



Manchester Metropolitan University

What impact has the Volunteer Driver Service Had on Its Members?

A quantitative study concerning how the members use the service and in what ways it has positively impacted their lives.

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Q-Step

**A step-change in
quantitative social
science skills**

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Chapter 1- Non-Technical Report

The volunteer driver service provides affordable transport for Rochdale's vulnerable and older members of the community. It has been running since 2008 with much success, however there is not statistical evidence of the service's impact on their members.

The aims of this research were:

1. To understand how the members use the service by looking at frequency of use, most common use of service, whether they would like to have an app or website to aid the booking process, whether they would prefer to be contacted by email or text rather than phone call, when they have an organised trip.
2. To explore the impact, if any, the service has had on the individual's lives and to be able to quantify this for the organisation to use as evidence of their success.

Literature Review Summary

1. An Ageing Population- People are living longer, which in turn means the dependency ratio is increasing (Victor, 2005; Falkinham, 1997). The dependency ratio is a calculation of how many people over the age of 65 there are per 1000 working age people. For the country this is 18%, for Rochdale, this is higher at 22%, which makes the issue of ageing a specific problem for Rochdale. The rate of ageing has many impacts on a community and economy, specifically with regards to healthcare (Thane, 1989). Considering cuts to health and social care budgets, voluntary organisations contribute heavily to filling in gaps and preventing further, more rigorous healthcare (Age UK, 2018; Humpfries et al, 2016; Allan, 2008; ECT, 2016). Many of the VDS members experience issues addressed by Age UK, such as struggling with cost of travel, uncomfortable transport and struggling with everyday tasks (Age UK, 2017). It is because of this, they have been accepted as members of the VDS, because using other forms of transport is impossible for them.

2. Older People and Deprivation- Poverty affects nearly half of people aged 60 and over (Scarf et al, 2002) and older people living in deprived areas of England are twice as likely to experience poverty compared to the rest of Britain, with two-thirds of people experiencing medium to high levels of deprivation (Help the Aged, 2018). Rochdale is considered a deprived area as it has consistently fell into the top 1% most deprived areas consistently from 2004 to 2015 (Manchester Evening News, 2015). Deprivation stems beyond financial poverty and the Index of Deprivation measures material deprivation as well as other factors. A significant amount of older people have been found to be socially isolated and/or severely lonely. According to Age UK, someone who is not financially deprived can still be materially deprived.

3. Older People and Social Isolation- Social isolation can be caused by both an emotional and geographical levels. Social isolation is geographical when a person



lives away from local amenities and friends and family. Older people who cannot travel and live away can experience isolation if they do not have the opportunity to travel. It can also be caused by emotional factors due to withdrawal from roles in the family or work place, which naturally comes with age as a person retires and children leave the family home (Toepoel, 2012; Cumming and Henry, 1961). Social connectedness and social activity are strongly associated with a person's overall health (Giummarra et al, 2007).

4. Older People and Loneliness- Loneliness is an expression of negative feelings of missing relationships (De Jong Gierveld and Van Tilburg, 2006). There are two types of loneliness firstly emotional, which is the lack of intimate relationships and secondly is social, which develops from the lack of broad groups of contacts or social networks. Age has been found to be negatively associated with network size and closeness of relationships (Cornwell et al, 2008). Age is also positively related to feelings of loneliness (Bowling and Gabriel, 2004). The TNS Loneliness survey, 2014 found that 12% of older people (Aged 65 and over) feel cut off from society. Loneliness is tied with social isolated, if a person has limited or no social connections, they may begin to feel lonely (Age UK, 2014).

5. Older People, Travel and Mobility- Many older people experience anxiety, exhaustion and distress when travelling to hospital appointments (Age UK, 2017). Older people face many issues when travelling such as, uncomfortable and costly transport (Painful Journeys, 2017). Poor quality transport can cause social isolation as older people choose not to travel because of the stress and discomfort of travelling (Closing the Gap, 2013). Community transport is an important part of the solution to many older people's problems (Whitty, 2016). Voluntary transport allows people to travel with ease, convenience and peace of mind which ensures they remain independent and prevents social isolation (Northampton Volunteer Car Scheme, 2018). Lack of mobility can lead to "loneliness, isolation and even death" (Musslewhite, 2008: 26). Mobility for leisure purposes significantly boosts well being of older people. Society has become hyper dispersed as people commonly live away from local amenities and activities which makes opportunities for transport increasingly necessary.

6. Effective Service Provision- Local community services provide an essential point of contact for older people (Owen, 2007). Social work needs to start with the experiences of older people and social workers need to be aware of individualism of older people (Tanner and Harris, 2008). Effective social care providers will tune into the needs of service users as individuals by responding to and understanding their concerns (Victor, Scambler and Bond, 2009)

Research Methods Summary



1. Quantitative methodology was used to help the understanding of the impact VDS has on its members. A five-point attitudinal scale was used to determine attitudes, along with some generic demographical questions.

2. Main access issues stemmed from contacting participants. As vulnerable adults there were certain standards that had to be met with regards to the branding of the questionnaire. It had to match the organisations typical branding for its legitimacy to be trusted and for honest responses to be gained. Questionnaires had to be posted in the final distribution because many members do not have email addresses. This was one access issue because the method of distribution and collection took longer than it would have, had responses been online or via email.

3. Ethical approval was gained through the University's Ethos online application. This requires a signature from a dissertation supervisor. The form outlines the research aims and highlights any ethical issues and any potential hazards concerned with conducting a placement.

Main Findings and Discussion Summary

1. The VDS contributes to preventative healthcare as it improves wellbeing of its members. This is suggested through the statistics that, 47% of members use the service for medical appointments. These may have otherwise not been arranged or met had the service not been provided to them. The service is used often by the members with most people using the service 5-10 times in the last month (up to the point of filling in the survey). This supports the literature that transport organisations help people meet their regular appointments and so reduces the chances for emergency trips (ECT, 2016).

2. Older people experience anxiety when travelling (Painful Journeys, 2017) and many older people experience discomfort when travelling and are put off by the cost. This research found that the VDS has made a difference to its members levels of anxiety, demonstrated by 98% of respondents agree or strongly agree that the service has made travelling less of a worry for them and 86% think that the service is reliable all the time. Further to this, 89% agree or strongly agree that the VDS has had a positive impact on their life. As per these results it is clear that the VDS relieves the stress and worries of travelling and has improved people's wellbeing.

3. Areas of high deprivation use the service the least and generally have a lower TotalScore when compared to those in areas of low deprivation. Alongside this, those that use the service the most have higher TotalScores. This demonstrates that respondents living in areas of high deprivation are not engaging with the service as much as those in areas of low deprivation. However, there was no relationship found between area and most common use of service, so assumptions cannot be made as to whether respondents in low deprivation areas have more disposable income for

leisure trips or that they have more leisure activities in their area, to be using the VDS for this.

Recommendations

1. There is high importance of social connectedness in later life which is made clear by both previous literature and the findings of this research. Only 15.2% of respondents are members of HMR Circle, it could be beneficial for the organisation to increase merchandising and advertising around HMR Circle, to members of the VDS.
2. The organisation has been considering an App or Website to allow respondents to book or track trips. This research found that members are not interested in such technology and prefer to be contacted by phone, as the system currently stands. An app or website specifically for drivers would be recommended as it could take some of the work off volunteers.
3. The service is targeted for people who cannot use public transport and have no other means of travelling. This research found that 18% of respondents agree or strongly agree that they “feel confident using public transport”. In the future it could be useful for the service to make the application process harder to pass through. Such as needing a letter of referral.

A conclusion

1. The findings demonstrate the importance of the service for the people who use its well-being and for the wider community. The VDS is contributing to preventative healthcare and is offering a life line for people who would otherwise be putting themselves at risk of social isolation or injury and anxiety from travel.
2. The importance of services like the VDS will only grow as the Age Dependency ratio does. Further budget cuts to healthcare will have a trickle-down effect on services like the VDS as support systems for older people struggle to keep up with demands.
3. The VDS has actively improved people’s well-being through having positive impacts on their independence, anxiety levels when travelling, social life and their lives as a whole.

Chapter 2- Background and Introduction

This research was produced for Rochdale's Volunteer Driver Service. This service is a voluntary organisation which is attached to the befriending service, HMR Circle. The work of the volunteer drivers is to provide affordable and safe travel for vulnerable and older people in the Rochdale area. Members of this service will pay a membership fee of £10 a year, in return they have highly affordable, reliable and safe travel for whatever their journey needs will be.

The service was established in 2008 by the Partnership for Older Peoples Projects (POPPs). To qualify for the service, you must be unable to drive and to use public transport. The VDS covers trips to doctor and hospital appointments and to leisure activities such as shopping, church and meeting with friends and family, all types of trips are considered including one trip to Scotland. Services like the VDS have been implemented across the UK. This research helps to understand the importance of these services for the people and communities. Although all services like this are unique, the impact they have on the vulnerable people that use them will be similar.

The basic aims for this research was to understand the service users and to explore how the VDS has impacted on members lives. The work of the VDS is vital for many members who struggle with travelling. However, before this research there was no way of quantifying how important the service is to people or the impact it has had on their lives. This research reflects the views and opinions of some service users and develops evidence of the services' success.

I chose to follow the Bachelor of Science route for my dissertation as I have studied Quantitative research with the Q step department for 2 years prior to this and felt that I had expanded and developed my knowledge of quantitative methodology and research and was interested to develop my skills and experience further. I wanted to conduct my dissertation as a placement as I felt it would give me a valued opportunity for work experience, which I would not have got having done a Standard Dissertation. I chose to do research with the Volunteer Driver Service because I didn't know a lot about the service or about issues facing older people. After looking at the website and



finding out more information about the whole organisation I decided that I would like to find out more about problems older people face and find out more about the organisation.

Chapter 3- Key Literature

3.1 An Aging Population and Its Impact

Over the years it has become clear that people are living longer which has a significant impact on the dependency ratio of the country (Victor 2005; Falkinham 1997; Toepoel 2012). The dependency ratio is how many dependant people there are for every 1000 working age people (16-64 years old), the Old Age Dependency Ratio is increasing across the UK but differs between areas (The Economist, 2009). Older people (Over 65 years old) make up 18% of the UK population (ONS, 2017). Interestingly, the dependency ratio of Rochdale is 22% (ONS, 2018). This means for Rochdale, that there is a greater proportion of older people within its community, compared to other areas in the UK.

The most concerning implication an ageing population has is on the economy. Population ageing is a result of low fertility and increasing longevity which leads to a growing proportion of the population becoming dependent (Marshall and Norman, 2013). Ageing population is a concern because it is feared that rising costs of healthcare provision and pensions will create a burden on the working age population through increases in taxation (Thane, 1989, Bos and Weizsacker, 1989). This is important when considering voluntary organisations targeted at older people because they may become increasingly in demand, as the economy struggles to provide for its citizens and community.

An ageing population has many implications on health and social care services as they are in high demand with little resources. Age UK found that 1.4 million older people are struggling to find support for their needs, such needs, “like getting dressed, using the toilet, making a meal, or getting to the shops” (Age UK, 2018). Age UK’S Care in Crisis report further explains these statements highlighting the “current state of care” in the UK.



Four points of the “current state of care” are addressed. Firstly, the underfunding of services, such as, public spending on older peoples’ social care, which has been cut by £160 million in the last 5 years (from 2018). Secondly, they describe the care system as a “postcode lottery” which addresses the issue that there is variation in quality of care between local authorities, leaving many older people without support; “Access to care depends increasingly on what people can afford – and where they live – rather than on what they need” (Humpries et al, 2016). Furthermore, their third point being 1.2 million people over the age of 65 do not receive the care and support they need with “essential living activities” such as described above. Finally, there is a “declining access” to services due to cuts to local authority services, this has placed “increasing pressure” on unpaid care givers” (Age UK, 2018).

With budget cuts, care services and local authorities struggle to keep up with the demand for effective social care. The impact of poor health and social care on older people can be fatal. A significant proportion of older people struggle with loneliness, isolation and mental health problems such as depression, those who are typically most prone to these problems are the very elderly and the very poor (Allan, 2008). Those people who experience the highest levels of loneliness are also those without an active social or community life and have poor physical health (Allan, 2008).

Such aspects of people can be found in members of the VDS. Those who are members are extremely vulnerable as they may have physical or mental illnesses preventing them from travelling alone. The VDS potentially helps to prevent high levels of loneliness, low confidence and social isolation within its membership.

Although there have been extensive budget cuts to health care, the Chancellor reiterated the government’s plan to a multi-year funding agreement over the next 5 years, in the 2018 Budget announcement (The Health Foundation, 2018). This translates to £20.5bn extra for the NHS England by 2023/24, a 3.4% increase per year. Although this money does not cover the Department of Health and Social care, the government has issued a £240million social care investment to “ease NHS winter pressures” this money will be invested into adult social care with a further £40 million



invested in the year 2019-20. (Department of Health and Social Care, 2018; The Kings Fund, 2018; Randstad, 2018). The money will be invested in several ways one being. 86,500 “reablement packages” which support workers to help patients carry out everyday tasks and regain mobility and confidence. Furthermore, the government has planned an additional £1.6 billion to be given to the NHS for 2018 to 2019. The investment will be used to “treat a quarter of a million more patients in A&E” (Department of Health and Social Care, 2018).

Although these investments were announced the government faced criticism over the budget from experts such as Alzheimer’s Society. Alzheimer’s Society chief executive Jeremy Hughes said that the money may “prop up the broken system” but “only staves off total collapse” (Independent, 2018). While Glenn Garrod, president of the Association of directors of adult social services (ADASS) describes it as “a step in the right direction” it is still not enough as local authorities have been dealing with “shortfalls for years” (Independent, 2018). This is important because the VDS receives funding from the Rochdale Borough Council. With budget cuts and increased expenditures, it could mean volunteer services funded by local authorities could struggle to receive crucial government capital. Which adds value to this research as this can be used to demonstrate the necessity, success and importance of this service.

Leading on, in the UK, severe budget pressures are encouraging local public services to find more innovative cost-saving ways of tackling key issues such as spiralling social care needs and increasing poverty (Diamond and Vangen, 2017). Gerontologist Liz Lloyd (2006a), echoes these concerns and considers inadequate resources as a major problem in the health and social care industry; As people live longer and the government struggles to keep up with the rate of dependency, older people can end up vulnerable to ill physical and mental health, through the neglect of physical needs such as transport and at home care and through the mental implications of ill health and isolation.

Research by the Royal Society for the Encouragement of Arts, Manufacturers and Commerce (RSA) (Written by Paul Buddery, Director of Public Services) set out to



discover how different services can work together to form more effective and significant innovations in social care (Munro et al, 2017). In conducting the study, it became clear that voluntary organisations play a key role in many partnerships in social services. Many Politian's and public sector leaders agree that Voluntary organisations bring a "deeper understanding of local residents needs and concerns" while also suggesting "novel suggestions as to how these might be addressed" (Munro, 2018).

Further to this, The RSA found that public service delivery strategies "now rely explicitly on volunteering" providing the example of the NHS Five Year Forward View, which "locates the energy for sustainable health and social care systems in volunteers" (Buddery, 2015). Leading on, local authorities encourage volunteering as a means of making a community stronger and able to support themselves as traditional professional services "become difficult to maintain".

This research is relevant to the VDS as it contributes to preventative health care. The VDS provides transport to medical appointments, which for many of its members may not have been attended had the service not been available to them. This is because of issues such as anxiety of travelling to central hospitals, physical difficulties, which come with older age. Leading on the ECT Charity provides examples of how volunteer transport services help the wider community:

"taking an elderly lady on a weekly shopping trip not only saves a carer having to do this for her, but also boosts her wellbeing by getting her out and about. Ensuring that an 80-yearold man with diabetes gets to his regular check-ups means that he remains healthy and independent, reducing the chances of an emergency trip to hospital followed by weeks of after-care".

(Ealing Community Transport, 2016: p6)

This example is demonstrative of the impact organisations like the VDS have not only on the individuals who use them, as they "boost wellbeing" and help service users remain "healthy and independent". It also illustrates the impact services have on a



wider scale as transport services reduce the pressure on the NHS in the long run as likelihood of emergency trips and the need for hospital after-care.

3.2 Older People and Deprivation

Poverty affects nearly half of people aged 60 and over in deprived urban neighbourhoods (Scharf et al, 2002) this is based on research by Keele University in partnership with Help the Aged. Further to this the research found that older people living in deprived areas of England are at twice as likely to experience poverty compared to the whole of Britain, with two-thirds of older people experiencing medium to high levels of poverty. This is important with regards to the community of Rochdale because Rochdale has fallen into the 1% most deprived areas of England consistently since 2004 (Manchester Evening News, 2015), this is based on research from the Department for Communities and Local Government released in 2010. Although this is relatively dated, current updates of the concur that Rochdale is still an incredibly deprived area with almost a third of the population of Rochdale Borough (66,450 people) live in areas amongst the 10% most deprived in the country (IMD, 2018).

However, poverty among older people goes beyond low income (Poverty and Social Exclusion, 2018; Department for Work and Pensions, 2013). For example, a significant minority of older people were found to be socially isolated and/or severely lonely (Help the Aged, 2002) with many older people excluded from involvement in social relationships and civic activities within their communities. According to Age UK, poverty among older people is not determined only by income, material deprivation can be low even if financial income is high. If older people have social support networks, positive attitudes and priorities, good health and financial management it has a significant positive impact on their material circumstances. However, if they live in an area which lacks this they will experience higher levels of relative material deprivation (Poverty and Social Exclusion, 2018).

It is because of the prevalence of deprivation in Rochdale it has been used as a variable. The Index of Deprivation demonstrates levels of deprivation by postal areas and has been used in this research to determine groups, it quantifies both financial

and material deprivation. Oxford Consultants for Social Inclusions (OCSI) was commissioned by The Department for Communities and Local Government to update and review the 2010 index of deprivation. The model of deprivation is not based solely on financial aspects, it includes multiple units of deprivation. The measurement includes seven areas of deprivation, Income; Employment; Education, Skills and Training; Health; Crime; Barriers to Housing Services and Living Environment. The index is designed to be small area measures of relative deprivation which is useful to the research as it allows for small areas of Rochdale to be distinguished and categorised accordingly.

With deprivation being a key issue for older people in the UK it is useful to include it in the research. It will be interesting to demonstrate the impact, if any, deprivation has on members use of the service or the impact that the service has had on them.

3.3 Older People and Social Isolation

Leading on, another issue affecting many older people is social isolation, which was previously indicated as an issue which contributes to deprivation levels and identified by Help the Aged as a problem for older people. Social isolation can be caused by either social or geographic influences. It can be caused by a person living away from local amenities, friends or family, with no or little transport connecting them to such. Social disengagement theory argues that aging is a “mutual withdrawal which takes place between aging people and others”. This process leads to the relinquishment of roles since the person drops out of the working sphere and children move out of the home (Toepoel 2012; Cumming and Henry, 1961).

Giummarra et al. (2007) takes these ideas further with their interviews with health professionals. Finding that older people found that social connectedness and social activity are strongly associated with their overall health. The research uncovered that health professionals reported “mental and physical health deteriorating when older people are socially isolated” (Giummarra et al, 2007).

This is where the work of the VDS is important. The VDS helps to keep its users, who are vulnerable to social isolation, connected to their communities and amenities. Not



all trips are for leisure purposes, those that are, however, keep the service users in touch with society, through the volunteers. This small interaction may be often or rare, but both are points of contact and will help to keep the service users connected. Therefore, the questions, “The service has improved my social life.” and “The driving service has improved my independence” were used in the questionnaire. Both questions allow the respondent to reflect on their experience before using the VDS and what their life is like now.

3.4 Older People and Loneliness

De Jong Gierveld and Van Tilburg (2006) define loneliness as an expression of negative feelings of missing relationships. They distinguish two types of loneliness; firstly, emotional, which stems from the lack of intimate relationship or close attachment, and social, which stems from the absence of a broad group of contact or social network. Age has been found to be negatively related to network size, closeness to network members, and the number of non-primary-group ties (Cornwell et al. [2008](#)). This is comparable to the relinquishment of roles (Toepoel, 2012) such as roles as a parent or fulfilment of roles in employment. According to Bowling and Gabriel, 2004, age is arguably positively related to the experience of loneliness. The TNS Loneliness survey, 2014 found that in the UK 12% of older people (Aged over 65) feel cut off from society, 9% feel trapped in their own home and 6% leave their house less than once a week. Meanwhile over 65s are estimated to spend 80% of their time in their home (Help the Aged, 2006) and 30% would like to go out more often (Age UK, 2014).

Loneliness is tied with social isolation. If a person has limited or no social connections or does not have access to social networks, they may begin to feel lonely. The work of the VDS helps to combat this through introducing older members of society back into their communities. This may be through taking them to do their weekly food shop or taking them to see their family.

3.5 Older People, Travel and Mobility

Research demonstrates that many older people experience anxiety, exhaustion and distress (Age UK, 2017) when travelling to hospital appointments, while 1.45 million



people over the age of 65 find it difficult or very difficult to travel to their appointments. There are some major issues that older people face when travelling such as uncomfortable public transport and extra cost (Painful Journeys, 2017). Issues concerning poor quality transport can cause social isolation as older people choose to not travel due to the stress or discomfort they feel when travelling (“Closing the Gap”, 2013). “Community transport is an important – but often invisible – part of the solution” to many of these problems. (Whitty, 2016). Volunteer Transport Schemes allow older people to travel with “ease, convenience and peace of mind, allowing them to maintain their independence for longer and helps to prevent social isolation.” (Northampton Volunteer Car Scheme, 2018). The Volunteer Driver Service provides this solution to its members.

Research suggests that lack of mobility can lead to “loneliness, isolation and even death” (Musslewhite, 2008:26). Musslewhite argues that mobility which connects people for leisure purposes are vital to the well-being of older people and although some services (like the VDS) offer this, these services are “few and far between” (Musslewhite, 2018:26). Globally there is an increase in life expectancy and the dependency ratio (Musslewhite, 2018) In 1950 those over 60 years old accounted for 8.6% of the global population this has now risen to 11.6% and is expected to rise to 21.2% by 2050 (UN 2015). These changing demographics have an impact on transport policy especially as we live in a “hypermobility” society (Musslewhite, 2018, 28). This is where high levels of mobility are needed to stay in contact with friends and family and to access shops and services which have “become dispersed across space”. Being mobile is linked to quality of life (Schlag et al, 1996). Being immobile later in life has been linked to a decrease in wellbeing and increase in depression and health related problems. Older people are more likely to have physical difficulties which prevents them from driving or accessing transport (Schlag et al, 1996). They are also the most likely age group to give up driving or reduce their driving (Box, Gandolfi & Mitchell, 2011). This difficulty with accessing transport has led to a mobility deprivation amongst older people (DfT, 2001), those aged 75 and older report the



greatest difficulties in accessing shops and services and with feeling engaged in their community (Shergold, Pankhurst & Musslewhite, 2012).

3.6 Effective Service Provision

Tom Owen (2007), research manager for Help the Aged, reports that, older people need to develop relationships with people they trust, and outreach and community services play a vital role in the as acting as a single form of contact for older people.

Tanner and Harris (2008) explore the provision of effective social services. They report that social work needs to start with the experiences, perceptions and perspectives of older people and social workers need to be aware of individualism of older people and the social construction of age, by not assuming all older people are the stereotype. Stereotyping of older people include ideas of their social engagements and relationships, stereotyping is also embedded in gerontology as it focuses on the problems of old age, while public policy highlights loneliness and social isolation (Victor, Scambler and Bond, 2009). Effective social care providers will tune in with this and treat older people as individuals by responding and understanding their concerns.

Considering all the literature in this review, the following research question has been chosen:

What impact has the Volunteer Driver Service Had on Its Members?

3.7 Table of Variables

Table 1 Table of Variables

Name	Label	IV/ DV	Type of Variable
Use	Most Common Use of Service	DV/IV	Nominal
Membership	Membership of HMR Circle	IV	Nominal
Area2	Area of Deprivation	IV	Nominal
LastMonth	In the Last Month, how many times have you used the service?	DV/IV	Ordinal
Reliable	Do you think the volunteer drivers are reliable?	IV	Nominal
Confirmation	How would you like to receive confirmation of your journey?	IV	Nominal
Website	Would you be interested in a website or app, which allowed you to book or track your trip?	IV	Nominal
Confidence	I feel confident using public transport	IV	Ordinal
SameDriver	I prefer to use the same driver when I use the Volunteer Driver Service	IV	Ordinal
SocialLife	The service has improved my social life.	IV	Ordinal
DifficultTransport	I find it difficult to use public transport	IV	Ordinal
AnyDriver	I am comfortable with any driver	IV	Ordinal

PreferVDS	I prefer to use the volunteer driver service over other forms of transport	IV	Ordinal
LessWorried	Using the VDS makes travelling less of a worry for me	IV	Ordinal
PositiveImpact	Using the VDS has had a positive impact on my life	IV	Ordinal
ImprovedIndependence	The VDS has improved my independence	IV	Ordinal
Satisfied	I am satisfied with the service provided by the volunteer drivers	IV	Ordinal
TotalScore	TotalScore	DV	Scale

3.8 Hypotheses

Hypothesis one

RH1: There will be a relationship between Area of Deprivation and Impact of Service Score. (Two-tailed)

NH1: There will not be a relationship between Area of Deprivation and Impact of Service Score.

Findings Hypothesis Two

RH2: Respondents from areas of high levels of deprivation will use the service the least. (One-tailed)

NH2: Respondents from areas of high levels of deprivation will not use the service the least.

Findings Hypothesis Three

RH3: There will be an association between Areas of Deprivation and Membership of HMR Circle (One-tailed)

NH3: There will not be an association between Areas of Deprivation and Membership of HMR Circle

Hypothesis Four

RH4: Respondents who agree that the VDS is reliable, will have higher Impact of Service Score. (One-Tailed)

NH4: Respondents who agree that the VDS is reliable, will not have a higher Impact of Service Score.

Hypothesis Five

RH5: There will be a relationship between how often a person uses the service and their Total Impact of Service Score. (Two-tailed)



NH5: There will not be a relationship between how often a person uses the service and their Total Impact of Service Score.



Chapter 4- Project Methodology

Quantitative social research is a deductive view of the relationship between theory and research with a preference for the natural science approach and objectivist conception of social reality (Bryman, 2016). It encompasses a range of techniques that involve the analysis, collection and manipulation of numerical data. Quantitative research focuses on gathering numerical data and generalizing it across groups of people or to explain a phenomenon (Babbie, 2010; Muijs, 2010). This type of data can be collected by using primary surveys, questionnaires and polls or secondary data can be used and manipulated to fit research purposes. Quantitative methods are preferred by some researchers as this type of data can be generalised to reflect wider society. Qualitative research is an epistemological position, in contrast to the positive model, it stresses the understanding of the social world through the “examination of the interpretation of that world by its participants” (Bryman, 2016: 375).

Quantitative research has been criticised by qualitative researchers who argue that it fails to distinguish people and social institutions from the world of nature (Bryman,2016: 166). This critique is one put forward by phenomenologists. Phenomenology is a philosophy concerned with how individuals make sense of the world around them and how a philosopher should remove themselves from their own preconceptions (Bryman, 2016: 26). Alfred Schutz coined the term “world of nature” to distinguish between the “social reality” and “molecules, atoms and electrons” (Schutz, 1962: 59). For phenomenologists like Schutz, their fear is that a natural science approach interprets no meaning from its findings. Thereby, natural science approaches fail to “see things from that person’s point of view” (Bogdan and Taylor 1975: 13-14). Schutz accuses positivism of turning a blind eye to the difference between the natural order and social world, in turn, ignoring that people interpret the world around them and there is no amount of self-reflection and interpretation found among the objects of natural science.

Leading on the measurement process of positivist research is criticised by qualitative researchers for creating an artificial sense of accuracy (Bryman, 2016: 166). Cicourel (1964) argues that the connection between the concept and its measurement is

assumed by the researcher, which is the notion of “measurement by fiat”. Furthermore, the researcher assumes that the participants understand and interpret terminology in a similar way and with similar intentions. Therefore, quantitative methods don't allow for clarification on both the researcher and participant's perspectives.

However, this depth that can be lost with quantitative methods can often be problematic in qualitative research as qualitative methods can push subjective opinion and data can be interpreted and influenced by the researchers own attitudes and opinions. Research can often become impressionistic and subjective, meaning that findings are often reliant on the researchers sometimes unsystematic interpretation of what is important, valid and significant (Bryman, 2016: 166). However, quantitative research methods are not only focused on statistics and numbers, the natural science approach seeks to explain societal phenomena. Which means examining the causes, difference and relationships between variables. These being the independent and the dependant variables, or the cause and effect (Bryman, 2016; 163).

4.1 Research Methods

For this research quantitative methods were used to help in the understanding of the impact the Volunteer Driver Service (VDS hereafter) has had on its client's lives. Although using qualitative methods could have provided in depth understanding of older vulnerable people's lives before and after the VDS, qualitative methods tend to take a longer time to analyse and interpret meaning not as many respondents could have been included in the research. Using an attitudinal questionnaire, with a 5 point scale (Strongly disagree to Strongly Agree), meant that 73 people were contacted easily and efficiently with all data being inputted to SPSS in one day. Although depth of understanding will be limited to questions asked, some respondents did leave written feedback as well as completing the questionnaire which is helpful for the research as it provides some depth of understanding to the lived experiences of VDS clients.

4.2 Research Objectives

The main research objectives were set by HMR Circle although there was room for the research to go in any chosen direction. The main objective set by HMR Circle was for the research to collect official data on the impact of the VDS. A main issue for HMR Circle was that although they understood and knew the difference the VDS has made to everyday people's lives, they had no quantifiable understanding of this impact and only had feedback from members themselves through conversations and emails. Which does not provide a statistic for satisfaction and therefore the quality of service has not been measured effectively, which is partly why this research is needed. This included finding out if the VDS is effective as a service and does it have a positive impact on the service users lives. As a chosen research area some issues commonly associated with older people such as social isolation and loneliness were briefly explored. This was through asking about the impact VDS has had on their social life, independence and their ability to travel alone and with confidence.

4.3 Access Issues

The main access issue faced was that as vulnerable older people are the subject of research, they are harder to distribute questionnaires to. In order to be a member of the VDS and use the service, a person must be unable to travel. This does not just include physically unable but includes mental or emotional barriers keeping them from travelling, such as anxiety or dementia. Many participants had not provided an email addresses to the VDS which could have been used to contact them and so an online questionnaire for all members was not feasible.

It was important that the questionnaire had enough information and was branded with HMR circle's logos. This allows the participant to understand the legitimacy of the survey which in turn allows them to answer honestly. Alongside this, the service itself is difficult to access as almost 1000 trips a month are completed by the VDS. This means as a busy service, handing out questionnaires would have been inappropriate as it would interfere with the normal running of the VDS. Instead, further understanding of the type of people that use the service was done by spending time on the phones, taking bookings, talking to members and putting bookings on the online



system. Not only this but a postal questionnaire was chosen as the most appropriate way to contact service users. Using a postal questionnaire meant that the questionnaire appeared official as it was in a branded envelope and the information sheet (see appendix 3) and questionnaire (see appendix 5) were both branded.

This research uses primary data collected from a sample of VDS members. The sample reflects a variety of people who use the service. Such as vulnerable adults aged 30-60, who are a younger cohort of the service users. It is also inclusive of vulnerable elderly people who use the service independently and those service users who use the through the assistant of care givers. Some clients are unable to book trips themselves or travel alone which requires them to travel with a carer. In these more sensitive cases carers, spouses, partners and family members may have completed the questionnaire on the service user's behalf.

4.4 Pilot Survey

An online questionnaire was used to gather responses for the pilot survey (see appendix 4). Online questionnaires were sent out via email from the HMR Circle office. Using the company email address allowed respondents to recognise the company and encouraged them to respond. As it was coming from email and much of HMR Circle and VDS correspondence is done through post it was important for the questionnaire to appear legitimate. The format used was Google Forms as it allowed for easy distribution and download of the responses. Email surveys allow for a quick response time, with many responses being back on the same day. Google Forms automatically put responses into an excel file with respondent's names and email addresses. Using email addresses meant that respondent numbers could be used when inputting into SPSS, but it was clear who was yet to respond. Each respondent was given an ID number when inputted into SPSS, their emails were not put into the dataset. Not all members of the VDS have email addresses and so members who had emails were selected for the pilot. Selection was not random. Members were selected based on having an email address, however, some respondents were recommended by HMR Circle as people who would be likely to respond and be likely to look at their emails.



As many members do not use their emails or the email is provided by someone else, such as their children or carers. This approach is not suitable for all members of the VDS as all members are vulnerable adults and many have not provided emails and do not use the internet. In this case email questionnaires were useful as a pilot study as it allowed for a small group of people to be reached quickly. If online questionnaires were sent to all members of the VDS it may not be as effective as many members do not use their emails even if they have provided one.

Although the pilot was sent via email to 8 members of the VDS, the results of the Cronbach alpha were, 0.338. This demonstrates how the questions do not reliably measure what they are intending to. This is perhaps due to the low rate of response, with just 6 respondents, but also from the questions as well.

Although the reliability score is not at the threshold of 0.6, face validity can be used in this instance as the questionnaire's statements are simple and do not use complicated terminology, the questionnaire was further approved by the organisation.

The final questionnaire was distributed by post. Surveys were posted to 98 households as some respondents had two surveys sent as they were married. There was a response deadline of two weeks (18th February) which ensured responses were collected as quickly as possible. There were 68 respondents to the questionnaire all within the two-week deadline. Respondents were all given an information sheet explaining the outline of the research and giving them an ID number to keep. All questionnaires had ID numbers on them as well to keep track of responses. ID numbers and names were held on a spread sheet in alphabetical order. Further details such as age, postcode and most common use of service were collected from the HMR Circle data base. By collecting some information using secondary data it meant the questionnaire was shorter for the respondent, making it more likely for them to want to respond. It also meant much of the data could be inputted to an SPSS file before responses were back.

4.5 Data Cleaning and Recoding

There was some recoding to the variable Area. Originally the variable was categorised into areas, Rochdale, Middleton, Heywood, Castleton Norden and Littleborough (see table 3.3.18). This variable was collected from secondary data provided by HMR Circle. Information such as address, date of birth, membership and most common use of service can all be found through data already possessed by the organisation. The original set up for the variable Area is problematic because there are too many groups to compare and the groups are less evenly distributed and do not hold much statistical power, needed for analysis. The variable was recoded based on Index of Deprivation.

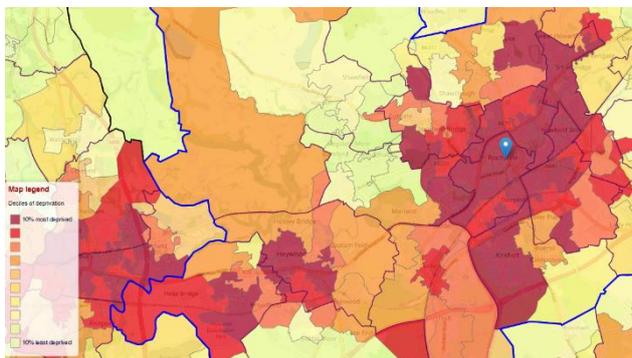


Figure 1 Index of Deprivation Map of Rochdale

The index of deprivation map was used to determine categorisation. Those whose postcodes appeared on the map in Dark Red zones of Rochdale were recoded as 1.00 to represent a high level of deprivation area. Those respondents whose postcodes were light red to orange were coded as 2.00

to be categorised into moderate levels of deprivation and lastly those postcodes which appeared yellow to green on the map were categorised as 3.00, low levels of deprivation. Recoding the variable meant that comparisons between wealth can be made. Although some areas are not close together geographically, those who are now grouped together share a similar background and analysis of Area2 is more useful to the research.

However, the Index of Deprivation looks at postal codes and does not identify ages within these postal codes. This means that although a member's of VDS may live in a deprived area, they themselves may not be as deprived as their neighbours. On the other hand, it is still important to categorise respondents based on the Index of Deprivation, because it allows for fewer groups for analysis and stronger statistical power. Not only this but the Index measures many factors of deprivation, including

crime, barriers to housing and overall living environment, which will be an issue or concern of all people in the area, including older members of the community.

4.6 Ethical Issues

Ethical approval was granted by Manchester Metropolitan University Ethos procedure based on filling out an online ethics form (Appendix 1). Amendments were over seen, and the form was signed by a supervisor, Adam Westall. The completed form detailed the nature of research, potential implications for participants and any health and safety hazards which stem from the nature of being on placement. There is no deception to this study as information was provided which ensured full transparency of the research. Participants were informed that no personal information would make them identifiable within the research and that ID numbers were kept in an encrypted file with only researcher's access. Raw data for this study is stored in an encrypted file on a computer and contains no personal information that makes participants identifiable to the researcher.

4.7 Measurement Issues

Area was measured on the basis of the deprivation index. As previously explained in Chapter 3 the index of deprivation indicates the level of deprivation across the UK. For the purpose of this research each postal code of respondents was used to categorise them based upon the colour coding system of the Index of Deprivation, 2018 data. This allowed the data to be categorised more effectively for analysis. This is because having the three categorizations (High levels of deprivation, Mid-levels of deprivation and low levels of deprivation) made groups larger and more evenly distributed.

The next variables needed to be edited to allow for higher level analysis. Originally intended to be a Likert Scale, the following variables, PositiveImpact, Satisfaction, SocialLife, ImprovedIndependence and LessWorried were calculated into a total score. This total score is not that of a Likert scale as there are no negative statements to counteract the positive ones. The reason there were no negative statements is that the questionnaire became incredibly large. Although it should have been reduced while still being a Likert scale, the variables that remain are important to the organisation and contribute to the research and wider understanding of volunteer



transport schemes. The variables have been calculated into a total score which represents the impact the service has had on people's lives. The original coding for all variables was, 1, strongly disagree to 5, strongly agree, however due to the error of not having negative statements these variables will be calculated to a total score whereby, the higher the score the stronger the impact the VDS has had on respondents' lives. Although it is not ideal for the data to be manipulated in this way, as it was avoidable, the questions still reflect the attitudes of the respondent and the questions were approved by the organisation. In terms of data analysis, it is beneficial to look at these variables as one scale to provide a higher level of analysis and understanding.

4.8 Design

This study was designed to be a part attitudinal and part demographical questionnaire. The data has been analysed using SPSS, inputting all responses and conducting bivariate and descriptive statistical analysis. The dependent variables in this research is TotalScore and other ordinal variables in the questionnaire. The independent variables are, Area of Deprivation, Membership of HMR Circle, Age, Most Common Use of Service and Frequency of Use.

Chapter 5- Findings and Analysis

5.1 How Do Members Use the Service

<u>Variable</u>	<u>Variable Name</u>	<u>Percentages/ Mean (sd)</u>
What is you most Common use of service	Use	Primary Health 22.7% Secondary Health 24.2% Leisure 43.9% Adult Care 9.1%
Are you a member of HMR Circle?	Membership	Yes 15.2% No 84.8%
Area (grouped on basis of deprivation levels)	Area2	High Deprivation 36.9% Mid-Deprivation 24.6%

		Low Deprivation 38.5%
How many times have you used the service in the last month?	LastMonth	Not at all 18.2% 1-4 times 40.9% 5-10 times 86.4% More than 10 times 27.3%
Do you think the VDS drivers are reliable?	Reliable	All the time 86.4% Most of the time 10.6% Never 1.5%
How would you like to receive confirmation of your journey?	Confirmation	Phone Call 80.3% Email 10.6% Text message 9.1%
Would you be interested in a website or mobile phone app which allowed you to book and/or track your trip?	Website	Yes 18.2% No 80.3%
I feel confident when I use public transport.	Confidence	Strongly disagree 40.9% Disagree 24.2% Neither 12.1% Agree 12.1% Strongly Agree 6.1%
I prefer to use the same driver when I use the Volunteer Driving Service.	SameDriver	Strongly Disagree 4.5% Disagree 13.6% Neither 31.8% Agree 28.8% Strongly Agree 13.6%
The service has improved my social life.	SocialLife	Strongly disagree 4.5% Disagree 1.5% Neither 21.2% Agree 42.4%

		Strongly agree 6.1%
I find it difficult to use public transport.	DifficultTransport	Strongly Agree 50% Agree 22.7% Neither 9.1% Disagree 9.1% Strongly disagree 6.1%
I am comfortable with any volunteer driver.	AnyDriver	Strongly Agree 28.8% Agree 45.5% Neither 3.0% Disagree 9.1% Strongly Disagree 7.6%
I prefer to use the Volunteer driver service over other forms of transport.	PreferVDS	Disagree 3.0% Neither 7.6% Agree 33.3% Strongly Agree 54.5%
Using the service makes travelling less of a worry for me	LessWorried	Agree 37.9% Strongly Agree 60.6%
Using the VDS has had a positive impact on my life	PositiveImpact	Neither 6.1% Agree 40.9% Strongly Agree 48.5%
The VDS has improved my independence	ImprovedIndependence	Disagree 1.5% Neither 9.1% Agree 33.3% Strongly Agree 53.0%
I am satisfied with the service provided by the Volunteer Drivers	Satisfied	Agree 21.5% Strongly Agree 78.5%
Total Score of Impact of the Service	Total Score	21.25 (4.24)

- The most common use of the service is for leisure (43.9%) which is interesting when compared to only 15% of members also being a member of HMR Circle. HMR Circle has a befriending service and organises activities for its members. This means that HMR Circle are potentially missing out a large demographic of people who may be interested in having a full membership with Circle.
- Most respondents use the service 5-10 times a month (86.4%), this is interesting because it means, on average, most respondents use the service more than once a week, which demonstrates how they are using VDS for regular trips.
- 84.6% of respondents believe the VDS are reliable which is important because it demonstrates how the service is trustworthy and a huge majority of members agree that they can depend on the VDS.
- Most respondents are not interested in a website or mobile phone app linked to the service (80.3%) while 80.3% would prefer to receive their booking confirmation through phone call. This is important information for the service because the organisation is considering developing this technology in the future.
- This demonstrates that how the service currently operates works well for the people who use it. Evident in the 78% of people that strongly agree with the statement “I am satisfied with the service provided by the Volunteer Drivers” and the 21% who agree with this.
- 40.9% of respondents do not feel confident using public transport, which is to be expected as the service was created for vulnerable people. However, 18% do feel confident using public transport, which is further supported by the 9.1% who disagree and the 6.1% who strongly disagree that they “find it difficult to use public transport”.
- 53% of respondents strongly agree that using the VDS has increased their independence, with 33.3% agreeing to this statement.

- 42.4% Agree that the service has improved their social life. It is made clear by previous literature that social life and preventing social isolation will prevent further health issues and contributes to a better overall wellbeing.
- Importantly, 60.6% of respondents strongly agree that using the VDS makes travelling less of a worry for them, with a further 37.9% agreeing to this.
- 28.8% of respondents agree that they would prefer to use the same driver, with 13.6% of respondents strongly agreeing to this. This is comparative to the 28.8% of respondents who strongly agree that they are comfortable using any driver and the 45% that agree to this. The two statements do contradict in results slightly. Which could mean that people have misunderstood the question.
- 38% of respondents live in areas of Rochdale with lower levels of deprivation, as calculated by the Index of Deprivation. This is compared to 36% living in Highly deprived areas of Rochdale and 24% living in mid-deprived areas. It is interesting that the majority of respondents are either in low level or high-level deprived areas, as opposed to there being an even spread or an extreme concentration in one. What this demonstrates is that older all older people are affected by vulnerability and mobility issues regardless of wealth. However, it poses interesting comparisons to be made between area of residence and their responses to the statements.

Frequency tables can be found in appendix 7.

5.2 How Has the Service Impacted Members Lives

5.3 Parametric Assumptions

Only one parametric test was ran for total score and area. As total score did not meet parametric assumptions of normality no further parametric assumptions were run.

5.4 Findings and Analysis

Findings Hypothesis One

RH1: There will be a relationship between Area of Deprivation and TotalScore.



Kruskal-Wallis Test Value	N	Df	Sig.
H=7.507	65	2	0.023
High Deprivation= 24.69; Mid Deprivation= 37.69; p= .094 High Deprivation= 24.69; Low Deprivation= 37.93; p=0.039 Mid Deprivation= 37.69; Low Deprivation=37.93; p= 1.00			

The Kruskal-Wallis test, ($H(2) = 7.507, P=.023$) is statistically significant, the null hypothesis is rejected. Findings suggest there is a relationship between areas of deprivation and the positive impact the service has had on a person's life. The Pairwise comparison tests indicates a significant relationship is between those of High deprivation areas (Mean rank= 24.69) and those of Low deprivation areas (Mean rank= 37.97). Although the Pairwise does not show any significant relationships between High deprivation and Mid deprivation (Mean Rank= 37.69) or between Mid deprivation and Low Deprivation.

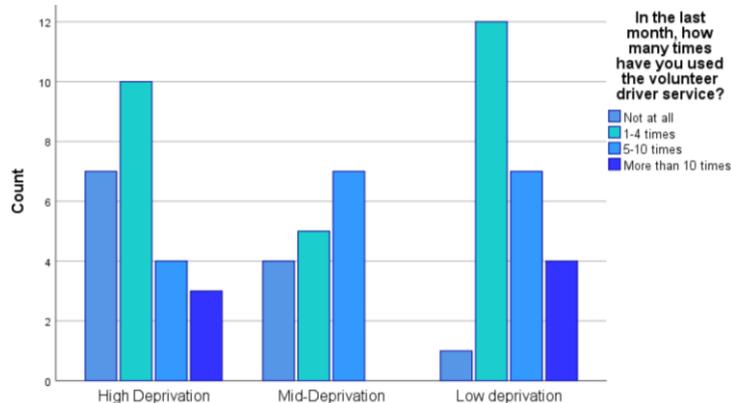
To take this a little further, a Spearman's Rho analysis was conducted the results ($\rho=.308; N= 65; \text{Sig}= .012$) indicate a statistically significant, weak positive association between Area of Deprivation and Total Impact Score. Therefore, the overall findings suggest low deprivation levels are significantly related to increased positive attitudes towards the service. Perhaps the correlation is so weak ($\rho= .308$) because the only significant association found in the Kruskal-Wallis, was between High and Low levels of deprivation.

As reflective of the Kruskal-Wallis and Spearman's Rho, the significant relationship is between High and Low areas of deprivation and the positive correlation is, between increasing levels of wealth and Impact of the Service. Therefore, the research hypothesis can be accepted, there is a relationship between Areas of Deprivation and TotalScore.



Findings Hypothesis Two

RH2: Respondents from areas of high levels of deprivation will use the service the least.

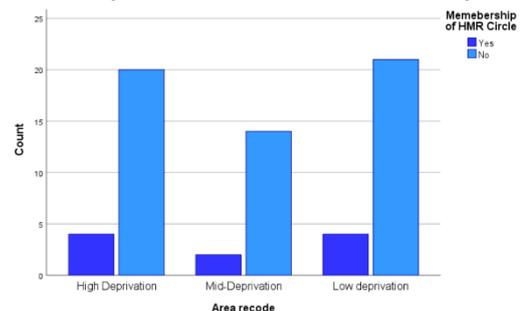


The results of the Spearman's Rho ($\rho = .227$; $N = 65$; $p = .036$) demonstrate a significant, positive relationship between the variables, however this is a very weak relationship. Conclusive that respondents from high levels of deprivation do use the service the least while respondents from areas of low deprivation use the service the most. The relationship is weak because all members of VDS use the service because they are vulnerable, regardless of wealth.

Findings Hypothesis Three

RH3: There will be an association between Areas of Deprivation and Membership of HMR Circle

The null hypothesis is accepted according to the results of the Chi Square and Cramer's V outputs (Appendix 8c). They demonstrate no association between the two variables (Chi Square Value = .140; Cramer's V = .46; Sig = .932). While expected and observed results demonstrate no significant differences.



Hypothesis Four

RH4: Respondents who agree that the VDS is reliable, will have higher TotalScore.



The findings of the Spearman's Rho analysis (Sig= 0.243; Correlation Coefficient= 0.88) concluded there is no relationship between Impact of Service Score and whether people think the VDS is reliable. There is an insignificant, weak and positive correlation between the two variables. The null hypothesis (NH4) is accepted.

Hypothesis Five

RH5: There will be a relationship between how often a person uses the service and their TotalScore.

The results of the Spearman's Rho (rho= .448; N= 65; p= .000) demonstrates a significant, positive relationship between how frequently a person uses the service and how much of an impact the service has had on their lives. This relationship is of medium strength and is expected because if a person is frequently using the service, they will be more satisfied and in turn use it more. However, the relationship is not strong because all the total score is skewed to the right as scores are consistently high among respondents. Therefore, the null hypothesis is rejected and there is a relationship between how often a person uses the service and the TotalScore.

All bivariate analysis outputs can be found in Appendix 8



Chapter 6- Summary of Key Findings

- The key findings from the Bivariate Analysis are there are many significant relationships between Areas of Deprivation and other variables, which begin to demonstrate a narrative.
- There is a positive relationship between Area of Deprivation and Total Impact score, this demonstrating that there are significant differences between Low Deprivation Areas and High Deprivation Areas respond to the services impact.
- Areas of Low deprivation tend to have a higher total score, leading on, respondents who live in areas of low deprivation use the service more frequently than those in High Deprivation Areas.
- Those who use the service the most frequently provide higher Impact of Service Scores.
- The descriptive statistics clearly highlight the immense success of the service and explicitly demonstrates the impact the service has on respondent's real-life experiences.
- Statistics such as, 78% of people strongly agree that they are satisfied with the service (with a further 21% Agreeing to this).
- It is widely agreed among respondents that the service has improved independence (Strongly Agree= 53%; Agree= 33%), Improved their social life (Agree= 42%), Travelling is less of a worry for them (Strongly Agree= 61%; Agree= 38%) and Had a positive impact on their life (Agree= 41%; Strongly Agree= 48%). It is clear from these statistics that the work of the VDS is highly important in people's lives.
- A huge majority of respondents are not interested in a website or mobile app to book or track their journeys (80.3%), the same percentage of people would prefer to continue to be contacted by phone rather than Email or Text Message.
- This shows that the organisations ideas of introducing the website or app would only target 20% of their users, and may not be worthwhile, from the service user's perspective.

- 18% of respondents agree or Strongly agree that they are confident using public transport, which is further confirmed by the second statement analysing this where by 15% of respondents disagreed or strongly disagreed that they “find it difficult to use public transport”.

Chapter 7- Discussion

The literature review concluded; an ageing population has a profound impact on the economy as there are more people to look after for a longer period than before. Older people are more likely to require extensive and continual healthcare meaning they need a means of transport to get to appointments as the grow older, they need more preventative health and social care provisions (Allan,2008). As explained in the literature review, health and social care has experienced £160 million worth of cuts, according to Age UK, 2017. This cut means that the healthcare system will struggle to provide for everybody. It has also meant that healthcare has become a “postcode lottery” (Age UK, 2017) whereby there is not an equal distribution of care, with limited access to care provisions such as hospital provided transport and problems of affordability. Therefore, preventative healthcare is essential in an ageing population as it means ailments and illnesses can be treated earlier avoiding the need for older people to need more extensive or invasive treatment (ECT, 2016). Volunteer Driving Services contribute to preventative care both on a practical level and an emotional level.

The research demonstrates evidence to support that the VDS provides preventative care on practical level, through the statistics such as, 47% of the VDS members use the service for medical appointments. These medical appointments may not have been met otherwise because members of the service are unable to use public transport or drive themselves. As explained in the literature, 1.45 million people over the age of 65 find it difficult or very difficult to travel to their appointments (Age UK, 2017). The Volunteer Driver Service helps members go to regular appointments, which is made clear in the statistics as 86% of members have used the service 5-10 times in the month leading up to taking the survey. The example provided previously, by Ealing Community Transport, 2016, community transport services help not only to “boost



wellbeing” of their users but also ensure “regular” appointments are met which in turn “reduces the chances of emergency trips” and members of such services can remain healthy and independent. This is echoed in the research as 53% of members Strongly Agree that using the VDS has improved their independence and a further 33.3% Agree to this.

Leading on the work of Age UK’s report Painful Journeys is applicable to the findings in this research. The report found many older people experience anxiety, exhaustion and distress (Age UK, 2017) when travelling to hospital appointments and older people experiences major problems when travelling such as uncomfortable or inadequate public transport and the financial expense of travelling and with 15% of people feeling worse after their hospital appointments (due to stress caused). The research concluded that the main issues older people are faced with are long and uncomfortable journeys, the expense of transport and wasted time on these people’s families and finally the varying quality of hospital transport services. In light of these issues found in Age UK’s research, the results of this research are all the more demonstrative of how effective the service is. It was found in the research that, 98% of respondents feel less worried when they use the VDS, 86.4% think that the service is reliable All of the Time and 89% agree or strongly agree that the VDS has had a positive impact on their life. It is evident from the statistics that the VDS offers a solution to the problems addressed in the Painful Journeys report. The VDS relives the stress of travelling from its members as it means the pressure placed on their families is relieved and worries of travelling using public transport are also diminished. It is also a less expensive service than using a taxi or trains. The statistics here demonstrate the impact the VDS has on its members overall wellbeing when they travel as they can use a trusted service and not worry about price and timings of meeting appointments.

As previously discussed in the literature review, social isolation is an issue that effects many older people in the UK. Social isolation can be both emotional, as people withdraw from family and work ties (Toepoel, 2012) or geographical, whereby people live away from local amenities and friend and family. It is found that social connectedness can be directly linked to a person’s overall health (Giummara et al,



2007). And that a person's mental and physical health deteriorates when social relationships breakdown. This social isolation can lead to loneliness, which is another issue that the literature found to impact older people disproportionately to the rest of the population (Bowling and Gabriel, 2004). Loneliness is the expression of negative feelings or missing relationships, which can stem from social isolation, from living away from family and the relinquishment of roles (Toepoel, 2012). Loneliness and isolation can also be experienced through the absence of broad social contacts, not necessarily from close relatives (De Jong Giervela and Van Tilbury, 2006). The VDS provides this form of broad contact through regular trips with drivers. 42% of members prefer to use the same driver however, 74% are comfortable using any driver, providing evidence of the relationships that are formed through using the VDS, as drivers can offer companionship for those members who struggle with loneliness. This is especially important considering previous research because 6% of older people leave the house less than once a week and a further 9% feel trapped in their own home compared to the 30% that would like to go out more (Age UK, 2014). The work of the VDS is important in this sense because 44% of trips are made for leisure, such as shopping, religious meetings and meeting friends and family. With this number of trips being made for leisure, it demonstrates how the work of VDS is contributing to combatting loneliness and isolation in its members. This is further supported by the finding that 48% agree or strongly agree that the VDS has improved their social life. Relating this to the state of health and social care in the UK, preventing loneliness and isolation prevents further illness in older people (Allan, 2008).

There were many relationships found in this research concerning peoples Levels of Deprivation (Area2) and how they interact with the service. Previous research has found that poverty affects 50% of older people over that age of 65 years. Deprivation is a key issue for the people of Rochdale because as a town it has consistently fallen into the top 1% most deprived towns and cities in the UK. Scarff et al (2002) concludes that 2/3's of older people lives in either medium or high deprivation. This is comparable to the respondents in this survey as 61% fall into medium or high levels of deprivation.



This measure of deprivation includes material and financial factors which are all measure by the Index of Deprivation.

With regards to the key findings, area of deprivation has an influence on how members use the service. Areas of High Deprivation use the service the least and generally have lower TotalScore when compared to those people in Low Deprivation Areas. Alongside this, those who use the service the most, generally people who live in Low Deprivation Areas, have the highest TotalScores. this demonstrates that people who live in areas of High Deprivation are not engaging with the service as much as those in Low Deprivation areas. This could be for a number of reasons such as, affordability, perhaps they only use the service for absolutely necessary trips, it could also be that there are less social and leisure activities in their area so they may not be engaging with their communities as much. Unfortunately, there was no relationship found between Area and most common use of service which means it cannot be assumed how respondents compare with their use. This research demonstrates that all levels of deprivation use the service in the same way, it's just that people in Low Levels of Deprivation Areas use the service more frequently. Were this research to be conducted again, a deeper look into the deprivation index would be helpful, this way factors which specifically influence a person's relative deprivation could be explored in detail, factors such as, Environment, Financial Situation, Barriers to housing etc. This would further the scope of research because it would allow respondent's individual deprivation concerns to be analysed more critically. It would also be beneficial for a larger scale of participants to be used as this would give stronger statistical power to the trends and correlations that were found.

In conclusion, the findings demonstrate how the VDS is an extremely vital service just as similar services referenced in previous research have been found to be. The VDS is a key instrument in members social lives and in their mobility. However, as the dependency ratio continues to increase nationally and budget cuts continue to effect healthcare, research into the importance of services like this has to increase with it. In order to shed light on the key impact that the VDS has on the member's everyday lives. Firstly, to answer the wider research questions, the Members use the service in



a variety of ways including for leisure and medical reasons. Without the implementation of the service, many people would struggle to meet their appointments and to stay connected in their communities. Finally, to address the impact the service has on people, this research has made clear that the VDS reduces older people's anxiety surrounding travel (LessWorried) and has improved older people's independence (ImprovedIndependence) and the social lives of members (SocialLife). Overall the service is working extremely well for its members which is clear in the 100% of members agreeing that they are satisfied with the service. The success of the VDS is clearly demonstrated throughout this research and with reference to previous studies, it is made clear the impact on members who use the service, and the wider community and economy.

Chapter 8- Recommendations

Further findings from this research lead to some small recommendations for the organisation.

Firstly, the literature review and discussion have concluded the importance of social connectedness in older people as a preventative method of healthcare. This research found that only 15.2% members of VDS are members of HMR Circle. It could be beneficial for the organisation to invest in advertisement for HMR Circle to members of VDS. This would help to boost the overall well being of its members as it would give them greater opportunities for socialising and befriending.

Secondly, the organisation has been considering funding an App or website which helped to cut down the work of the VDS office volunteers by allowing members to book trips online or receive confirmations either online or by text message. As per the results of the research this is not in the interest of the VDS members as 80% are not interested in an App or Website and 80% would prefer to receive confirmation of journeys by phone call. Instead of this, it could be useful for the organisation to have a driver assigning app or programme instead. This way the members can still receive confirmation by phone call, as they prefer. But the work of the Volunteers is reduced as driver assignation is done through an application instead of manually. This



programme could collate availability and send notifications to drivers with opportunities for unassigned trips.

Lastly, the service is targeted at vulnerable and older people who cannot use public transport or do not have other forms of transport. This research has demonstrated that 18% of respondents agree or strongly agree that they are confident using public transport. In the future it could be useful for the service to change its membership requirements, rather than taking on new members via the phone and taking their word that they are unable to travel, perhaps it could be useful to implement measures such as doctoral referral or a letter of supporting statement from friend or family member. This way the membership process is harder, which could deter people who are trying to bend the rules, but it also allows for greater confirmation of a person's inability.

Chapter 9- Reflective Discussion

The following discussion uses Gibb's Reflective Cycle (1988) to discuss my time writing this research and completing a placement at HMR Circle.

There was an option to either complete a standard dissertation, with my own chosen topic and dataset, or to conduct a placement dissertation where the topic and methods of research were informed by an organisation. I believed that a placement dissertation would be more useful for me as it allowed me to gather work experience within a workplace environment and allowed for me to conduct my own primary research, which I believed would demonstrate my skills as a researcher to future employers.

A placement interested me as it meant that I could have one designated day a week for my dissertation, which fit into my schedule as I work 3 days a week. Doing a placement also gave me the opportunity to be apart of a work environment. Having a clear research plan and aims and a designated day during the week helped me to stay on track with my work.

One aspect of conducting primary research I struggled with was gaining the ethical approval, this was because I was not aware of how much needed to be controlled and implemented for my research to be an ethical. There was a lot of unexpected ethical



issues such as hazards of working in an office and hazards of commuting. Although this took time, I understand why it was important and, in the future, if I have to conduct myself in the same way, I will be more experienced and expect to allow more time for completing my ethics.

The experience of primary research was interesting and daunting. This piece of work required me to collect information about the service from the members so that the organisation had statistical evidence of its successes and had information on areas of which it could make improvements. When I first found out I was conducting my own research, I was initially apprehensive. This is because although I had done similar before for assignments, I was not confident of my skills and experience enough. From conversations with previous students the consensus was that conducting primary research was an unnecessary stress to put on top of a dissertation. However, once I started completing the work, I felt that what they had said was not applicable to me. Although doing my own research was at times stressful, it has given me valuable work experience and has allowed me to take my research and data in whatever direction I wanted to. What did not go so well was the design of the questionnaire. I did not produce a proper Likert Scale which meant my data had to be manipulated for analysis which is not statistically powerful or ethically ideal. In the future when conducting research extra care and research will go into effective questionnaire design and into other methods of attitudinal measurement, other than a Likert Scale.

Overall, I enjoyed my experience at HMR Circle, were I to do this again I would increase my involvement in the charity. Although I spent time on the phones in the office, taking bookings and assigning drivers to trips, in retrospect I would have liked to have taken a more active role in the office by volunteering more and make the effort to go to HMR Circle events. Even though these events are separate from the VDS and VDS members may not have attended, I think it would have developed my understanding of the type of people that need use the service. It would have given me the opportunity to understand the sample more which could've been reflected in my discussion and findings or contributed to my questionnaire.





References

1. A, Bartlett., C, Frew., J, Gilroy (2013) “*Understanding Material Deprivation Among Older People*” In-House Research., Department for Work and Pensions. [Online] <https://www.bl.uk/britishlibrary/~media/bl/global/social-welfare/pdfs/non-secure/u/n/d/understanding-material-deprivation-among-older-people.pdf> Last Accessed: 29/04/2019
2. A, Bryman. (2016). “*Social Research Methods*”. Oxford University Press. 5th edition
3. A, Mathew-King., (2018) “*Budget 2018: Extra £650m for social care a sticking plaster that only staves off total collapse, experts warn*” . The Independent. (online) <https://www.independent.co.uk/news/health/budget-2018-social-care-funding-nhs-philip-hammond-spending-latest-reform-a8607491.html> Last Accessed: 29/04/2019
4. A, Schutz. (1962) *The Problem of Social Reality: Collected Papers I*. The Hague: Martinus Nijhoff.
5. A, Whitty. Ealing Community Transport. (2016). “*Why Community Transport Matters: Proving the Case for Community Transport and its Positive Impact on Health, Well-Being and Communities*”. (online) https://ectcharity.co.uk/files/uploads/ECT_Why_community_transport_matters_Final_version4.pdf Last Accessed: 29/04/2019
6. Age UK (2018) “*Later Life in the United Kingdom: April 2018*”. Help the Aged. (online) https://www.ageuk.org.uk/globalassets/age-uk/documents/reports-and-publications/later_life_uk_factsheet.pdf Last Accessed: 29/04/2019
7. Age UK. (2014) “*Over 1 million older people in the UK feel lonely*” (Online) <https://www.ageuk.org.uk/latest-news/archive/over-1-million-older-people-in-uk-feel-lonely/> Last Accessed: 29/04/2019
8. Age Uk. (2018) “*Poverty In Later Life*”. (Online) https://www.ageuk.org.uk/globalassets/age-uk/documents/reports-and-publications/reports-and-briefings/money-matters/rb_apr18_poverty_in_later_life Last Accessed: 29/04/2019
9. Ageuk.org.uk. (2018). *Care in Crisis | Age UK*. [online] Available at: <https://www.ageuk.org.uk/our-impact/campaigning/care-in-crisis/> [Accessed 19 Nov. 2018].
10. Allan, J., (2008) ‘Older people and Wellbeing’. Institute for Public Policy Research.
11. Anderson, L. (1998) *Loneliness research and interventions: a review of the literature. Ageing and mental health, 2, 4, 264-274*
12. Bos, D. and Weizsacker, R. (1989). Economic consequences of an aging population. *European Economic Review* 33: 345-354.
13. Box, Gandolfi and Mitchel. (2011). “*Maintaining safe mobility for the ageing population: the role of the private car*”. The RAC Foundation. (online) https://www.racfoundation.org/assets/rac_foundation/content/downloadables/maintaining%20safe%20mobility%20-%20rac%20foundation%20-%2020140410%20-%20report.pdf Last Accessed: 29/04/2019

14. C. Miller. (2015) "Deprivation in Manchester: Stats show city comes top of mostdeprived areas of England". Manchester Evening News. (Online)
<https://www.manchestereveningnews.co.uk/news/greater-manchester-news/deprivation-manchester-stats-city-top-10166607> Last Accessed: 29/04/2019
15. C.B.A Musslewhite. (2010). The role of education and training in helping older people to travel after the cessation of driving., *International Journal of Education and Ageing* 1(2), 197-212 ISSN 2044-5458
16. Closing the Gap: Prime ministers report 2013. (2013). [eBook] Available at: https://www.dss.gov.au/sites/default/files/documents/02_2013/00313-ctg-report_fa1.pdf [Accessed 19 Nov. 2018].
17. Cornwell, B., Laumann, E. O., & Schumm, L. P. (2008). The social connectedness of older adults: A national profile. *American Sociological Review*, 73, 185–203.
18. D, Muijjs (2010). "doing quantitative research in education with SPSS". 2nd edition, London, GB. SAGE Publications (in press)
19. De Jong Gierveld, J., & van Tilburg, T. (2006). A 6-item scale for overall, emotional, and social loneliness: Confirmatory tests on survey data. *Research on Aging*, 28, 582–598.
20. DfT (Department for Transport) (2001). Older Drivers: a literature review. London. Department for transport. Available at: <http://aka.dft.gov.uk/pgr/roadsafety/research/rsrr/theme3/olderdriversaliterature/erevie4770> Last Accessed: 29/04/2019
21. DfT (Department of Health and Social Care) (2018) "240 million social care investment to ease NHS winter pressures". Department of Health and social care. (online) <https://www.gov.uk/government/news/240-million-social-care-investment-to-ease-nhs-winter-pressures> Last Accessed: 29/04/2019
22. Diamond, J, Vangen, S, 2017, Coping with austerity: Innovation via collaboration or retreat to the known?, *Public Money & Management* 37, 1, 47–54
23. E, Babbie. (2010). "The Practice of social research". 12th Edition, Wadsworth, Belmont
24. E, Cumming and W, E. Henry. (1961) "Growing Old: The Process of Disengagement". New York: Basic Books.
25. Ealing Community Transport. (2016). "Why Community Transport Matters: Proving the Case for Community Transport and its Positive Impact on Health, Well-Being and Communities". (online)
https://ectcharity.co.uk/files/uploads/ECT_Why_community_transport_matters_Final_version4.pdf Last Accessed: 29/04/2019
26. Falkingham, J. (1997) *Who are the baby boomers?* In Evandrou, M. (ed.) *The Baby Boomers: Ageing in the 21ST Century*. Age Concern England, London.
27. Gibbs G (1989) *Learning by Doing: A guide to teaching and learning methods*. Further Education Unit. Oxford Polytechnic: Oxford.
28. Giummarra, M. J., Haralambous, B., Moore, K., & Nankervis, J. (2007). The concept of health in older age: Views of older people and health professionals. *Australian Health Review*, 31, 642–650.

29. HMR Circle (2018). [online] Hmrcircle.org.uk. Available at: <http://hmrcircle.org.uk/> [Accessed 19 Nov. 2018].
30. J, Beech., S, Bottery., A, Charlesworth., H, Evans., B, Gershlick., N, Hemmings., Candace Imison., P, Kahtan, H, McKenna, R, Murray and B, Palmer. (2019) “Closing the Gap: Key areas for action on the health and care workforce”. The King’s Fund. (Online) <https://www.kingsfund.org.uk/publications/closing-gap-health-care-workforce> Last Accessed: 29/04/2019
31. K. Dhaliwal., (2016) “Harmful effects of the Ageing Population on the Economy”. University of Kent. [Online] Last accessed: 17/04/2019 <https://www.kent.ac.uk/news/society/11994/harmful-effects-of-the-ageing-population-on-the-economy>
32. Lloyd, L. (2006a) “A Caring Profession? The Ethics of care and social work with older people”. British Journal of Social Work. 36: 1171-85
33. M, Kotecha., S, Arthur., S Coutinho., A, Bartlett., C, Frew., J, Gilroy and L, Taylor. (2013). “Understanding Pensioners Poverty and Material Deprivation- A synthesis of Findings”. Department of Work and Pensions. [Online] https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/197676/827summ.pdf Last Accessed: 29/04/2019
34. M, Randall. (2017) Overview of the UK population: July 2017. Office of National Statistics. (Online) <https://www.ons.gov.uk/peoplepopulationandcommunity/populationandmigration/populationestimates/articles/overviewoftheukpopulation/july2017> Last Accessed: 29/04/2019
35. M. Taylor., (2014) “A formula for Volunteering?”. The Royal Society for the Encouragement of Arts, Manufacturers and Commerce. [Online] Last accessed: 17/04/2019 <https://www.thersa.org/discover/publications-and-articles/matthew-taylor-blog/2014/08/a-formula-for-volunteering>
36. Marshall, A. & Norman, P., 2013. Geographies of the impact of retirement on health in the United Kingdom. Health & Place, March, Volume 20, pp. 1-12.
37. McMullan, J. (2017). *Population estimates for the UK, England and Wales, Scotland and Northern Ireland - Office for National Statistics*. [online] Ons.gov.uk. Available at: <https://www.ons.gov.uk/peoplepopulationandcommunity/populationandmigration/populationestimates/bulletins/annualmidyearpopulationestimates/mid2017> [Accessed 19 Nov. 2018].
38. Munro, J, Burbidge, I, Robson, J, 2017, Transforming together: Leading for people and place, London: RSA
39. Munro, J.(2018). *The Voluntary Sector Contributions to Local Innovations Across The Public Sector*. Voluntary Review. 9, 2, pp 215-224 (10)
40. Musselwhite, C. and Haddad, H. (2008) Travel and well-being. Travel independence and car dependence: An exploration of older drivers travel and driving needs. In: *British Society of Gerontology Conference*, Bristol, UK, September 2008.

41. Musselwhite, Charles. (2018) Community Connections and Independence in Later Life. In *Psychologies of Ageing*. (pp. 212-252). Cham: Palgrave Macmillan.
42. Musselwhite, Charles. (2018). Age Friendly Transport for Greater Manchester. Swansea, UK.
43. Musselwhite, Charles. (2018). The importance of a room with a view for older people with limited mobility. *Quality in Ageing and Older Adults*
44. Northampton Voluntary Car Scheme. (2019) Voluntary Impact Northamptonshire (Website) <http://www.voluntaryimpact.org.uk/car-scheme/> Last Accessed: 29/04/2019
45. Owen, T. (2007). Working with socially isolated older people. *British Journal of Community Nursing*, [online] 12(3), pp.115-116. Available at: <https://doi.org/10.12968/bjcn.2007.12.3.23038> [Accessed 19 Nov. 2018].
46. P. Buddery., (2015) “*Report: Volunteering and Public Services*”. The Royal Society for the Encouragement of Arts, Manufacturing and Commerce. [Online] Last accessed: 17/04/2019
<https://www.thersa.org/discover/publications-and-articles/reports/volunteering-report>
47. Painful Journeys: Why getting to hospital appointments is a major issue for older people. (2017). [ebook] London: Tavis House. Available at: https://www.ageuk.org.uk/contentassets/7354623c9df1491a84cc34ef46105647/painful_journeys_campaignreport.pdf [Accessed 19 Nov. 2018].
48. PSE (Poverty and Social Exclusion) (2018) *Older People*. (online) <http://www.poverty.ac.uk/tags/older-people> Last Accessed: 29/04/2019
49. R, Bogden., S.J, Taylor (1975) “*Introduction to qualitative research methods*”. New York: Wiley- Interscience
50. R, Humpries., R, Thorlby., H, Holde., P, Hall., A, Charles. (2016) “*Social Care for Older People: Home Truths*”. Nuffield Trust. (Online) <https://www.nuffieldtrust.org.uk/research/social-care-for-older-people-home-truths> Last Accessed: 29/04/2019
51. Randstad (2018) “*The 2018 budget- how will it affect health and social care?*”. Randstad. (2018) (online) https://www.randstad.co.uk/workforce360/archives/the-2018-budget-how-will-it-affect-health-and-social-care_1449/ Last Accessed:29/04/2019
52. Ritzer, G. (2000) *The McDonaldization of Society*, New Century edition, Thousand Oaks: Pine Forge Press.
53. S, Coates. (2018) “*Overview of the UK population: November 2018*”. Office of National Statistics. (online) <https://www.ons.gov.uk/peoplepopulationandcommunity/populationandmigration/populationestimates/articles/overviewoftheukpopulation/november2018> Last Accessed: 29/04/2019
54. Shlag, Bernhard & Schwenkhagen, U & Tränkle, U. (1996). Transportation for the Elderly: Towards a User-Friendly Combination of Private and Public Transport. IATSS Research. 20. 75-82. (online) https://www.researchgate.net/publication/284678293_Transportation_for_the_Elderly_Towards_a_User-

[Friendly Combination of Private and Public Transport](#) Last Accessed: 29/04/2019

55. T, Scharf, C, Phillipson, A, E Smith. (2002) "Growing Older in Socially Deprived Areas: Social Exclusion in Later Life". Help the Aged. [Online] https://www.ageuk.org.uk/documents/en-gb/for-professionals/communities-and-inclusion/id2255_a_growing_older_in_socially_deprived_areas_social_exclusion_in_later_life_2002_pro.pdf?dtrk=true Last Accessed: 29/04/2019
56. T, Smith, M, Noble, S, Noble, G, Wright, D, McLennan and E, Plunkett. (2015). "The English Indices of Deprivation: research report". Department of Communities and Local Government. (Online) https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/464597/English_Indices_of_Deprivation_2015_-_Research_Report.pdf Last Accessed: 29/04/2019
57. Tanner, D. and Harris, J. (2008). *Working with older people*. London: Routledge/Community Care.
58. Thane, P. (1989). Old age: burden or benefit? The changing population of Britain. Joshi, H. Oxford, Blackwell: 46-55.
59. The Economist, (2009) "Old-age dependency ratios." *The Economist*, 9 May 2009, p. 94(EU). *Academic OneFile*, <http://link.galegroup.com/apps/doc/A199203171/AONE?u=mmucal5&sid=AO NE&xid=160ba0a7>. Accessed 17 Apr. 2019.
60. The Health Foundation, (2018) "Budget 2018: What it means for health and social care." (2018) The Health Foundation. (online) https://www.health.org.uk/sites/default/files/upload/publications/2018/Budget-2018-Briefing-181108_0.pdf Last Accessed: 29/04/2019
61. Tingay, Karen Susan., Roberts, Matthew. & Musselwhite, Charles B.A.. (2018). Including household effects in Big Data research: the experience of building a longitudinal residence algorithm using linked administrative data in Wales. *International Journal of Population Data Science* 3(1)
62. Toepoe I. (2012) "Ageing, Leisure, and Social Connectedness: How could Leisure Help Reduce Social Isolation of Older People?" <https://doi-org.ezproxy.mmu.ac.uk/10.1007/s11205-012-0097-6>
63. United Nations., (2015) *World Population Ageing*. United Nations. New York. (online) https://www.un.org/en/development/desa/population/publications/pdf/ageing/WPA2015_Highlights.pdf Last Accessed: 29/04/2019
64. V. Cicourel, Aaron. (1965). Method and Measurement in Sociology. *Journal of Marketing Research*. 2. 10.2307/3149988.
65. Victor, C. (2005) 'The social context of Ageing'. London: Routledge
66. Victor, C., Scambler, S. and Bond, J. (2009). *The social world of older people*. Maidenhead: The Open University Press.
67. Warwick-Edinburgh Mental Well-being Scale (WEMWBS) © NHS Health Scotland, University of Warwick and University of Edinburgh, 2006, all rights reserved// Using WEMWBS to measure the impact of your work on mental wellbeing

68. Z, Gabriel., A, Bowling. (2004) *“Quality of Life from the Perspective of Older People”*. Ageing and Society. Cambridge University Press. (p 677-691).
Online <http://discovery.ucl.ac.uk/1648/1/qualityoflife.pdf> Last Accessed:
29/04/2019

