

# **Draft equality impact assessment**

**On**

**eHealth and Care Strategy for Northern Ireland**

**DATE: 30<sup>th</sup> September 2014**

## CONSULTATION ANNOUNCEMENT

This document is being presented for public consultation. It reports the outcome of an Equality Impact Assessment (EQIA) by the Health and Social Care Board on the e-Health and Care Strategy for Northern Ireland.

A copy of the full report is also available on the organisation's website at: [www.hscboard.hscni.net](http://www.hscboard.hscni.net) Consultation on the EQIA will end on the 9<sup>th</sup> January 2014. It is intended that other consultation methods will be used to seek views and it may be that you will receive further communication from us in due course.

We hope that you will find time to comment on this document.

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### Alternative formats

This document can be made available, upon request, in other formats including Easy Read; Braille; large print; computer disk; audio tape; or in another language for anyone not fluent in English.

For these formats please contact *us using the methods mentioned above*.

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## 1. Executive Summary

### The Organisation

The Health and Social Care Board (HSCB), together with its Local Commissioning Groups (LCGs) is accountable to the Minister for Health, Social Services and Public Safety and translates the Minister's vision for health and social care into a range of services that deliver high quality and safe outcomes for users, good value for the taxpayer and compliance with statutory obligations.

A key role of the HSCB with the Public Health Agency (PHA) is effective engagement with providers, Patient Client Council (PCC), local government, service users, local communities, other public sector bodies and the voluntary and community sectors.

### The Strategy

The eHealth and Care Strategy sets objectives to use technology to support person centred health and social care in Northern Ireland. The use of this technology in health and social care is known collectively as eHealth. The aim is to make best use of patient, client, management and administrative information that HSC already collects to ensure people and care professionals can make better, safer and more efficient decisions.

Health and social care has seen many changes in recent years, but more needs to be done to make sure we continue to meet the needs of the people of Northern Ireland. Northern Ireland has strategies setting out what these changes should be, including Transforming Your Care; Quality 2020; and the new strategic framework for public health Making Life Better. The changes we know we will face with a growing and ageing population and an increasing burden of disease mean we need to find smarter ways of doing things.

eHealth technology is a key enabler to support the vital changes in how health and social care is delivered to meet the challenges of the future. It can help to provide services remotely and also improve communications between care professionals and with patients, clients and their carers. eHealth technologies including eAssistive Technologies (eAT) are increasingly available to support or improve daily living for those with physical sensory or cognitive impairment.

Using eHealth to link existing ICT systems which don't currently work together means that information travels with the patient and connects their care team across geographical, professional and organisational boundaries, delivering a better, more joined up service with better outcomes for patients and service users.

Using information the HSC collects helps to deliver both better preventative services for individual people and also large scale service planning across Northern Ireland.

eHealth offers an opportunity for the HSC and the eHealth commercial sector in Northern Ireland to innovate – improving health and well-being and contributing to economic development.

The eHealth infrastructure needs to be maintained and modernised, keeping existing eHealth systems and services operating and supporting staff in their care for patients.

## Data Collection

Data was gathered for two populations, namely:

- the general population,
- section 75 groups - with a targeted focus on people with a disability, people from an ethnic minority background and older people,

In preparing the draft EQIA, the findings from a range of data and research sources were taken into account. Statistical information was available from Northern Ireland Statistical Research Agency (including Census information from 2011) and the NI Health and Social Care Inequalities Monitoring system reports and bulletins.

Targeted engagement was also undertaken with one to one meetings and round tables conducted with organisations representing section 75 groups, including older people, people with a disability and people from a minority ethnic background.

These three groups were identified in the screening as facing potential impacts to using and accessing some of the provisions of the e-Health and Care Strategy. The decision to carry out a full EQIA to explore those issues was taken.

The needs of the wider general population, outside of the aforementioned groups were also taken into account.

During the consultation process staff in the Health and Social Care Sector will be consulted on the equality impact of the strategy. This will have a particular emphasis on staff with a disability, staff from a minority ethnic background and older staff.

## Key Findings

### Age

Older people will have a diverse response to eHealth, depending on age and experience.

The uptake of eHealth technologies by older people could be restricted by concerns of confidentiality, security, confidence, skills and experience of using technology. These will need to be considered in the introduction of large scale eHealth technologies. These technologies will have to supplement existing services, to allow older people to continue to access services through existing methods.

The development of eAT will provide a range of positive impacts for older people, providing increased independence and the ability to remain in their own home. There were concerns that the impact of assistive technology may increase independence but may raise issues of consent and understanding which should be assessed as part of any implementation. eHealth technology should be used appropriately to avoid negative impacts which could be a reduction in social contact and increasing isolation. eHealth technologies may be able to help reduce isolation through the development of on-line communities, supporting isolated older people through the use of technology.

Younger people will see a positive impact on the use of eHealth, they are used to using technology in their daily lives and will quickly adapt to eHealth technologies. Young people generally are waiting for the HSC to adopt the technologies that they use every day.

### Disability

The use of eHealth technology was seen as having a positive impact for those with disabilities, with the potential to provide better information, allow better care and improve independence.

The feedback from the development process showed that the development and implementation of eHealth solutions must respond to

the needs of all users and incorporate the needs of users with disabilities in the development of eHealth care systems.

The use of assistive technologies has considerable potential to support independence for those with disabilities, balanced with the need to ensure that these technologies are correctly supported and maintained for those using them.

The sharing of information was thought to provide considerable benefits, allowing care professionals to understand communications problems and complex medical histories more easily, particularly in urgent care or when they interact with a new care professional.

### Ethnicity

The use of eHealth technology was seen as having a positive impact, with examples seen during the consultation process which provided positive impacts for those from an ethnic minority. These included the use of automatic translation functions and the ability to access health information in their own languages. The widespread use of smartphones by those from an ethnic minority provides a major opportunity for the use of eHealth technology.

For a variety of reasons those from an ethnic minority may not be able or willing to use eHealth technologies. Trust in eHealth technologies will have to be built and demonstrated for these to become acceptable. As a result eHealth technologies should supplement existing services, allowing the person the choice of whether to engage with the technology

## 2. Background

### Organisational Background

In 2005, the NI Review of Public Administration concluded that major reform was required in the administrative structures of health and social services. In addition an Independent Review of Health and Social care Services in NI conducted by Professor John Appleby the same year highlighted the need for reform and modernisation of the management of these services.

As a first phase of the RPA reforms in health and social care, five integrated Health and Social Care (HSC) Trusts were established in April 2007 to operate alongside the existing Northern Ireland Ambulance Services HSC Trust.

Following public consultation, the Minister of Health, Social Services and Public Safety announced details of the second phase of health and social care reform in Northern Ireland. Central to this was the establishment from 1<sup>st</sup> April 2009 of a new Health and Social Care Board (HSCB), including 5 Local Commissioning Groups coterminous with the Trusts, the Public Health Agency (PHA), a Business Services Organisation (BSO) and a Patient and Client Council (PCC).

The Health and Social Care Board (HSCB), together with its Local Commissioning Groups (LCGs) is accountable to the Minister for Health, Social Services and Public Safety and translates the Minister's vision for health and social care into a range of services that deliver high quality and safe outcomes for users, good value for the taxpayer and compliance with statutory obligations.

A key role of the HSCB with the Public Health Agency (PHA) is effective engagement with providers, Patient Client Council (PCC), local government, service users, local communities, other public sector bodies and the voluntary and community sectors.

In short, the HSCBs key functions include:

- In line with Ministerial objectives, ensuring effective commissioning to secure the provision of health and social services and other related

interventions that address the needs of people from pre-conception to death;

- The efficient, effective and appropriate use of delegated funding of some £4bn per annum to meet agreed objectives in line with Ministerial objectives and Department policy in order to maximise access to quality and safe services and reduce unnecessary bureaucracy;
- Implementing a comprehensive framework for performance management and service improvement that will monitor HSC performance against relevant objectives, targets and standards and provide appropriate assurance to the Department and the Minister about their achievement;
- Establishing arrangements at a regional and local level that ensures close strategic and operational partnership with key stakeholders both within the HSC and wider public sector in meeting the objectives of the Board and proactively engages and informs local communities and the voluntary and community sectors on the work of the Board;
- Establishing a close working relationship at a regional and local level with the PHA minimising unnecessary duplication and ensuring a seamless approach to the improvement of the health and social wellbeing of all the people of NI reflected in the development of an integrated annual commissioning plan for approval by the Minister;
- Facilitating and supporting Local Commissioning Groups in their role of achieving effective locality based commissioning, managing their performance, and holding them to account so that they can exercise their devolved authority within an effective framework of regional priorities and standards;
- Within the parameters of the Department's overarching Framework Document, working with other key stakeholders such as the Department, PHA, Trusts and Regulation & Quality Improvement Authority (RQIA) to ensure clarity of responsibility and appropriate provision for the safety of services, the management of critical incidents and service failings and the protection of the public;
- Ensuring that regional priorities – for example programmes for improving cancer services – are integrated into local plans while promoting real delegation to a local level within that framework; and
- Overseeing the agreed publication of performance information.

## Equality Impact Assessments

Schedule 9 of the Northern Ireland Act 1998 provides for a comprehensive consideration by public authorities of the need to promote equality of opportunity, giving effect to Section 75 of the Act, between:

- people of different religious belief, political opinion, racial group, age, marital status or sexual orientation;
- men and women generally;
- people with a disability and people without one; and
- people with dependants and people without dependants.

These are called ‘Section 75 groups’ because the relevant law is section 75 of the Northern Ireland Act 1998. In addition, without affecting the above duty, public authorities must have regard to the desirability of promoting good relations between people of different religious beliefs, political opinions and racial groups.

Equality Schemes must be prepared, which among other things must set out arrangements for assessing the likely impact on the promotion of equality of opportunity of the policies adopted or proposed.

Where equality impacts are likely to be major, a public authority needs to undertake an Equality Impact Assessment (EQIA). This is “a thorough and systematic analysis of a policy, whether the policy is written or unwritten, formal or informal, and irrespective of the scope of the policy or the size of the public authority.”

As part of the assessment consideration must be given of anything that could reduce any adverse impact on equality of opportunity of the policies proposed. Thinking through what opportunities exist to better promote equality must also be a part of the assessment. Consideration to alternative policies that might better promote equality of opportunity must also be given.

## The strategy subjected to an Equality Impact Assessment

The eHealth and Care strategy sets objectives to use technology to support person centred health and social care in Northern Ireland. The use of this technology in health and social care is known collectively as eHealth.

This strategy covers the full range of eHealth needed for Northern Ireland,

- Delivering eHealth services for the public including information, communications and assistive technologies,
- Sharing and analysing eHealth information,
- Supporting changes to HSC services through eHealth technologies
- Contributing to a vibrant eHealth commercial sector,
- Maintaining the eHealth systems we already have.

Successfully implementing the strategy will mean that the right care will be given to the right person at the right time with the right resources.

eHealth services for the public in Northern Ireland are currently limited. At the moment, we do not make it easy for people to seek out information for themselves or make decisions about their own health and wellbeing. Using technology well to provide quality information to the public through online networks and websites as well as to their mobile phones will enable people to make better decisions about their health and well-being.

Communicating with health and social care services tends to rely on three methods of communication with patients, clients and carers: paper, phone and in person. Contacting health and social care services about appointments or test results for example, is still mainly done by telephone or letter. In future many of these communications could be carried out electronically, supplementing existing methods of communication with text, email, video conferencing, mobile apps and other electronic communications.

Using eHealth to link existing ICT systems which don't currently work together means that information travels with the patient and connects their care team across geographical, professional and organisational boundaries, delivering a better, more joined up service with better outcomes for patients and service users.

eHealth will make best use of the patient, client, management and administrative information that is already collected across current and

future systems to ensure people and care professionals can make better, safer and more efficient decisions.

Developing innovative eHealth solutions to improve health and well-being benefits the local eHealth industries as they seek to compete globally.

The objectives are set out over the years 2015 – 2020 and are linked to those set out in other key health and social care strategies for Northern Ireland.

Strategic Objective	Outcomes
<p><b>Supporting people</b></p> <p><b>Provide eHealth services, supporting electronic access for everyone where that is their choice. This will include electronic information services, electronic records access, on-line support and care services, appointment booking and remote care</b></p>	<ul style="list-style-type: none"> <li>• HSC will develop a web portal providing trusted advice, self-care information, information on HSC services and secure access to online services.</li> <li>• HSC will provide online access to your own health records.</li> <li>• HSC will build on existing pilot schemes to reduce paper and develop ways of allowing citizens to interact with the HSC electronically.</li> <li>• HSC will optimise the use of current GP systems to facilitate access to GP records and other ways of communicating and interacting with GPs, e.g. prescription ordering and online booking.</li> <li>• HSC will encourage the development and use of mobile health apps to support, facilitate and extend the relationship between care professionals and users for self-care and management.</li> <li>• HSC will promote the use of eAT, telemonitoring and telecare to enable people to live independently.</li> </ul>

	<ul style="list-style-type: none"> <li>• Along with other appropriate agencies such as housing and councils, HSC will develop new ideas and funding opportunities to enhance the quality of life and well-being of older people and those who care for them. This will include more integrated community-oriented services, more sustainable home and neighbourhood design, and more age-friendly SMART Living technologies.</li> <li>• The HSC will develop a Social Media and Alternative Communications Plan, evaluating the use of social media, smart phone technology and self-service technologies for communication with citizens</li> </ul>
<p><b>Sharing information</b></p> <p><b>Give care professionals appropriate access to information to improve the speed and quality of the care decisions they make, and the outcomes for the individual</b></p>	<ul style="list-style-type: none"> <li>• Continue enriching NIECR, to link in more HSC clinical and care information systems and develop NIECR functionality, including providing care professionals with appropriate role-based access to clinical and care information systems including NIECR.</li> <li>• Provide staff with mobile access to the HSC network and systems, as part of a three-year investment.</li> <li>• Provide secure and appropriate access to NIECR information for community pharmacists, dentists, opticians and independent health and social care providers, such as nursing homes.</li> <li>• Build links with independent health and social care providers to allow them to contribute to the NIECR to help make sure all relevant patient information is captured and able to be shared.</li> <li>• Digitalise manual processes and paper records to allow information to be</li> </ul>

	<p>shared and re-used appropriately.</p> <ul style="list-style-type: none"> <li>• Develop plans for linking citizen-captured information into shared care records, including data from telemonitoring and information directly input by the patient or carer</li> </ul>
<p><b>Using information and analytics</b></p> <p><b>Develop ways to transform data and information into knowledge (informatics) that supports care, from being able to suggest personalised preventative care through to supporting population-level health and care planning</b></p>	<ul style="list-style-type: none"> <li>• Develop links between HSC information systems that improve how we can analyse information. An Information and Analytics strategy will examine the legal and ethical frameworks needed, the standardisation and coding of HSC information needed, and the training and education needs of staff. This strategy will take account of the outcome of the DHSSPS consultation on secondary use of information - “Caring for Your Information”.</li> <li>• Use risk-stratification techniques to provide early-intervention support to help citizens keep healthy.</li> </ul>
<p><b>Supporting change</b></p> <p><b>Make thinking about eHealth central to planning any changes to health and care services to make sure we are making the most of technical opportunities and the potential for improved information flows to support improvements</b></p>	<ul style="list-style-type: none"> <li>• Demonstrate that eHealth can improve patient-centred care for example collecting patient experiences of the HSC to help improve services.</li> <li>• Develop eHealth Clinical Lead roles to drive and direct the use of eHealth to support care delivery.</li> <li>• Put in place a new leadership and governance structure, with care professionals at the heart, and design it to ensure consistency and equity in service delivery.</li> <li>• Support the development of staff to allow them to best use eHealth technologies, through training and support, working with professional</li> </ul>

	<p>bodies and existing training providers. This will integrate with current DHSSPS and professional workforce planning and education strategies</p> <ul style="list-style-type: none"> <li>• Develop new ways for patients, clients and their carers to interact with HSC and access services for example through videoconferencing, email and text messaging</li> </ul>
<p><b>Fostering innovation</b>  <b>HSC will work with businesses colleges and universities, community and voluntary organisations, other government departments and international partners to develop uses of eHealth to help improve health and wellbeing, recognising there may be opportunities where such work contributes to developing sustainable economic growth in Northern Ireland</b></p>	<ul style="list-style-type: none"> <li>• We will continue to develop both the Northern Ireland Connected Health Ecosystem and our partnerships outside Northern Ireland. We will develop our own capacity to innovate, using local and international partnerships to access the expertise needed to develop solutions to problems affecting our patients.</li> <li>• We will work with other partners to take forward the recommendations in the Economy and Jobs Initiative Task and Finish Group’s report. This can be found at <a href="http://www.dhsspsni.gov.uk/t_f_final_report.pdf">www.dhsspsni.gov.uk/t_f_final_report.pdf</a></li> <li>• We will work with local eHealth industry to develop and use innovative products and systems we can sell worldwide, supporting the local economy and increasing local employment.</li> <li>• We will build on our success in developing and delivering EU programmes, drawing funding, ideas and expertise into Northern Ireland.</li> <li>• We will support an annual eHealth Innovation Award and Conference to celebrate and promote best practice in the use of eHealth.</li> </ul>

**Maintaining and improving what we have**

**Maintain a modern, reliable eHealth infrastructure, including investment in supporting, modernising and replacing key systems and HSC networks and hardware as needed**

- Develop and extend HSC ICT access to all parts of the health economy that need it, either through mobile, wireless or fixed networks including improvements in access and bandwidth.
- Develop an Infrastructure Strategy. This strategy will set out the future direction for HSC infrastructure including networks, datacentres and storage, including the appropriate adoption of cloud computing and cloud storage.
- Develop an Application Strategy. This strategy will set out the future development and replacement pathway for HSC applications, including the adoption when appropriate of open-source applications.
- Deliver the eHealth technologies needed to support service change; areas identified include medicines management and pathology services.

There are a number of constraints to the implementation of the strategy; in the first year of the strategy existing revenue and capital resources are identified however delivery of major elements of the strategy in the remaining 5 years will require considerable further revenue and capital investment. Secondly, as set out in other Health and Social Care Strategies, service change is critical in order to deliver the objectives of the eHealth and Care Strategy and realise the potential benefits

The eHealth and Care strategy supports the future HSC service provision outlined in Transforming Your Care and a range of other strategies.

As a result there is a wide range of stakeholders including:

- The population of Northern Ireland - with a focus on patients, clients and their carers / advocates;
- Community and voluntary groups (including those groups representing the interests of Section 75 interest groups);
- Health and Social Care Trusts and staff;
- Local Commissioning Groups (LCGs) and Integrated Care Partnerships (PCPs);
- Independent sector (GPs, pharmacists, opticians, residential & nursing home provision);
- HSC Board (HSCB) and Public Health Agency (PHA) directors and staff;
- Patient and Client Council;
- Department of Health, Social Services and Public Safety;
- Assembly Health Committee;
- MLAs, MPs and local councillors;
- Designated political party spokespersons on health and social care;
- Professional representative bodies;
- Trades Unions;
- City, Borough and District Councils;
- Public organisations with an indirect impact on health e.g. housing, education; and
- The Press and Media

There are a number of policies, strategies as well as health and social care legislation that impact of the eHealth and Care Strategy, setting the framework within which it is developed.

These include:

- Health and Social Care (Reform) Act (Northern Ireland) 2009; Quality 2020: A 10-Year Strategy to Protect and Improve Quality in Health and Social Care in Northern Ireland;
- 
- Transforming Your Care: A Review of Health and Social Care in Northern Ireland, 2011;
- Acute Services Reconfiguration, DHSSPS 2012;
- Making Life Better – A Whole System Framework for Public Health 2013-2023
- Investment Strategy for Northern Ireland 2011-2021, Strategic Investment Board, November 2011;
- Northern Ireland Executive Economic Strategy, Northern Ireland Executive, 10 January 2011; and
- Personal & Public Involvement Strategy, January 2011, DHSSPS

Following both the strategy and the equality impact assessment consultations a strategy implementation plan will be developed. This plan will outline what needs to happen to deliver the outcomes in the strategy, including:

- List the projects in the delivery programme,
- Show what outcomes they will help deliver,
- Show when they are to be delivered,
- Explain how this process will be managed
- Explain how this process will be monitored

### **Screening and Scope of the Equality Impact Assessment**

A screening was carried out while developing the draft eHealth and Care strategy. It was determined that a full equality impact assessment was necessary on the basis of the proposals within the strategy being strategically significant and having potential and unknown impact. Based

on professional experience and research literature, it was determined that particular impacts are likely to arise for people with a disability, people from a minority ethnic background and older people. Those most immediately impacted by the strategy are patients, clients, carers and staff.

The eHealth developments outlined in the strategy have potential to impact all areas of an older person's or someone with a disability, be it their physical and cognitive abilities or social and emotional life. The extent of such impact varies significantly between different groups of people. The delivery of the strategy has no impact for many very old people living alone in remote rural areas who don't have access to communications technology through location who will continue to use existing services. A very significant positive impact will be seen for people living, for example in assisted living homes with substantial eHealth technology who will become less reliant on existing services. It is also likely that there will be groups of people for whom the impact of such technologies will still be minimal. Such groups are likely to be affected by 'generational exclusion', lack of skills, affordability issues or a conscious choice to not use this technology.

The extent of the impact is likely to continuously increase in the future as more people attain ICT skills, new devices and solutions influence all activities and new services, become available on mass scale.

For people from a minority ethnic background where English is not their first language and where cultural differences with regards to the use of eHealth technologies exist there is the potential for disadvantages arising in relation to usability and access. On the other hand, lack of interpreting services and interaction difficulties with care professionals is cited as barriers for this group interacting with HSC. eHealth has the potential to enable greater choice in modes of communication and thus produce clear benefits for this group. However, cognisance must be given to language and access to technology within this population group to ensure that they are in a position to take full advantage of the potential benefits.

The scope of the Equality Impact Assessment therefore is on the equality outcomes and impacts, with a particular focus on potential barriers to accessibility and particular needs for people within those three Section 75 categories; age, disability and ethnicity.

The strategy recognises that people may have difficulty accessing eHealth through disability, age or ethnicity or through lack of access to technology and language difficulties. In particular the objective of “Supporting People” proposes to provide eHealth services by supporting electronic access for everyone where that is their choice. This will include electronic information services, electronic records access, on-line support and care services, appointment booking and remote care.

### 3. Data Collection

In line with the Equality Commission (NI) Guide to the Statutory Duties and EQIA Guidelines, data was drawn from a number of sources to help us prepare this EQIA.

Data was gathered for a range of communities, namely:

- the general population,
- section 75 groups - with a targeted focus on people with a disability, people from an ethnic minority background and older people,

The needs of the wider general population, outside of the aforementioned groups, were also taken into account.

In preparing the draft EQIA, the findings from a range of data and research sources were taken into account. Statistical information was available from Northern Ireland Statistical Research Agency (including Census information from 2011) and the NI Health and Social Care Inequalities Monitoring system reports and bulletins.

Targeted engagement was also undertaken with one to one meetings and focus groups conducted with:

## Age

### [Age NI](#)

The eHealth team met with a range of representatives from Age NI, including staff from their Services, Policy and Communications teams, as well as trustees and members of the Age NI Consultative Forum.

### [Aging Well Together Network – North West](#)

The eHealth team held a roundtable and engaged with professionals and users of the North West Aging Well Together Network and discussed use of technology and barriers to accessing HSC for older people and their families and carers. The group included representatives from Old Library Trust, GABLE/SHELTER NI, Age NI, Rural North West, Easilink Community Transport, Strabane Community Project and Strabane & District Citizen's Advice Bureau. The Aging Well Together Network offered to support the further consultation process and help to engage more widely with service users.

### [Commissioner for Older People Northern Ireland \(COPNI\)](#)

The eHealth team met with staff from COPNI to discuss the strategy and any impacts that there may be for older people in Northern Ireland.

### [Include Youth](#)

The eHealth team held a round table with a small group of young people aged 16-19 years. They explored how they currently access Health and Social Care Services. What their experiences have been and their access to, and use of technology generally. There were four females and one male in the group and all had regular contact with health and social care services. The young people expressed an interest in eHealth in particular looking at new ways to communicate with social care professionals such as texting and video calls.

## Disability

### [Disability Action](#)

The eHealth Team held a round table and engaged with disabled people and organisations representing disabled people to discuss the strategy and any likely impacts for people with a disability. This was hosted by

Disability Action, and included representatives from the North West Forum for People with Disabilities, RNIB, Habinteg Housing Association and Disability Action. It was suggested that consultation with the wider North West Forum for People with Disabilities would be beneficial during the consultation phase.

### [MENCAP](#)

The eHealth team engaged with professionals in MENCAP and discussed use of technology and barriers to accessing HSC for people with a learning disability and their families and carers. We requested further engagement with MENCAP and in particular people with a learning disability during the consultation phase of the strategy.

### [Royal National Institute of Blind People \(RNIB\)](#)

The e-Health and Social Care Strategy team explored the JAWS, Zoomtext and other accessibility solutions for blind and partially sighted people and engaged with the RNIB Products and Technology team.

## **Ethnicity**

### [Horn of Africa People's Aid Northern Ireland \(HAPANI\)](#)

The eHealth team held a round table with ten refugees from the Horn of Africa and explored how they currently access HSC services. Their experiences and their access to, and use of technology was also discussed. There were six males and four females, one person under 18 and one male over 65 within the participating group. It was agreed that a wider engagement session will be arranged during the consultation phase for more members of this community to engage with the strategy and learn more about the eHealth.

### [Northern Ireland Council for Ethnic Minorities \(NICEM\)](#)

The eHealth team met with staff from NICEM to discuss the strategy and any impacts that there may be for minority ethnic people in Northern Ireland.

### [Strabane Ethnic Minority Forum](#)

The eHealth team met a representative from the Strabane Ethnic Minority Forum and discussed the impact of eHealth services on ethnic minorities in the Strabane area.

## **General Equality**

### [Equality Coalition](#)

The eHealth team met a representative group within the Equality Coalition including representatives from the Committee on the Administration of Justice, UNISON, Northern Ireland Council for Voluntary Action, Disability Action, The Rainbow Project and MENCAP. We discussed various aspects of accessibility to eHealth provisions by section 75 groups. Further consultation with section 75 groups will form part of the wider public and equality consultation process.

### [Equality Commission](#)

The eHealth team met with policy professionals in the Equality Commission for Northern Ireland and discussed access issues for people with a disability and the design of the strategy and associated services in the context of the UN Convention on the Rights of Persons with a Disability.

During the consultation process staff in the Health and Social Care Sector will be consulted on the equality impact of the strategy. This will have a particular emphasis on staff with a disability, staff from a minority ethnic background and older staff.

## Key findings

This section outlines our key findings across the nine equality groups outlined in Section 75(1) of the Northern Ireland Act. This analysis has been produced following a desktop review of available local, National and International literature and an extensive engagement programme with three of the categories, namely, Age, Disability and Ethnicity, as outlined in section 3.

As far as the availability of data allows, across the nine equality categories each section looks at (1) profile, (2) use of technologies and (3) any other needs identified

## Gender

### Population Profile

The population of Northern Ireland on Census Day 2011 was 1,810,900

Males 887,300 (49%)

Females 923,500 (51%)

Accurate figures on the number of transgender people are not currently available. McBride (2011) 'Healthcare Issues for Transgender People Living in Northern Ireland' estimates that the number of people who say they are transgender in Northern Ireland is 8 per 100,000 (120) people (aged 16 and over). There is a higher proportion of male to female transitions.

Negative attitudes are displayed towards transgender people, according to the 2011 Equality Awareness Survey by the Equality Commission. This found that 35% of respondents would mind (a little or a lot) having a transgender person as a work colleague, while 40% would mind having one as a neighbour and 53% would mind having one as an in-law.

Negative attitudes were stronger among people over 65 years old. They were more likely to mind having a transgender person as a work colleague (52%), as a neighbour (54%), or in a relationship with a close relative (69%) compared with the younger age groups aged 16–29 years old (29%, 33% and 46%, respectively) or 30 to 44 years old (28%, 34% and 48%, respectively).

In 2005, there were significantly more men using the Internet in all age groups. This difference seems to have diminished and was no longer significant in 2007 for the youngest age group (15 - 25 years). Of women aged 15 - 25 years, 83.5% used the Internet for health purposes in 2007. The corresponding proportion for men was 72.4%. At the other end of the age scale (66 - 80 years), the opposite effect was seen, where 22.6% of men and 9.9% of women used the Internet for health purposes. The same effect was visible in 2005, but it was not so clear.

The study Kummervold et al 2008 J Med Internet Res. 2008 Oct-Dec; 10(4):analysed trends (from 2005 to 2007, looking at age, gender, and employment status and their effect on the use of the Internet, Internet health information, and interactive health services. The logistic analysis showed no significant effect of gender on the use of the Internet. There is, however, a significant interaction effect between gender and age, where the proportion of men is largest in the highest age groups. Employment status is also a significant factor, since a very large proportion of students are using the Internet.

The perceived importance of the Internet as a health information source is increasing. There is relative growth in all age groups and for both men and women in Internet use for health purposes, with especially strong growth among young women. Along with this growth, we also see that the second generation of Internet health users is using the Internet for more than just reading information. They are using the Internet as a channel, for direct communication with health professionals as well as with peers.

## Staff Profile

At March 2013, the HSC employed around 66000 people either full-time or part-time. This accounted for almost 10% of all employment in Northern Ireland as shown in the (Northern Ireland Health and Social Care Workforce Census, March 2013

- The majority of the HSC workforce is female (81%). Of these female staff, 49% are employed full-time.
- Males represent 19% of all HSC staff employed. Of these male staff, the majority (84%) were employed full-time.

## Age

### Population Profile

Compared with the England, Scotland and Wales, Northern Ireland had the fastest-growing and youngest population between 2001 and 2011, with an estimated increase of 7.5%. It is projected to have the youngest population during 2011-2021. This equates to 24% or 432,814 children and young people aged less than 18 years. (Source: NISRA 2009 Mid-year Population Estimates)

The population of Northern Ireland is getting older. Between the 2001 and 2011 censuses the median age increased from 34 years to 37 years. According to NISRA, the population aged 85 and over has increased by 9,000 people (38 per cent) in the 10 year period between June 2002 and June 2012. This is five times faster than the overall population growth of just over seven per cent over this same period. Within Northern Ireland this population is projected to grow from the 31,800 at the 2011 census to 100,000 by 2041.

In March 2013 Age UK launched a twenty page fact sheet highlighting those over 85 whom they labelled as the 'oldest old'. Some key points to note from the Age UK briefing were:

- Almost three quarters (74.8%) of the oldest old live on their own
- Malnutrition rather than obesity was an issue (33% of admissions to hospital in 80+ , 40% of 90+ were thought to be malnourished)
- Malnutrition of those entering care homes over 85 is at 52%
- Significantly more likely to have fallen.
- A 'considerable' number are vitamin D deficient
- Dementia affects one in six over eighty and one in three over ninety-five.
- Only 8.5% of those dying of cancer aged over eighty-five die in a hospice compared with 20% of all cancer deaths and a lower

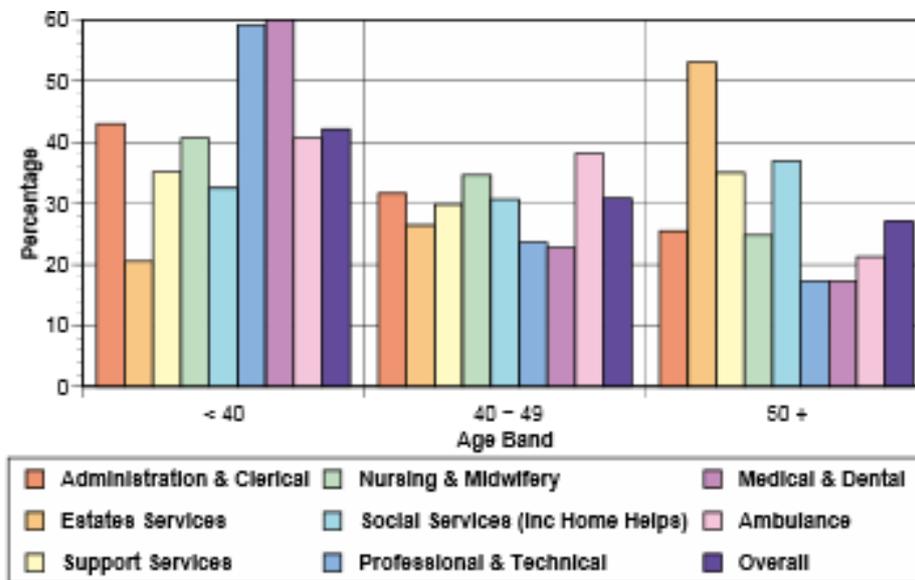
proportion of those over eighty-five access specialist palliative care.

- In the UK nearly 50,000 people aged over 85 provide unpaid care to a partner, family member or other person.
- The 'oldest old' are as a group at greater risk of poverty than the 'younger' old.
- Ninety per cent of those over eighty-five are estimated to spend an average of 80% of time in their home.
- Thirty per cent of those over 80 have limited access to services such as shops and GPs and 25% are cut off from friends and family.
- About 40% of the 'oldest old' have a 'severe disability' (but 60% do not)
- The Newcastle 85+ study found urinary incontinence in 21.3%, hearing impairment in 59.6% and visual impairment in 37.2%.

### Staff Profile

Two fifths (42%) of all HSC Staff were under the age of 40, while 31% were aged between 40 and 49 and 27% were aged 50 and over. Age distribution varied between the Occupational Families with 60% of Medical & Dental staff and 59% of Professional & Technical staff aged under 40, while only 21% of Estates Services staff were aged under 40.

Table1: Age profile of HSC Staff by occupational group



### Use of ICT /eHealth

The extent of ICT development impacting older people’s living conditions at home and in the community can be considered from two perspectives: the extent of the adoption of ICT solutions by older people and the potential impact these solutions can have on people’s lives, once adopted.

As regards impacts once adopted, three different spheres of influence can be distinguished: cognitive function, physical function and social and emotional life. Different ICT solutions vary in terms of their impact, benefits and risks to older people’s activities at home and in the wider community. Technology solutions also play different roles for various phases of the ageing process: they can help to delay the effects of ageing (facilitate ageing well) or assist in dealing with the ageing affects by making lives of older people with diseases and disabilities easier.

There are potential risks associated with their unwarranted application. With an increased uptake of telehealth solutions there is the risk that older people become over-sensitive around their health causing anxiety and stress. Another potential negative effect of such transformation

could be a change in long-established behaviour to 'listen to one's body' in favour of relying on quantitative data. Another risk is associated with people who have no or very limited skills and understanding of technology, who through changes in the health and social care model may find themselves surrounded by technology that they do not understand or trust leading to a feeling of confinement.

Finally, there is also an increased risk of social isolation. eHealth although very beneficial from a physical and psychological point of view, may pose risks for the emotional well-being. Replacing a face-to-face contact of an elderly patient with their care professional with a remote connection may result in deepened social isolation and feelings of exclusion and disconnect.

Thus, while there is no doubt that ICT solutions have a very positive and in many cases transformative impact on older people's living conditions, most of the risks associated with their application appear to be related to their impact on the emotional and social sphere. More research exploring the impact of ICT on older peoples' emotional and social sphere is required to better understand this matter and ensure that risks associated with it are minimised.

According to Eurostat (Seybert, 2011) 25% people aged 16 to 74 in the EU had never used the internet.

In 2012 amongst individuals aged between 55 and 64, 40% never used internet and amongst those aged between 65 and 74 it was 63%. In terms of computer skills, 16% of individuals aged 55 to 64 could perform 1-2 computer related activities while in the group aged 65 to 74, only 12% could perform 1-2 computer related activities. The involvement in social networks amongst older people is also low – in the USA only 7% of those aged 65 and over has a profile on online social network (Senior Journal , 2009).

Given the current low level of use of computers and internet amongst older people the extent of impact ICT technologies are likely to have on their living conditions is set to be low. Yet, as the number of older people

using ICT technologies is continuously growing ICT will influence their living conditions in the future to much greater extent. One in 50 people aged 75 and over use Wii Fit as a way to keep fit while in the group over 50 year olds that number doubled. Also, in the same group one in ten people use electronic brain-training games to maintain mental fitness (SAGA, 2011). The uptake of other ICT technologies, such as telemedicine and smart home solutions, amongst older people is even smaller, although it is set to rise more rapidly.

The factors underlying the level of adoption of ICT technologies amongst older people are related to older adults' computer skills, access to hardware and broadband, which in turn may be influenced by financial constraints or service availability. For some solutions more personal factors may be at play, e.g. having a need for technological solutions, willingness to learn necessary skills or acceptability of ICT solutions. Personal values and attitudes are often linked to the lack of confidence in one's ability to learn, negative experiences, privacy concerns or lack of clear understanding of the benefits as well as the disadvantages. In the Netherlands, a study was undertaken to gauge older patients' interest in the use of eHealth applications. In this instance, the application was an Online Health Community for the frail elderly, "aimed at facilitating multidisciplinary communication". The report concluded that those most likely to properly engage with this idea were those with a high computer literacy.

This Aging Well Together Network members thought that there was great potential for assistive technologies and eHealth generally for those older people willing and able to use these services. However they stated that for a long time into the future a number of older people who would be unable to use these services, needing to access services in the traditional fashion. It is important that older people are not coerced into using eHealth technology and that current services and processes are maintained.

The participants in the Age NI roundtable were broadly positive about the benefits of eHealth technologies for older people, both as direct users of the service but also as beneficiaries of staff working smarter and more efficient.

A lot of older people do not trust technology and cannot be convinced of the benefits of it. They do not want to learn how to use it or embrace it. Existing services will need to be maintained for those people that do not want to use it. Many older people want face to face meetings and there will need to be cognisance of that in the strategy and implementation.

Older people broadly see benefits in terms of service quality for older people if they don't have to repeat their story over and over and if information is flowing around the HSC system more freely, giving a fuller picture of someone's condition.

It is important to consider the vast differences on experiences and capabilities of older people and the 'older' old, that is, those over 85. eHealth should not completely remove the current services as there will be many older people that do not use, trust or want to use ICT. A balance therefore needs to be considered in the use of these technologies and how they either reduce or compound isolation of older people. The views of the older people must always be considered.

It is also important to consider privacy issues with regard assistive technologies.

The sharing of health and social care information among professionals was highlighted as an area of interest for the group of young people we engaged as their experiences to date have meant they have often had to repeat "their story" as they moved around the HSC system.

### Staff use of technology

Concerning the attitudes of nurses towards computerisation, the literature is almost equally divided between those which found nurses to have positive attitudes and those which found them to have negative attitudes. A number of published studies have focused on the attitudes of nurses toward computerisation (Marasovic et al, 1997; Simpson and Kenrick, 1997). Most of these researches were carried out in the UK, USA, Australia, Taiwan and other developed countries.

Eley et al. (2009) also state that nurses generally demonstrated positive attitudes towards computer use and acknowledged the benefits of ICT to

clinical care. Their assertion is supported by Hwang and Park (2011) who found that nurses had favourable attitudes toward computerisation.

Several factors have been found to shape the attitudes of nurses towards the use of computer systems. Age, educational level, years of nursing experience and experience with computers have frequently been described as factors influencing nurses' attitudes towards computerisation. According to Lee, et al. (2008) cited by Huryk (2010), age was consistently found to influence nurses' attitudes towards computerised nursing care plans. Younger nurses demonstrated a greater enthusiasm in the use of the technology. Simpson and Kenrick (1997) were in agreement when they asserted that younger, less experienced nurses had positive attitudes towards computerisation.

## Marital Status

### Population profile

Table 2: Marital Status of Northern Ireland residents aged 16+ years, Census 2011

Marital status	Count	Percentage
Married	680,831	47.6
Single	517,393	36.1
Same-sex civil partnership	1,243	0.1
Separated	56,911	4.0
Divorced	78,074	5.5
Widowed or surviving partner	97,088	6.8

(Source: NISRA (2012) Table KS103)

The table shows that almost half (48%) of people aged 16 years and over on Census Day 2011 were married, and over a third (36%) were single. Just over 1,200 people (0.1%) were in registered same-sex civil partnerships. A further 9.4% of residents were separated, divorced or formerly in a same-sex civil partnership, while the remaining 6.8% were either widowed or a surviving partner (Source: NISRA (2012) Table KS103).

The urban areas of Belfast and Derry/Londonderry had the largest proportions of single people (47% and 42% respectively), while Ards and Banbridge (both 54%) had the highest proportion of married people.

No data has been identified to suggest that the use of technology differs by marital status.

## Religion

### Population Profile

In Northern Ireland most people are of Christian faith, as shown in the table below. There are gaps in the information about those of non-Christian faiths and those with no faith.

On Census Day 2011, the usual population of Northern Ireland was 1,810,863. The table shows the change in the religious make-up of Northern Ireland between the 2001 and the 2011 Census.

**Table 3: Changes in religious make up of Northern Ireland between 2001 and 2011 censuses**

Religion/ religion brought up in	Census 2001		Census 2011		Percentage change (%)
	Count	Percentage (%)	Count	Percentage (%)	
<b>Protestant /other Christian</b>	895,377	53.1	875,717	48.4	-2.2
<b>Roman Catholic</b>	737,412	43.8	817,385	45.1	10.8
<b>Other religions</b>	6,569	0.4	16,592	0.9	152.6
<b>None</b>	45,909	2.7	101,169	5.6	120.4

(Source: NISRA, Table KS07b (2003); KS212 (2012))

No data has been identified to suggest that the use of technology differs by religion.

## Ethnicity

### Population Profile

Since the 2001 Census, there has been a marked change in Northern Ireland's ethnic diversity. On Census Day 2011, 1.8% (32,400) of the resident population belonged to minority ethnic groups, more than double the proportion in 2001 (0.8%). The main minority ethnic groups were Chinese (6,300 people), Indian (6,200), Mixed (6,000) and Other Asian (5,000), each accounting for around 0.3% of the population.

Ethnic group	Census 2001		Census 2011		Difference
	Count	Percentage	Count	Percentage	Count
<b>White</b>	1,670,988	99.2	1,778,449	98.2	107,461
<b>Chinese</b>	4,145	0.2	6,303	0.4	2,158
<b>Indian</b>	1,567	0.1	6,198	0.3	4,631
<b>Mixed</b>	3,319	0.2	6,014	0.3	2,695
<b>Other Asian</b>	194	0	4,998	0.3	4,804
<b>Other</b>	1,290	0.1	2,353	0.1	1,063
<b>Black African</b>	494	0	2,345	0.1	1,851
<b>Irish Traveller</b>	1,710	0.1	1,301	0.1	- 409
<b>Pakistani</b>	666	0	1,091	0.1	425
<b>Black other</b>	387	0	899	0.1	512
<b>Bangladeshi</b>	252	0	540	0	288
<b>Black Caribbean</b>	255	0	372	0	117

**Table 4: Changes in ethnic makeup of Northern Ireland between 2001 and 2011 censuses**

(Source: NISRA, Table KS06 (2003); KS201 (2012))

Irish Travellers comprised 0.1% of the population. Since 2001, the minority ethnic count rose from 14,300 to 32,400. Increases were recorded for all groups with the exception of Irish Travellers, whose number fell from 1,700 in 2001 to 1,300 in 2011. Belfast (3.6%), Castlereagh (2.9%), Dungannon (2.5%) and Craigavon (2.1%) had the highest proportions of residents from minority ethnic groups.

Residents born outside Northern Ireland in March 2011 accounted for 11% (202,000) of the population, compared with 9% (151,000) in April 2001. This change resulted largely from inward migration by people born in the 12 countries that have joined the European Union since 2004 (EU

12). These accounted for 2% (35,700) of Northern Ireland residents on Census Day 2011, compared with 0.1% in 2001.

The rest of the population born outside Northern Ireland consisted of 4.6% born in Great Britain, 2.1% born in the Republic of Ireland, 0.5% born in countries that were EU members before 2004, and 2% born elsewhere.

**Table 5: Breakdown of country of birth for the population of Northern Ireland**

Country of birth	Count	Percentage
<b>Northern Ireland</b>	1,608,853	88.8
<b>Outside Northern Ireland</b>	202,000	11.2
<b>England</b>	64,717	3.6
<b>Scotland</b>	15,455	0.9
<b>Wales</b>	2,552	0.1
<b>Republic of Ireland</b>	37,833	2.1
<b>EU before 2004</b>	9,703	0.5
<b>EU 12</b>	35,704	2.0
<b>Other</b>	36,046	2.0

(Source: NISRA (2012) Table KS204)

The number of requests received by the Northern Ireland Health and Social Care Interpreting Service has risen from 10,257 in 2005/6 to 63,868 in 2011/12, showing the increasing demand on services responding greater diversity in the population. Responses to the TYC Vision to Action consultation noted how important it was to have foreign-language interpreters available.

According to the “All-Ireland Traveller Health Study” (AITHS), the Traveller population in Northern Ireland is estimated at 3,905, with 1,562

families. The age profile of this community is markedly different from that of the general population. Some 70% of Travellers are aged 30 or under, and only 1% are aged 65 and over. This partly reflects a higher birth rate, a higher death rate and inward migration.

National research suggests there are differences within black and minority ethnic (BME) groups generally when compared with the white population. Ill health often starts at an earlier age in BME groups than among white people. There are variations from one health condition to another; for example, BME groups have higher rates of cardiovascular disease than white people but lower rates of many cancers. Diabetes is more common in BME groups and high blood pressure is more common in Asian groups.

Evidence suggests a lack of knowledge among BME groups about social care services. There is a particular lack of knowledge about services for those with dementia and their carers.

People from BME groups face particular difficulties in accessing services, making complaints and getting mistakes corrected. The Health Professions Council's 'Scoping Report on Existing Research on Complaints Mechanisms' says this can partly be explained by a relative lack of knowledge about how services work. People from BME groups may also be more likely to fear the consequences of complaining or asserting themselves.

Medical Sociology Online produced a report based on research undertaken in Western Scotland. The report details the opinions of patients from ethnic minorities on the use of eHealth. There were varying concerns from different community groups. The report highlighted "issues of trust, language barriers as well as a perceived lack of relevance" as reasons why Chinese patients might be reluctant to engage with eHealth.

Confidentiality issues persisted with patients from the African community; those going through the asylum process were particularly reticent to hand out their information. Even in the case of an interpreter, these patients feared that confidentiality would be breached and

members of their own “small close-knit” community might become aware of otherwise private information.

Language barriers remained the single biggest issue for the Horn of Africa (HAPANI) refugees to accessing Health and Social Care in Northern Ireland. Communications from HSC was almost always in English, which means that people have to rely on friends or family members that can read and/or speak English for translation. This raises potential and real human rights issues, namely around privacy and also potential issues around gender equality.

There was some examples of good practice raised by the HAPANI round table, such as GP’s surgeries that have a touch screen in reception that have a Somali flag that when touched allows the user to type in their name and it will confirm in the patients native language that they have the correct appointment. The roundtable discussed this further and acknowledged that while this is good practice, it is also important that when they see the GP, in this instance, that they can still communicate with the GP and receive the appropriate care.

An issue of not being kept informed was flagged up by the HAPANI roundtable, with people highlighting instances of waiting considerable times for information and then having to have this translated which delayed the process even further.

The issue of older people from an ethnic minority background was raised during the engagement with the Strabane ethnic minority forum, where they may find particular difficulty in accessing healthcare and using eHealth.

NICEM raised issues around the strategy in the context of settled migrants in Northern Ireland tending to be better off than new migrants in terms of socioeconomic status. New migrants (particularly those from eastern bloc countries) tend to be younger. New migrants however embrace technology more than the older settled migrant community, however they tend to access it in their own language, so language will still be an issue.

Culturally Travellers don’t embrace traditional computers and don’t have them in their homes. However they have smart phones, it will be

important to ensure that whatever is developed from the strategy is compatible across multiple devices.

## Staff Profile

**Table 6** Equality and diversity data for the register as of July 2011 , responses have been received from 286,190 out of 665,545 registrants or 43% of nurses and midwives employed

	White British	Other White	Asian	Black African	Black Caribbean	Other/Mixed
Overall	73%	11%	7%	5%	2%	2%
England	72%	9%	8%	7%	2%	2%
Northern Ireland	55%	39%	5%	0.4%	few	0.6%
Scotland	89%	6%	2%	1%	few	0.4%
Wales	84%	9%	5%	1%	0.3%	0.9%
Non-UK	36%	46%	9%	4%	2%	1%
Midwives	79%	11%	2%	4%	2%	1%
Nurses	72%	11%	8%	6%	2%	2%
SCPHNs	83%	9%	2%	3%	2%	0.7%

NB- Some combinations with fewer than 30 correspondents are marked "few" for anonymity

## Political Opinion

### Population Profile

There is limited data available; however the Electoral Commission's data on the first-preference votes per party in the Northern Ireland Assembly Elections 2011 gives a good guide to political preferences in the province as a whole.

**Table 7: First preference votes per party in Northern Ireland Assembly Elections 2011**

Political party	Votes
<b>Democratic Unionist Party</b>	<b>198,436</b>
<b>Sinn Fein</b>	<b>178,222</b>
<b>Social Democratic and Labour Party</b>	<b>94,286</b>
<b>Ulster Unionist Party</b>	<b>87,531</b>
<b>Alliance</b>	<b>52,384</b>
<b>Other</b>	<b>52,284</b>

(Source: Electoral Office NI, 2011)

A DHSSPS literature review of equality and human rights on fair access to health and social care said it is difficult to know how statutory health and social services perform as regards political opinion. This is partly because of a lack of research (See <http://www.dhsspsni.gov.uk/eq-literature-review>).

### Staff

This strategy applies to most HSC staff. It is important to protect the identity of individuals by excluding specific information. However the data has been considered. Many members of staff chose not to disclose their political opinion. There is no evidence of difference in eHealth technology use by political opinion available.

## Disability

### Population Profile

Census figures show that in 2011 just over one in five of the resident population (21%) had a long-term health problem or disability that limited their day-to-day activities, similar to the proportion in 2001 (20%).

Strabane and Belfast (both 24%) had the highest proportions of residents with a long-term health problem or disability.

**Table 8: Long-term health problem or disability of Northern Ireland Population**

<b>Disability</b>	<b>Count</b>	<b>Percent %</b>
<b>Long-term health problem or disability: day-to-day activities limited a lot</b>	215,232	11.9
<b>Long-term health problem or disability: day-to-day activities limited a little</b>	159,414	8.8
<b>Long-term health problem or disability: day-to-day activities not limited</b>	1,436,217	79.3

(Source: NISRA (2012) Table KS301 – Health and unpaid care)

According to a NISRA survey carried out in 2006; some 37% of households include at least one person with a disability and 20% of these include more than one disabled person.

For both men and women, the rate of disability increases with age. Women on average live longer than men therefore disability tends to be more common among women. The rate is particularly high for women aged 75 and above (at 62%). It is only among the youngest adults aged 16 to 25 that the rate for men (at 6%) is higher than for women (4%) (Northern Ireland Survey of Activity Limitation and Disability (2006/07).

Some 32% of the 1,860 people receiving direct payments from their local Health and Social Care Trust have a physical or sensory disability (January 2011).

In Northern Ireland there are about 16,500 people with a learning disability. McConkey et al (2006) predict this will increase by 20.5% by 2021. Any change to older people’s services must take account of the needs of older people with learning disabilities as well as other forms of disability. (McConkey et al, ‘Accessibility of healthcare information for people with a learning disability. A Review and Discussion Paper’ (2006)

**Table 9: Percentage of People in Northern Ireland population by type of long term condition or disability**

Type of long – term condition	Percentage of population with condition %
Deafness or partial hearing loss	5.14
Blindness or partial sight loss	1.7
Communication Difficulty	1.65
Mobility of Dexterity Difficulty	11.44
Learning, intellectual, social or behavioural difficulty.	2.22
Emotional, psychological or mental health condition	5.83
Long – term pain or discomfort	10.10
Shortness of breath or difficulty breathing	8.72
Frequent confusion or memory loss	1.97
A chronic illness (such as cancer, HIV, diabetes, heart disease or epilepsy.	6.55
Other condition	5.22
No Condition	68.57

(Census 2011)

In a June 2011 report entitled ‘Digital Inclusion for People with a Disability’, Disability Action NI concluded that ‘government should ensure that products and services are usable and accessible for older

and disabled people'. While this was a general recommendation as Northern Ireland progresses to a more ICT-literate future, the need for digital inclusion of specific members and groups of our society extends to their inclusion in eHealth initiatives in Northern Ireland.

In Australia, the Disability Information and Resource Centre has been encouraging patients to make the most of eHealth opportunities offered by the government. Registering for an eHealth record allows patients private access to their record “anywhere, anytime in Australia via a secure website”. This also affords those with disabilities to track immunization, organ and tissue donation status. This would be helpful to allow those with a disability to maintain all of their healthcare information in a secure singular location. It might afford them peace of mind, and prove invaluable for clinicians they come into contact with.

In Queensland, Australia, there have been steps taken by local disability groups to build a social eHealth record. The record allows people with disabilities, and their families and carers to save relevant personal and health information in a secure location. This allows clinicians to keep a record of patient-specific information that might otherwise be lost in paper records or simply forgotten. The ethos behind this socially-created record is that “...people living with a disability have much more information that needs to be retained centrally”. Engaging with the affected group at the beginning of an eHealth process is of great importance, for the most user-friendly result. This record is also notable in that it allows the patient and their family to modify it, rather than exclusively clinicians.

Web accessibility refers to the inclusive practice of removing barriers that prevent access to websites by people with disabilities. When sites are correctly designed, developed and edited, all users have equal access to information and functionality. For example, when a site is coded with semantically meaningful HTML, with textual equivalents provided for images and with links named meaningfully, this helps blind users using text-to-speech software and/or text-to-Braille hardware. When text and images are large and/or enlargeable, it is easier for users with poor sight to read and understand the content. When links are underlined (or otherwise differentiated) as well as coloured, this ensures

that colour blind users will be able to notice them. When clickable links and areas are large, this helps users who cannot control a mouse with precision. When pages are coded so that users can navigate by means of the keyboard alone, or a single switch access device alone, this helps users who cannot use a mouse or even a standard keyboard. When videos are closed captioned or a sign language version is available, deaf and hard-of-hearing users can understand the video. When flashing effects are avoided or made optional, users prone to seizures caused by these effects are not put at risk. And when content is written in plain language and illustrated with instructional diagrams and animations, users with dyslexia and learning difficulties are better able to understand the content. When sites are correctly built and maintained, all of these users can be accommodated without decreasing the usability of the site for non-disabled users.

The needs that Web accessibility aims to address include:

- Visual: Visual impairments including blindness, various common types of low vision and poor eyesight, various types of colour blindness;
- Motor/Mobility: e.g. difficulty or inability to use the hands, including tremors, muscle slowness, loss of fine muscle control, etc., due to conditions such as Parkinson's Disease, muscular dystrophy, cerebral palsy, stroke;
- Auditory: Deafness or hearing impairments, including individuals who are hard of hearing;
- Seizures: Photoepileptic seizures caused by visual strobe or flashing effects.
- Cognitive/Intellectual: Developmental disabilities, learning disabilities (dyslexia, dyscalculia, etc.), and cognitive disabilities of various origins, affecting memory, attention, developmental "maturity," problem-solving and logic skills, etc.

There are a number of issues in particular which have a potential impact on the use of eHealth by people with learning disabilities, their families and carers.

Accessing reliable health and social care information for parents or carers of young people with a learning disability is cited. This information needs to be aimed at the right people – should this be the carer, parent or person with a learning disability – at the right time, to enable people to make the right choices for themselves or those they care for.

There is an issue, particularly for parents of young people with a learning disability, in navigating the social care system. Parents are usually calling and making contact with the service in times of crisis and sometimes it can take considerable time to get through to the correct service area and considerable time to receive a response from the correct professional.

When access to a service requires choosing options on an automated phone switchboard, complicated pathways can create unnecessary barriers for a person with a learning disability. If similar pathways are transferred through the eHealth Strategy from phones to computers, the same difficulties will exist.

Rarely are the communication needs of people with a learning disability considered as part of their care in other parts of the HSC, requiring family members or carers to engage with the care professional to explain the communication needs. A system that allowed care professionals across the HSC service to be made aware of the communication needs of the person with a learning disability no matter where they are accessing services and being cared for would be beneficial

For people with a learning disability, there are issues around ownership of information and how information is shared, both amongst care professionals and between the professionals and the person with the learning disability and/ or their family and carers.

At the round table hosted by Disability Action, the participants emphasised the need for continued engagement with disabled people throughout the design and implementation phases of many of the initiatives being proposed as this will ensure it works best.

It is important to consider different health needs, not just the main impairment that a disabled person has and it is also important to

understand that many disabilities are not static, they are recurrent and fluid.

Electronic processes shouldn't replace one to one contact; health information is sometimes very personal information and people may be reluctant to give this information over to a machine or computer and prefer a person to speak to. There is a 'fear' around technology for many disabled people, particularly older disabled people.

It is important that the ambulance service are linked into the eHealth framework and that relevant information, particularly for disabled people, who may not be able to communicate effectively, or be on medication that is constantly changing for example, is available to them as this would improve the care for disabled people significantly.

## Staff Profile

**Table 10 shows the statistics for nurses and midwives employed who answered yes to having a disability**

	Yes	No
Overall	6%	94%
England	6%	94%
Northern Ireland	4%	96%
Scotland	5%	95%
Wales	6%	94%
Non-UK	12%	88%
Midwives	6%	94%
Nurses	6%	94%
SCPHNs	5%	95%

## Dependants

### Population Profile

In the 2011 Census respondents were asked whether they provided any unpaid help or support to family members, friends, neighbours or others because of long-term physical or mental ill-health/disabilities, or problems related to old age. Twelve per cent of the population (213,980) provided such unpaid care, around a quarter (26%) of whom did so for 50 or more hours a week, a total of 56,000 people.

Between the 2001 and the 2011 Censuses there was an increase in the number of people providing unpaid care.

**Table 11: Changes in the provision of unpaid care in Northern Ireland between 2001 and 2011 censuses**

Care provided	2001 Census		2011 Census	
	Count	Percentage %	Count	Percentage %
<b>Provides no unpaid care</b>	1,500,201	89.0	1,596,883	88.2
<b>Provides 1-19 hours unpaid care per week</b>	110,407	6.6	122,301	6.8
<b>Provides 20-49 hours unpaid care per week</b>	28,000	1.7	35,369	2.0
<b>Provides 50+ hours unpaid care per week</b>	46,659	2.8	56,310	3.1
<b>Total</b>	1,685,267	100	1,810,863	100

(Sources: NISRA Univariate table UV021(2001 numbers) and NISRA (2012) Table KS301 – Health and unpaid care (2011 numbers))

Based on the most recent information from Carers Northern Ireland (June 2011), the following facts relate to carers:

- 1 in every 8 adults is a carer;
- There are about 207,000 carers in Northern Ireland;
- One quarter of all carers provide over 50 hours of care per week;
- People providing high levels of care are twice as likely to be permanently sick or disabled as the average person;
- About 30,000 people in Northern Ireland care for more than one person; and
- 64% of carers are women; 36% are men.

In 2006 the DHSSPS published a *Survey of Carers of Older People in Northern Ireland*. Of which providing this care over three-quarters (77%) were female and almost a quarter were male. Fifteen per cent were aged 75 or over, 48% were aged 55-74, 35% were aged 35-54 and only 2% were aged under 35. Just over three-quarters of the male carers (76%) were aged 55 or more, compared with three-fifths (60%) of female carers. Almost a quarter (24%) of the male carers and 12% of the female carers were aged 75 or more.

The majority of informal care is provided by family members, usually spouses or adult children.

There has been a policy drive in recent years towards supporting carers in their caring role and ensuring that health and social services assist carers in maintaining their own health and well-being. Yet, despite this many carers continue to feel marginalised and often believe that their own particular health and social care needs are overlooked (Arksey et al, 2003:1).

Barriers relating to service issues include, GP surgeries not identifying or carers' health records; a lack of training in carers' issues amongst staff; "gate-keeping", inflexible appointments systems; waiting times; and, lack and/or cost of transport and parking at health care facilities (2003:45). Barriers relating to information and knowledge issues include, carers not being provided with sufficient information regarding available services and how to access them; professional concerns about confidentiality and disclosing information to carers (2003:58). The provision of reliable online information and access to expert knowledge via eHealth technologies could improve this situation.

eHealth has the potential to provide health and social care services in settings which are accessible and acceptable to carers, such as the use of video conferencing and email from home therefore recognising and addressing the transport needs of carers (especially those in rural areas).

## Sexual Orientation

### Population Profile

Accurate figures are not available on the sexual orientation of the general population, and estimates vary considerably. The Northern Ireland Statistics and Research Agency (NISRA), along with other UK census offices, concluded that the census was not suitable for obtaining such information. The 2011 Census does provide some information, based on same-sex civil partnerships.

Research by HM Treasury shows that from 5%–7% of the UK population say they are gay, lesbian, bisexual or ‘trans’ (transsexual, transgendered and transvestites).

The 2010 Northern Ireland Life and Times survey (1,205 adults) reported the figure as only 1%. The Office for National Statistics 2010 report (450,000 respondents) found that in Northern Ireland 92.5% said they were heterosexual and 0.9% of respondents said they were LGB, although 0.4% reported as ‘other’ and 6.2% said they didn’t know or refused to respond.

Between 2006 and 2012, there were 715 recorded Civil Partnerships regionally. However, this is not indicative of the LGB population. There are no accurate statistics on sexual orientation in the community as a whole, it is however estimated that between 5% and 10% of the population would identify as lesbian, gay or bisexual.

There is no data available on the use and attitudes to technology varying with sexual orientation.

### Staff Profile

Some Trusts and Health and Social Care Organisations collect data on sexual orientation, however there are gaps in the data and a significant non-disclosure rate. It can however be reasonably assumed that the sexual orientation demographic of staff reflects that of the general population, around 5%-10%.

**Table 12 shows figures for nurses and midwives employed by sexual orientation**

	Bisexual	Gay / lesbian	Heterosexual
<b>Overall</b>	1.5%	1.5%	97%
<b>England</b>	1.5%	1.5%	97%
<b>Northern Ireland</b>	1.9%	0.5%	98%
<b>Scotland</b>	1.1%	1.4%	98%
<b>Wales</b>	1.5%	1.2%	97%
<b>Non-UK</b>	1.7%	1.9%	96%
<b>Midwives</b>	0.8%	0.6%	99%
<b>Nurses</b>	1.6%	1.6%	97%
<b>SCPHNs</b>	0.5%	0.8%	99%

- NB- Some combinations with fewer than 30 correspondents are marked "few" for anonymity

There is no data available on the use and attitudes to technology varying with sexual orientation.

## 4. Good Relations

We have identified no issues impacting on good relations.

There is no evidence of differing eHealth technology use across the religious groups noted within the 2011 Census. The variable difference in technology use among those from different minority ethnic backgrounds has no impact on good relations and there is no evidence of differing eHealth technology use among those with different political opinions, that impacts on good relations.

## 5. Disability Duties

Through the development of the eHealth and Care Strategy we have consistently considered our obligations under both the Disability Discrimination Act 1995 and the United Nations Convention on the Rights of Persons with Disabilities (UNCRPD). We have engaged with organisations representing disabled people and disabled people directly through the drafting of the Equality Impact Assessment.

### United Nations Convention on the Rights of Persons with Disabilities (UNCRPD)

We acknowledge General Comment No. 2 (2014) of the Eleventh Session of the Committee on the Rights of Persons with Disabilities, namely; *“While different people and organizations understand differently what information and communications technology (ICT) means, it is generally acknowledged that ICT is an umbrella term that includes any information and communication device or application and its content. Such a definition encompasses a wide range of access technologies, such as radio, television, satellite, mobile phones, fixed lines, computers, network hardware and software. The importance of ICT lies in its ability to open up a wide range of services, transform existing services and create greater demand for access to information and knowledge, particularly in underserved and excluded populations, such as persons with disabilities”.*

The development and implementation of this Strategy contributes to meeting the HSCB's obligations under the UNCRPD, namely:

### Article 9 Accessibility

1 To enable persons with disabilities to live independently and participate fully in all aspects of life, States Parties shall take appropriate measures to ensure to persons with disabilities access, on an equal basis with others, to the physical environment, to transportation, to information and communications, including information and communications technologies and systems, and to other facilities and services open or provided to the public, both in urban and in rural areas. These measures, which shall include the identification and elimination of obstacles and barriers to accessibility, shall apply to, inter alia:

(b) Information, communications and other services, including electronic services and emergency services.

### Article 21 Freedom of expression and opinion, and access to information

States Parties shall take all appropriate measures to ensure that persons with disabilities can exercise the right to freedom of expression and opinion, including the freedom to seek, receive and impart information and ideas on an equal basis with others and through all forms of communication of their choice, as defined in article 2 of the present Convention, including by:

(a) Providing information intended for the general public to persons with disabilities in accessible formats and technologies appropriate to different kinds of disabilities in a timely manner and without additional cost

### Article 25 Health

States Parties recognize that persons with disabilities have the right to the enjoyment of the highest attainable standard of health without discrimination on the basis of disability. States Parties shall take all appropriate measures to ensure access for persons with disabilities to health services that are gender-sensitive, including health-related rehabilitation. In particular, States Parties shall:

(c) Provide these health services as close as possible to people's own communities, including in rural areas

(d) Require health professionals to provide care of the same quality to persons with disabilities as to others, including on the basis of free and informed consent by, inter alia, raising awareness of the human rights, dignity, autonomy and needs of persons with disabilities through training and the promulgation of ethical standards for public and private health care

#### Article 26 Habilitation and rehabilitation

1. States Parties shall take effective and appropriate measures, including through peer support, to enable persons with disabilities to attain and maintain maximum independence, full physical, mental, social and vocational ability, and full inclusion and participation in all aspects of life. To that end, States Parties shall organize, strengthen and extend comprehensive habilitation and rehabilitation services and programmes, particularly in the areas of health, employment, education and social services, in such a way that these services and programmes:

(b) Support participation and inclusion in the community and all aspects of society, are voluntary, and are available to persons with disabilities as close as possible to their own communities, including in rural areas.

3. States Parties shall promote the availability, knowledge and use of assistive devices and technologies, designed for persons with disabilities, as they relate to habilitation and rehabilitation.

#### Disability Discrimination Act 1995

The implementation and out workings of the eHealth and Care Strategy can significantly contribute to the two duties of the HSCB of the Disability Discrimination Act 1995.

##### 1. Encouraging disabled people to participate in public life

Involving people in their own care and giving people greater autonomy and choice is central to the eHealth and Care Strategy. Key to making this work is the design, testing and implementation of new technologies and the development of existing technologies. Service user involvement, including disabled people, is important, if we are to get this right. Encouraging disabled people, from outside of the statutory sector, to

contribute to any implementation boards or working groups that are established as a result of this strategy is fundamental to how we will proceed. Additionally, through the use of technologies such as video conferencing as part of these processes, will enable the HSC to potentially reach and engage disabled people with significant mobility issues or other complex needs.

## 2. Promoting positive attitudes towards disabled people

One of the six core objectives of the strategy is to use information and analytics (infomatics) to map trends and support care. This information can also be used to identify people with disabilities entering the system, which parts of the system they are entering, what they are entering the system for; allowing HSC to identify service gaps, including potentially any training needs of staff, which will assist with the promotion of positive attitudes towards disabled people across the HSC service.

## 6. Human Rights

The impact of the eHealth and Care strategy human rights was identified as affecting Article 8 – Right to respect for private & family life, home and correspondence.

There may be potential interference with the right to privacy by increased sharing of care information, through the expansion of the use of the Northern Ireland Electronic Care Record (ECR). The privacy and confidentiality requirements of the ECR have been extensively investigated during its development including guidance from the Information Commissioner and the Privacy Advice Committee of the DHSSPS(NI). This has included the development of the “The Data Protection considerations associated with the electronic processing of personal data for direct care purposes” DHSSPS(NI) 2012 policy document.

The ECR contains information which was already collected and held electronically, in hospitals, clinics and GP practices. The ECR replaces manual transfers with an electronic system, but does not change the information gathered or the use of the information to care for the person. This indicated that the impact on privacy by the ECR would be limited and managed through consent and effective communication arrangements.

The ECR issued a leaflet to all Northern Ireland households explaining how their data would be used and how you could opt out of the ECR. A small number of people decided to opt-out of the ECR. The ECR also implemented a strong consent model prior to clinical staff accessing the record.

A separate consultation has been undertaken by the DHSSPS(NI) on the secondary use of patient identifiable data. This will set out the future framework for using health data for purposes other than the care of person the data is about.

The development of e Assistive Technologies (eAT) through the strategy has the potential to promote the rights under article 8 of those with a physical or cognitive disability. The use of this technology could allow more independent living and thus more privacy for those with specific disabilities.

## 7. Conclusions

### Summary and Assessment of Key Findings

#### Age

The older age group will have a diverse response to eHealth, depending on age and experience.

The uptake of eHealth technologies by older people could be restricted, by concerns of confidentiality, security, confidence, skills and experience of using technology. These will need to be considered in the introduction of large scale eHealth technologies. These technologies will have to supplement existing services, to allow older people to continue to access services through existing methods.

The development of eAT will provide a range of positive impacts for older people, providing increased independence and the ability to remain in their own home. There were concerns that the impact of assistive technology may increase independence but may raise issues of consent and understanding which should be assessed as part of any implementation. eHealth technology should be used appropriately to

avoid negative impacts which could be reducing social contact and increasing isolation. eHealth technologies may be able to help reduce isolation through the development of on-line communities, supporting isolated older people through the use of technology.

The younger age group will see a positive impact on the use of eHealth, they are used to using technology in their daily lives and will quickly adapt to eHealth technologies. Young people are waiting for the HSC to adopt the technologies that they use every day.

### Disability

The use of eHealth technology was seen as having a positive impact for those with disabilities, with the potential to provide better information, allow better care and improve independence.

The feedback from the development process showed that the development and implementation of eHealth solutions must respond to the needs of all users and incorporate the needs of users with disabilities in the development of eHealth care systems.

The use of assistive technologies has considerable to support independence for those with disabilities, balanced with the need to ensure that these technologies are correctly supported and maintained for those using them.

The sharing of information was thought to provide considerable benefits, allowing care professionals to understand communications problems and complex medical histories more easily, particularly in urgent care or when they interact with a new care professional.

### Ethnicity

The use of eHealth technology was seen as having a positive impact, with examples seen during the consultation process which provided positive impacts for those from an ethnic minority. These included the use of automatic translation functions and the ability to access health information in their own languages. The widespread use of smartphones by those from an ethnic minority provides a major opportunity for the use of eHealth technology.

For a variety of reasons those from an ethnic minority may not be able or willing to use eHealth technologies. Trust in eHealth technologies will have to be built and demonstrated for these to become acceptable. As a result eHealth technologies should supplement existing services, allowing the person the choice of whether to engage with the technology. Other section 75 areas

The remaining 8 areas, gender, marital status, religion, political opinion dependants and sexual orientation do not show significant variation in the use of eHealth.

## Proposed Action

The complexity of eHealth, the funding challenges and the rapid advance of technology mean that in many areas of the strategy it is not possible to predict precisely the equality impacts of the implementation of the strategy now.

### Sub-strategies

**Issue** – The major sub-strategies of the eHealth and Care strategy may have some equality issues which will need to be investigated.

**Action** - The sub-strategies, for example the Information and analytics strategy and the Social Media and alternative communications strategy will be equality screened.

**When** – They will be equality screened during their development process.

### Individual Projects

As well as the screening of the sub-strategies large scale individual projects in the strategy must undertake individual equality screening. This is particularly important for those projects which will interact with the public directly and for those which change the way staff and patients interact. An example of this would be the development of a web portal or the replacement of the patient administration system in hospitals.

**Issue** - The accessibility needs of specific groups need to be taken into consideration when developing new systems and services to ensure that they are accessible for those with a disability.

**Action** - Best practice for technology project delivery the role of the user is critical to the development of the project. Projects delivering in the eHealth programme should include within their users appropriate representation from older users, users with a disability or who are not fluent in English. This will depend on the characteristics of the user group for the project or service

**When** - This user engagement will happen during the design phase of the projects.

## Proposed Monitoring

The eHealth and Care programme has defined the governance arrangements for the delivery of the programme, with a range of stakeholders engaged in managing the delivery process.

The eHealth and Care strategic board will ensure that the principles set out in this draft EQIA are reflected in the projects that deliver the strategy. This will be part of the annual review of the eHealth and Care programme which reviews progress and sets direction for the year ahead.

The EQIA will also be reviewed at the bi-annual review of the strategy to ensure that this is still accurate.

## Appendix 1 – The Steps of an EQIA

### What is an Equality Impact Assessment? (EQIA)

An EQIA is “a thorough and systematic analysis of a policy, whether the policy is written or unwritten, formal or informal, and irrespective of the scope of the policy or the size of the public authority.”

### The Steps of an EQIA

#### What is it we are actually looking at? (‘Aims of Policy’)

The first part of an EQIA involves thoroughly understanding the policy to be assessed; what context it is set in; who is responsible for what; what links there are with other organisations or individuals in implementing the policy etc.

#### How can we tell what is happening on the ground? (‘Consideration of Data’)

This involves reviewing what data is available in-house or elsewhere and identifying what data needs to be newly collected. ‘Data’ means statistics and the views, experiences and suggestions of those affected by the policy. ‘Collecting new data’ means going out and doing a survey and also talking to people who are affected by a policy or those who are involved in implementing the policy, for example in delivering a service.

#### So are there any problems for any of the groups? (‘Assessment of Impacts’)

All relevant data that has been identified (whether collected from available sources or newly gathered) is brought together and analysed. Conclusions are drawn as to the impact of the policy on the nine groups.

#### What can be done to make things fairer? (‘Consideration of Measures’)

Now the findings are related back to action: proposals are what can be done to address any inequalities/ unfairness that the analysis of the data has revealed.

#### Are we getting the right picture and are we thinking of doing the right thing? (‘Formal Consultation’)

The findings and the proposed actions are brought back to the public at this stage, usually on the basis of a draft report. Now it’s time to find out what people think about the analysis and proposals!

**With what people have told us – what are we going to do?  
(‘Decision by Public Authority’)**

After the wider public has had a chance to comment on the analysis and proposals it’s time for the organisation to take final decisions and commit themselves to action points.

**This is what we have found out and this is what we will do  
(‘Publication of Results of EQIA’)**

These decisions and commitments are published in a final report alongside the findings from the analysis of collected data and the comments raised by the wider public during formal consultation.

**Keeping a close eye on what is happening (‘Monitoring of Adverse Impacts’)**

An EQIA is not a one off. It’s important to keep a close eye on what difference the changes to the policy actually make.

## References

- Eley R, Fallon T, Soar J, Buikstra E, Hegney D: **Barriers to use of information and computer technology by Australia's nurses: a national survey.** *J Clin Nurs* 2009, **18**(8):1151-8. Available at: <http://www.ncbi.nlm.nih.gov/pubmed/19320784>
- Kummervold P, Cronaki C, Lausen B, Prokosch H-U, Rasmussen S, Santana S, Staineszweski A, Wangberg S *J Med Internet Res.* 2008 Oct-Dec; 10(4): Available at <http://www.jmir.org/2008/4/e42/>
- Marasovic C, Kenney C, Elliott D, Sindhusake D: **Attitudes of Australian nurses toward the implementation of a clinical information system.** *Comput Nurs* 1997, **15**:91-98.
- Simpson G, Kenrick M: **Nurses' attitudes toward computerization in clinical practice in a British general hospital.** *Comput Nurs* 1997, **15**:37-42.
- Hwang J-I, Park H-A: **Factors associated with nurses' informatics competency.** *Comput informatics Nurs CIN* 2011, **29**(4):256-262. Available at: <http://www.ncbi.nlm.nih.gov/pubmed/21076284>
- Lee T-T: **Nursing information: users' experiences of a system in Taiwan one year after its implementation.** *J Clin Nurs* 2008, **17**(6):763-771. Available at: <http://doi.wiley.com/10.1111/j.1365-2702.2007.02041.x>