

# RURAL CAR DEPENDENCE: AN EMERGING BARRIER TO COMMUNITY ACTIVITY FOR OLDER PEOPLE?

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#### **Abstract**

Community activity is identified as a key contributor to quality of life for many older people. and mobility is central to its facilitation. Following the premise that community activity enables the accumulation of social capital within a community, a link is proposed between 'mobility capital' and the sustainability of that community. As older people comprise a growing share of rural populations, they are of increasing importance to both kinds of capital within those communities. However, their mobility is problematic, due to limitations in physical capacities and access to transport. This paper also contends that rural mobility issues are compounded by an increasing focus, in policy and practice, on the car as a mobility solution. To explore this hypothesis, the engagement with community activity of a sample of rural elders living in Southwest England and Wales is examined, drawing on a survey and semi-structured interviews. Key findings were that car availability was important in seniors achieving 'connectedness', although by no means a panacea, and that most journeys for community activity were shorter than 1.5 km. Given the importance of activities to wellbeing it is therefore concluded that more emphasis should be placed in rural transport policy on facilitating short-range travel for social purposes, including walking, cycling and the use of mobility scooters.

## 1. Introduction: Community Activity, Mobility and an Ageing Population

The growth in both the number, and proportion, of older people in rural communities<sup>1</sup> in the UK may have wider impacts on the sustainability<sup>2</sup> of those communities. This paper explores the issue through an examination of rural 'community activity' as a key driver of quality of life for both individuals and their community. The focus on older citizens is given extra impetus from evidence that they are identified as being over-represented as actors in this community engagement, perhaps reflecting greater capacity for involvement. The effects of this engagement, to individuals and their communities is considered in more detail in Section 2, with reference to evidence for community activity being central to quality of life, and conceptualised through the popular frame of 'social capital'. Notwithstanding the rise of telecommunications and 'virtual presence', physical movement remains central to most community activity, and Section 3 will explore this, drawing on the concept of 'motility capital' from the 'new mobilities' paradigm, and proposing a conceptual model of community sustainability drawing on these two 'capitals'. Given the importance of mobility for community connectivity on the one hand, and the importance of older citizens for that connectivity on the other, the fact that older citizens experience particular constraints on their physical mobility emerges as an important potential issue for the sustainability of their community. Thus Section 4 reviews evidence for these constraints, with a focus on daily travel and more specifically on travel for social purposes. Longer-term mobility constructs such as 'residential mobility' or 'migration' (such as re-location to rural areas) are of course still relevant and

<sup>&</sup>lt;sup>1</sup> For the purposes of this discussion, rural communities are interpreted as communities living together in localities, for example in villages.

Whilst this term may be contested - particularly in respect of a rural community (Levitt-Therival in CRC 2005), the UK government describes such a place as being: "where people will want to live and work now and in the future" (Defra 2005 p120). To this could perhaps be added the notion that such a community will be 'thriving', have vitality, and be viable.



pertinent as they set the context for which transport choices are available to a household, but here we consider only the mobility options which exist once that context has been set.

The methodology used to collect the data discussed in this paper is briefly described in Section 5, whilst section 6 considers the contention that the focus on the private car as a mobility solution in rural areas is potentially misplaced. It reviews evidence on the extent of 'carlessness' in the rural communities studied, the mobility options (and multi-modal experience of older people) as well as what activities older people are involved in, and importantly where. Section 7 will draw together these arguments and presents a series of conclusions. Although this paper is based on a study of rural elders in the UK, it is mindful that issues effecting population demographics, including ageing, are reflected globally. In a recent UN report (UN 2009), it is noted that the world's population is ageing, with those over 60 forecast to make up over 20% of the population by 2050 (some 2 billion people). compared to just 8% in 1950, and 11% currently. In more developed countries the over-60s make up one fifth of the population, and by 2050 this may be a third. In Europe specifically, the forecast is for older people (those 60 and over) to be 35% of the population in 2050. The same report also noted that the proportion of older people in rural areas in 'developed' nations was growing at a faster rate than in urban areas, up from 17% in 1975, to 23% in 2005, compared to 15% and 19% in urban areas. In 1975, Sweden was the only country with more than 25% of its rural population 60 and over, but by 2005 ten countries, including the UK had reached this level. These trends suggest that better understanding the effects on the sustainability of rural communities is an important topic to engage with.

## 2 Community activity as a key factor in quality of life

Quality of life is a term that is interpreted in many different ways, but here the focus will not be on issues such as deprivation or poverty (important though they may be), but more on the related concepts of 'happiness', 'life-satisfaction' and 'well-being'. The intention in this paper is to consider how older people's involvement in community activities might contribute both to their quality of life, but also through the notion of 'social capital', to the quality of life of their communities. There is evidence from Britain (and other developed countries) of a link between social engagement and 'happiness': those people who are very active in their communities reporting more satisfaction than those who never engage with or attend local groups (Donovan and Halpern 2002). Godfrey et al (2005) identify the positive influence of 'volunteering' and belonging to community organisations on factors such as health, depression, morale and self-esteem, with 'feeling valued' and being 'respected' in particular seen to contribute to good mental health and wellbeing (Lee 2006). In addition, having a 'role' outside the home and family appears to protect against isolation, depression and dementia (McCormick, 2009).

Involvement in community activities has potential benefits for the wider community as well, in the form of social capital. This is seen to be created out of 'repeated social interactions between individuals and groups', and these social interactions will 'develop trust, social norms and strengthen co-operation and reciprocity' (Lee et al 2005, after Bordieu and Putnam). But importantly, it is only through wider relationships and networks that this capital can then be used, and made use of (Lee et all 2005). There are seen to be many social (and economic) benefits for a community from the creation of such capital, particularly in greater social cohesion and less social exclusion. It can help create a stronger sense of identity and 'place', an effect which it is suggested can be stronger in rural locations (Moseley et al 2007). It can be particularly beneficial for 'marginalised communities' (Field 2003), and provide individuals and their communities the capacity to 'overcome adversity' (Stanley et al. 2010). Social capital is increasingly recognised by government(s), and successive rural policy statements in the UK have rural community empowerment at their core (Curry 2009).

## 3. Mobility, Motility and Community Activity

Older people it could be argued are the ideal candidates to be involved in this community activity, having both the time, and potentially the capacity. In fact, in the UK 65-74 year olds



have the highest levels of formal and informal volunteering<sup>3</sup> compared to other age groups (DCLG, 2010). Older people also spend the most amount of time volunteering relative to other age groups and those in rural areas are more likely to volunteer than those in urban areas (ibid). A key enabler for older people being able to participate in community activity is of course their ability to access them, allowing them to 'participate in society' (Cahill 2010). This access usually relies at least in part on an older person's own personal-mobility (i.e. capacity to walk), combined with various modes of transport to provide mobility.

Following Kaufmann (2002) the extent of mobility options an individual can use reflects his or her 'motility capital': the sum of "the factors that define a person's capacity to be mobile" or "potential to travel". This will include not only the physical elements of transport and communications systems and their accessibility, but also (older) peoples aptitude, mobility aspirations, time constraints and importantly, their knowledge of how to use systems (ibid p38). Kaufmann proposes that people will try to amass the greatest potential mobility through acquiring skills and access to the most systems (ibid p104). There is though contradictory evidence for habitual behaviour and monomodalism which suggests this view can be overstated. A minority of adults in developing countries avoid walking to the extent that they lose the capacity in later life, and in many countries cycling levels are extremely low in older age, although much higher in certain states (See Pucher and Dijkstra, 2003) where there has been societal-level investment in this mode. Levels of car dependence in some developed societies can lead to the rational judgement that investment in and maintenance of the skills to use any other mode is inefficient.

Kaufmann also introduces a link between motility and social capital, suggesting that motility is determined by the 'life course of those involved, and by their social, cultural and financial capital, which together define the range of possible specific choices in terms of opportunities and projects' (Kaufmann 2002 p40). Thus their capacity and capability to be involved is in turn partly related to and derived from social capital. By focussing then on this concept of social capital, and the connectivity's this provides both amongst older people and between them and others in their community, it is possible to better understand the well-being of older people in rural areas and the generation by older people of well-being within rural communities as a whole (Curry 2009). Figure 1 below further develops the conceptualisation of motility capital in presenting it at the societal level and as existing in a synergetic relationship with social capital, with older people's capacity to be mobile (their motility capital) in particular potentially underpinning a self-reinforcing process of community sustainability. The model is supported by 'social capital', both as a facilitator, and a result of community activity and community connectivity.

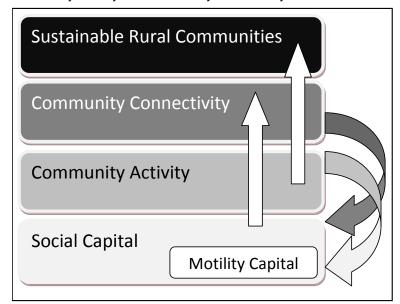


Figure 1. The importance of Motility Capital to a Sustainable Rural Community

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<sup>&</sup>lt;sup>3</sup> Formal volunteering is defined as unpaid help given as part of a group, club or organisation to benefit others. Informal volunteering is defined as unpaid help given to someone who is not a relative.



As a consequence, social capital can be seen to be a key factor in the sustainability of rural communities, as (older) people not only take part in activity, but may also be engaged in the direction and management of, or decision making for their community, with motility capital as a key facilitator.

#### 4 Mobility of rural elders

Having proposed these conceptual linkages between motility capital, social capital and community activity, and reflected on the importance of rural elders to 'community', it is also important to note that there are practical constraints on older people's mobility. These constraints arise within the wider physiological issues associated with ageing coupled with more dispersed services found in rural settings to present a range of 'mobility' barriers for older people when accessing community activities.

Active travel (e.g. walking and cycling) as well as the use of mobility scooters for the lessable could provide mobility options for some rural elders. There are though potential barriers such as being unable to walk or cycle for long periods of time or having difficulty in physically accessing vehicular transport (Schlag et al., 1996) or lack of confidence in walking ability associated with fear of falling (Avineri et al., in press). There may be infrastructure problems such as a lack of pavements, or inadequate street lighting (Newton et al., 2010). In respect of public transport, the widespread introduction of free fares for older people in the UK has reduced financial barriers to bus use, but there must be a viable bus service available to use which is not often the case in rural areas (Parkhurst and Shergold, 2010). There are also psychological or perceived barriers to using alternative transport, including a lack of confidence in knowing the "norms" surrounding bus use (Musselwhite and Haddad, 2010; Musselwhite, in press). Some modes may also attract a negative stigma, deterring use.

Although many older people continue to drive, they are the group most likely to be giving-up. Thus there are households which have no vehicles or resident drivers (having perhaps relinquished licences or never having had them) and here car-based mobility would be reliant on taxis, or lifts by others. Vehicle operating costs also represent a rising barrier which some identify as of greater significance in rural areas (Root et al., 1996). In this context, those on lower incomes but with cars available may not be able to undertake all of the journeys they would like, with the implication that the more discretionary journeys, for community involvement, may be the ones that are sacrificed.

There is evidence that volunteering and involvement rates are affected by these barriers, with 'physical access', 'busy roads' and 'traffic' identified specifically (Lee 2006). In addition, some organisations put an upper age limit on specific tasks such as driving (ibid). Therefore mobility-related issues could be a critical part of disengagement, which suggests that some older people in rural areas may not be fulfilling their capabilities and aspirations. In the context of declining formal state involvement in service provision in the 2010s, this has important ramifications for their communities: by implication, if these barriers could be reduced, then engagement rates for this critical group of citizens may be maintained, or even raised.

Having explored the conceptual underpinnings, the second half of this article now turns to examine research evidence on this topic and particularly on the relative importance of car access for rural community engagement.

# 5. Data Collection Methodology

Data was collected in rural locations in South West England (Cornwall, Dorset and Gloucestershire) and Wales (Dyfed, Monmouthshire and Powys). A doorstep questionnaire provided 920 responses and follow-up semi-structured interviews were undertaken with 34 of the respondents. Interviewees were older people who exhibited a range of characteristics of interest, such as being cyclists, or mobility scooter users (along with regular car-users). Four extra interviews with older people who had stopped driving were also carried out. Findings will be discussed below in the context of the 'survey' and / or 'interviews.



The study areas represent a gradient of rural characteristics following definitions employed by the UK Government Department for Food, Agriculture and Rural Affairs (Defra). These were 'remote and deprived' (Defra 'Rural 80' designation), 'less remote and deprived (Rural 50), and 'relatively affluent and accessible' (Significant Rural). Broadly equal numbers of respondents were contacted in each area, and communities ranged in size, with the largest having a population of several thousand people. For the survey, stratified random sampling was employed, with the outcome being a slight bias towards the 'younger old', but broadly in line with 2008 population projections for split of age-groups (60-100) from the Office for National Statistics (ONS) for England and Wales. There was also a slight bias with respect to the gender split in the 2008 projections, the sample having slightly fewer men, and slightly more women.

#### 6. Findings - The Car and Community Involvement

"We're very active in our religion....it's nice to get together with a hundred like minded people and sing hymns together and to pray together" (Male, 64, Dyfed)

"...at the moment I'm playing a lot of bowls so I've got to be able to get round to matches and places...that is my social life." (Female, 88, Monmouthshire)

It was evident from a number of the interviews that being involved in community activities of one sort or another was important to older people, contributing to their well-being. What this paper now sets out to do is to explore through the survey and interview data the role of the car in facilitating, or potentially creating barriers to this.

What was immediately evident was that 'carlessness' for this sample was now rare, with 87% of respondents having access to a car in the household: the level across all rural households being 91%, and for all of England 75% (DfT 2009). There does though appear to be an age effect in relation to car access, with household availability for those over 80 falling to around 60% (see figure 2 below).

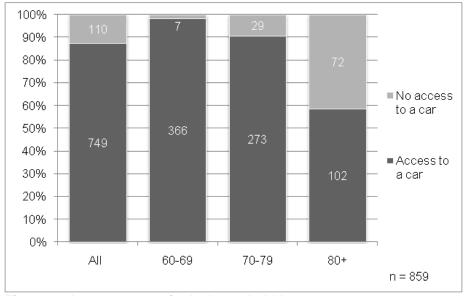


Figure 2. Access to a car in the household by age group

Through the survey, the ability to be involved in community activity was also explored. In the main, the view expressed was that older people as involved as they would like to be in their community (83 % replying positively) - although it should be noted that it was not possible to assess from the data whether the minority of dissatisfaction was due to the lack of identified community to be active within, or difficulty in reaching activity that was known to exist. It was though possible to identify a statistically significant relationship between satisfaction with level of community involvement and car access ( $\chi^2$  'n' p < 0.01).

Acceptable levels of access were also found in the depth interviews: people generally saying that they were able to get to what they wanted. Responses did though suggest that



participation was contingent on car access: there was "no other way of doing it", that they were "entirely dependent on it" or that it was "essential to be able to participate" and in its absence they would "have to cancel social activities". Using a car was also seen by several interviewees as an important measure of their independence, another contribution to their well-being.

"My own car is really important. It's my independence and although I go with my husband to most places and we then use his car, I really love having my own car, like today if I am on my own I am not stuck so that is really important to me". (Female, 71, Cornwall)

Even where potential for the use of alternate modes was identified, mode choice criteria such as the desire to reduce journey time, to avoid the weather, or to counter poor health favoured the car: with one interviewee stating that their village was 'too big', and there wasn't always time to walk. In other instances, there was perceived to be a lack of 'local' community activity, which necessitated car travel further afield. Lack of alternatives was also seen as important, with some people identifying specific mechanisms to explain why: one interviewee, a treasurer for a local organisation, saw the only theoretical alternative to reach meetings as being taxis, which was not seen as acceptable, and another noted that things happened in the next village, to which there were no buses.

Whilst many discussions emphasised 'own needs', some identified that the car was important for being able to help partners who were less mobile, or *other* people in the community, for example, through provision of 'meals on wheels' and informal lift-giving to neighbours for accessing healthcare. Whilst this latter activity is not directly a 'community activity' as such it could be argued that it is social-interaction, and is thus contributing to social capital.

#### Importance of Transport

The survey also investigated barriers to participation in community activity, with 25% of respondents identifying 'transport' as a factor. Two-thirds of those without car access suggested that they were experiencing some restriction on their participation — with over a quarter responding that they were prevented from getting involved in these sorts of activities at all (accepting of course that issues that restrict car access, such as declining health may in some instances also restrict community activities). However, even those with car access were subject to constraints, with 15% of this group reporting limits on their participation. In this respect, the interviews uncovered evidence of competing needs for access, as only having one car in a household meant that people relied on either pursuing the same interests as their partner, or on picking activities that would not clash, so that both could be involved.

"...my husband used the car to go to his Zen Buddhist group on a Friday night, and it was the night there was a Cornish dance club that I really wanted to get to but couldn't." (Female, 63, Cornwall)

"I've recently taken up going to Tai Chi but of course I checked it out with him first: if he's going to be happy to drop me." (Female, 70, Dorset)

Such issues might encourage some older people to maintain two cars in their household rather than one, so underlining the level of car dependence and making implicit assumptions about future health and economic status. This though could add extra expense to the household budget of older people, many of whom are already concerned by motoring costs.

"...the cost of the car is high because of the petrol prices at the moment. I mean motoring is expensive.... we are limited in our income and so there's a limit to how much we can get out and about and go places." (Female, 70, Dorset)

"We're on a grand total of about two hundred pounds a week of which the vehicles take the best part of a hundred and something." (Male, 64, Dyfed)

Some interviewees had given up driving, mainly as a consequence of declining health, or involvement in an accident. Others referred to self-regulation: restricting their driving as a consequence of traffic speed, traffic levels, or parking problems. It was often the case that people would avoid busy times or motorways, or perhaps driving after dark, or they would visit specific shops because of parking availability.

"Well I know, I am a nervous... I don't like driving far I'm afraid. I once had a panic attack on a motorway which has worried me ever since. I am happy on minor roads: that's why we

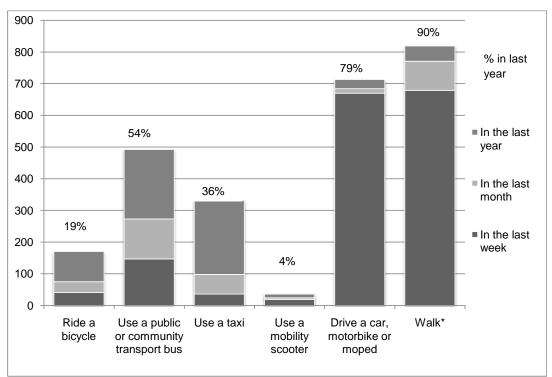


don't go far to be honest..... It does mean we do tend to cancel things you know, if I feel I can't cope with it you see" (Female, 80, Monmouthshire)

It was also evidenced in the interviews, that the use of lifts from friends and neighbours was often limited, as people might feel they were abusing a friendship to seek them, or there were limited people available to give a lift when it was needed. The exception to this seemed to be where family lived close by and would readily offer car-based transport – although sometimes again only at a time convenient to the lift-giver. There were perhaps also limits to where lifts might be used, with more of a focus it seems on access to healthcare facilities.

#### Multimodality

Access to different modes of travel was also considered. In the interviews, older people in the same community sometimes gave opposing answers when asked about alternatives to the car – some describing public / community transport options for example whilst others reporting there were none. In a number of instances, interviewees had also specifically collected information on public transport alternatives for the interview, although they had never themselves explored their use. Both perhaps illustrations of how car-users were not looking beyond that mode? However, the survey did seem to provide evidence of some degree of multi-modality in the study areas, with broadly similar numbers of older people recording that they had walked as did those who reported they had used a car in the last week. Over half of the respondents had used public transport and nearly 20% a bicycle over the preceding year. (See Figure 3 below)



**Figure 3. Last use of range of transport modes**. \* Walk for 15 minutes or more for leisure, health or just to get somewhere.

In fact, over 90 % of those people who used a bus in the last year had access to a car in the household, as did practically all of the people who had cycled. There is also a noticeable progression to multi-modality (see Figure 4 below) over the 'last month' and year.

This could then be seen as a partial illustration of the 'motility capital' of the older people in the study communities. It does though only show the mobility that older people are using, as opposed to giving an indication of their 'potential' for mobility. Whilst there will of course be limits on who can walk and cycle and drive, or has a bus nearby, an argument can be made that if these levels are being expressed by some in the community then they could also be appropriate for many others.

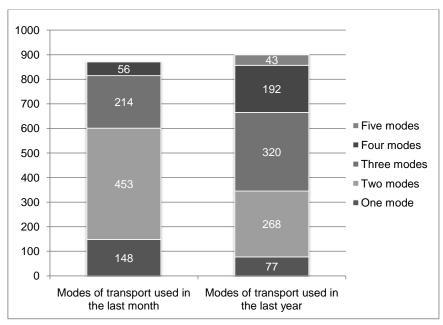


Figure 4. Number of modes used in previous year.

Adaptation to different modes also emerged in the interviews with those that had ceased driving. There were instances of older people who were now walking, using public transport, or in one of the study areas community transport<sup>4</sup>, as ways of continuing social and community activities. It was notable, though, that they might have altered the activities they chose to be involved with to reflect the change in travel mode. Although some saw this as a broadly negative change, others found positives, such as the social aspects of using public transport or the fact that it saved them money.

"I enjoy being on the buses with other people, it's a social thing... there's always somebody I know on the buses...whereas driving is a little more enclosed personal thing." (Female1, 70+, Powys)

"I would say yes definitely you have got more money to handle because you haven't got your insurance, your tax and your fuel and wear and tear, oh yes it makes a lot of difference" (Female2, 70+, Powys)

#### Length of journeys for community activity

The third area of investigation considered the types of community activity being undertaken by older people, and importantly how far they travelled to be involved. It should be noted that respondents could answer more than once against each choice, for example people attending both a local and a more distant church could respond for 'place of worship' in two distance categories (although this happened in just a few instances). The responses are summarised in Figure 5 below. The most popular activities were those organised by churches or taking place in religious buildings, perhaps not surprising, bearing in mind that most communities still have a church of some form, followed by 'community groups' and then voluntary or charity based activities.

In a few cases the majority of the activities reported were being undertaken more than 16km from home: notably nature conservation, building conservation and activities related to professional associations which are all biased towards longer journeys, although most of these had relatively low participation rates. From the current research it is not clear whether this simply reflects the deterrent of 'friction of distance' or whether specific transport barriers were suppressing participation in those activities. What is notable, though, is that 83% of all reported journeys for social and voluntary activity were less than 8.1km in length, with 63% under 1.6km

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<sup>&</sup>lt;sup>4</sup> Community Transport refers to registered local bus services run by local organisations on a not-forprofit basis, with all drivers being volunteers. They provide services where there may be no commercial operators, and where there would otherwise be no service. They are not restricted in who they carry.



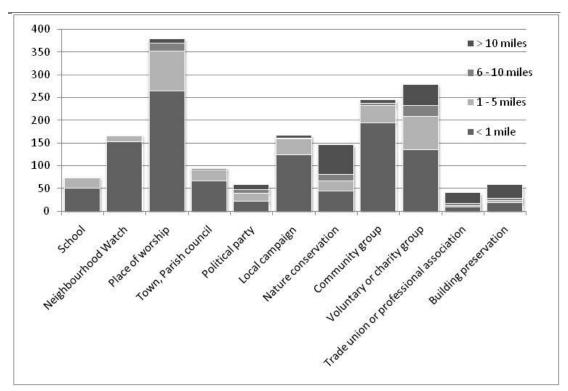


Figure 5. Reported Distance Travelled to Different Types of Community Activity by older people<sup>5</sup>

In fact, in some of the interviews there were strong responses that the car was not important for local involvement because there was so much going on in the village and people could walk to it.

"We still have a very good centre in Painswick for community life anyway, it's really very strong, there's so many organisations" (Female, 68, Gloucestershire)

"....there are loads of clubs in the village ... I could walk to any of the ones that I wanted to go to" (Female, 63, Cornwall)

One implication of this is that many of these trips could be potentially undertaken by modes other than the car – for example by walking, cycling or by using a mobility scooter. This might also suggest that the focus on mobility being delivered through the car or by bus is misplaced – for these activities and in these areas at least. However it is apparent from the qualitative interviews that there are other barriers to this happening, including the weather and personal safety concerns when walking or cycling from traffic levels (particularly traffic speed), lack of pavements and lack of lighting (although a number of interviewees preferred not to have rural streetlights to minimise light pollution).

"we've got a really nice pub, exactly a mile down the road but I can't walk to it because it's much too dangerous down the A30.... this pub up here is exactly half a mile... if we walk up there in the winter we wear one of those reflector jackets and carry a light because it is dangerous". (Male, 65, Dorset)

"You couldn't walk; you have got to be very vigilant walking this road because they just come up the road as if they are on a motorway" (Female, 63, Monmouthshire)

Across the study areas older people who cycled for some journeys also mentioned road safety as a barrier to their use of the mode.

"It's a shame about the danger of cycling, really. These are narrow roads and they curve all over the place. We've still got two bicycles rusting away there" (Male, 81, Dorset)

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<sup>&</sup>lt;sup>5</sup> Interviewees were asked to estimate distances in miles, which is the way the most UK citizens express distance. The reported mileage is converted to the nearest kilometres equivalent in the text.



"More and more traffic in the lanes makes it less pleasant to cycle in the lanes. As traffic - as car traffic – increases." (Female, 80, Gloucestershire)

For others though, the wide spatial range of community was seen as a factor that favoured car use, in some cases because there was not perceived to be any local activity, but even interviewees who stated that they lived in communities with high levels of local activity expressed the view that the car was important for the things they wanted to be involved in outside of the village. And for some the concept of community did not relate to the 'local'. Some interviewees described how they actually returned to communities they had previously lived in to be involved in activities (facilitated by access to a car).

Finally, mobility scooters also offer an alternative for people with physical movement constraints (many of whom are elderly) the opportunity to regain some spatial mobility, and were observed in most of the study locations. But users also face barriers in using them to access community activities, road safety being an important issue, particularly in those rural locations where there were no pavements. The type of scooter also seems to impact on their use, with those that are designed to be dismantled and carried in a car boot for use at a destination proving less of a benefit in the local community for very short local journeys.

"Yes it's heavy. And it has to be assembled and disassembled.... To be quite truthful, with the battery on charge, its such a performance to go into the garage, get the battery out and put it on the little thing, get the [scooter] out, drive it there, come back, take the battery off. It's easy to get in the car: turn the key and off you go" (Male, 66, Dorset)

#### 7. Discussion and Conclusions

The earlier sections of this paper outline the importance of community activity to older people's well-being (including of course to their health), and how a link can be made from this individual benefit through to community benefit via the mechanism of social capital. The role that mobility, and potential mobility (motility), have to play in this has also been identified, leading to the presentation of a conceptual model which posits social capital as both the result and facilitator of such activities. The interactions and links between individual well-being and community well-being, or the social sustainability of a community, has also been set in the context of a globally ageing population, where the rural elderly in developed nations such as the UK are seen to be on a growth trend above that of urban areas. It has also been illustrated how, as people age, they can become subject to a range of mobility constraints, across the range of modes available to them; not helped by the potentially more dispersed provision of services, often experienced in rural environments.

From the study data at least, there are high levels of access to a car across all older people, but particularly comprehensive (almost universal) amongst the younger-old. There is an agerelated effect though, and the older-old exhibit lower levels of access - it will be interesting to see in coming years whether the current younger-old cohort, who have grown up with the car, will maintain such high-levels of access to the car when they age. Nonetheless, the findings suggest that one of the mobility constraints on older people's ability to continue to contribute to community activity is in fact the increasing reliance in rural areas on the car. The almost total penetration of the car has perhaps had two particular effects on the rural old in respect of their motility capital. First, it may actually have led to what was earlier termed monomodalism; that is the focus purely on a single mode - in this case the car - for all mobility needs. As a consequence, older people do not look for alternatives to add to their motility capital. Second, the widespread use of the car is actually undermining alternatives, whether it be through traffic levels creating unsafe conditions for other forms of travel or lack of patronage on public transport services which were then likely to be withdrawn, increasing the reliance on scarcer services staffed by volunteers. But the car is not a panacea, and even those with access are subject to availability issues, such as the need for those with partners to schedule activities to not clash, or to find shared interests. For some this issue is only overcome by having two cars in the household, but, whatever number, there are economic costs as a consequence of the dependence on the car. Rising costs in this area can actually mean that although older people have the potential for mobility using the car,

they may actually be constrained in its use as a result of the costs involved – particularly for those reliant on (state) pensions.

It could be seen then that there is a vicious circle of older people's reliance on the car which undermines the alternatives - particularly strong in younger-old age groups perhaps, and reflecting the fact that this group may need the alternatives at a future point, but do not recognise or accept the linkages between current behaviour and future need. In spite of this reliance on the car though, there are those that have moved to alternatives, and although they may report that they have had to adjust the activities they are involved in, they often find positives in the experience, for example the social aspects of community or public transport, or the health benefits of walking. It was also notable from the data that most community activities are taking place within a relatively short distance from older people's homes, and that this offers the potential for some of those journeys to be made by other modes, such as active travel. It is also apparent from the data that many older people are to some extent already multi-modal, using three, four or more modes over the year. What was apparent, though, was that for most of the sample using the car and walking were the primary modes of travel.

One policy implication from the study is that more emphasis should be placed in rural transport policy on facilitating short-range travel for social and community purposes. In many rural areas the solution is seen as greater deployment of public transport - usually in the form of the bus. In three of the study areas there were enhanced bus services in the form of Demand Responsive Transport (DRT). These sorts of service, although potentially an effective tool for delivering mobility, can be very expensive solutions to deliver (Enoch et al 2004). This is perhaps evidenced in the study areas, as in two instances services were also supported with pump-priming funding from the EU. However, services such as these, and the community transport mentioned earlier, are often focussed during the weekday, helping people to access shopping, or social and healthcare facilities, whereas community activities often occur at weekends and evenings in order to be open to all. Community transport could potentially play a greater role, perhaps the sort of response envisaged by the current UK government's 'big society' initiative. But community transport is currently subject to irregular, tenuous funding, and of course would be dependent on 'volunteers', perhaps less likely to be available at the times when community activities might be taking place. 'Active travel' options are also currently underrated; in the case of cycling due in part to the focus on promoting this mode to younger age groups. Many of the current barriers to local active travel could be addressed through basic, practical measures such as improved pavements and lighting. These changes would also benefit those people who use mobility scooters which the research has confirmed are not solely an urban mode.

With a growing population of older people in rural areas, and these people making up a growing proportion of the rural population, it is (and will be) important that this group is able to participate in community activities – both for their own individual well-being, and for the well-being and sustainability of their communities. Although the car is increasingly seen as perhaps the *de facto* mode of transport in rural areas, there are a range of modes of travel that are available, and which if properly supported would create both mobility and motility plurality for the rural elderly. If, as a society, we merely rely on the car as a solution in these circumstances it may be that we risk undermining the creation of social capital in rural communities, and thus their social sustainability.

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