes specific reference to an IT strategy, but this is more than a technology strategy, as it will require a change in how we deliver services and how we interact with our customers.

#### 6. IMPACT

##### **Improving Customer Experience –**

Our customers, partners and suppliers can use any service digitally. They will be able to access services more easily and receive a more consistent level of service.

##### **Improving Staff Experience –**

All staff will be able to work from anywhere, with anyone and at any time. The strategy will ensure that our staff have the right tools and training to do their jobs.

##### **Improving our use of Resources –**

The strategy will deliver savings and allow us to work better with our partners. In delivering this we will seek to minimise costs by exploiting existing frameworks, sharing programmes either locally or nationally and using our existing capabilities better.

## 7. MANAGEMENT OF RISK

The delivery of Being Digital will be monitored through the Transformation Board.

Risk	Resolution / Mitigation
Leadership and buy-in required across the organisation.	CMT approval to be sought and be championed by Corporate Governance Director to achieve full sponsorship and endorsement.
Lack of buy-in to a corporate approach throughout all levels within the organisation.	Implement a full and inclusive communications and engagement plan.
Insufficient investment to support implementation.	Identify requirements & budget source.
Culture change.	Implement a training and engagement programme.
Limited implementation capacity and capability of resources to deliver.	Upskill existing staff and buy in specialist resources if required.
Potential conflict with other corporate programmes.	Align and prioritise through the Transformation Board.

## 8. BACKGROUND PAPERS

None

## 9. REPORT AUTHOR DETAILS

Simon Haston, Head of IT and Transformation

Email: [shaston@aberdeencity.gov.uk](mailto:shaston@aberdeencity.gov.uk)

Tel: 01224 (52)3366

Angela Doyle, Customer Experience Officer

Email: [adoyle@aberdeencity.gov.uk](mailto:adoyle@aberdeencity.gov.uk)

Tel: 01224 (34)6980

Helen Cannings, Senior Information Compliance Officer

Email: [hcannings@aberdeencity.gov.uk](mailto:hcannings@aberdeencity.gov.uk)

Tel: 01224(52)3430

## **Appendix 1: Being Digital**

# Being Digital

## Digital Transformation Strategy

### Aberdeen City Council

2016 to 2020

## Executive Summary

The digital world continues to transform the way we live our lives: the way we shop, socialise, travel and work. It has changed the way we look for information about public services, and altered our expectations about how we can engage, access and influence services. This has led to an exponential change in audience expectations. Technology is now transforming businesses and disrupting traditional ways of working.

Exploiting these opportunities will be challenging. We deliver complex services and have a diverse workforce with varying digital skill levels. Our technology infrastructure is ageing and fragmented. Moreover we are faced with further budget pressures and an increasing demand.

We need a new approach to technology. The core strategy is to provide a digital platform that is customer focussed on our customers and staff and is driven by data. It will be based on an open architecture approach, enabled by good information and data management and anchored by a modern infrastructure.

The creation of the digital platform will require leadership and governance. We need to develop principles and adopt standards that bring consistency to the development of the digital platform, while at the same time allowing room for pragmatism.

### What is digital?

Digital technologies are applications, devices and resources that create, store or process data, and the infrastructure that is needed to support them.

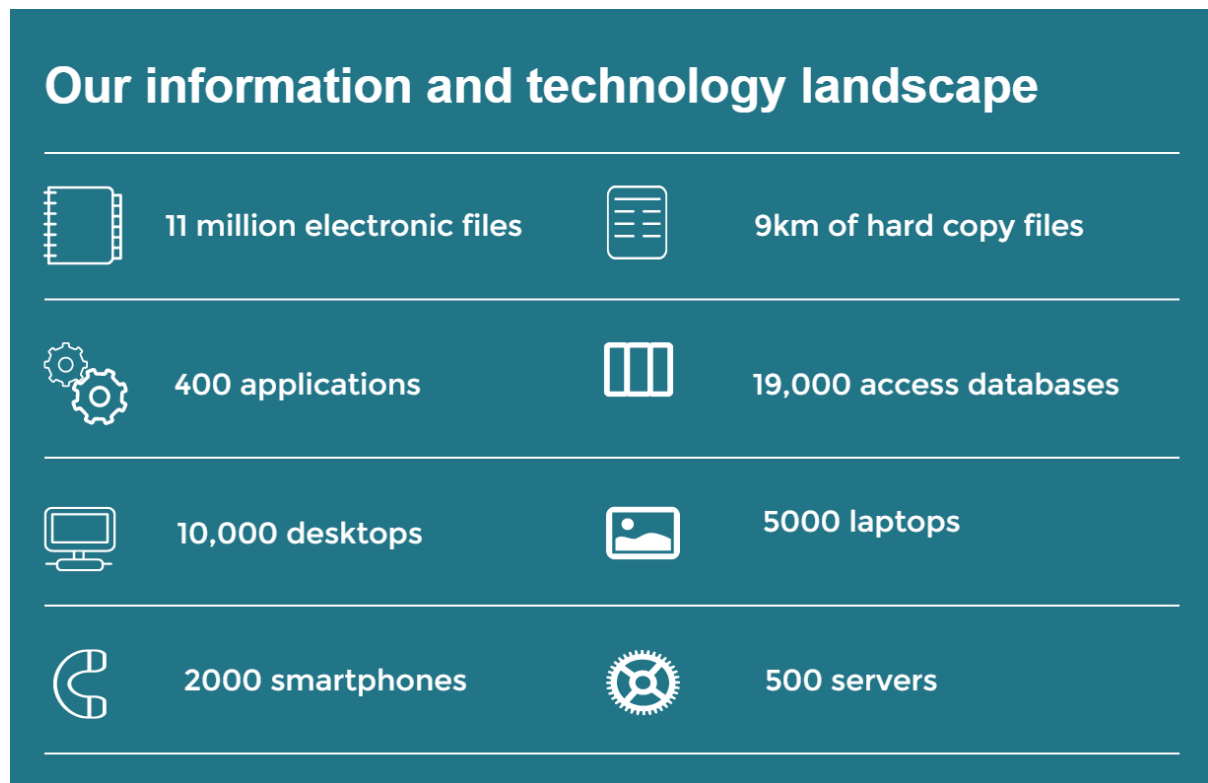
This includes things like systems for managing social care records, or for looking after our roads and streetlights; the desktop computers, laptops and mobile phones and tablets we use for our work; and the data that sits within them. It also includes the bits of cabling, switches and routers that are needed to make it all work.

Many of us use digital solutions at home, such as Facebook, Twitter and Instagram. We use websites and apps to do our shopping, pay bills, monitor our diet and fitness, and keep up with the news.

Digital technologies, and the way we use them in our personal lives, work and society have changed the face of business and will continue to. The pace at which it is happening is accelerating faster than ever before.

## Why do we need a digital strategy?

Every service the Council provides depends on our data, the applications, tools and devices we use to capture, process, protect and manage it. We hold data on every one of our customers and every property in the city. Every member of our staff needs our data, supporting the applications, tools and devices to do their jobs. This is a large and complex landscape:



So, being digital is not new for the Council, any more than it is for the world at large. We need a new approach to digital for the Council, so we can be sure we're doing the right things, in the right way, at the right time to directly and measurably support us to achieve our core outcomes for the people we serve, our staff, suppliers and partners.

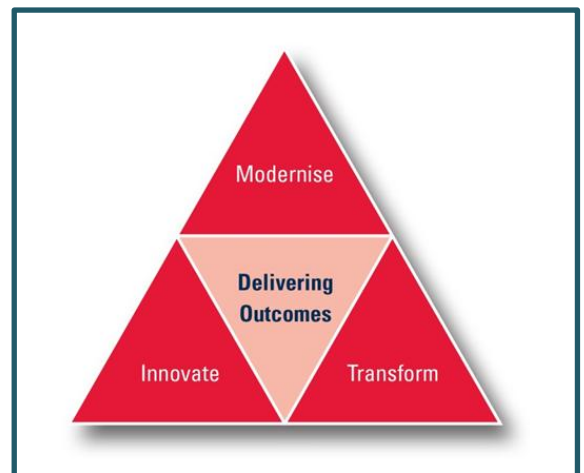
## Strategic Alignment

This strategy is about making sure that the Council has the right digital infrastructure, systems and capabilities in place to support the Council to achieve the objectives set out in our Strategic Plan, in line with the City's key priorities, outlined in our Smarter City Vision.

Digital plays a key role in achieving the shared plans we have for Aberdeen, which depend on us having the data, applications and infrastructure we need to work with our partners in the public and third sector partners to deliver a thriving city region where everyone who lives here can flourish.

This strategy is an enabler of the Council's strategic objectives for Social Work, Child Protection, Health & Social Care Integration, Education, Culture, Financial Inclusion, Housing, Community Safety, Transport and Economic Development in the region.

The strategy is a fundamental strand of our Organisational Plan to modernise, innovate and transform the way we do business, and will contribute to the Council's triple aim of improving the customer experience, making the best use of our resources, and improving the experience of our staff.



## Who is this strategy for?

The Council is a people business, and this strategy is aimed at the 230,000 people that we serve. It supports our 8,000 employees to do their jobs better, and have a better experience at work. The Council also relies heavily upon its supply chain with over 2,300 different suppliers helping us to deliver our services.

We also work closely with several public sector partners such as the NHS, Police Scotland, Fire and Rescue, the third sector, the DWP and the Scottish Government.

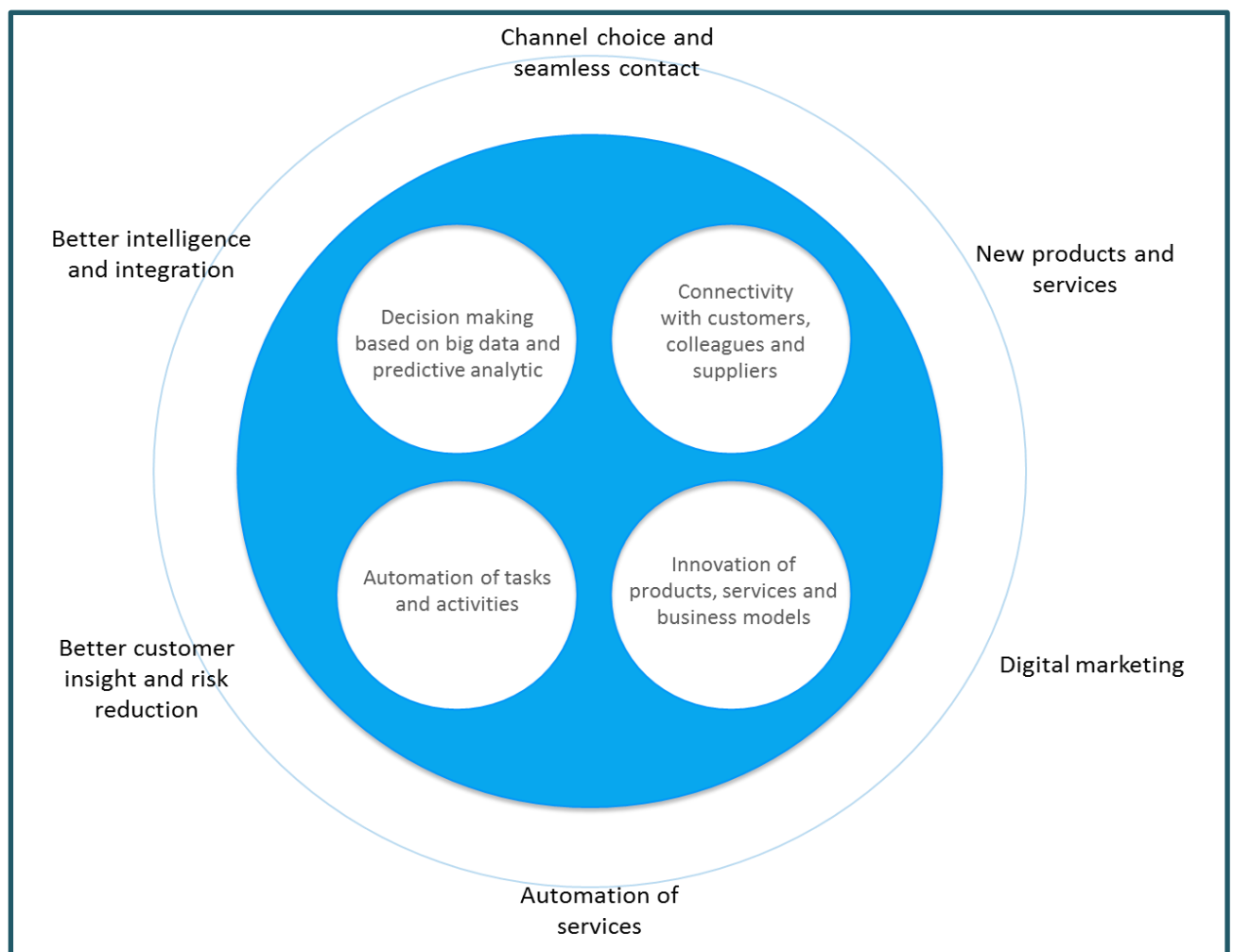




## Modernising, Innovating and Transforming

A key aim of this strategy is to modernise our Council. We need to provide customers with choice of channels, and make sure whenever they do contact us their experience seamless. Through digital enablers we can develop new and innovative products and services.

How we communicate and promote the City with people can be done through new and more engaging channels. We can automate our administrative tasks to allow our staff to focus on higher value activities. We can use data to provide better short and long term insight into our customer's needs and in doing to provide solid evidence around potential risks. New data analytic techniques will allow for real time business intelligence and predictive, rather than reactive, decision making.



## Improving the Customer Experience

### Where do we want to be?

**‘Our aim to enrich the lives of our customers by building a level of excellence and personalisation where the customer is at the heart of everything we do. We will transform the way our customers access services and transform the services themselves as we continuously review and improve what we do...’**

### What will the Digital Strategy do for our Customer Experience?

- Our Customers will find it easier to access our services and information on our new improved website.
- Our Customers will have faster and more reliable access to the internet as we improve connectivity across the city.
- Our Customers will be able to access more and more of our services online as we put in our new customer platform.
- Our Customers will have one account to access our services, putting them in control of their information and how they want to interact with us.
- Our Customers will get faster better service at first point of contact as we improve the way we manage and join up our data.
- Our Customers will only have to tell us things once as we join up our systems and data, and they update each other automatically.

### Our customers and staff say...

***‘Give customers a single number rather than a separate account for, say, rent and council tax – easier to remember and keeps all information in one place...’***

***‘I wish I could do it online...’***

***‘Let’s streamline processes – for example at present Housing faults reported online are not actually logged until the next day – this is misleading and frustrating for customers who assume that online is the quicker method...’***

## Improving the Staff Experience

### Where do we want to be?

**‘Our aim to create a positive culture which is both staff and customer centred...a culture where our workforce is actively engaged and there is a clear focus on capability, capacity and well-being of staff; where staff are informed, consulted, and involved in decision making...’**

### What will the Digital Strategy do for our Staff Experience?

- Our Staff will have more reliable access to the data they need in key systems as we modernise our core IT infrastructure.
- Our Staff will be able to spend more time with customers rather than doing back office stuff as we digitise processes in our new customer platform.
- Our Staff who work out and about will have better tools and systems so they can update job records and order parts without coming back to the office.
- Our Staff will spend less time inputting and updating information in systems as we join them up so they do it automatically.
- Our Staff will have the right information to help customers, as we improve the way we share and join up our data.
- Our Staff will find it easier and quicker to do their jobs as we rationalise the number of systems they have to use.
- Our Staff find it easier to find the help and support they need as we improve our intranet and make it easier to search and use.

### Our customers and staff say...

***‘I think you should be allowed to renew your parking permit online after it expires which you are not allowed to do after 10 days. This is a waste of tax payers’ time and money. I hope that something can be done...’***

***‘Let’s get to know our customer base in order to predict and anticipate what they might need...’***

***‘We need to share information better between services to help our customers’***

## Improving the way we use our Resources

### Where do we want to be?

**‘Our culture will promote working together with our colleagues, partners and service users to bring a joined up approach to local services that delivers more for less. We will demonstrate sound governance whilst becoming increasingly imaginative and resourceful...’**

### What will the Digital Strategy do for our use of resources?

- We will reduce and rationalise the number of applications we have across the organisation, and make it easier and cheaper to manage our digital infrastructure.
- We will change the way we procure IT systems and services, with shorter contracts so we can be more flexible when better or cheaper solutions become available.
- We will be able to better use our data to get the insight and intelligence we need to innovate and transform, as we join it up and improve its quality.
- We will reduce the amount of time our staff have to spend on inputting and updating information as we join up our systems and data.
- We will be able to work with our partners more easily as we have the systems and capabilities to share data appropriately.
- We will be able to exploit our land and property assets more effectively as we as we join up the data and systems we use to manage them.

### Our customers and staff say...

*‘Be more proactive and less risk averse when it comes to reviewing technology...’*

*‘Add Aberdeenshire and other external partners to the directory on the Zone to further promote integrated working....’*

*‘Identify the purpose and owner of the numerous systems which presently exist so that other teams can use what’s already in place rather than duplicating...’*

## Influencers

This digital strategy has been influenced by key internal and external factors:

### **Changes in expectations**

90.7% of adult in Aberdeen have accessed the internet in the last three months, which is one the highest usage rates in the UK. While face to face remains important, we must also provide online options. It must be easy to use, integrated and linked with the whole customer experience. We must also recognise that some of our most vulnerable in communities are part of the 9.3% who never go online.

### **The need to integrate services**

Public services will continue to integrate more and more. Notable of examples of this are Health & Social Care Integration and Community Planning, recently strengthened by the Community Empowerment Bill.

### **Technology is now disrupting traditional business models**

Technology used to be used just to improve efficiency. It is now being used to disrupt whole business models, remove whole layers of administration and crucially disrupt traditional business. For example, Netflix has changed how we consume television, Uber has challenged the whole concept of metered Taxis and Airbnb is challenging the hotel and rental market.

### **The complexity of our services and diversity of our workforce**

The Council provides over 400 different services with a workforce that spans five different generations, most of whom were born before the digital age. This means we need to be sensitive to the different skills and perspectives of our workforce.

### **The increasing number of cyber-attacks**

Security is both a major risk and a threat to adoption of digital services. We block 314,000 threats every month.

### **Fragmented service delivery**

We have 450 systems delivered through multiple IT teams.

### **Poor perception of technology**

Only 42% of staff felt that they had the right tools to do their job in a staff survey 2014. Most of our estate is over 4 years old, which in IT terms is a generation.

### **An ageing estate and fragmented service delivery**

Most of our estate is over 4 years old, which in IT terms is a generation.

# The Strategy on a Page

## STATEMENT OF DIGITAL STRATEGY

To change how we do business to meet outcomes and customers expectations through digital solutions.

### Current position

4% of services digital

42% of staff satisfied with tools

£0K savings

### Top five initiatives

1. **Providing channel choice**
2. **Valuing our information.**
3. **Providing a modern core**
4. **Governance and leadership.**
5. **Mindset and capability.**

### Position by 2020

80% of services digital

70% of staff satisfied with tools

£5m savings

### Our Principles

- Design services with our customers at the centre.
- Present easy to use, integrated and standard interfaces
- Build service, not just websites
- Hold information once and securely.
- Use our data well.
- Make sure the foundations work.

## Our Core Approach

We will create a digital platform from which a variety of digital solutions can be delivered. This is based on **an open architecture** approach, enabled by good information, integration and anchored by a modern infrastructure. It is similar to using Lego. We will use the same components to build different services.



### What is a Digital Platform?

A platform is a family of technologies that are integrated and can be used for different purposes. This is the model used by Amazon, Google, Apple and Facebook.

Until now, we have used larger systems that were closed and difficult to change. A platform allows us to be more agile and to collaborate better.

This is underpinned by what is known as an open architecture.

### What is an Open Architecture?

An open architecture allows us to re-use, add new or dispose of systems easily. It allows systems to talk to each other easily within a secure environment.

In effect it:

- Gives customers a better experience.
- Reduces the number of systems we have.
- Allows for data sharing and integration.
- Allows us to swap out systems easily.
- Saves us money.

# Our Principles

This strategy will be delivered against a set of principles:

## **1. Design services with our customers, staff and partners at the centre**

We will build and design solutions with rather than for our customers. This means involving them in the design, build and implementation. This can be either by using existing customer data, holding customer design sessions or using specialist to help us design services.

## **2. Present easy to use, integrated and standard interfaces**

Customers and staff should be able to access services and information through a number of channels. Face to face, online, text, phone or email. Whatever way they wish to contact us we deliver excellent services and we make sure that it is an integrated experience.

## **3. Build services, not just websites**

Websites are important. However a good experience online must be replicated by a good experience in the delivery of the service. So if you book a replacement bin online, then this arrives when we say it will.

## **4. Hold information once and securely**

This means we will collect, maintain and secure customer details once. This information will be used to update all our main systems. So not only will data be secure but it will not have to be provided many times.

## **5. Use data well**

We will share the right data within the Council and with our partners. We will use data analytics to make the right decisions and open up our data where we can to provide communities and business access to what we hold.

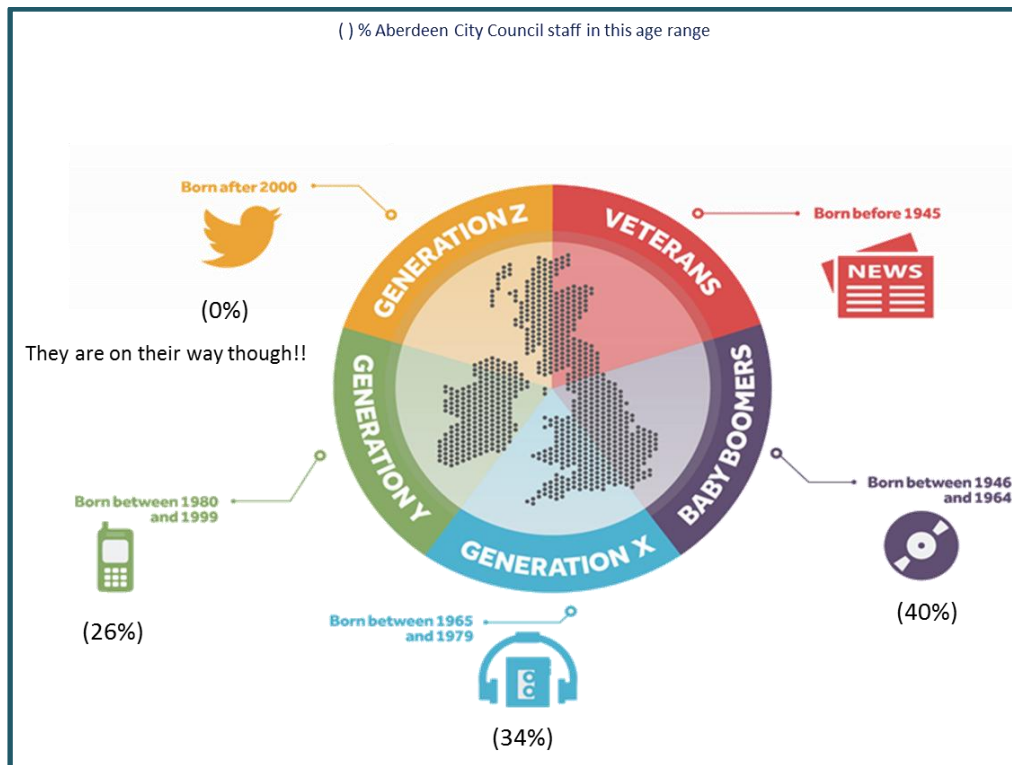
## **6. Make sure the foundations work**

The unseen side of technology is critical. Our networks, where we store data, how we integrate systems, security walls and systems maintenance. All these components are connected. So a change in one element may have an effect on another. This is often referred to as our eco-system.



# Our Challenges

There are several challenges to delivering this strategy. Perhaps the biggest challenge is how to ensure that our staff are involved and engaged. As the chart shows we have a staff group that spans many generations, but is mostly from a pre digital age.



This is less of a challenge with our population where there are more citizens who were born in the digital age, partly to the student population. To meet this challenge we need to ensure that there is a comprehensive awareness and training programme. It is critical that we give our staff the right skills, even if these are at a basic level.

The second challenge is how we keep up with the exponential changes in technology. Technology use to have a lifespan of about four years, this is now one year, if not less. It is therefore critical that we ensure we are agile in our use and disposal of technology. So for example we will not take on contracts beyond two years. The final challenge is to open up systems and make them talk to each other more easily and make sure our data is secure.

## What we will do to make it happen?

### The Strategic Plan

Our strategic plan has been developed to address the environment we operate in, our current position within the Council, what our customers and staff said to us, the challenges we face and the opportunities we have. All these factors form the primary and secondary drivers. Against each of these is the activity that will address the drivers with measures against each of these over the next four years

# Strategic Plan

Primary Drivers	Secondary Driver	Activity	Key Measure	Measure			
				Now	17/18	19/20	20/21
<b>Customer Experience (External)</b>							
Provide a seamless service across all channels. (See illustration)	Be able to do business fully online. Join up the whole process.	Implement a customer experience platform that allows for digital transactions, updates and channel choice.	% of transactions completed through a digital channel.	4%	20%	60%	80%
	Get updates on requests.						
	Find information easily.	Design and implement a new website and content strategy.	Socitm rating.	3 star	4 star	5 star	5 star
Use our data to identify you so that you do not need to provide the same data many times.	Hold one set of customer information across all key systems.	Implement a single account for external customers.	Number of customers signing up.	0	2k	20k	70k
	Share your data to protect you.	Implement Master Data Management and system integration.	% data sets shared that should be shared.	-	40%	70%	95%

Primary Drivers	Secondary Driver	Activity	Key Measure	Measure			
				Now	17/18	19/20	20/21
<b>Staff Experience</b>							
Better training and awareness of digital solutions and how to use basic digital tools.	Have the basic digital skills.	Implement a Council wide training and awareness programme.	% of staff have the basic digital skills.	-	30%	70%	95%
	Receive better information on IT initiatives.	Introduce a new IT knowledge platform.					
		Run a series of digital awareness sessions.	Number of sessions per annum.	2	5	10	10
Be able to from anywhere within a stable technology platform.	Be able to work from anywhere.	Deploy a new collaboration system that provides the usual office applications plus, social media, personal web pages, instant messaging, new ways to share files. Expand on the Ideas Hub to give pupils and The IJB access to their innovation solution.	% of Staff that say they have the tools to do their jobs.	42%	60%	70%	70%
	Ensure that systems are available and stable.						
Be able to find and communicated with people more easily.	Better information and search facility for staff.						
	Provide different types of communications tools.						
Be able to work with other organisations easily.	Day to day tasks with other organisations can be done through single systems.	Join our day to day systems such as email and calendars with organisations we work with.					
	Have access to data to deliver joint services.	Joint systems, master data management and messaging systems.					
Get my issues resolved quickly and receive a prompt service.	Be able to self-serve and have access to help quickly.	Introduce a new self-service platform. (Service Now). Increase the number of drop in sessions for quick questions, improved online help facilities and increased engagement through the Ideas Hub.	% customer satisfied or very satisfied with the service they received.	45%	60%	90%	95%
	Ensure that systems are available and work.						

Primary Drivers		Secondary Driver	Activity	Key Measure	Measure			
					16/17	17/18	19/20	20/21
<b>Better Use of Resources</b>								
Support the Councils in making savings.	Reduce non value activities.	Implement customer experience platform, process redesign, use artificial intelligence.	£m saved	£0	0.7	2	5	
	Reduce failure demand.							
	Reduce the complexity of IT across the Council.	Implement open architecture approach and application reduction programme.						
	Be more innovative in how we commission suppliers.	Introduce standard requirements, shorter contracts and use Digital Marketplace as our default supply route.						
		Exploit shared services, cloud and national initiatives where possible.						
Ensure that there are the right skills and capabilities to deliver digital solutions	Need to specialist skills from the market.	Establish digital hub that is focussed on driving digital transformation.	% of required skills in place	45%	90%	90%	90%	
	Upskill existing staff.							
	Ensure we have the right resource to drive operational excellence.	Review how IT is delivered across the Council.						
Support the Council to make the right decisions	Real time data and business intelligence tools to make short term operational decisions.	Deploy through master data management and a business intelligence hub that will pull data from several systems and sources.	% of key short and term indicators derived through new master data systems.	0%	90%	90%	90%	
	Use data and trends to support longer term policy and strategy decisions.							

# Technology Roadmap

One of the main challenges in any digital transformation programme is the rate at which technology changes. So our digital strategy has a deliberate plan over the next 18 months and beyond that we will need to adapt as technology trends become more mature and understood. This is helped by having shorter term contracts and developing an open architecture across the Council.

## Deliberate Plan

We have a clear technology plan over the next 18 months. This includes tried and tested technologies designed to improve our customer's experience, staff experience and make better use of resources

**Customer Experience Platform:** a platform for all customer contacts, that can be changed to meet our needs, hold our data in one place, develop apps based in the cloud and across all channels.

**Master data management (MDM)** is a system that enables an enterprise to link all of its critical data to one file, called a master file that provides a common point of reference.

**Ideas Hub.** The Council has already implemented an online area where staff can submit ideas, which are then tracked through to delivery. We will expand this all schools and Adult Health & Social Care.

**Your Desktop.** This a virtual desk top that will allow all staff to access their systems from anywhere and through any device, including their own devices.

**New Collaboration System:** This will provide normal office packages (word etc.), conferencing solutions, personalised webpages, internal social media, easier ways of sharing documents, team sites, projects management tool, all through one package.

**Convergence.** Introduce a Single customer and staff accounts to allow for the federation of core systems with other organisations such as Aberdeenshire Council and the NHS.

**Enterprise Private Cloud.** Most of our data and storage is now held in a private cloud. This means it is managed off site by a specialist provider. This gives us flexibility and scalability.

## Emergent Plan

We also know that there are a number of emerging technologies over the next ten years that may be exploited to improve how we do our business. These are more immature technologies and the extent to which they can benefit us is less clear, but we need to consider them.

**Platform as a Service** is a category of cloud computing that provides a platform and environment to allow developers to build applications and services over the internet. PaaS services are hosted in the cloud and accessed by users simply via their web browser.

**Ambient computing:** refers to electronic environments that are sensitive and responsive to the presence of people and other objects.

**Virtual reality:** The definition of 'virtual' is near and reality is what we experience as human beings. So the term 'virtual reality' basically means 'near-reality'.

**Internet of Everything** brings together people, process, data, and things to make networked connections more relevant and valuable than ever before.

**Business process automation** is the strategy a business uses to automate processes in order to contain costs. It consists of integrating applications, restructuring resources and using software applications throughout the organization.

**Artificial intelligence:** In computer science, an ideal "intelligent" machine is a flexible rational agent that perceives its environment and takes actions that maximize its chance of success at some goal.

**Big data:** extremely large data sets that may be analysed computationally to reveal patterns, trends, and associations, especially relating to human behaviour and interactions.

## Governance & Leadership

The programme will be overseen by the Finance, Policy & Resources Committee to ensure Elected Members have transparency over the programme, receive regular updates, and are involved in the evolution of the strategy. The Digital Governance Group will take responsibility for the day to day running of the programme, and will be chaired by the Head of IT & Transformation. This group will report to the Transformation Board is made up of Chief Officers across each Directorate, and will ultimately be accountable for the delivery and that the strategy remains relevant.



£4.5m of capital funding has been allocated to the digital transformation. This has been spread over five years, to take account of the need to meet changing requirements, adapt to new technology and to accommodate new opportunities. This expenditure will be managed through the Digital Governance Board, who will regularly report to the Transformation Board and the Finance, Policy and Resource Committee.

By year four there is an anticipated net annual saving of £5.5m. These have been benchmarked against other organisations are based on a reduction on the complexity of our technology estate, digital channel choice which reduces cost to administer services, a reduction in customer contacts, through better evidence and on a reduction in demand failure.

## Mind-set & Capability

This is not solely a technology strategy. To exploit the potential of digital solutions we need to build capabilities and engage widely. This includes identifying and understanding our audience. We will start an engagement and skills programme across the Council. We will expand this to our citizens, partners and communities. We should recognise that many people still prefer traditional methods of communications and therefore all channels need to be integrated.

To deliver the strategy will need to ensure that it is understood and supported across the organisation. Therefore a wide scale communication programme will be implemented. We will also need to have a team dedicated to delivering this. This team will be supplemented by external specialists and seconded resources with expertise in our business areas.