Silver Surfers: Social Inclusion or Exclusion in the Digital World?

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We believe this report will be helpful for those to who are involved in eliminating or reducing the digital divide around the globe, but most especially within the UK.

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Disclaimer

The information and opinions contained in this report should not be taken as representing the views of the UK, or the employers of the research team. Further, unless referenced to a secondary source, the information contained in this report is based on the obtained material and conversations exchanged during the course of this research project. It is given in good faith, but no liability can be accepted for its accuracy, or for any use to which it might be placed.

The authors of this report are solely responsible for the content, style, language and Editorial control. The views expressed do not necessarily reflect those of other others researching this particular subject as there are many facets associated with this topic.

Executive Summary

> ***"A society can be judged on how it treats its children and older people"***
> ***(Office of the Deputy Prime Minister, 2006)***

When one considers the population profile of a country, no longer is the emphasis upon mortality rates of younger people. As the years progress, enhancements to the quality of life have led to an increasingly ageing society. The emphasis globally has changed to provision for all age groups as a result. In this report, we determine how Information and Communication Technologies (ICTs) are being introduced through programmes by a variety of agencies into the lives of one particular population group – the silver surfer[1]. The context of this report is the United Kingdom.

The research confirms that there are still certain groups of society for whom access to, and use of, ICTs is minimal to non-existent. These include certain sectors of the younger population (from deprived areas or with low education levels), the disabled and older people.

The intention of this report is to investigate and determine technical and non-technical factors that lead silver surfers to online interactions. A review of previous research has indicated that online products and services are being provided by the use of sole or multiple partnerships between public and private sector agencies. We look at how such programmes can be sustained.

Our initial finding was that there is still a digital divide existent in the UK and across the globe. It is evident that more silver surfers need to obtain, use and adopt the computer and the internet in their daily lives. To enable this, there are a number of factors to consider. Using an evaluative method that builds on previous research, we identify technical and non-technical factors for consideration.

There are many factors associated with broadband itself. However, to enable ease of response, we used *types* of broadband as the identifying technical factor. From our survey, it was evident that speed is the technical factor that entices silver surfers online. Nonetheless, many respondents stated that they were not confident about the speed they were receiving and did not think they were getting value for money. Additionally, replies were largely dependent on the interests of the individual as well as, of course, their level of technical competence.

When considering non-technical factors, we found that research, work, children's homework and household activities (online shopping, online banking and information search) were important determining factors in silver surfers' desire to become online interactive. We also assessed whether advertising and a close social circle of friends as well as the availability and quality of

[1] An adult, generally 50 years of age or older, who frequently surfs the Web and spends time online ("silver" refers to the color of their hair). The phrase silver surfer is commonly heard in the U.K., but applies to midlife adults (generally those in their 40s, 50s and 60s), and seniors (age 70 and over) everywhere (netlingo, 2008)

service are significant factors of consideration. From the obtained results, these factors had insignificant influences, with the availability and quality of service making an impact upon decision making in comparison to the other two factors. Relatedly, we concluded that the level of sophistication and frequency of, use is critical, even when considering the non-technical factors. The research also shows that downloading of music and film is a low priority activity.

An interesting and significant finding that appeared in this research is that although silver surfers stated that they had broadband at home, they were in a household shared with other individuals and it appears from our findings that the others in the house use the broadband connection and not the 'silver surfer'. This is a significant finding as it informs researchers that when considering the digital/social inclusion issue, there is still a gap that needs to be filled. Although broadband is being implemented in the home, silver surfers are not using it. This implies that silver surfers may not use broadband after the training and education received in training centers and in time could still lead to the digital/social inclusion gap.

The second aim of this research was to investigate sustainability. Our case study of Citizens Online demonstrates such sustainability. We have identified several key basics regarding sustainability as follows:

- Firstly, labour resources in the form of volunteers willing to spare time and to teach and educate older people as required;
- Secondly, people need to be willing to learn to be online interactive;
- Thirdly, the provision of appropriate hardware and software;
- Fourthly, the vision and leadership of a coordinating individual;
- Finally, the importance of the provision of targeted funding.

In conclusion, it is evident that initiatives such as 'Everybody Online' are generating the possibility for increased inclusion of silver surfers in the UK. The focus now must be on attending to broadening and sustaining such initiatives.

1. Introduction

1.1 Background and Aims of this Research

Recognising the potential that Information and Communications Technologies (ICTs) offer for competitiveness and the effectiveness of communities, Governments across the globe are striving to provide online products and services[2] to all user groups. This has led to a 'push and pull' strategy in economies, and efforts from and partnerships to be formed between many government (public) and private sector organisations and citizens. However, despite all efforts, certain groups of society-disadvantaged groups such as, the disabled, older people and people from poorer backgrounds, are not using online products and services, which has led to a 'digital divide/social inclusion' issue.

This report, which has been funded by the **Association of Information Systems, Microsoft, Citizens Online** and **University of Hertfordshire** describes how a partnership between a large multi-national organisation (Microsoft's Unlimited Potential Programme) and a local charity (Citizens Online, 'Everybody Online' programme) is leading to a reduction or elimination of the digital divide/social inclusion issue within a developed country and how it can be sustained in the future. Further, the report explores the factors that can lead to the social/digital inclusion of silver surfers when they familiarise themselves and use online facilities.

To explore and ascertain the worthiness, and longevity of the involved projects, in the UK and around the globe, this research posed the following research questions:

1. Are programmes established for social inclusion/digital divide sustainable, and how can they be made sustainable?

2. What are the technological and non-technological factors that influence senior citizens' online interactions?

1.1.1 Structure of the Report

This report discusses the programme being operated by Citizens Online and what are the factors that can lead to social inclusion and a reduction or elimination of the digital divide, by briefly describing how the research was conducted and discussing the results of this research in light of the research questions. First, a literature review relevant to this study is presented to introduce many of the topics related to this research. Then the research approach that the team applied is detailed. Next the data collected for this research is presented in the 'Research Findings' section. Following this, a series of recommendations and conclusions are made.

[2] The provision of online products and services is also more commonly known as e-government

1.2 Motivation for this Research

According to the United Kingdom (UK) Office of National Statistics (2008), people aged over 60 in the UK outnumber children for the first time. However, in the current environment where there are dramatic transformations occurring in medicine, health care and the environment, this is not an uncommon situation in many countries around the globe. We noted that such situations are not disappearing and may eventually become common place. As such, our research began to investigate whether researchers have determined the reasons (factors) that can lead to silver surfers becoming familiarized and experienced with online products and services. Online products and services were selected as an online world is not only here to remain, but is expanding.

One of the researchers (Choudrie) has also been investigating the reasons for adoption and usage of broadband for a number of years. This led to her being aware of some user groups, including silver surfers, not obtaining and using Information and Communication Technologies, which offered further motivation for this research.

1.3 Research Scope

When researching the ICTs area there are many applications and devices that can be investigated and this can lead to a research focus that is immensely vast and findings that are thin and less relevant. To avoid this, the research focused on quite specific aspects. Further, there is only reference to, and mention of, UK policies or grassroots level initiatives as our aim was to investigate and examine Citizens On line's projects (their own initiatives) and those supported by Microsoft. We also acknowledge that there are many disadvantaged groups that still cannot use online products and services but the aim of this research is to focus specifically on silver surfers as the core sample.

2. Literature Review

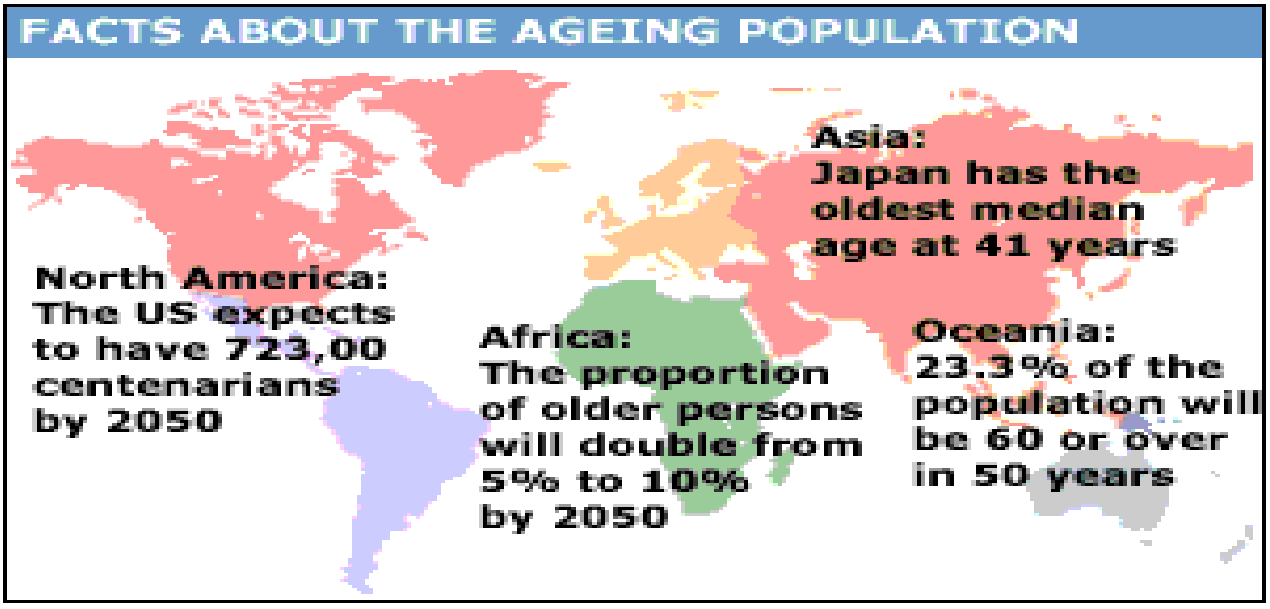
2.1. Introduction and Background

The purpose of this project is to examine how programmes for silver surfers are sustained and additionally to examine the technological and non-technological factors that can lead to social inclusion (or indeed exclusion) for the 'silver surfer' group. Selected literature below sets the scene for the broader contextual background of this work.

2.1.1 An Ageing Society in the UK

Due to advances in medicine, economies and society, countries around the globe are facing the prospect that their population profiles will have increasing mortality rates and a large number will consist of older people (NIA, 2007).

Figure 1: Facts about the Ageing Population



Source: BBC (2002).

In the UK[3], in mid 2007 the population was 60,975,000. In mid 2006 there was an increase of 388,000 (0.6 per cent), which is equivalent to an average increase of approximately 1,000 people a day. Population growth has increased over recent decades. As an example, this latest increase (0.6 per cent) compares with an average annual growth of 0.5 per cent since 2001; 0.3 per cent per year between 1991 and 2001 and 0.2 per cent between 1981 and 1991. Of the population increase it was found by the Office of National Statistics in August 2008 that people aged over 60 outnumbered children. It was revealed that there were 13,262,256 people 60 or over in mid-

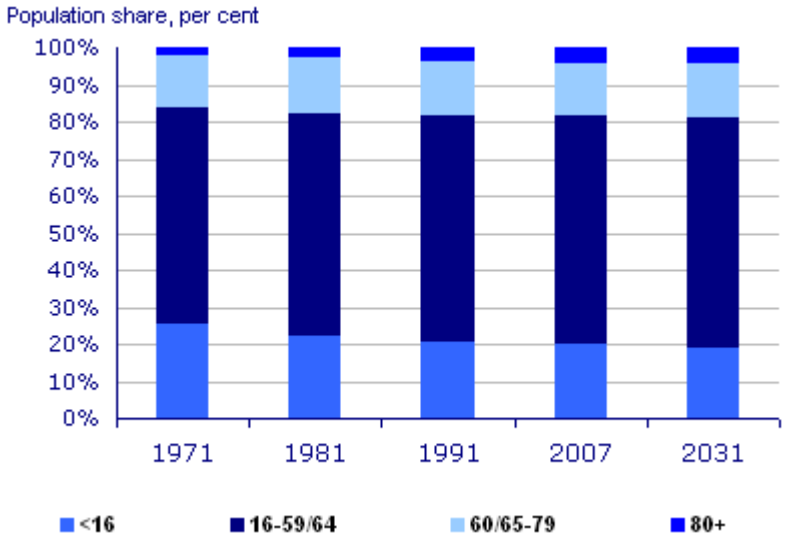
[3] The UK is the context of focus of this research

2007 - up from 12,928,071 the previous year. Average growth in the population aged over state pensionable age between 1981 to 2007 was less than one per cent per year; however, between 2006 and 2007 the growth rate was nearly 2 per cent. The fastest growing age group in the population is those aged 80 years and over whom currently constitute 4.5 per cent (2,749,507) of the total population. This age group increased by over 1.1 million between 1981 and 2007 (1,572,160 to 2,749,507), from 2.8 per cent to 4.5 per cent. This is mainly a result of improvements in mortality at older ages over the second half of the 20th century.

This result is similar to last year's where there was an increase from 55.9 million in 1971 to 60.6 in mid 2006, with the changes again not being even. In 2007, the population aged over 65 grew by 31 per cent, from 7.4 to 9.7 million, whilst the population aged below 16 declined by 19 per cent, from 14.2 to 11.5 million. The largest percentage growth in population in the year to mid-2006 was at ages 85 and over (5.9 per cent). The numbers of people aged 85 and over grew by 69,000 in the year to 2006, reaching a record 1.2 million. This large increase reflects improving survival and the post World War One baby boomers now reaching this age group (Office of National Statistics, 2008). As suggested by the findings,

"Population ageing will continue during the first half of this century. The rise in the proportion of the population aged 65 and over is set to continue as the large numbers of people born after the Second World War and during the 1960s baby boom age. As the baby boomers move into retirement they will be replaced in the working age population by smaller numbers of people born since the 1960s. Even though fertility has risen recently, the number of people being born is still less than was the case in the 1960s" (ONS, 2008).

Figure 2: Population: by age, United Kingdom



Source: Office of National Statistics (2008).

2.2 Information and Communication Technologies and Silver Surfers

2.2.1 Information and Communication Technologies

Presently, new technologies, such as Information and Communication Technologies (ICTs) [4] are viewed as critical tools for the future prosperity and growth of economies and there is a drive from both the public and private sectors to have ICTs adopted and used in daily lives. When considering online interaction and which technology is being used to encourage silver surfers to become interactive, we focused upon the faster internet service known as 'Broadband'. For those unfamiliar to Broadband a very short explanation is offered. Prior to the provision of Broadband, access to the internet was obtained using the telephone line and a modem, which resulted in a much slower internet service (in this report, the term is ***narrowband***).

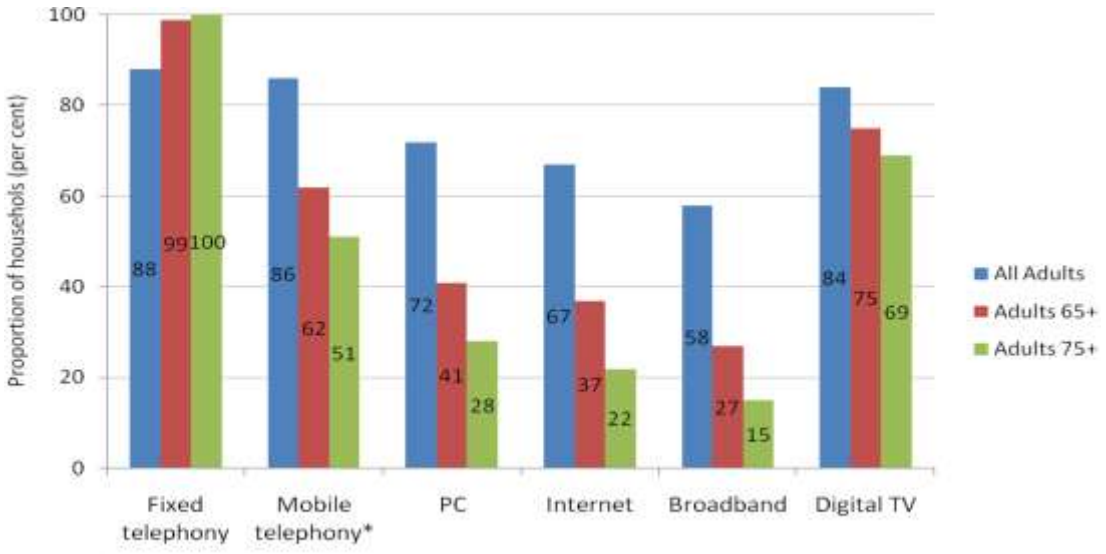
However, as advances in technology occurred, Broadband appeared on the scene. Generally 'Broadband' is considered to be an 'always-on', 24 hours access' technology. However, the definition of broadband varies across countries (Firth and Kelly, 2001) depending upon broadband enabling technologies and the available bandwidth in the last mile (Sawyer, *et al*, 2003). Given the variations in defining 'broadband', for the purpose of this research we follow the technology neutral definition suggested by the Broadband Stakeholder Group (BSG) (2001). This definition is 'technology neutral' (i.e. less to do with technical speed, and focuses on functionality, that is, more to do with what a user can do with broadband.) and focused towards the delivery of services to the end users (Sawyer, *et al*,2003). Broadband is defined as 'always on access, at work, at home or on the move provided by range of fixed line, wireless and satellite technologies to progressively higher bandwidths capable of supporting genuinely new and innovative interactive content, applications and services and the delivery of enhanced public services' (BSG, 2001).

From UK official published figures, it was discovered that although ownership of ICT related artefacts, the internet and mobile phones, was increasing amongst all age groups, it was not so pronounced in the older groups (Figure 3).

"Just over four in ten over-65s (41%) had a PC or laptop in Q1, compared to the UK average of 72%, while 37% had internet access at home against an all-adult average of 67%. The difference was even more apparent with broadband, where those aged over 65 were less than half as likely to have a home connection (27% compared to the UK average of 58%). For all of these services the figures became even more pronounced when looking at the over-75 age group. Almost all of those aged 75 or older had a landline at home and just over half (51%) said that they personally used a mobile phone, while seven in ten said that they had digital TV. Over a quarter (28%) had a PC or laptop but only 22% had home internet access and this fell to 15% with a broadband connection" (Ofcom, 2008).

[4] Examples of ICTs include broadband (the offering of a faster internet service), personal digital assistants, such as, blackberries and mobile telephones

Figure 3: Take-Up of Communications services, by age



*Note: *Data for mobile penetration refer to the proportion of people who personally use a mobile phone*

Source: Ofcom (2008)

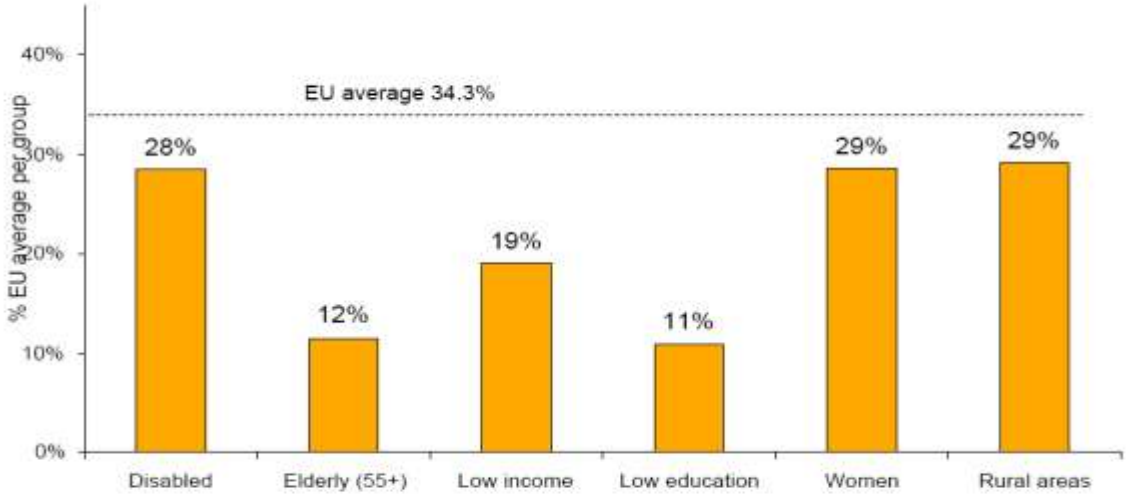
Further, the Office of National Statistics (2007) noted:

"*Household adoption of ICT has been rapid, particularly among the young and those in the labour market, but much slower among older people. In 2006, 55 per cent of people aged 50 or over in Great Britain had not used a computer in the previous three months. For those aged 16 to 30, the figure was 13 per cent. ICT ownership and use is also closely linked to household* income. *While more than 90 per cent of households in the highest income group in the UK had Internet access in 2005–06, the figure for those on the lowest incomes was under 20 per cent (Office of National Statistics, 2007)."*

In more recent statistics in 2008, 16 million households in Great Britain (65 per cent) had Internet access. From the last year this is an increase of just over 1 million households (7 per cent) and 5 million households (46 per cent) since 2002. Within 35% of households with no access, there was an increase in the proportion that said they did not want the internet at home, from 3% in 2006 to 24% in 2008. The survey also found that the better educated were more likely to be online. The ONS said that 93% of adults aged under 70 who had a university degree or equivalent qualification had internet access. This compared with just 56% of those with no formal qualifications being online.

Whilst the above can be considered more of a UK perspective, such trends are also emerging in Europe. In Figure 4 it can be seen that internet penetration is lowest amongst the elderly, lowly educated or low income people; thereby confirming that socio-economic factors are important when considering the digital inclusion/digital divide issue.

Figure 4: Internet Penetration by Socio-Economic Groups



Source: Kaplan (2005)

Selwyn (2004) reminds us that 'the silver surfer' "discourse" reinforces the notion that older adults stand to benefit from ICTs in various ways, and that the ability to make use of new technology is a ready way through which to bridge the generation gap' (p.3). There remains an ongoing debate about whether this is the case.

Selwyn (2004) also explored the reasons and motivations underlying older adults' adoption or non-adoption of ICTs, as well as the nature of this ICT use and the outcomes of older adults' (non) use of ICTs. The project focused on four local authorities in England and Wales with a sample of 1001 adults. The study found that to conceptualise all older adults as either absolute 'nonusers' or highly empowered silver surfers is misleading, and indeed the latter categorisation is erroneous in many cases.

"These older adults who were using computers were mainly doing so for specific purposes: word processing, keeping on contact with others and generally teaching themselves about using the computer. Older adults' computer use mainly takes place at home and where there is support from immediate family and close relations. Similarly, nonusers are not a homogenous group of disempowered, under-resourced and under-skilled individuals…it was not apparent from our interviews that older adults are not making use of computers because they are alienated from or unable to use new technologies."

It is certainly the case that the rhetoric of the Information Society belies the fact that for many older people dealing with everyday problems does not involve the use of ICTs and as such can and will lead to a digital divide.

Gaved and Anderson (2006) draw attention to the question of overcoming the multiple aspects of the digital divide. Following the work of Di Maggio, *et al* (2001) such multiple dimensions may be identified as access, training, support, skills, purpose and civic engagement. Choudrie, Brinkman and Pathania (2007) looked at the translation of UK national policy at local level, with regard to the impacts of strategies on the equitable distribution of a society in terms of

disadvantaged groups. Their study of local government did find evidence for the reduction of the digital divide but they note that:

"*…the danger does exist that in pursuit of providing an equitable distribution of an esociety, a novel and diverse form of digital divide, a rural and urban diverse ethnic group could occur". (p.1)*

However, although ICTs show much potential for the inclusion of older adults, there is much evidence to suggest that in reality the use of technology is quite an exclusive activity. Madden and Savage (2000), for example, have shown that the probability of internet use declines with the age of the user. Similarly Hamley (2002) notes although the consumption of established technologies increases with age, this is reversed with regard to more 'recent' technologies.

Selwyn is left with a conundrum about whether there should be a correction of 'the 'deficiency' of non-ICT using individuals- whether in terms of augmenting their access, skills or disposition. ***'Should we be reshaping the older adults or should we be reshaping the ICT?'*** The practical barrier to the development of more ICT-based services tailored towards the needs and interests of older adults is that few, if any, companies would be likely to be willing to provide them with ICTs until a ready consumer base exists.

In terms of silver surfers as a sample, it is useful to engage with Ostlund's (in Jaeger 2005) consideration of the stereotypes about older adults and the consequent incomplete picture that emerges when such persons are: '*described in terms of properties and characteristics derived from ageing. (p.26)'.* Ostlund notes that in addition to be defined by age, older people are often defined in terms of physical impairment, social loss, technical illiteracy and/or technology. Essentially the picture of older people as a homogeneous group has guided the technical development for the most part. She notes that the strengths of the established definitions include a changed societal arena (from which old people are excluded), the fact of being oldest, the fact of being treated as old and of course shared generational experiences, but rightly concludes that the overall problems are objectification of old technology users and a '*lack of a deeper reflection of their heterogeneous state (p.33)'.*

Ostlund (2005) goes on to note that lack of heterogeneity itself is reflected by ones health and thus access and ability to use IT. Further there are differences in resources, specifically funding and competence, which shape access to IT. A key factor in this is gender, which is turn affects their economic situation as well as the fact that modern sex roles contribute significantly to different experiences with technology. Additionally, this will all be affected by the supporting infrastructure and expectations surrounding the technology. In addition to the above cluster of factors, there is the fact that the technology itself is not problematised, also noted earlier by Selwyn, in that researchers assume, for example, that older persons (as users) are supposed to fit into the technology. Finally, there is the related problem of generalisation – i.e. the uses of general concepts for design are dependent on the existence of something that can be categorised as normal. But, there isn't a 'normal'. Ostlund concludes that:

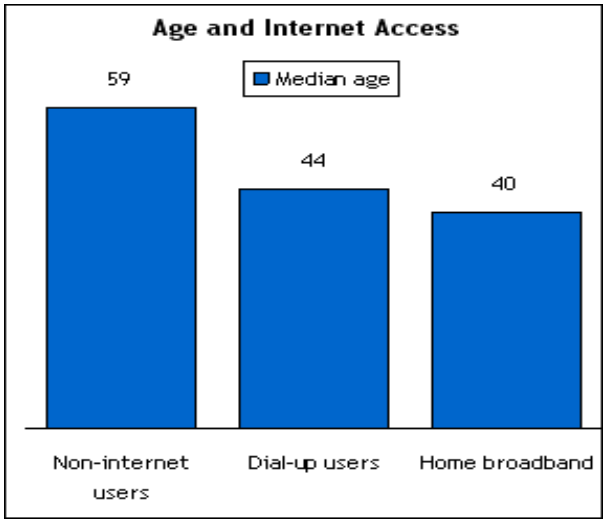
' *…the technological push and the lack of user-involvement that still characterises this field will have serious effects on the understanding of older people's ICT needs and other long-term*

impacts. For this reason a discussion on the definition of the old as users is just the beginning. (p.38).'

2.2.2 Socio-Economic Groups and Internet Use

According to Horrigan (2002) the main reasons for non-use of the Internet, were lack of interest (52 percent), fears about security/pornography (42 percent), cost (30 percent), lack of time (29 percent), too complicated (27 percent), and lack of a computer (11 percent). In a more recent study Horrigan (2007) found that non-internet users as a group are disproportionately old and poor. The median age of non-internet users is 59 (Figure 5). It is not, however, simply a question of money or age. Non-internet users do not have very positive attitudes about information technology. Many report worries about information overload and few link information technology to greater control over their lives. Moreover, non-internet users are apt to see the online environment as a dangerous place–that is, a place with inappropriate or irrelevant content. Given that these non-users are people with worries about information technology and not a lot of extra disposable income, luring them online will not be an easy task.

Figure 5: Age and Internet Access



Source: Horrigan (2007)

From a more global perspective, the OECD found:

"…people over 60, 70 and older are less connected, contributing to an increasing divergence between generations mainly due to an absence of PCs in these households. In the USA, 15% of the population (up from 8% in 2005) over 65 years had access to broadband in 2007 versus 63% of those in the 18-29 age bracket.142 In the UK, in 2006, 84% of people aged 16 to 24 years had used the Internet within the last three months, compared with 52% of people aged 55 to 64, and 15% of those aged 65 and over. In Korea, the broadband usage rate of persons in their 60s and older is around 16.5%. In Japan, generational disparities generally lower with respect to mobile broadband access. (OECD, 2008)"

2.3 Defining Digital divide

Although measures are being taken to offer online products and services, this is also leading to a 'digital divide' that not only extends to the provision of computers and the appropriate infrastructure, but is also linked to ideas of social inclusion and exclusion.

There are various forms of digital divide that have been discussed in academic literature, but recently the OECD (2008) has also noted this:

"*Despite progress in broadband usage and access, certain divides are evident. Household use is often related to income, education levels, gender (males having more access), the number of children (households with children having more access), age and disability. As data for 2006-2007 from Australia shows, use is significantly higher for the age group 15 to 17; people from households in the top two income quintiles; people with higher levels of educational attainment; and the employed"(Australian Bureau of Statistics, 2007).*

As observed above, there are various levels to the digital divide. Our top level definition of the digital divide follows Norris (2001). Norris conceptualized the digital divide as operating on three levels:

- **The global divide** refers to the divergence of internet access between industrialised and developing countries;
- **The social divide** concerns the gap between information rich and information poor in each nation;
- **The democratic divide** signifies the difference between those who do, and those who do not, use the panoply of digital resources to engage, mobilise, and participate in public life.

A basic strategy for overcoming the digital divide has been to provide physical access to computers; but, as Warschauer (2003) clarifies, there are additionally three further aspects with regard to resources: Digital resources (material made available online); Human resources (in particular literacy and education) and Social resources (the community, institutional and societal structures that support access to IT). The aspects that Warschauer (2001) identified as important formed the basis of this research when evaluating and identifying the non-technical and technical factors that lead to the adoption and usage of technology by silver surfers.

2.3.1 Examining Social inclusion

Since the role and importance of ICTs, especially Broadband became evident; governments have been striving to obtain Broadband for all. Governments consider it as being important for citizens and *all* government policies and functions, including social ones. Broadband is viewed as having the
"*potential to streamline the internal workings of government, facilitate the on-line supply of public services and provide access to public sector information and content"* (OECD, 2008).
However, this is an ongoing task, and issues of social exclusion persist.

The UK government definition of social exclusion is as follows:

'a shorthand term for what can happen when people or areas suffer from a combination of linked problems such as unemployment, poor skills, low incomes, poor housing, high crime environments, bad health and family breakdown.' (Cabinet Office, 2000).

But what has been found is that such a definition

" *…is a complex and multidimensional process. It involves the lack or denial of resources, rights, goods and services, and the inability to participate in the normal relationships and activities, available to the majority of people in a society, whether in economic, social, cultural or political arenas. It affects both the quality of life of individuals and the equity and cohesion of society as a whole". (Jermyn, 2001)*

Similarly, Walker and Walker (1997) (p.8) define social/exclusion as:

The dynamic process of being shut out, fully or partially, from any of the social, economic, political or cultural systems which determine the social integration of a person in society. Social exclusion may, therefore, be seen as the denial (or non-realisation) of the civil, political and social rights of citizenship.

As Adams and Fitch (2006) note, not having access to technology is often seen both as part of the inclusion/exclusion problem and part of the solution by enabling access to information resources through different channels. Yet, we argue that by using technology to address an inclusion/exclusion problem, it will also result in moving the problem from one area to another. Their work examined mobile phone use amounts of the young (18-25) and old (retired) and their studies show clear differences between age groups and gender in adoption and use of the mobile telephone. They observed that:

"Social inclusion is multifaceted; it is not an either/or measure and many attributes are subjective and depend on context. Social inclusion for mobile access is also closely linked to deeply embedded structures within society, such as those traditionally associated with gender. Technology may be changing these structures; indeed, age may be the new gender. The family or social unit may also be a useful entity to consider in the exclusion debate. Technology is being used to address social exclusion; however, we suggest that while some leveling may result, there may also be different social exclusion fronts emerging."

2.3.2 Governments and Social Inclusion

Whilst the above is a theoretical perspective of social inclusion, there is also a political impetus to the subject. To ensure that all citizens in a country have access to technology, to achieve social/digital inclusion and to show a clear vision to all, Governments have formed and implemented policies and also undertaken programmes to encourage awareness and usage amongst citizens. An example is the launch of the eEurope Action Plan in 2002 that places digital inclusion at the top of the EU policy agenda. Alakeson et al (2003) in their report for the EU on Social Responsibility and the Information Society made a number of recommendations

for government, for business and for further research. With regard to the latter, they identified a need for greater understanding of digital inclusion, and in particular, identifying the factors that enable people to move up and down the digital ladder. They acknowledge that there is already evidence of a payoff to commitment to digital inclusion. For example:

Household internet penetration in the EU has increased dramatically from 18.3% in March 2000 to 34.3% in December 2001(European Commission,2002a: Raban et al 2002). But, this positive headline masks various discrepancies in uptake. Household internet penetration in the Netherlands is over 65% and rising, in contrast to Greece where it has fallen last year to below 10%.....Similarly, internet penetration among other traditionally disadvantaged groups – the disabled, the elderly, and the poorly educated- falls far below the EU average. (Alakeson et al, p.25).

An example of policies used to overcome the digital divide further away from the UK and Europe which has led to increasing success and obtained a leading position for a country in terms of broadband use, is the case of South Korea.

"*The South Korean government used a variety of promotion policies designed to boost Internet use amongst the population. These measures included IT literacy and Internet literacy programmes targeted at particular populations such as housewives, the elderly, military personnel, farmers and socially excluded sectors such as low-income families, the disabled and even prisoners. The government set up the "Ten Million People Internet Education" project in June 2000 to provide Internet education to 10 million people through a range of programmes. This promotion activity contributed to the nationwide Internet boom, with 3.4 million people including one million housewives being provided with basic Internet skills by December 2000 (MIC, 2000).*

Amongst the programmes for computer and Internet literacy, the one for housewives is an interesting example for its success and impacts. The MIC set housewives (married females not in employment) as one of its main targets. Government subsidies were granted to private IT/Internet training institutes for training housewives, which allowed the housewives to undertake Internet courses at an affordable price. The programme was a success and created an Internet boom among housewives. The rationale for targeting housewives was that they controlled the household budget and had an influence upon the purchasing decisions made by the families. Policy makers believed that without the housewives' commitment to the Internet, its diffusion among households could be retarded. Most importantly, the programme identified the shared feeling amongst the housewives of "being left behind" or "being ignored by their own children", and thereby stimulated a hidden demand for the Internet, particularly for its use in their children's learning (Lee et al., 2003)."

In the UK the digital divide is considered an important issue, but has not been undertaken on a government and policy level to the same extent as the case cited above. Instead initiatives at a more local level have occurred and led to a narrowing of the digital/social inclusion gap. Nonetheless, to encourage e-services adoption amongst citizens, the UK Government has pioneered projects using UK online centres, Learn Direct, and Wired up Communities, as well as valuable local initiatives (Jones and Crowe, 2001, pp vii). Local initiatives include, People's Network, which was a scheme offered by the local governments using lottery provided funds,

within public libraries. This scheme offered access to the internet and computers to the citizens. Additionally, the Government has created Directgov (www.direct.gov.uk), an online portal that allows citizens to access services offered by Government from a centralised location. As Selwyn and Craven (2008) found: *"ICT has fallen significantly down the agenda of more recent strategies, largely as a result of the success of regional campaigns to promote access to broadband services".*

A key principle of the UK e-government initiative is to socially include all citizens into the modernisation process. This includes members of society who are poor, disabled, and unemployed, ethnic minority groups, young, old and the educationally and culturally deprived (Hicken, 2004; Crown, 2004).

The UK Government has been supporting the pledge in the following ways.

- In 2007 it was found that at least £424m of mainly UK government money was currently invested in projects that promote digital inclusion or that could be leveraged to do so (Digital Inclusion Team, 2007). However, the Digital Inclusion team (2007) thought that such an amount was not enough for such an important issue and identified government initiatives, which are shown in Table 1.
- A Social Exclusion Unit being established by the current (Labour) government in 1997 to examine and develop policy dealing with social exclusion. One of the Policy Action Teams-PAT 15, was focused on looking at ICTs and social exclusion with the goal "to develop a strategy to increase the availability and take-up of information and communications technology (ICT) for people living in poor neighbourhoods"[5]. The team commissioned reports on a number of issues, including, women, race, disability, White Males with manual backgrounds, and current ICT use in deprived areas. A final report with findings and recommendations was presented in February 2000.
- Recently (2008) a new ministerial position to combat the digital inclusion issue has been established. The Secretary of State for Wales, Mr. Paul Murphy attained the position in January 2008 and is attempting to overcome the issue. This move has also obtained the formation of a cross-sectional cabinet committee and a Digital Action Plan to overcome the digital/social inclusion gap.

Table 1: Digital Inclusion and Related Government Policies

Potential to Impact Digital Inclusion	**Yes**	**Digital Strategy (DTI)** **i2010 – European Information Society (DTI)** **Inclusion Through Innovation (former ODPM)** **Home Access Taskforce (DfES)** **Third Sector Strategy (Cabinet Office)** **Future Builders/ Capacity Builders**	**Digital Switchover (DCMS)** **Transformational Government/ Varney Review (Cabinet Office/HMT)** **Social Exclusion Action Plan (SEAP)** **Skills for Life/ Leitch Review (HMT/LSCs)** **Health Whitepaper covering Telehealth and Telecare (DoH)**

[5] http://www.cabinet-office.gov.uk/seu/2000/Compendium/15.htm

	(Cabinet Office) **Invest to Save (HMT)** **Government Data Sharing Strategy** **(DCA/ Cabinet Office)**	**Local Government Whitepaper** **(CLG)** **Link Age (DWP)** **National Action Plan on Social Inclusion**
No		**Together We Can (DCLG)** **Every Child Matters/ Green Paper on Children in Care (DfES)**
	No	**Yes**

Potentially Impacted by Digital Inclusion

Source: Digital Inclusion Team (2007)

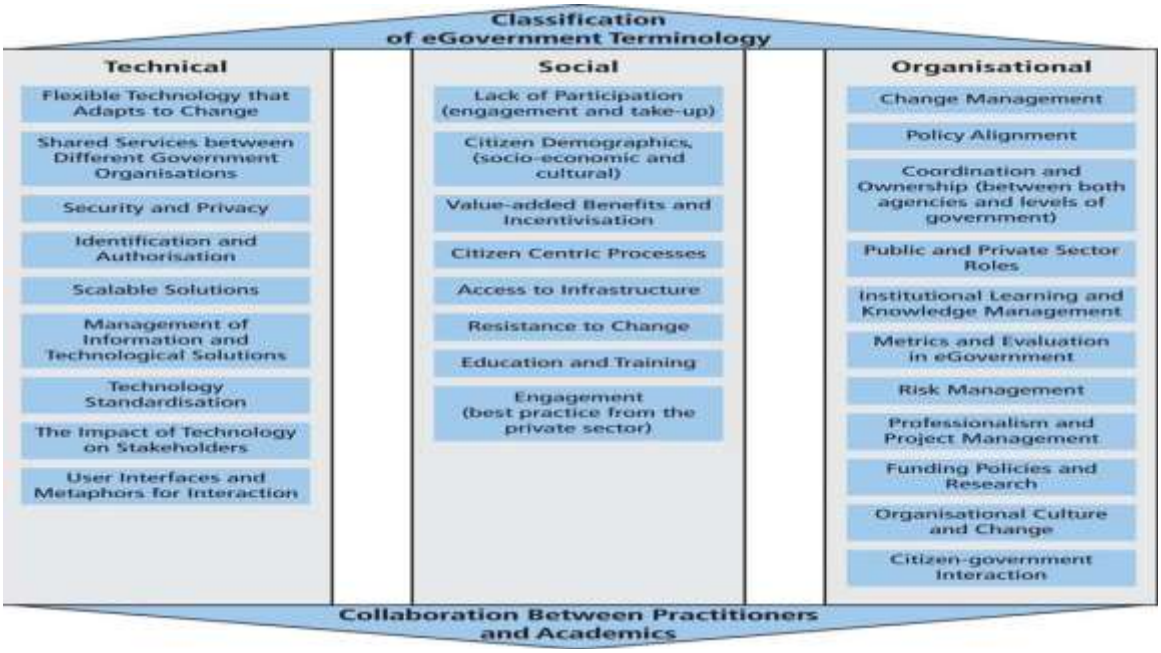
However, such efforts are still not being considered enough. Despite all efforts, provisions for the elderly are still low. As found:

"Absolutely no progress has been made in getting older people online and the spotlight is now on Government and the industry to get switched on," said head of policy, *Help the Aged* (BBC, 2008)**.**

2.4 Methodology Used to Evaluate Technical and Non-Technical Factors

When considering technological and non-technological factors of technology adoption, this research applied a particular evaluation method. An initial understanding was formed by referring to an evaluation study by Elliman et al (2007). Elliman et al (2007) developed a framework from a technical, social and organizational perspective. This framework differs from this research in that it does not emphasize the silver surfers, but does investigate e-government and its application from the citizens' perspective.

Figure 6: Classification of e-Government Technology



Source: Elliman et al (2007).

However, whilst research studies such as Elliman et al (2007) have resulted in the development of frameworks, there have been others that have adopted a different perspective. This has resulted in the formation of a deeper and richer understanding by using an ethnographic and experimental approach (Reed and Monk, 2004).

An evaluation study that was considered useful for this research project was a framework that has been developed by Clegg et al (1997). The evaluation studies that they undertook focused upon the factors that obtained the implementation and development of technology and the role of human and organizational factors, political, management and end-users in the performance of technology. The research approach involved interviewing end users and managerial level staff. This research also adopted similar approaches and attempted to identify how policies, technology, or social factors lead to the social inclusion or differences in the digital divide of silver surfers.

3. Research Approach

The approach taken to the study was a multi-method approach to data collection. This was appropriate given the multi-faceted nature of the aims and the target sample group. We also began with the intention of examining only the UK (due to Citizens Online) but we quickly learnt that there are factors to consider for the aim that examined the factors leading to online interaction. Consequently, this led to the research widening to include silver surfers end-users from both the categories of OECD and non-OECD countries. For this an online survey that contained close-ended, Likert scale questions was used. The analysis of the online survey was undertaken using the statistical package SPSS.

The first part of the research involved a literature review. This was to inform the research team of the theoretical aspects and also the policies and definitions to use within this document. An extensive literature review of almost 80 published reports and archival documents was conducted.

To determine the support programme provided by Citizens Online and Microsoft, a series of pre-determined questions, semi-structured interviews were conducted with individual representatives of Citizens Online. The qualitative data (interviews) were either telephone or face-to-face and recorded using a Dictaphone and hand written notes. The results were then analysed utilizing a grounded theory perspective.

3.1 Age, Income, Gender and Educational Qualifications of the Online Respondents

An online survey open to all respondents was posted using an application (Survey monkey) for 3 months. We did not restrict our survey to the silver surfers only. This obtained a good response rate of 650. Within this broad sample, 123 of the 650 respondents were 50 years and above. Henceforward, this particular age group will be referred to as "Silver Surfers". The age distribution of the latter group is as follows:

Table 2: The Age Distribution of Silver Surfers

Age Band	Frequency
50 – 54 years old	49
55 – 64 years old	52
65 – 74 years old	19
75 - 85 years old	3
	Total: 123[6]

[6] Of the 650 responses 123 were applicable to the 50 years and above categories and are distributed as shown in the table.

Within this particular age group, 22 respondents lived in non-OECD countries (mainly India and Malaysia) and 101 respondents live in OECD countries (mainly Britain).

When referring to *gender* distribution, we encountered some missing data. More specifically, 10 respondents refused to or failed to disclose their gender. This practically meant that the effective sample size was reduced to 113 with 70 respondents being male (62%) and 43 being female (38%).

The highest educational level category of the "Silver Surfers" appeared to be high. The greater majority of this particular group held either the qualifications of a degree or postgraduate degree. Of the 113 respondents, 3 respondents did not provide any information on their educational attainment. This reduced our effective sample to 110 respondents. The final distribution of the 110 respondents is as shown.

Table 3: The Educational Level of Silver Surfers

Highest Educational Attainment	Frequency
GCSE (SPM)	5
A Levels (STPM)	2
GNVQ / Diploma (Diploma)	13
Degree	40
Postgraduate (Masters/PhD/DBA)	50
	Total: 110

The majority of the "Silver Surfers" seemed to earn an annual labour income in the region of 50,000 Euros. However, 12 respondents (out of 110) failed to provide any information on their income and as a result; the effective sample size was reduced to 98 respondents. Also, the missing values were deleted, which resulted with our effective sample size consisting of 98 respondents. The new distributions are as follows:

Table 4: Income Levels of Silver Surfers

Income pa in Euros	Frequency	%
<10,000	1	1.02
10,000-19,000	10	10.20
20,000-29,000	5	5.10
30,000-39,000	8	8.16
40,000-49,000	12	12.24
50,000-59,000	12	12.24
60,000-69,000	6	6.12
70,000-79,000	12	12.24
80,000-89,000	7	7.14
90,000-99,000	4	4.08
100,000-109,000	12	12.24
110,000 ++	9	9.18
	Total: 98	

Table 5: Age Ranges of Silver Surfers

Age Band	Frequency	%
50 – 54 years old	38	38.78
55 – 64 years old	42	42.86
65 – 74 years old	17	17.35
75 - 85 years old	1	1.02
Total: 98		

Table 6: Educational Qualifications of Silver Surfers

Highest Educational Attainment	Frequency	%
GCSE (SPM)	5	5.10
A Levels (STPM)	1	1.02
GNVQ / Diploma (Diploma)	12	12.24
Degree	38	38.78
Postgraduate (Masters/PhD/DBA)	42	42.86
Total: 98		

Table 7: Regions of Silver Surfers

Region	Frequency	%
Non-OECD	20	20.40
OECD	78	79.60
Total: 98		

3.2 Supporting the Survey responses

To support the online survey findings we contacted some of the silver surfers located in the OECD and non-OECD regions. We wanted to ensure that not only the survey's perspective was used as this would lead only to a surface understanding. This would mean that that there would not be a deep and rich understanding of the issues of this research. For this purpose, we used both interviews and e-mail.

3.2.1 Interview Respondents Details

For the interviews we had 14 participants-8 female and 6 male. All of them were retired, from the OECD countries and the 65-74 years old groups. The females were educationally qualified as follows: 2 degree holders and 6 GCSE qualified individuals. Of the male respondents, 2 were degree holders and 4 GCSE holders.

Table 8: Details regarding the Interview respondents

Gender	Age	Education	Frequency	Region
Female	**65-74 years old**	**GCSE (SPM)**	**6**	**OECD**
Female	**65-74 years old**	**Degree**	**2**	**OECD**
Male	**65-74 years old**	**GCSE (SPM)**	**4**	**OECD**
Male	**65-74 years old**	**Degree**	**2**	**OECD**
Total			**14**	

3.2.2 E-Mail Respondents Details

Due to distance and summer vacations, not all the respondents could be interviewed. In such instances, e-mail was used to confirm and understand the survey results. For e-mail mode we had 6 more respondents-3 males and 3 females. There were 2 participants from the OECD countries and 4 from the non-OECD category. There was 1 male, postgraduate degree holder and 1 female, degree holder. Both were from the OECD countries.

Table 9: E-mail Respondents Details

Gender	Age	Education	Frequency	Region
Female	**55-64 years old**	**GCSE (SPM)**	**1**	**Non-OECD**
Female	**65-74 years old**	**GCSE (SPM)**	**1**	**Non-OECD**
Female	**75-84 years old**	**Degree**	**1**	**OECD**
Male	**65-74 years old**	**GCSE (SPM)**	**2**	**Non-OECD**
Male	**65-74 years old**	**Post-Graduate (Masters/PhD/DBA)**	**1**	**OECD**
Total			**6**	

4. Findings of this Research

4.1 Types of Internet Connections

As there are various forms of internet access, we designed our questions accordingly. In this section to form the distinctions between those who have broadband and no broadband, the terms narrowband and broadband are employed.

4.1.1 Narrowband Users and No Internet Connections at Home

Following all the cleansing of the data our survey obtained results for 98 "Silver Surfers" i.e. people beyond the age of 50. 86 respondents stated that they had Broadband at home, three answered that they had Narrowband at home while nine said they had neither Broadband nor Narrowband at home. The latter group consisted of seven females and two males. Regarding the regional distribution of the latter group seven respondents (five females and two females) resided in non-OECD countries (four in India and three in Indonesia) and two respondents (both females) resided in England. The majority of the respondents who did not intend to use the internet at all are above 65 years old. This particular group appears to be quite wealthy since their average income is more than 60,000 Euros a year. When considering the educational attainment of this particular group only one female, aged greater than 75 years old lives in England and has a GCSE qualification, one male and one female held Diplomas and the remainder hold higher or postgraduate degrees.

When considering the Narrowband users, two users resided in OECD countries (England and Australia) and one in India. They were all males and aged more than 65 years old. Their average income was more than 60,000 Euros and two had a higher degree whilst the Australian male possessed a postgraduate qualification.

Respondents with no internet connection at home seemed to access the internet in the University (which is their workplace) and one in the Internet Cafe. However, only four respondents provided an answer. With the remaining five it was assumed that they did not have any access to the internet.

A natural question that emerged in our minds was whether people with no internet connection or Narrowband connection at home had any intention of adopting Broadband in the near future. This is vitally important due to governments around the globe pushing for broadband implementation and online products and services. Table 10 summarises their intent.

Table 10: Broadband Propensity

Respondents with no internet connection at home: **9**	**Respondents with Narrowband connection at home:** **3**
Number of Respondents with no internet connection at home intent to adopt Broadband: **2** **When?** **Three months to one year**	**Number of respondents with Narrowband connection at home intent to adopt Broadband:** **3** **When?** **Three months to one year**

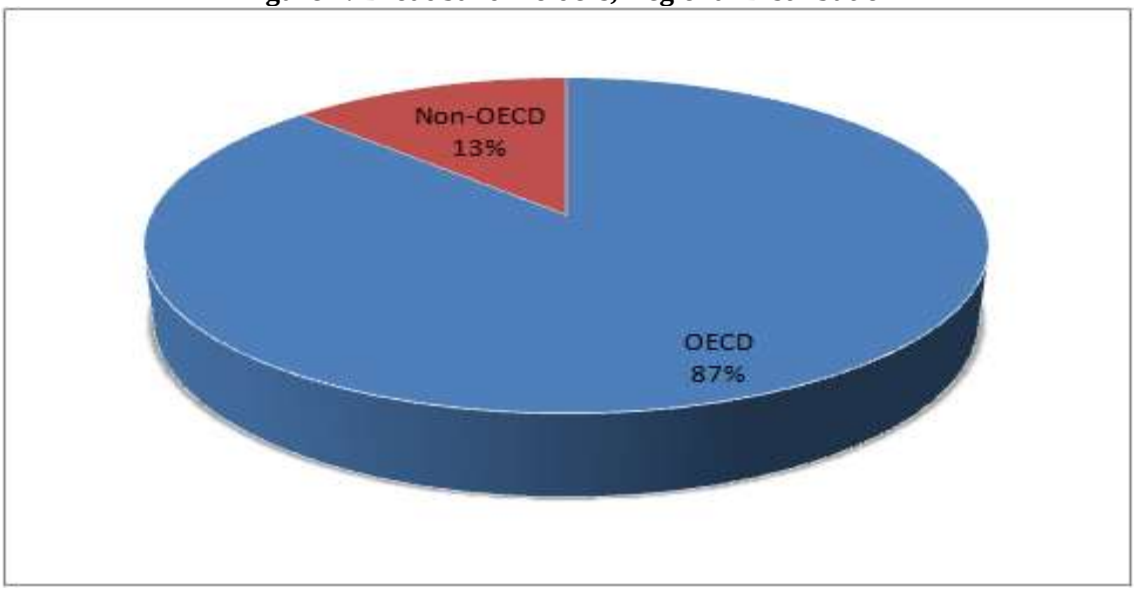
Lack of knowledge seems to be the most important factor discouraging potential internet users but we cannot make any firm conclusion since only one person provided an answer.

4.1.2 Broadband Holders Connections at Home

This section concentrates on the respondents who have a Broadband connection at home. The purpose of this section is to uncover their characteristics together with the factors that led to the embracing of Broadband at home.

As mentioned above 86 respondents stated that they have Broadband at home. From our results, the majority of them resided in OECD countries. For further information, Figure 7 illustrates the regional distribution of the Broadband holders.

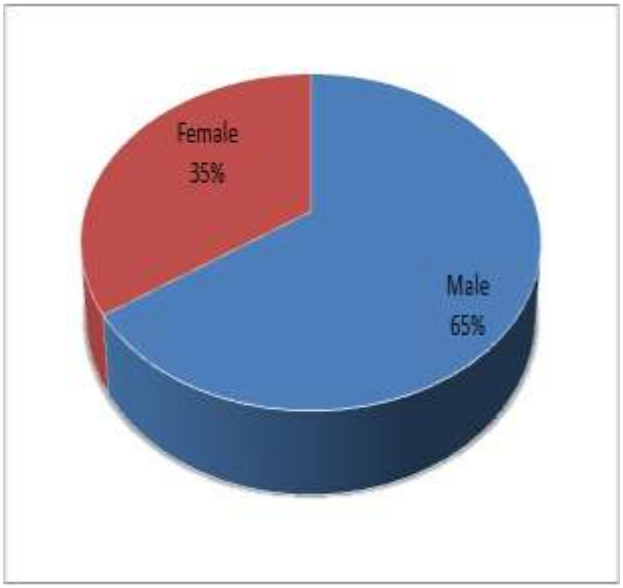
Figure 7: Broadband Holders, Regional Distribution



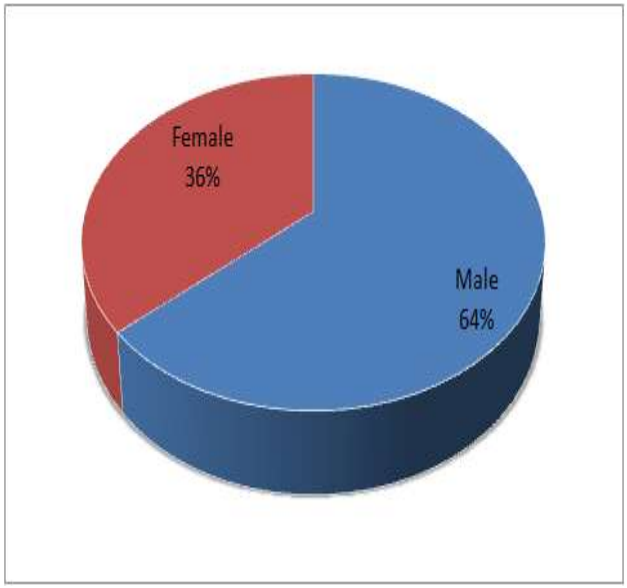
The non-OECD Broadband holders resided in Malaysia (5), India (3), Egypt (1), Bahrain (1) and Tanzania (1). The OECD Broadband holders resided mainly in Britain (England). The latter sub-group accounts for 83% of the OECD residents in our sample. The remainder reside in Europe (France, Greece, Italy, Norway and Spain) as well as in the United States of America and Canada.

Figure 8: Broadband Holders, Regional Distribution by Gender

OECD Countries

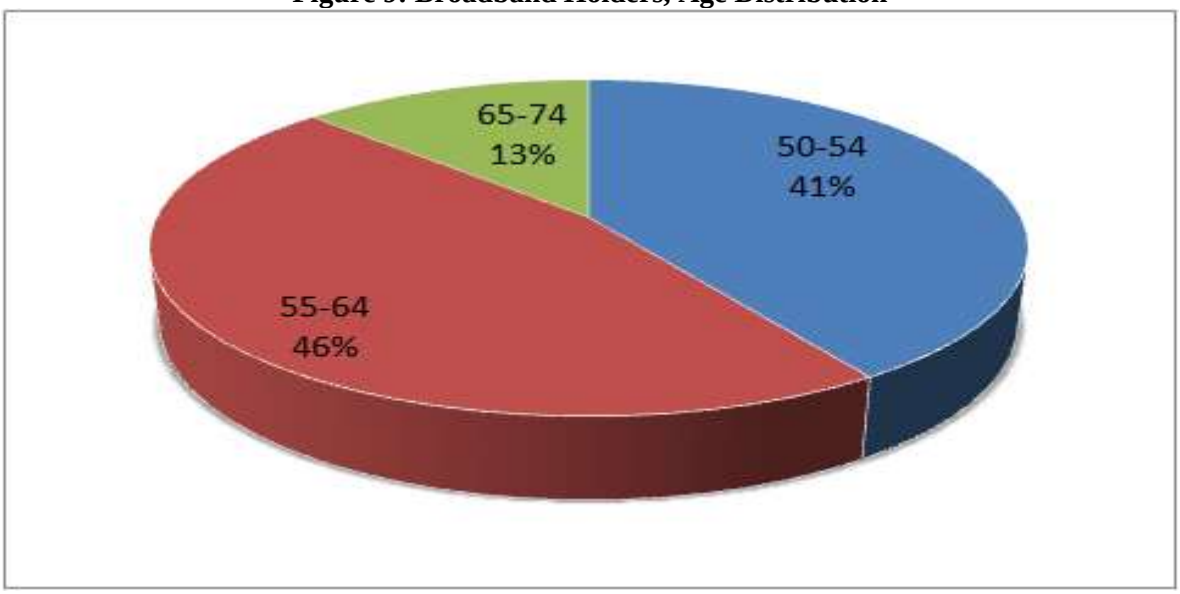


Non-OECD Countries



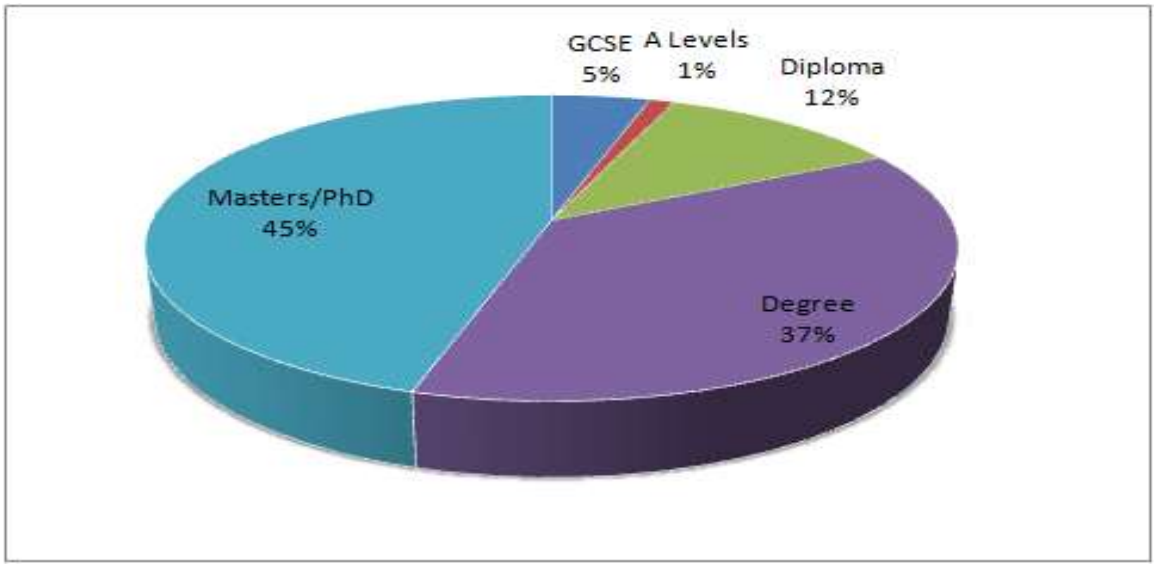
The gender distribution of Broadband users appears to be male dominated-65% are males. The regional distribution by gender produces a similar result (see Figure 8).

Figure 9: Broadband Holders, Age Distribution



The larger majority of the people beyond the age of 50 and who had Broadband ranged between 55 and 64 years old (see Figure 9). People beyond the age of 74 did not appear to use internet at all. Respondents residing in non-OECD countries emerged in the 50-54 categories (73%) and the remainder appeared in the 55-64 categories. Hence the 65-74 categories consisted of people residing in OECD countries.

Figure 10: Broadband Holders, Educational Attainment

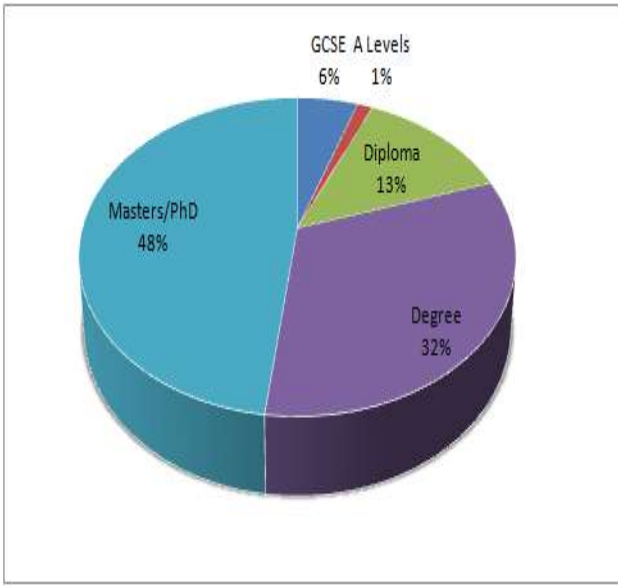


The educational attainment of the "Silver Surfers" is considerable. A large proportion of this group hold higher or highest degree [Undergraduate/Masters/PhD/Research degrees]. This is not surprising as this particular group specialise in jobs that require high levels of education (Universities, researchers, senior managers). Even the retired individuals have had similar jobs given their reported annual income. Figure 10 decomposes our respondents into five educational

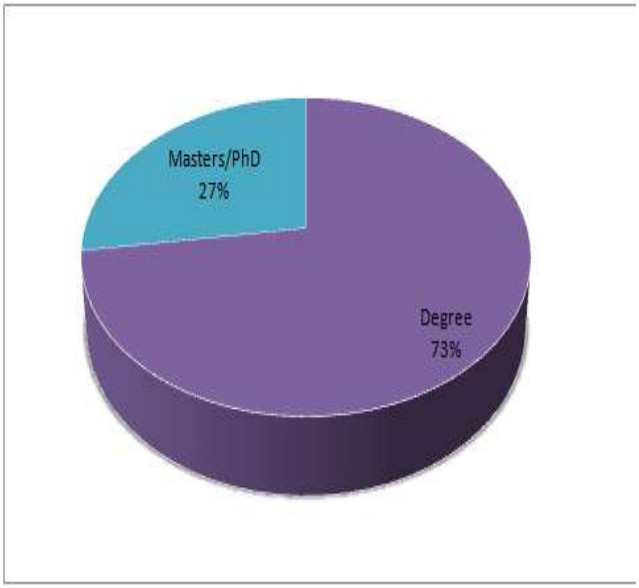
categories. As is evident, the overwhelming majority of the Broadband holders attained high levels of education.

Figure 11: Broadband Holders, Educational Attainment by Region

OECD countries

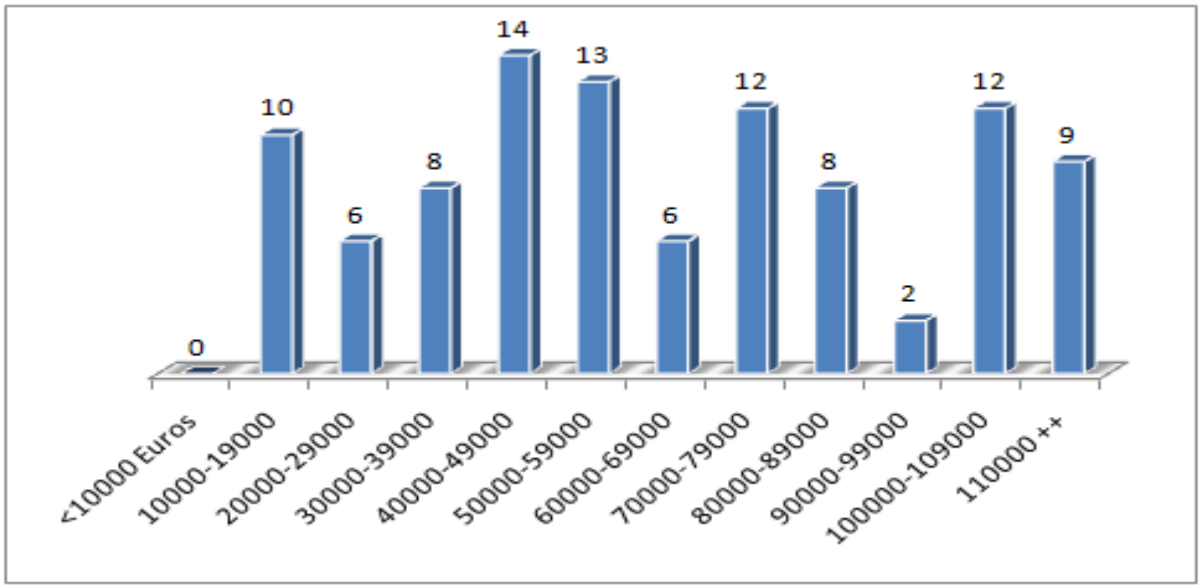


Non-OECD countries



As stated earlier, our sample was distributed into OECD and non-OECD countries. After separating the sample into the latter categories, there were some noticeable distribution changes (Figure 11). In comparison to OECD countries the non-OECD respondents possessed only higher or highest qualifications.

Figure 12: Broadband Holders, Annual Income per annum - *Percent*



When referring to annual income distribution, it is revealed that the "Silver Surfers" earn considerable income levels a year (See Figure 12). As mentioned above, given their nature of the jobs this finding comes as no surpise.

The results did not change dramatically even when the sample was regionally decomposed. However, it is worth making a note of the income allocation in non-OECD countries (Figure 14). The greater majority earned more than 100,000 Euros a year. This is in line with our findings obtained from e-mail exchanges with some participants in non OECD countries. For example:

"We do not have broadband for private people like in my home etc...even your Uncle's office does not have full broad band, he has just above the lowest range....Only very few big organizations have the full broad band....So even to open your website is not very easy on my computer but I have asked many to assist you in filling your survey" **(Female,56, non-OECD).**

Figure 13: Broadband Holders, Annual Income per annum OECD – Percent

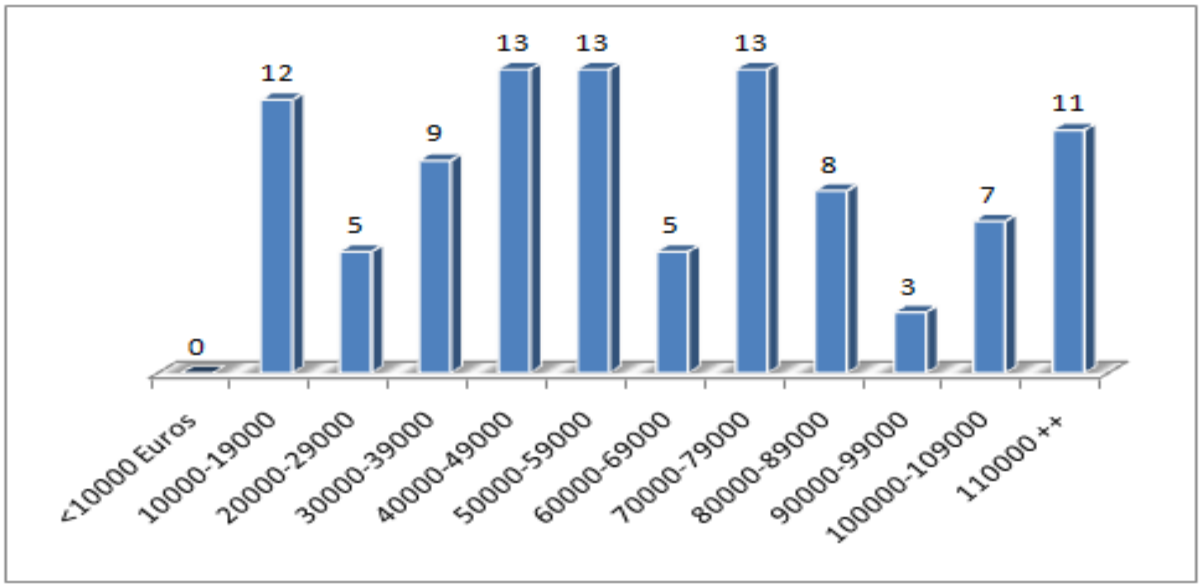
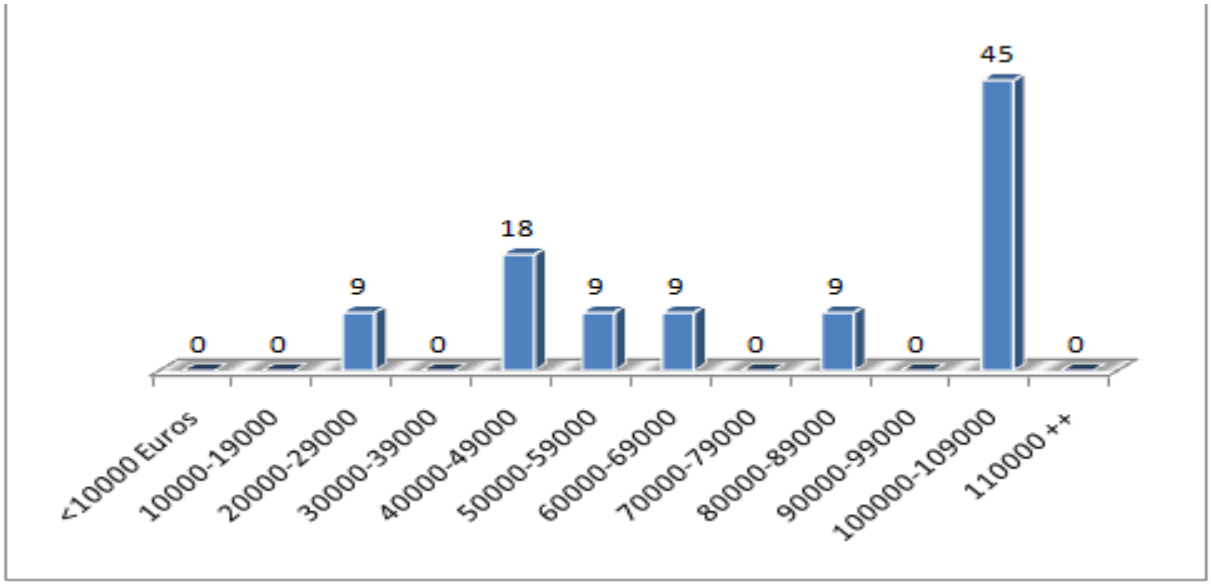


Figure 14: Broadband Holders, Annual Income per annum Non-OECD - Percent



4.2 Findings regarding Technical and Non-Technical Aspects

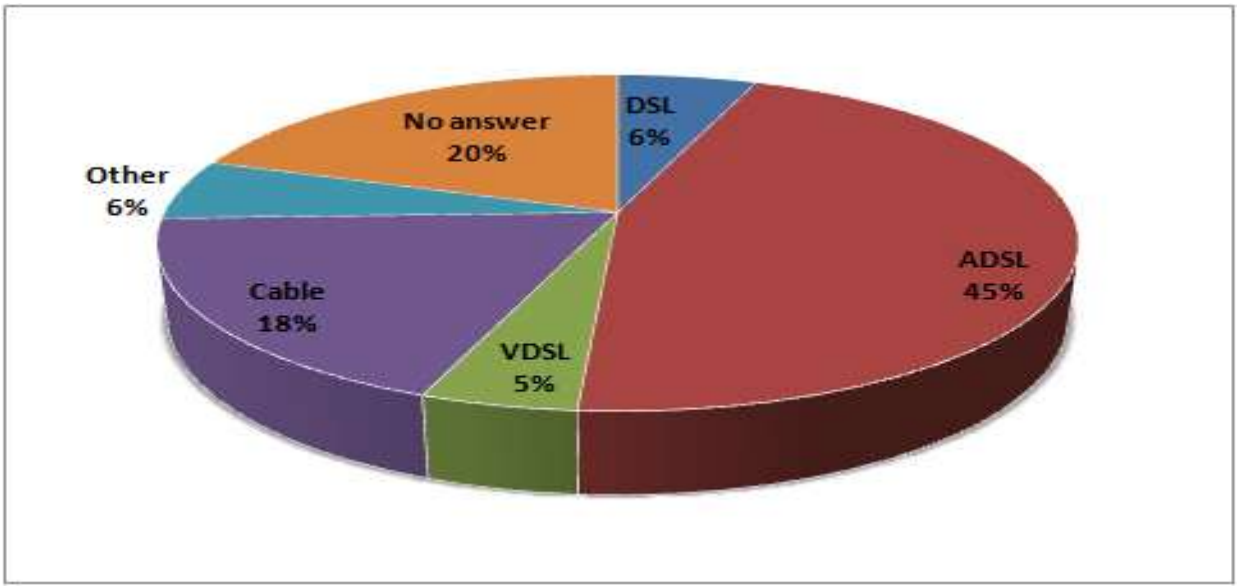
Aim of this Research:

Do Technical Factors Lead to Online Interactions? What technical information related information can lead to Online Interactions?

One of the main aims of this research is to determine what technical factors lead to silver surfers' online interaction. For this, a small number of the survey questions asked respondents about the technical nature of broadband. However, as the participants ranged in terms of education qualifications we had to have simple, technically focused questions. For this purpose, we asked respondents about the types of broadband that they were using, which was answered to a large extent.

With reference to the technical characteristics of Broadband, those having Broadband at home seemed to have a preference for 'ADSL' followed by 'Cable' (see Figure 15). In non-OECD countries, the ADSL share is even more prominent as it is the preferred mode -73%.

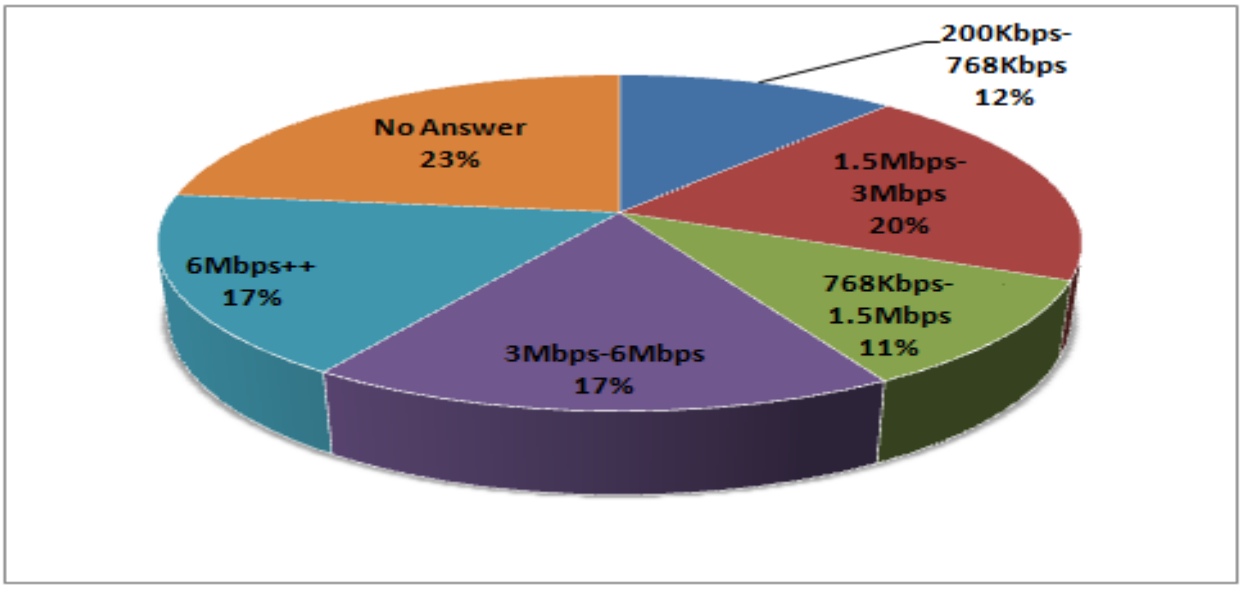
Figure 15: Types of Broadband in terms of Broadband Holders



On the other hand, when identifying the Broadband speed, the distribution is more even with 1.5Mbps to 3Mbps being the most popular speed (see Figure 16). In the non-OECD countries, three quarters of the Broadband holders used 200Kbps to 768Kbps.

A point to note is that although respondents offered replies about the speed, many were not entirely confident about the true speed as they felt that they were obtaining a lesser speed than they were paying for.

Figure 16: Broadband Holders, Speed of the Broadband



From this research there was an important lesson to learn. Although questionnaires can obtain required answers, they may not provide a deep understanding of the actual reality and for this purpose the face-to-face, telephone and e-mail exchanges were important. In the above two figures we found that respondents can answer questions relating to the types of broadband that they have. However, it is only from our qualitative data that it became evident that when an individual is first introduced to a computer, the technical factors are not issues of importance.

From our interviews with the members of Citizens Online we learnt that when silver surfers first attend a taster session the information initially relayed to them refers to very basic items associated with the computer. For instance, the participants are explained about a mouse. That is, they are explained that the mouse is not a small rodent, which is what one not familiar to a computer would immediately think of. Instead illustrations of the mouse are shown to the users and explanations are provided by the trainers (Figure 17). There are also handouts that the silver surfers take home and an illustration is shown below (Figure 18). However, from these conversations and also from the findings of the online survey it can be learnt terms such as ADSL would not be appropriate when first introducing a silver surfer to the computer or Internet. The type of broadband that one has may be something that a silver surfer may never know. It depends upon one's own interest.

Figure 17: Handout explanations of a computer provided to silver surfers at Citizens Online

Hardware
A Personnel Computer (PC), is made up of many different components which operate together to perform different tasks simultaneously, some of which you won't be aware of as a computer user. The main PC components are described below.

The term hardware refers to the physical components of your computer such as the base unit or system unit, mouse, keyboard, monitor, disk drives etc.

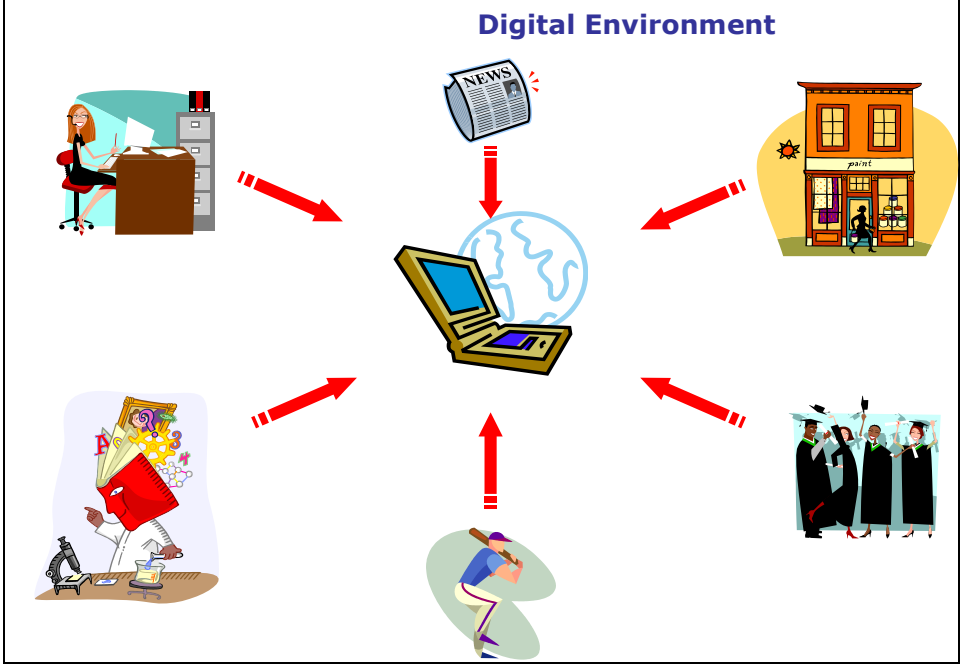
Input Devices

Mouse
The mouse is used to control Windows and application software. It is better used with a mouse mat to help the mouse glide over the surface. There are two main types, ball and optical. The optical type has less mechanics and is not so prone to collecting dust. There are also cordless types available which use radio or infrared to communicate with the PC. Track balls perform a similar operation to the mouse.

Source: Citizens Online

Figure 18: An example of the handout given to the silver surfers

We are surrounded by technology at home, at work and at play. We take things for granted, which 50 years ago or more would have been a luxury item, e.g. cars, washing machines, telephones, microwave ovens etc. Computers are just another machine that can help to enrich our lives. It enables us to access the Internet and big adventure within – the digital environment. The Internet is the world's biggest office, newspaper, department store, college, sports stadium, encyclopaedia, community centre etc.



Source: Citizens Online

4.4 Evaluation of Factors

After examining the general characteristics of the respondents aged 50 and above, we examined the factors that led to Broadband adoption.

Since the purpose of this research is to evaluate the technical and non-technical factors, we used some of the categories that Clegg et al (1997) developed. These are itemised into the factors, technical and social. Due to the time factor Policies were something that we could not ask at this time. Following the identification of the categories we classified these factors into the following categories:

1. Technical factors (Table 11).
2. Work –related factors (Table 12).
3. Household activities factors (Table 13)[7]
4. Entertainment Factors (Table 14)

[7] Household activities are: online shopping, online banking and information search

Table 11: Technical Factors that Led to Broadband-*Percent*

	Faster Access	Always-On Access	Unmetered Access	Free Phone Line
1 Least Relevant		1.16	3.49	13.95
2		2.33	2.33	3.49
3		0.00	4.65	2.33
4	2.33	5.81	2.33	3.49
5 Most Relevant	22.09	15.12	11.63	1.16
No Answer	75.58	75.58	75.58	75.58

Faster access appears to be a decisive factor that will entice people aged 50 and above to connect to the internet at home via Broadband (Table 11). Convenience such as always-on or unmetered access is quite important as well. Given the income of the occupational distribution, it is assumed that this particular group of people already had a landline; hence, the offer of a free landline offered by the Broadband providers is not a vital factor.

Table 12: Work-related Factors that Led to Broadband-*Percent*

	Work Related	Research	Home Business	Government Services	Communication
1 Least Relevant	2.33	1.16	9.30	5.81	1.16
2		3.49	1.16	4.65	1.16
3	4.65	1.16	2.33	2.33	4.65
4	4.65	4.65	4.65	4.65	9.30
5 Most Relevant	12.79	13.95	3.49	6.98	8.14
No Answer	75.58	75.58	79.07	75.58	75.58

Table 12 illustrates another set of factors that led to obtaining Broadband at home. Given the occupational distribution of this particular age group, it is not surprising that research activities were foremost when considering the factors that lead to the adoption of Broadband. Obviously, the latter factor is closely correlated to work-related aspects, which comes second. This particular age group seems to take advantage of the on-line Government services but does not seem to use Broadband extensively for Home business. One explanation might be that not too many people work from home. Finally, communication turns out to be a very important social factor as the two top bands attract a significant combined percentage. Communication in

conjunction with certain technical aspects (see Table 12) appears to be an essential combination that appeals to people aged 50 and above.

Communication is a vital aspect of Broadband that the older participants valued and this was confirmed by an e-mail exchange with one of the female participants:

"My only interest in computers was in e-mailing my daughter in Canada as timing telephone calls is so awkward. Most of my e-mails are actually to my son (in Birmingham) as we just carry on conversations. Also, since I got the scanner we can send each other articles from papers and magazines" **(83 years, OECD).**

Research is also something that is important and another female participant confirmed in the undertaken interview is important and supported the obtained statistical results. However, the research that the participant undertook is related more to the participant's hobbies rather than being work related.

"I use the Internet for getting tutorials on everything from lawnmowers to sheet music. A recent thing that I have also started to do is to read the reviews and story of a movie before I go to view it. I have also used it to get a diet plan set up for my husband. I am using Tesco's diet programme and it appears to be working" **(Female, 74, Music interest)**.

Table 13: Household Factors that Led to Broadband-*Percent*

	Household Activities	Children' Homework
1 Least Relevant		11.63
2	4.65	1.16
3	6.98	1.16
4	2.33	2.33
5 Most Relevant	8.14	3.49
No Answer	77.91	80.23

Table 13 shows the impact exerted by household activities on the decision to use and obtain Broadband. Household activities appear to be quite important but do not attain to very high percentages compared to other activities shown above. Broadband is used for helping Children with their homework, but the latter usage is rather limited.

Entertainment factors such as On-line Games and Movies and/or Music do not seem to carry significant explanatory power as the majority of the respondents deem the entertainment factors the least relevant ones. Table 14 shows the corresponding distribution.

Downloading of music or films was an interesting question and one that we wanted to explore using interviews. *"Do you download music or movies?" was the question that we asked the participants.* One of the respondents, a male, 66, retired, living in Australia and a very keen musician said *"I will look for a site where I can buy music or stay without, but I will not download anything free. I do not want to be arrested for downloading any music or films or bring in viruses into my computer."* This was also confirmed by the retired, keen England based musician female:

"I buy sheet music from sites like play.com or just a trusted site. I will not just buy anything from anywhere. Some of these sites offer cheaper prices if we download and then I will, but only after paying."

When another respondent who also used the Internet (but more for online banking purposes or communication purposes) was asked this question, the reply was:

"I would not know where to begin. My children will get what I want in terms of music. I do not want to get any viruses and also get anything that I do not really want. The Internet is alright for finding good natural medicines, online banking or e-mail. I do not want to go any far than that. The Internet is not always a good place."

An 80 years old female also affirmed this point during an interview.

Table 14: Entertainment Factors that Led to Broadband-Percent

	On-Line Games	Movies & Music
1 Least Relevant	20.93	12.79
2	1.16	3.49
3	1.16	4.65
4		1.16
5 Most Relevant		2.33
No Answer	76.74	75.58

Do Peer Influence*[8], Advertising[9], Availability and Quality of Service make an impact on Broadband Adoption

Apart from technical and social factors there is another cluster of factors that appears to play an important role when it comes to Broadband adoption. These factors are more direct than the ones discussed above as they are more direct and related to family, friends, advertisement and Broadband availability. These factors can be classified into the following categories.

[8] Peer influence are close friends and family
[9] Media

1. The decision to have Broadband at home was influenced by family and friends (Table 15).
2. The decision to have Broadband at home was influenced by advertisements (Table 16).
3. The decision to have Broadband at home was influenced by availability and quality of service (Table 17).

Table 15 illustrates how the decision to obtain Broadband at home has been influenced by family and friends. The results show that a close social circle does not exert a significant influence on the decisions of people aged 50 and above. Similar trends are exhibited by Table 16. This particular age group is not inclined to obtain Broadband due to advertisements or special offers (Table 16).

Table 15: The Influence of Peers-Percent

	Family	Children	Friends
1 Least Relevant	15.12	13.95	15.12
2	2.33	3.49	1.16
3	1.16		2.33
4		1.16	1.16
5 Most Relevant	1.16	2.33	2.33
No Answer	80.23	79.07	77.91

Table 16: The Influence of Advertisements-Percent

	TV	Offer
1 Least Relevant	16.28	9.30
2	1.16	3.49
3	3.49	2.33
4	1.16	4.65
5 Most Relevant	1.16	3.49
No Answer	76.74	76.74

Table 17's distribution follows more or less the same patterns exhibited by Tables 15 and 16. Availability and quality appear to be marginally more significant than the previous factors but not as relevant as the technical or social ones.

Table 17: Broadband Holders and the influence of Availability and Quality of Service-*Percent*

	Availability	Quality
1 Least Relevant	12.79	6.98
2	2.33	4.65
3	1.16	5.81
4	2.33	1.16
5 Most Relevant	3.49	3.49
No Answer	77.91	77.91

USAGE OF BROADBAND BY HOLDERS

This section attempts to identify the how Broadband is being used by the "silver surfers" on a daily basis. To prevent confusion the usage patterns were divided into the following types:

1. Work-related (job) usage (Table 18).
2. Household usage (Table 19).
3. Entertainment usage (Table 20)
4. Personal usage (Table 21)[10].

Table 9 is directly related to Table 12. Recall that the latter Table outlined some possible factors that led to Broadband adoption by this particular age group. The "Silver Surfers" seem to use Broadband for research and the latter was cited as the most relevant reason that led to Broadband installation at home. Work related reasons were very important and this particular age group uses Broadband for this type of service. It was also mentioned as one of the most important factors that led to the group embracing Broadband (see Table 12). "Silver Surfers" do not seem to use extensively Broadband for Government services and/or home businesses and besides they were not cited as the most crucial factors (see Table 12).

[10] Health and security

Table 18: Types of Broadband Usage (Work-Related)-*Percent*

	Work Related	Research	Home Business	Government Services
1 Least Relevant	2.33	1.16	8.14	4.65
2	1.16		4.65	4.65
3		3.49	1.16	1.16
4	4.65	1.16	4.65	8.14
5 Most Relevant	15.12	18.60	4.65	4.65
No Answer	76.74	75.58	76.74	76.74

Table 19 is directly related to Table 13. A striking difference is that the "Silver Surfers" appear to use Broadband more extensively for childrens' homework than initially thought (see Table 13). Likewise household activities appear quite appealing for daily usage compared to what the "Silver Surfers" initially had in their mind (see Table 13).

Table 19: Types of Broadband Usage (Household)-*Percent*

	Household Activities	Children' Homework
1 Least Relevant	1.16	13.95
2	2.33	1.16
3	5.81	
4	5.81	1.16
5 Most Relevant	9.30	6.98
No Answer	75.58	76.74

Table 20 is directly related to Table 14. The former and the latter are highly correlated. It appears that (with few exceptions) that entertainment is neither a factor that will lead to Broadband adoption nor will it be a factor that will have "Silver Surfers" to spend most of their time on.

Table 20: Types of Broadband Usages (Entertainment)-*Percent*

	On-Line Games	Movies & Music	Watch TV
1 Least Relevant	13.95	3.49	16.28
2	2.33	5.81	4.65
3	1.16	4.65	
4	3.49	8.14	1.16
5 Most Relevant	1.16	2.33	
No Answer	77.91	75.58	77.91

Finally there are some personal reasons that this particular age group might find useful. The respondents were asked to cite whether they use Broadband for security or health purposes. Table 21 details their answers. As is evident in Table 21 the usage of such types of services does not appear to be very popular.

Table 21: Types of Broadband Usages (Personal)-*Percent*

	Security	Health
1 Least Relevant	17.44	11.63
2	1.16	2.33
3	1.16	1.16
4	1.16	5.81
5 Most Relevant	3.49	3.49
No Answer	75.58	75.58

IMPORTANT NOTE: All the tables and diagrams contain a significant proportion of "No Answers". The reason for this is to illustrate that although there are 86 people who have Broadband at home, with only one quarter of them making use of Broadband for daily activities. Within the remaining respondents it was found that although they have Broadband at home they do not appear to use it all. Some other members of the household are likely to use the services offered by the Broadband. This is an important and significant finding with implications for this research as it suggests that despite all the efforts of the government to provide training and education regarding broadband, it is not being adopted by the silver surfers. This suggests for the government and Internet Service Providers a gap to fill.

4.4 Support Programmes and Citizens Online

An added aim of this research was to determine how support programmes can be sustained. For this there was a condition in that we had to collaborate with a partner of Microsoft from the Microsoft Unlimited Potential programme. From our internet searches Citizens Online was identified as a potential research partner and after discussions with them, support for our research was also obtained. For more information on Citizens Online and Microsoft's Unlimited Potential Programme please refer to Appendix 1 and 2.

Citizens Online is a charity organisation that is making impacts in the UK, but is particularly renowned for being an organisation that impacts various user groups of society with the assistance of their own experienced and small numbers of officers and volunteers. For this reason, time being a scarce resource and also that several programmes had been completed, there were a limited number of participants that we could interview from Citizens Online.

Despite such hurdles, the research team had 1 face-to-face and 2 telephone interviews with 3 participants from Citizens Online. We also exchanged e-mails seeking more answers and clarification from answers that we had received before. The interviews ranged from 1 hour to 1.5 hours. The answers were recorded using a Dictaphone and hand written notes. This was to ensure that there was no missed information during the telephone or face-to-face interviews. When face-to-face interviews were undertaken then a second person went with the main researcher for an additional perspective. For example, when we visited Liverpool we went to the main offices, the training center and visited the main attraction. At all these places we made mental notes that we discussed and learnt of how silver surfers were using technology. Clearly, the presence of the second person enhanced the amount of data that could be obtained within a prescribed time period.

The qualitative data for all three interviews was considerable and provision of all three implied that this report would be very large. To avoid such an instance, we are providing the transcript of the visit made to Liverpool and summaries and findings of the interviews held with the Northern Ireland project officer and information manager of Citizens Online.

4.4.1 Interview 1: Project Officer-Northern Ireland

The project officer of Citizens Online Northern Ireland is an experienced person who has held the position since 2006. The experience entails is from this current project as well as the previous position where the individual worked with Help the Aged in training older people. This part of Citizens Online programme is unique in that training is being provided by visiting sheltered housing. From previous projects the Officer had learnt that the elderly feel confident and safe when using technology in their own environments. Further, mobility is a problem that older silver surfers faced. Bearing such factors in mind, Citizens Online in Northern Ireland provide technology training in the older peoples' environment (Shown in the photographs below-Figure 19).

Figure 19: Silver Surfers in Northern Ireland

Source: Citizens Online

This programme is also unique in that the Department of Finance and Personnel, Delivery and Innovation Division and BT are working together in Northern Ireland to provide access to computers. In England, this is not the case. However, the common strand in the programmes is the presence and assistance obtained from volunteers. Volunteers are crucial and the way that the support is provided is in the form of 1 volunteer to 2 people or 1 volunteer to 1 person. When the volunteer arrives in the sheltered house there is a laptop computer that is locked when not in use and when the volunteer arrives, is used for the training. There is also a web camera that the users are familiarised to. The sizes of the groups that are trained vary. "Sometimes they are on a 1-1 basis other times they are in small groups of 2-3. The maximum I have taken is 7 people in a class."

With regards to the duration of the scheme it generally varied between 6 to 8 weeks. The current scheme is being operated upon with the aid of sheltered housing schemes (the participants), Lloyds TSB, who are providing computers and Awards for All (The Lottery Scheme). The majority of their clients have ranged between the 65 and 70s age groups and 80s to 90s.

When asked about how the participants were encouraged to go online, the officer mentioned various ways, but in her experience she found that there has to be an interest for the participant. For example, there are no public records in the vicinity of the silver surfers; therefore, genealogy is something that people like to indulge in. The other is that shopping is something that people all like to have a keen interest in and for this purpose, the surfers are taught about secure shopping, which includes watching out for the padlock sign and also about their credit cards. Some people felt confident such that now they purchase tickets from Easyjet for flights and using places like E-Bay. One woman who had a tea set from her wedding day had lost many of the teacups and could not find irreplaceable pieces. After becoming aware of the security measures, the woman made purchases on e-Bay and has completed her tea set that held immense sentimental value for her.

In terms of interests, it has been found in the officer's experiences that women are keener than men, but the men grasp the concepts better. This meant that men used it more later on and saw it as a social interface. On the other hand, "Women will come in for a "chinwag" and drop off as soon as their interest falls.

Of the successes that were achieved there is a noteworthy one and an excerpt form the local newspaper is provided below. From this excerpt it can also be learnt that social factors and an interest in that part of life does get silver surfers to go online.

Table 22: Examples of Silver surfers in Northern Ireland

Eva and Maria were understandably nervous about getting to grips with the Internet at 94, but this formidable pair was determined to keep their minds active. Through informal training sessions at Loughview Fold, a supported accommodation and residential home, both Eva and Maria learnt new skills and opened up a virtual world of potential. With some family members living in New York, Maria decided to use her new found skills to trace her relatives as she hadn't heard from them in several years. She managed to find the American phone book with names and addresses of people with the same name as her search. Not knowing their email addresses, Maria is reverting back to traditional methods by writing a letter to the matching records to see if she can find her long lost family. Hopefully some day soon she will receive a letter or even an email!

Source: Citizens Online, Northern Ireland.

When asked about how the programme is sustained, the important role of volunteers was emphasised. For instance, reference was made to a project within the Belfast Chinese community where a volunteer from the Chinese Welfare Association. What was also unique about this project was the keyboard with the Chinese language. This was seen as important as once again, there was an interest within the community to communicate with relations in the Far East and this keyboard and the volunteer's role were considered pertinent. As another example, the officer sent us information regarding a local community person named Paddy Minne and provided the following details.

Table 23: An example of a volunteer's work in Citizens Online in Northern Ireland

Paddy Minne became interested in helping encourage older people learn about the internet, after teaching his elderly father how to become a 'silver surfer'. Paddy signed up to train residents, the youngest being in their early 80s, in Loughview Fold. . The training has given the older people a new interest. Online communications with family and researching family history have become regular activities. The experience has also helped Paddy in his own job. He has gained understanding in the importance of writing reports and software manuals in simple language that everyone will understand. Paddy now sees himself as a permanent fixture in Loughview Fold, as he would like to train the residents on a permanent basis for as long as possible.

Source: Citizens Online, Northern Ireland.

The final question asked was on how the programme could be sustained in the future. At this juncture the officer spoke of how younger volunteers are sought. Since younger people could obtain more in salary and wages terms, it is difficult to obtain volunteers and so there is a demand for that. Also, the software and hardware required for the training is crucial. Currently, some housing associations are recycling old computers and using them. Further, with the support of organisations like Microsoft, software is obtained. Reference was made to the

Microsoft suites that were received in 2007 and assisted the programme. Finally, of course, money is important as it is possible to get more computers and other resources important for the success of the project.

4.4.2 Interview 2: Project Officer-Liverpool

This interview was also held with the Project officer (co-ordinator) of the Everybody Online project in Liverpool. This is a post that the officer had held since 2006 after working as a housing group project manager for citizens working on a community project engagement and implementation project throughout Liverpool and after that an organisation called Healthy Living.

The project that Liver pool offers was described as one where: In the first year the project was about delivering on the ground , finding out what the barriers are for digital inclusion; why people aren't accessing the internet and then looking at way of how to remove those barriers. At that point, there was alot of practical on the ground activities and outreach questionnaires used. There were also a whole host of activities for local school including grandparents to school have had family learning activities. Now the project is at a more strategic level and the project is looking at how we can expand this project across Liverpool and the northwest replicating what we have done here share the success throughout the city and neighbouring cities…

We discovered the reasons for people not adopting and using computers as being attributed to confidence.
"Firstly it was confidence not really having the confidence to engage in it they were a little bit scared of ……. Particularly with the sort of over 65's categories we found that people just did not think the internet was relevant to them, so we had to look at alternatives ways to introduce them to the internet… the grandparents to school project was particularly successful. Some People weren't aware of the facilities that we're available to them; obviously cost was a barrier to people having to take the internet at home was an option and once they were aware of the computer training facilities that were available locally they engaged with them we find a lot of the times we've had people having more of an understanding of the value of the internet use they applied back so they could go on the everyday life…."

A barrier to the adoption of computers was also identified as ensuring that a computer has relevance in their lives. "For some people especially in some communities with diverse culture … a lot of people have lot of relatives that live abroad we quickly found that communicating via email and so on was really a vital part of their lives activity contacting people back in their home countries for a lot of other people things like online money management; price comparative sites they've got the opportunity to give them the ability to make more choices and empower them in that way it's really good. for Education purposes they are able to research training courses and access it; open reach learning sources , research job opportunities is obviously as employment was one of our key targets .. getting people into training and then into employment so on online job search; things like that are obviously very important …

When the interview began it was in a general context and when we referred to the silver surfers we discovered that for a silver surfer there has to be relevance and interest. "When we tackle the silver surfers we found that if you try to hold just an IT session it would probably not be that great. You need to use sort of an alternative, which is why with their grand children they invited them in and they would attend not because they are interested but because we ask the children to introduce their grand parents to it and by the end of it they are happy to go on and do something else.

Generally what we try to do is to ask the children to come along; for follow on activities to engage with. Some times we'll deliver some follow on activities… depending on if they were interested in a particular topic."

For the silver surfers the role of children was considered as important and made the silver surfers return. "So you did find out that when the older people came with the children to the sessions the silver surfers did return? Yeah. This was a 100% success? Yeah

With regards to the records of silver surfers and children activities we sought records and off the top of their heads, the numbers were: "…on average we try to run sort of one silver surfers activity a month. On average we have 10 – 15 grand parents/children on average. All of them have had tasters of … the silver surfers training and all of them do generally, not in every single case but most of the time will go on to.. continue to do something some just prefer to spend sometimes with their grandchildren on the computers and that's how they take it on. Some people will try to come back and do something useful……..Did you say 15 grand parents and about 10 children? Yeah 10- 15 grandparent/children.
When asked about the mix of the group, the reply was that there tended to be more women. "In the silver surfers the grand parents were mixed men and women? Yeah although we tend to have more women. More women? Yeah

We also tried to identify whether the women adopted the technology better than the men.
".. when the women came in they were a larger group, did they take to technology better or …..? No I wouldn't say they took to it better it was pretty even.

"Alright …would you say they were more encouraging maybe to the children that's why they attended? Em.. I don't know I think sometimes the men seem to have less confidence in participating with those sort of activities …..group activities they just seem to be less forthcoming . I mean the parents and children project session we did it was eleven women and one man so when we roll out we really try to push to engage with fathers

Then we asked what would be the reasons for the silver surfers to adopt the technology. "With the silver surfers group why do you think they were more interested in getting the computer skills? Initially I wouldn't say they were……. As a result of ….. Probably because computers weren't so prominent when they were growing up they haven't really had an awareness of what was available once they got online and found out how much relevant information was available to them especially things like ……keeping in touch with relatives that have moved abroad and those sort of things and the sort and see how easy it is to use the internet they see things ….and they quickly build on their interest.

Ok..How do the people find out about the programme.. PAC? I understand, and also the Grandparents

Yeah with the school obviously they try and learn with the children but then with other projects the PAC partnership organization of south Liverpool personnel which we worked with say couple of our clients want to attend lots of community conferences etc will use local news letters; word of mouth and there is also an organisation called street ahead…which basically do door to door promotions; referrals free of charge, obviously they don't work throughout the neighbourhood at one time but they will happily give out the leaflets and posters out and so on ……..

Is it something that is prevalent within all the citizens on line project or is it exclusive…….

It is exclusive to Liverpool…..

Are PAC and the grandparent programmes all being part of the citizens on line project designed for…

PAC was designed by ourselves for Liverpool although some of the toolkits we used were from the support the parent online projects toolkits I assumed are being used by a number of projects across Liverpool.

Em.. we talked about why the silver surfers were interested ..

Ok.. do you find that when the silver surfers obtain their skills is it all like a past time that they use the computer for or is it just for business services because now that ageism have come in.

A complete mixture

Ok ….

With the silver surfer in particular I'll say it's more of a past time than for business purposes but sort of across the board of people we work with particular interest is sort of web base business …. there are a lot of people interested in learning how to build websites obviously we have training courses available locally we try and take them to where they learn ……..

Have you been in touch with some people who have set up businesses and so forth…?

Quite a few

Alright

And they have been successful at it?

I assume they've been successful being that they have a website and so on.

Right ok..

That's very good one person in particular who came in as a volunteer and he set up a web base business to help people with learning disabilities

Ok ……

You find that many of the people ask you to the same questions?

Yeah…

Yeah… you have been praised a lot on the internet sites because Liverpool is quite a success here with citizen on line

Yeah

So you have been visited by the MP as well.

Yeah.. ……. and has he been very interested in your work

Yeah I'd say…… and obviously BT sponsored the project initially em.. although now when we are looking to expand the project we are looking for other means to bring in funding so a lot of the work we are doing is like …landlord..em because for various type of people I mean a lot of …landlords are try to move away from just being about how but about how they can invest and support the neighbourhood as a whole so obviously by making the neighbourhood a better place to live in by getting more people into employment and training ..em.. eventually to provide a better place to live will attract more people in and obviously the value of properties will go up and that's the long term plan and also projects like this really empowers them to choose their gas and electricity suppliers ..em and they can use it for online consultation and so on which they have done are the few advantages …

Ok…. Right so you have been getting funding from BT

Yeah..

And you have also been getting funding from local associations?

no the initial funding for BT was for the whole of Liverpool for 3 years which expires in December 2008, although I think there is the possibility to extend that …. We have also got some funding from them to help start some other projects which is one in Chester we are hoping to launch and our other key partner is the ……. housing group… they manage lots of stuff for Liverpool they also got a whole load of other ……. which they manage and they have been really pleased with what they've done here so they want to replicate it across the city soon. We have already built a business plan with them say a central salary cost…..

so we are going to be looking at how with more money to actually deliver the project across the city across the neighbourhood.

Have you had support from Microsoft?

We have had … software from them and I know Microsoft is one of the key partners sponsoring the everybody online club so em.. we use the toolkits ..in terms of that yeah.. but in terms of actually financing the projects em no.

It seems they don't provide a lot of funding actually?

No

I'll imagine they have partnership between organizations?

Yeah

They haven't provided laptops or anything at all?

No

And do you also find that maybe education; work experience things like that makes a difference to how people relate to technology.

Em.. not particularly it's just the specific group that you are talking with there will be people who find it hard to relate to technology but there will also be people who find it easy to adapt to technology.

So I mean some of the groups are harder to reach out to ..em.. there are some ethnic minority within the community that have started quite hard to engage but once you have actually manage to engage with them in terms of how quickly they ….. how easy they can access it then it's the same as any other groups

Can you think of any example of where there has been a hard group..That has been very hard to get to and then once you get to them they got really interested.

Yeah

I mean the Somali community is quite a hard group to reach but we do a lot of project with them and tasty sessions and they see how at the end they have been very happy.

How did you get to break into the Somali community?

..em just really doing some networking really working with some of their key community workers…

Did gender make any difference there..

Em ..not particularly I know sometimes there are certain things you have to take into consideration. Sometimes the women don't like to work in the same environment with men so you have to take that into consideration but for me I haven't had problems working with the men they've been quite happy to deliver.

…if you went into the ethnic minoritiesy that you have in the community I mean that shouldn't have a direct ……..

Well we do ….. I mean we run……. Most of the way we work with them is through outreach sessions we work with the Somalis centres and we work with this organization called African development trust They actually bring out the laptops to the centres for them so quite immediately people don't want to leave the centre really that brings down the barriers to them and they are a lot more comfortable. We also have a mobile it project running through the are so we kind of arrange for them to go to the centre as well that's another way of bringing the facilities To them..

When learning about the technical factors, we phrased the questions as follows and learnt that technical issues are not referred to in the initial sessions.

Table 24: Technical Issues Relevance when introducing computers

Do you find that you have to explain things in a very different manner when you are going to talk about say for instance the hardware and the software to these people . Do you even talk about such things to them.

Em.. we tend not to let the session run overly technical we might explain the difference between a software and a hardware but in terms of actually talking about the technical features of the computer that's not the kind of things we talked about unless there is a specific need so we do like the technician course so for people who wanted to know how to build a computer from the scratch this is a need for that sort of a thing then we can look at how we can set up specifically for them but we don't want to scare people by the technical jargon so we try to stir away from that as much as possible.

So say for instance would you be explaining to them say things like adsl and things like that?.

Yeah if they wanted to know that then yeah …

So if someone said how do I get broadband in the house.

Oh yeah that's the sort of things we talk about things like broadband……adsl……..

Right what about explaining things like the mouse?

Oh yeah the mouse although they are all basics we tend to introduce all the basic concept of computers the keyboard and so on …

Source: Citizens Online (Liverpool)

How many projects do you have, say for instance in your organization working on……. you talked about the grandchildren project where you had the 10 – 15 children …….

.. the project has engaged over 3500 people since it was introduced. Yes, over 3500 people to it.

How many supporters have you had……..
We've got about a hundred and fifty partners 150 that we work with in a whole range of faculty so it might just be to try and help people for some it might be for funding ; for some other it might providing manuals for training so a whole range of ways in which we use them.
How would you sustain the programme?
Well you need to make sure there is someone to deliver the project and that there is funding available to cover the cost. You need to make sure there is the need and interest for that project and you also need to make sure that any barriers for that sort of group are catered for if you work with parents you might need to look into how the availability of childcare cost can be factored into the project.

After the interview we visited the place that training to the various user groups is provided in. This was a refurbished pub and the reason that this was selected is that it is a place frequented by all, is within a suburb and so everyone can come along and is an environment that everyone feels comfortable in (refers to Figure 20).

Figure 20: Silver Surfers and Others in Citizens Online (Liverpool)

Source: Citizens Online

4.4.3 Interview 3: Citizens Online Information Manager, Swindon

Whilst interviews 1 and 2 were with the project officers responsible for the Everybody Online project, this was a different interview as this manager is responsible for the technical infrastructure of the Everybody Online project-Everybody Online hub and the technical aspects of the systems in Citizens Online.

This interview also revealed to us that Citizens Online had some projects that had finished now, but there were still a number of on-going projects in several cities, including, Edinburgh, Liverpool, City of London, Bristol and Newlyn. There were also 5 on-going projects in Northern Ireland.

We also learnt of how an independent marketing research company's services were employed to determine the success of projects. However, we were also informed that the Office of National Statistics had commented upon the Stoke-upon-Trent project as being successful and this was also something that Citizens Online considered to be a success.

When asked about what he would consider to be factors that would make a silver surfer go online, again reference towards a need and interest was made. When asked if technical factors would drive them towards adopting the internet, the answer was that it would depend upon the interest of a silver surfer. Again, the example of Liverpool's grandparents to school day was used.

When asked about the ways to sustain the programme, the factors of volunteers, training of volunteers and software were cited. When referring to sustaining software, reference was made to Microsoft's provision of the Office suites in various user groups and how the suites had helped in providing training. Although volunteers were considered important the attribute of interpersonal skills was considered important since they had to interact with various people and communities. For example, in Croydon users were from the Kosovo, Polish and Bangladeshi communities and in such instances, volunteers needed to be able to relate to various diverse communities and have knowledge of various languages. Then awareness of the programme was considered important. Specifically, mention was made of Newlyn and Liverpool's projects where local support from their local press and getting notices to publicise their events seemed very important to sustain the programme. In Newlyn, the Radio Club and Old Fishermens' Club publicized the work of Everybody Online and managed to create an impetus.

The other ways of sustaining the programme included finding places where individuals felt comfortable and confident. In his opinion, parish halls, village halls, pubs were frequented more than schools. In their experience they found that people are not willing to attend sessions in schools as it could be attributed to a bad period of their life. Finally, the issue of funding was considered important as it would allow organizations to obtain more resources.

5. Key Findings of this Research

Aim 1: The first aim of this research is:

"Are social/digital inclusion **sustainable, and, where they are not, how can they be made sustainable?"**

This report has indicated that there have been a number of programmes that have been offered to citizens in order to make them become online interactive. These include programmes such as Learn Direct, UK Online Centres and People's Network. These were programmes that were introduced at the grassroots levels for certain periods and to certain levels of the population. However, a major factor for such programmes was the level of available funding. Further, from the literature review it was found that a vision and strong push from various stakeholders is required. In Table 1, chapter 2 a description of the amounts of funding that was available has been stated. During this review it was also found that a vision is critical, which is compatible with the current UK post of Digital Inclusion Minister.

This review has indicated that social/digital inclusion programmes are largely sustainable. In this context, several factors are critical.

- First, labour resources in the form of volunteers willing to spare time to teach and educate the older people are required. When speaking to the Citizens Online personnel and also from visits that have occurred to previous programmes, the presence and use of volunteers is critical. This is because the salaried members of staff are also undertaking administrative tasks and management work, which means that they are already working to the maximum; therefore, the role of volunteers then becomes critical. A question that then can also arise in one's mind is: "why not employ the volunteers?" It has to be remembered that in this case, the organisation is a charity and is limited in terms of funds. Further, it was clear that volunteers could also be working for a very short period and also can work in other organisations at other jobs. Therefore, the arrangement of a volunteer's position is beneficial for all the concerned parties.
- Additionally the willingness of people to learn is fundamental. In chapter 2 the numbers of citizens who have adopted and are using the internet was stated. Quite a number of people, then, are still not adopting and using broadband. Further, the findings in chapter 4 illustrate that not all members of the public have access to, and are adopting and using, the internet and/or broadband. Therefore, if numbers of people not using the internet/broadband continue, social and digital exclusion will persist. A view also shared by policy makers from charities aiming to narrow or eliminate the digital/social inclusion gap (Chapter 2, section 2.2.1).
- Following that, equipment-hardware and software are essential. Equipment in the form of computers with appropriate software is the most pertinent aspect. Microsoft's role is very important in this respect as they provided Microsoft suites and allowed the use of their software for the development and implementation of the 'Everybody Online' hub.
- Then, a vision that is brought forward by an individual and shared with and amongst the people is essential. In Citizens Online this is provided by their Chief Executive.

Table 25: Some excerpts from the Chief Executive of Citizens Online's background

John has extensive experience of creating partnerships between the community, business and the voluntary sector, having attracted £12m of funding for "STEAM", the Museum of the Great Western Railway built in the former GWR Swindon works in 2000. John joined Citizens Online as Chief Executive in February 2000, after completing an MBA at the University of Bath (1999-2001). He has since developed the organisation into a highly respected influencing and lobbying body, established to focus on the social and cultural impact of the Internet and promote access to the new technologies. Citizens Online created the EverybodyOnline project which in partnership with BT is evaluating the importance of ICT in eight of the most disadvantaged and least connected communities in the UK. Other activities include Innovation in the Community Awards with AOL and Unlimited Potential initiatives with Microsoft. At the 2002 local council elections Citizens Online provided voter engagement programmes for six of the e-voting pilots. Citizens Online is also the lead organisation for the pan-industry body, the Alliance for Digital Inclusion.

Source: http://www.citizensonline.co.uk/conline/aboutus/display?contentId=2679

- Finally, funding is essential. To provide programmes basic infrastructure in the form of buildings, people and equipment is of the essence. In particular funding is needed in order to provide the training and support, for managers', promotional events, and computers. For instance, in Northern Ireland, laptop computers are extensively used. For this, funding is important although, generous support from organisations, such as Microsoft, were emphasized a lot. Further use of the funds is made for promotion to make members of the public aware of the programme. The promotions can be in the form of, advertisements, brochures, flyers and competitions, for which use of the media is and can be made; therefore, funds are required for that. Currently since the internet is becoming prevalent in daily lives funds are essential for the development of an appropriate website. These may include, advanced graphics and animation software packages. Then, there is also stationery required and support staff to assist the managers. Finally, there are the basics of utility provision.

Therefore, a key finding for this research's first aim is as follows:

Key Finding Aim 1

Are programmes established for social inclusion/digital divide sustainable?

Yes they are, provided there are certain conditions that are met

How can the social/digital inclusion programmes be made sustainable?

- **Labour resources in the form of volunteers willing to spare time to teach and educate the older people are required.**
- **People willing to learn how to become online interactive are necessary**
- **Equipment-hardware and software are essential**
- **A vision**
- **Funding**

Aim 2: The second aim of this research is:
"To establish the technological or non-technological factors that influence senior citizens' online interactions and thereby their digital and social inclusion"

To achieve this aim, there were two methods used- semi-structured interviews and an online survey. From the interviews we learnt that when introducing and familiarising users to the computer and internet, technical factors are not of any significant importance at all. Instead the emphasis is upon the interests that a person has. For instance, in Ireland, genealogy is a topic of immense interest and that is a means of familiarising users to the internet and computers. What was also learnt is that technical information regarding broadband is not of much importance until at a much later stage. That is only if and when a person considers getting broadband.

We drew a similar conclusion when conducting the online survey. For the online survey the sample population consisted of degree and/or postgraduate holders and a medium to high level annual household income, which are statistics similar to those obtained by recent Office of National Statistics figures (Chapter 2, section 2.2.1). When the questions were first piloted, questions of a technical nature; for example, what is a router, a modem and such technical details were asked; however, individuals refrained from providing answers. Finally, after several trials of questions, we posed two questions regarding broadband. One was about speed and the other was the type of broadband. Again, although a large number of respondents provided replies, many also stressed that they were not actually aware of the speed of broadband as they were suspicious about the true speed of broadband.

A note about the findings is that although we cannot generalise that the silver surfers of the general population necessarily follow the trends that we have obtained, we are anticipating that a large number of silver surfers have traits similar to the patterns and trends that we have found in this research. By undertaking more research in this area we intend to prove or disprove these results.

However, returning to this section, the replies to the technical factors were as follows:

- With reference to the technical characteristics of Broadband, those having Broadband at home seemed to have a preference for 'ADSL' followed by 'Cable'. In non-OECD countries, ADSL is even more prominent as it is the preferred mode -73%.
- On the other hand, when it comes to the Broadband speed, the distribution is more even with 1.5Mbps to 3Mbps being the most popular speed. In the non-OECD countries, three quarters of the Broadband holders used 200Kbps to 768Kbps.

When investigating the non-technical factors we categorised these into work related, household activities (online shopping, online banking and internet search), research, government related, entertainment, children's homework, communication, personal (security and health) and home business. We obtained replies without any confusion and found:

- Given the occupational distribution of this particular age group, it is not surprising that research activities were foremost when considering the factors that lead to the adoption of Broadband. Obviously, the latter factor is closely correlated to work-related aspects, which comes second. This particular age group seems to take advantage of the on-line Government services but does not seem to use Broadband extensively for Home business. One explanation might be that not too many people work from home. Finally, communication turns out to be a very important social factor as the two top bands attract a significant combined percentage. Communication in conjunction with certain technical aspects (see Table 2) appears to be an essential combination that appeals to people aged 50 and above.
- Household activities appear to be quite important but do not attain to very high percentages compared to other activities shown above. Broadband is used for helping Children with their homework, but the latter usage is rather limited.
- Entertainment factors such as On-line Games and Movies and/or Music do not seem to carry significant explanatory power as the majority of the respondents deem the entertainment factors the least relevant ones.

From prior research experience and the literature review it was learnt that peers, advertising means, availability and quality of Service could also be added influencing factors for silver surfers when considering adopting broadband. However, from our research findings it was found that particularly peers and advertising do not have significant influences upon the decisions of silver surfers. In comparison, quality and availability of service has a larger significance upon decision making.

A significant finding of this research is also that although a small number of silver surfers have broadband and are using it, a large number of them are not using broadband. Therefore, even though silver surfers may indicate that they do have broadband, they may be in a household where other members of the household are using it, and the silver surfers claim that they are also using broadband. This is an important implication as this implies that despite the support, training and education being provided there might be chances that silver surfers will not use the

technology, either in an appropriate manner or not at all, implying that digital/social inclusion may still not be achieved.

Key Findings: Aim 2

From these explanations the key findings about the technical and non-technical factors are:

When determining how the digital/social inclusion gap can be narrowed or eliminated, technical factors are important; however, the user has to have a deep understanding and awareness of broadband. If such awareness is prevalent then technical questions such as the speed and types of broadband can be obtained.

Therefore, technical factors information pertaining to broadband can be categorized into:

- **Types of and**
- **Speed of Broadband.**

For the non-technical factors we identified these in the form of the following categories:

- **Work related,**
- **household activities,**
- **home businesses,**
- **research,**
- **communication,**
- **government services,**
- **education (children's homework),**
- **Entertainment.**

<u>NOTE:</u> In the instance of the silver surfers, research, communication, work related, education, on-line government services and household activities were important. Entertainment, a close social circle of friends and advertising as well as availability and quality of service were factors not considered highly enticing by this group of users.

6. Conclusions

This research provides an important qualitative and quantitative analysis of the degree of change in respect of the digital divide for the silver surfer category of internet use following various initiatives in respect of improving social inclusion, with particular emphasis on the UK context. From this initial small sample study we have found that there is a certain amount of social/digital inclusion amongst people aged over 50, in this case those who are educated and middle to high income levels individuals. However, amongst these users there are some who are using broadband, although they are paying customers but with little take-up. Therefore, social/digital inclusion remains a challenging issue but nonetheless important. We offer some initial recommendations based on the current context.

To overcome the 'digital divide' gap, there are ways being used to entice users and we identified these by refining and employing an evaluation method from the Information Systems arena. This led us to categorise our findings into technical and non-technical factors.

From our interviews with the Citizens Online programme it was found that technical factors are not of much importance when first introducing and familiarizing silver surfer users to the internet and broadband. However, from the online survey that we undertook, this research found that if users have an interest in technology then technical factors can be of consideration and as a starting point, the types of and speed of broadband can be considered.

The other category that we had was non-technical factors. These are fundamental and clearly need to be taken into consideration when encouraging silver surfers to be come online interactive. However, again, a factor that is most important is that of ***interest*** and this is something that not only our research has found but can be confirmed from previous research (e.g. Horrigan, 2002). The interest that we found in the instance of non-OECD and OECD countries foremost is that of researching for information in general. This was followed by more specific work related activities, household activities as well as children's homework as determinant factors. Communication is a very important factor and that is something that silver surfers who have retired and are spending more time at home state as very important. Factors that are not of significant influence for silver surfers were viewed to be entertainment-downloading of music or films, the influence of peers (a close circle of friends and family), advertising and the availability and quality of service.

We would also like to state that although our findings are essentially based on an initial small scale sample and selected cases, they have demonstrated consistency with previous research and with findings from prior official published archival documents. This then lends weight to the overall trend of findings with regard to the digital/social inclusion related to silver surfers. For instance, we found in our research, as found by the Office of National Statistics (UK) that a large number of educated, middle to high income annual income level silver surfers appear to subscribe to broadband. More broadly, the multifaceted nature of this non-homogenous group and the non deterministic nature of the technology itself have been borne out.

This research also looked at whether social/digital inclusion programmes can be sustained and from our research of one snapshot case, we can suggest that such programmes are potentially

capable of being sustained and enhanced. To sustain such programmes we argue requires the presence of at least the following: Labour resources in the form of volunteers willing to spare time to teach and educate the older people; willingness to learn in the case of the users themselves; support of organisations such as Microsoft in the form of equipment-hardware and software; vision and a person who can carry the vision forward is also considered important; sustained and targeted funding

6.1 Implications of this Research

In the following sub-sections, the implications of this research are briefly outlined.

6.1.1 Academic Implications

Governments are striving hard to provide all the citizens with online access, which is succeeding but to a limited extent. This has led to the issue of social and digital inclusion/exclusion becoming a subject of immense importance, and one which is being increasingly researched. This research adds to the discussions regarding silver surfers and the potential social/digital divide. The academic contribution of this research is the employment of a particular evaluative technique. Further, the investigation into how programmes attempting to narrow or eliminate the digital/social inclusion gap is research that has been undertaken rarely, and this is particularly the case with regard to the UK; therefore, this empirical contribution is an important one and, given the multifaceted nature of the problem, we suggest such an approach be extended to provide a richer picture of the UK context and beyond.

6.1.2 Industrial Implications

When considering the industrial contributions this research makes certain distinctions. The first industrial contribution is to the Internet Service Providers (ISPs) and other providers of ICTs to silver surfers. Additionally there are policy makers as well and these are considered below.

For **ISPs**, this research is vital as it draws attention to factors that may not have been clearly articulated. For instance, the research draws attention to the fact that although silver surfers state that they have broadband, they are not making use of it; therefore, there is a gap for the providers of broadband to fill. In Chapter 4 there is a note to state that silver surfers do state that they have broadband, but from the analysis, we learnt that the silver surfers are in a household and others are making use of the broadband, but not the silver surfers. Therefore, providers could attempt to determine how the silver surfer group can be enticed to make use of and not only to state that they have broadband.

For **Microsoft**, the implications of this research are that they can identify and determine the impacts of their support to charity organizations. Thus, they can ascertain whether their efforts are well placed and the outcomes. Certainly from the qualitative data that was obtained, there is a call for more support from their end. Nonetheless, due to their current initiatives there has been a gap that has been narrowed. However, more is still required and Microsoft's welcome initiatives in this respect should be extended.

For **policy makers**, the implications of this research are that policy makers can understand and determine the initiatives being achieved at grassroots levels. Therefore, they can utilize such results as test beds for future programmes and have a pre-understanding of the efforts that their support would achieve. Such research can also support policy makers and public and private sector organizations that are considering the continuing challenge of digital exclusion and what can be done to alleviate it.

6.2 Dissemination Plans

These research findings will be disseminated in the following ways:

- **Academic Publications:** The findings of this research will be published amongst Information Systems (IS), Policy related and Gerontology related journals. Initial literature reviews have revealed that this research topic is of profound importance. Therefore, this research will aim to publish findings in journals such as, *Ageing & Society, Technology and People, European Journal of Information Systems, Journal of European Social Policy, Behaviour and Information Technology* and *Journal of European Public Policy.*

- **Press Publications:** Where the findings require emphasis to a broader audience, then trade press magazines such as *Computing* and *Computer Weekly* will be targeted. During the preparation of this report there were press releases detailing our research; therefore, we will be releasing the results of this research within the media in daily publications such as, The Guardian.

- **Websites:** Dr. Choudrie has also got a website (www.jyotichoudrie.com) where a link to this report will be placed. The University of Hertfordshire website will also publicise the report.

- **Conferences:** Further, both, Dr. Susan Grey and Dr. Choudrie attend several conferences during the year and findings of this research will be publicised by getting papers published at such conferences.

- **Launch event:** Further dissemination plans also include a launch event where delegates will include media, industrial organizations and copies of this report will be distributed at the event.

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Appendix 1: A Case Study of Citizens Online

A partner very important for this project is Citizens Online and some information about them and their important work is provided in this appendix.

Citizens Online

Citizens Online is a national charity committed to researching and addressing the issues of Universal Internet Access and promoting digital inclusion. Our vision is "to make the benefits of digital technologies easy to access and usable by all, to promote a just and inclusive society."

There are currently several projects going on but the one that is emphasized and detailed on the main web site is the Everybody Online project:

Working at grassroots to bridge the Digital Divide

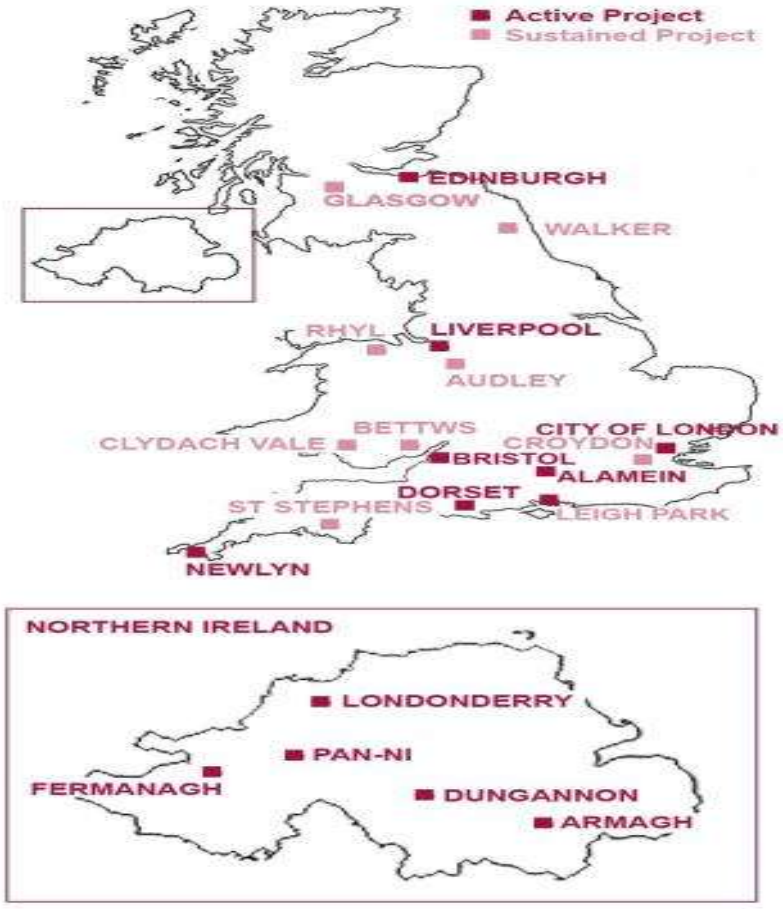
The EverybodyOnline Project helps communities and individuals in disadvantaged areas across the UK to engage with digital technology. We aim to help communities overcome any barriers they may have to computers and the Internet so they can take advantage of the wealth of opportunities digital technology and the Internet has to offer.

By providing the opportunity to access technology, people can enjoy the benefits of learning new skills, improved well being, increased employability, economic regeneration and extended social support.

What Citizens Online does to Provide Support

Once an area has been identified as being disadvantaged and having low levels of Internet connectivity, we employ a local project officer to work with local agencies and individuals to promote and deliver digital inclusion activities. This includes developing Internet learning programmes, offering local volunteering opportunities and contributing to local digital and social inclusion networks.

Figure 21: Current Everybody Online Projects



Source: Citizens Online (2008)

Appendix 2: A Case Study of Microsoft's Unlimited Potential Programme

Microsoft is the organization that allowed us the opportunity to approach our university and Citizens Online. There is information regarding their programme which is a way for organizations like Citizens Online to operate the 'Everybody Online' hub.

Microsoft's Unlimited Potential Programme

A partner assisting the cause of technology adoption and usage around the globe is Microsoft's Unlimited Potential Programme. This programme was introduced thirty years ago. At the time Microsoft dreamt of "a computer on every desk and in every home". Due to this initiative, far more than 1 billion peoples' lives have been changed.

Microsoft believes that there are several barriers that stand in the way of effectively reaching underserved communities, including, environmental or infrastructural obstacles, localization issues, the need for personalized solutions and the prohibitive cost of technology.

For this purpose, Microsoft Unlimited Potential combines advanced technologies and strong partnerships with governments, international organizations, nongovernmental organizations (NGOs), educational institutions, and technology and service partners. "Ultimately our mission is to enable sustained social and economic opportunity for those at the middle and bottom of the world's economic pyramid—the next 5 billion people."

In the short term, Unlimited Potential aims to reach the next 1 billion people by 2015 by exploring solutions in three key interrelated areas. Each is crucial to developing sustained economic opportunity:

- Transforming education
- Fostering local innovation
- Enabling jobs and opportunities

In the UK Microsoft's Unlimited Potential programme has been supporting the following organizations (2004 and 2008):

Table 26: Microsoft Unlimited Potential Programmes

Citizens Online/EveryBody Online, London

EveryBody Online was launched by Citizens Online in August 2002 to increase interest in, access to, and skills in IT and the Internet among the hardest to reach underserved communities in the U.K. The project achieves this by working among local communities and community organizations in selected parts of the U.K., organizing and supporting activities that help novices gain confidence and motivation to acquire more substantial IT skills.

For people in these communities, it has proven especially successful to help them discover online job opportunities, health and benefits advice, and cheaper goods and services. Typical activities include taster sessions, drop-in sessions, and basic computer skills sessions. Support from Microsoft will be used to expand the EveryBody Online project within the U.K., growing capacity for this early stage IT training, and encouraging more people to use the lifelong learning opportunities available to adults in the U.K. to develop further IT skills.

Age Concern, London

Established in 1944, Age Concern supports all people over 50 in the United Kingdom in getting the most from life by providing them with essential services and advocacy. Age Concern believes that access to IT and IT skills can provide many benefits for older people, enabling them to live more independently, providing a remedy for isolation, enabling greater participation in society, providing alternatives for those with mobility problems, and developing the skills and confidence to become active in the work force again through paid or voluntary work.

Age Concern's work includes providing computer access and training, developing guides to using computers, promoting IT for older people, and providing online chat through the Baby Boomer Bistro. Building on work to date, the Microsoft Unlimited Potential grant will support the establishment of Age Concern's first mini-explorer bus in the southwest UK. The mini-explorer bus will take IT to older people who are socially and geographically isolated, providing a roving IT training facility for those who cannot access existing services.

In 2008 Age Concern once again received Microsoft support and this is the current information:

In Western Europe, there are limited work force opportunities for unemployed people over 50. As a part of the Black Country project, Age Concern's mission is to address unemployment in the Black Country region by supporting all people over 50 through a digital inclusion network as well as promoting micro-entrepreneurship through the PRIME initiative. The PRIME initiative is a charity linked to Age Concern, which strives to help people older than 50 consider options for self-employment and micro-entrepreneurship. In supporting this goal, Microsoft Unlimited Potential funding will be used to run community workshops on self-employment and to ensure appropriate IT skills training is delivered. It will help recruit mentors for potential micro-entrepreneurs and help track progress of people who are starting small businesses.

Microsoft Unlimited Potential CTLC Awards Program, managed by Citizens Online, London

In partnership with Citizens Online, the Unlimited Potential Awards Program will be established in the U.K. to support IT skills training programs for underserved youth and adults in community-based

settings. The program will encourage applications from across the U.K. A review panel will include representatives from Microsoft, community leaders, and experts in the field. The program seeks to support the work of smaller groups and projects doing innovative work to develop IT skills training within their communities; these groups and projects may not have access to the resources and connections of larger regional or national organizations. Citizens Online, which will be managing the awards program, is a specialized charity with a mission to advance public education in the use of information technology. They have an established track record in managing similar grants programs.

The Karrot Project

The Karrot initiative, launched in 2001, is a joint program between the Metropolitan Police and Southwark Borough Council. The program serves disadvantaged youth (10 to 16 years old) in the borough of Southwark, which is the eighth most disadvantaged borough in the United Kingdom. It was set up to address increasing youth crime and truancy. A key element of this program is its state-of-the-art Internet bus, fully equipped with 11 PCs and a satellite communications system. The UP grant will be used to keep this bus operational for an additional two days a week, so activities on the bus can benefit youth in the area for a full seven days a week. The grant will also assist in funding additional technical support and technical training for staff. The Internet bus provides a key facility for a disadvantaged group of youth to learn about IT, use software to increase their employability, improve their communications skills, and increase positive involvement in community programs.

Fairbridge IT Skills Project

Fairbridge was founded in 1909 and exists to help build self-esteem and motivation in underserved youth populations (aged 13 to 25), strengthening the foundation upon which a life full of choices and opportunity can be built. The UP grant will support the establishment of IT skills programs in two Fairbridge centers, providing courses for young people to develop solid IT skills. These centers are Teesside (Middlesbrough) and Tyne & Wear (Newcastle) in the northeast region of England. The program serves youth in this region, which currently has a very high school dropout rate.

Leonard Cheshire Discover IT

Leonard Cheshire was established in 1948 and is the UK's largest voluntary sector provider of support to people with disabilities. It supports more than 21,000 people with disabilities in the UK, offering flexible services to meet a wide range of needs.

As part of Leonard Cheshire's wider charter, the organization sees an important role for technology in supporting people's employability and helping them achieve other valuable personal ambitions. The Discover IT project will provide IT training to people with disabilities via three fully accessible computer centers based at existing Leonard Cheshire locations in Westminster, Derby, and Cumbria. The UP grant will support the Discover IT program in these three centers, enabling people with disabilities who use these facilities to develop strong computer literacy skills."

Black Country Consortium

The Black Country Consortium (BCC) project is a long-term commitment supported by Microsoft to develop a stronger knowledge economy by improving the skills of the current labor force and providing basic skills to the unemployed. Through a network of 120 community technology centers, disadvantaged communities are receiving technology skills training in the

Black Country region. The project ultimately aims to enable job growth and sustained economic opportunity in this economically depressed region. BCC works closely with Black Country Knowledge Society, to provide technology training at all levels, and with the Black Country Learning Net, to broaden digital inclusion in the community.

Royal National Institute for the Blind (RNIB)

Seventy-five percent of people who are blind or have low vision are unemployed in the United Kingdom. The Royal National Institute for the Blind (RNIB) is part of the Black Country project. Its mission is to empower people with visual disabilities to improve employment opportunities through IT skills training. The RNIB partnership will drive increased accessible IT skills training and access to employment for blind and partially sighted people of working age. Microsoft Unlimited Potential funding will support the cost of training trainers, making training centers accessible, and providing employer awareness training on disabilities in the workplace.

Source:
http://www.microsoft.com/about/corporatecitizenship/citizenship/giving/overview/UPrecipients/europe2004.mspx