

Predictors of community cohesion: multi-level modelling of the 2005 Citizenship Survey



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Executive Summary

This study uses nationally representative data – specifically, the 2005 Citizenship Survey – to systematically examine the socio-demographic and attitudinal predictors of community cohesion in England, both at the individual and the community level.

This report presents findings from our multi-level statistical modelling and has three main objectives:

- to identify the individual socio-demographic and attitudinal predictors of community cohesion;
- to explore how far differences between communities can be explained by the individual characteristics of their members; and
- to establish the extent to which community level factors can predict cohesion above and beyond those characteristics which operate at the individual level.

Key findings

Both individual and community-level factors influence cohesion

- An individual's sense of cohesion is a product of both their individual characteristics and the characteristics of the community they live in.
- Multi-level modelling is able to fully take into account the hierarchical nature of this relationship.

Ethnic diversity drives cohesion

- Once other factors are accounted for ethnic diversity is, in most cases, positively associated with community cohesion.
- However, the relationship between diversity and cohesion is complicated and the nature of this relationship is dependent on the type of ethnic mix in an area.
- Living in an area which has a broad mix of residents from different ethnic groups was consistently shown to be a positive predictor of cohesion. However, having an increasing percentage of in-migrants born outside of the UK, is a negative predictor.
- Having friends from ethnic groups other than one's own is a strong positive predictor of cohesion.
- Part of the positive effect of diversity is a result of increased proportions of inter-ethnic friendships (ie bridging).

Disadvantage erodes community cohesion

- Irrespective of the level of ethnic diversity in a community, disadvantage consistently undermines perceptions of cohesion and operates in a similar fashion for all communities.
- However, not all deprived areas have low cohesion.
- Deprived, diverse areas have higher average cohesion scores than deprived, homogeneous White areas. It is thus deprivation that undermines cohesion, not diversity.
- Individual level disadvantage (ie low socio-economic status) is also a negative predictor of cohesion.
- Reducing individual level disadvantage: for example, increasing income or improving an individual's level of qualifications, can offset the negative impact of high crime rates and high levels of community disadvantage on perceptions of cohesion.

Crime and fear of crime strongly undermine cohesion

- Increasing levels of crime and fear of crime are both strong negative predictors of community cohesion.
- Feeling unsafe after dark, fear of crime and fear of being a victim of a racist attack have a particularly negative effect on perceptions of cohesion amongst those living in areas where the population is predominately made up of White and Pakistani & Bangladeshi people.
- Crime also undermines the positive effect of living in a very diverse areas.

Empowerment is important

- Feeling able to influence local decisions is a strong positive predictor of community cohesion.
- Feeling that an individual would be unfairly treated because of their race (especially by local housing authorities), coupled with a feeling of racial prejudice has a strong negative impact on cohesion.

Volunteering is a positive predictor of cohesion

- Individuals who engage in formal volunteering are more positive about cohesion.
- These individuals are likely to feel more empowered, have more interaction and form networks with individuals in their communities that they may not be in contact with otherwise.

Vulnerable groups have more negative perceptions of cohesion

- Women, individuals with a disability or long-term illness, individuals who lack access to services and council tenants are all less likely to think that their local area is cohesive.

The predictors of cohesion vary across ethnic groups

- Income has no effect on cohesion for White people, but it is a strong positive driver for Pakistani & Bangladeshi and Black African people.
- For Pakistani & Bangladeshi people, participation in informal volunteering is a strong positive driver of cohesion.
- The longer Indian people have lived in a neighbourhood the more negative their views on cohesion become (for White people, there is no relationship).

Chapter 1

Introduction

Research on and around the topic of community cohesion is becoming increasingly more common. This study adds to this important evidence base by using nationally representative data – specifically, the 2005 Citizenship Survey – to systematically examine the socio-demographic and attitudinal predictors of community cohesion in England, both at the individual and the community level.

The study uses multi-level statistical modelling and has three main objectives:

- to identify the individual socio-demographic and attitudinal predictors of community cohesion
- to explore how far differences between communities can be explained by the individual characteristics of their members
- to establish the extent to which community level factors can predict cohesion above and beyond those characteristics which operate at the individual level.

This chapter provides the broader context to the present study. First, a definition of community cohesion is provided, followed by the evidence to date on community cohesion. In Chapter 2 we outline our methodological framework, while in Chapter 3 we present results. These results are organised into two sections to allow individual and community level findings to be explored separately. In Chapter 4 we discuss key findings and in Chapter 5 key conclusions are presented.

1.1 Background

Community cohesion has become an important policy issue in recent years. Following the race-related disturbances in Oldham, Burnley and Bradford in 2001, Ted Cantele was appointed by the Home Secretary to examine the causes of the conflict. The subsequent “Cantele Report” concluded that many ethnic groups were not mixing and in effect leading “parallel lives”. The report also made a series of recommendations around fostering community cohesion and was the catalyst for the adoption of community cohesion as an important policy area within both local and central government.

After the events of 7 July 2005 there was a renewed interest in understanding the alienation experienced by some communities and widespread concern that some groups were still leading the “parallel lives” Cattle spoke of in 2001. These concerns were set alongside the recent influx of Eastern European migrants – many of whom are settling in areas which have not experienced large scale immigration before.

It was in this context that the Commission on Integration and Cohesion (CIC), chaired by Darra Singh, was launched by the Communities Secretary in August 2006. In the lead up to reporting in June 2007, the CIC engaged with a range of stakeholders and undertook an extensive consultation process during which more than 600 people/organisations were asked to consider how local areas can play a role in creating cohesive and resilient communities.

The current definition of a cohesive community is one where:

- there is a common vision and a sense of belonging for all communities
- diversity is appreciated and positively valued
- those from different backgrounds have similar life opportunities
- strong and positive relationships are being developed between people from different backgrounds in the workplace, in schools and within neighbourhoods (ODPM 2002, in CIC 2007)

The CIC proposed that this definition should be extended to include:

- a shared contribution to a future vision
- a recognition of the contribution of settled and new communities
- a strong focus on individual rights and responsibilities
- trust in institutions to act fairly (CIC 2007)

1.2 Drivers of community cohesion: overview of existing research

In developing a model of the predictors of community cohesion – as we intend to do in the present study – consideration needs to be given to what the existing evidence has already identified as the potential drivers of cohesion. This section provides a brief overview of key findings from selected research carried out by both academic and government researchers.

Ethnic diversity

The relationship between ethnic diversity and community cohesion is widely debated. While some academics (eg Oliver and Wong 2003; Stein et al. 2000; Marschall and Stolle 2004) argue that ethnic diversity builds cohesion; others argue the opposite, ie that ethnic diversity erodes community cohesion (eg McLaren 2003; Blumer 1958; LeVine and Campbell 1972; Alesina and Ferrara 2002; Putnam 2007).

INDIVIDUAL LEVEL

The “contact hypothesis” is the key theory behind the argument that cohesion and diversity are positively associated. At the individual level, contact theory suggests prejudice can be reduced, and cohesion increased, by equal status contact between groups co-operating in the pursuit of common goals and sanctioned by institutional support (Allport 1954). According to the contact hypothesis then, as diversity increases, the likelihood of inter-ethnic interaction increases and inter-ethnic primary and secondary bonds develop. These bonds prevent negative perceptions, misinformation, and rumours regarding other ethnic groups from becoming cemented (Gordon 1964; Varshney 2003). Intimate contact such as friendship is the most common way of developing bonds (McLaren 2003). In Putnam’s (2000) terms, having friends from different ethnic groups increases “bridging” social capital and helps to generate interpersonal trust, group cohesion and a sense of belonging. In such a scenario, diversity builds community cohesion, on the premise that diversity increases meaningful interaction between inter-ethnic groups.

However, other researchers have advanced the opposite argument and have suggested that increasing diversity may undermine cohesion. According to these researchers, formerly dominant groups come to feel threatened as increasing numbers of people from minority ethnic groups settle in “their” area. The central tenet of this theory (commonly termed the “threat hypothesis”) is that members of the dominant group may come to feel that certain resources belong to them, and “when those resources are threatened by a minority group, members of the dominant group are likely to react with hostility” (McLaren 2003: 915; see also Blumer 1958; LeVine and Campbell 1972; Giles and Evans 1986).

COMMUNITY LEVEL

At the community level, recent research on whether diversity builds or erodes community cohesion has produced equally mixed results. While bivariate analysis¹ of the Citizenship Survey found no association between the proportion of ethnic minority households in an area and views on cohesion (Kitchen et al. 2006a), studies from the US on the effect of community context on attitudes have found that as diversity in a neighbourhood increases, hostility towards minority ethnic groups also increases (Taylor 1998). Alesina and Ferrara (2002) similarly found a strong, negative relationship between levels of social trust and racial diversity at the US state level, which they attribute to “a natural aversion to heterogeneity” within communities. These results suggest that, in diverse areas, interactions between different groups occur infrequently and the lack of contact may lead to lower levels of trust and reciprocity.

¹ This finding is drawn from a crosstabulation which shows no relationship between the ethnic diversity of an area and community cohesion. It does not control for other variables and it is not therefore as robust as other statistical techniques such as regression analysis.

A recent study by Putnam (2007), also in the US, supports this. Putnam found that, although in the longer term, increasing ethnic diversity is likely to have cultural, economic, fiscal, and developmental benefits, in the shorter term it undermines both bridging capital between inter-ethnic groups and bonding capital within ethnic groups. However, a number of recent research findings disagree with these conclusions.

Oliver and Wong (2003), for example, found that living in diverse communities is associated with *positive attitudes* towards individuals from other ethnic groups, while Bledsoe et al. (1995) found that Black people living in ethnically mixed communities feel less bonding attachment and are more likely to form inter-ethnic friendships than those living in more homogeneous Black communities. Hewstone et al. (2005) examined attitudes between Protestants and Catholics in Northern Ireland and discovered that after controlling for class, education, and prior experience of integrated education, inter-group contact (the likelihood of which increased with increased diversity) made a consistent, significant contribution to more positive attitudes towards inter-group members.

Hewstone (2007), a key proponent of contact theory in the UK, further argues that “contact can do a lot to reduce the perception of [the] symbolic threat” of minorities, ie the threat based on a clash of values and ways of life (in Bunting 2007). Significantly, individuals do not need direct contact with minority groups: if they have friends who have friends in the out-group, they will also have more positive views on cohesion (Hewstone, in Bunting 2007). Nevertheless, these findings do not show that diversity per se is beneficial to cohesion; rather they indicate that, in diverse areas, cohesion is improved if people mix.

Recent research by Dixon (2006: 2196) using the 2000 US General Social Survey suggests that the effect of diversity on perceptions of cohesion is dependent on both the type of ethnic diversity and the type of contact. For example, superficial contact between Hispanic and White people results in less prejudiced views of Hispanic people, while superficial contact between Black people and White people does not change feelings of racial prejudice. However, a sustained level of contact between White and Hispanic people and White and Black people results in White people having less prejudiced views of both groups. Dixon (2006) concludes that the impact of different types of contact on White peoples’ perceptions of other ethnic groups is dependent on a historically and culturally rooted racial/ethnic hierarchy, which differentially shapes White peoples’ threat of, contact with, and ultimately prejudice toward minority ethnic groups.

Although the “contact hypothesis” and “threat hypothesis” suggest different outcomes to increasing diversity, they may be part of the same process. Park (1950) held that competition follows initial contact. First-generation immigrants, for example, may have language barriers, which inhibit interaction with the wider community (Park 1928). However, over time migrants may adopt patterns of behaviour, cultural values, and interests comparable to the dominant population and in doing so may come to interact more successfully, increasing the likelihood of forming primary social bonds with

individuals from different ethnic groups (Park 1928; Gordon 1964). As such, the second generation may find it easier to mix with people from different backgrounds and to build bridging social capital, which may in turn facilitate greater cohesion. From this perspective, as diversity increases in a community, the “contact” and “threat” hypotheses may simply represent different stages that communities pass through over time. The cohesion issues that the CIC found evidence of in areas which had, until the recent influx of Eastern European migrants, never experienced large-scale immigration may therefore settle down over time as English language skills improve and contact between established and migrant communities increases.

Despite there being a large and expanding evidence base on community cohesion, this research is yet to reach any consensus on the nature of the relationship between diversity and community cohesion. Furthermore the vast majority of existing research into the effect of ethnic diversity on cohesion has been conducted in the US and is not necessarily applicable to cohesion issues in Britain. There are many important differences in the social context and the extent of residential segregation in Britain and the US (Peach 1996) which make it impossible to extrapolate the results of American research to the British context. For example, and as mentioned earlier, recent A8 and A2² migration has presented new challenges to community cohesion, particularly in areas in the UK, which have not experienced large-scale immigration in the past (see, for example Markova and Black 2007; Spencer et al. 2007).

Socio-economic status and deprivation

The effect of socio-economic status on community cohesion is somewhat less contested than the effect of ethnic diversity.

INDIVIDUAL LEVEL

Research has consistently shown that poverty can significantly and negatively affect an individual’s ability and willingness to engage in social activities with neighbours; it can amplify the sense of powerlessness and mistrust, and increase inter-group prejudice and competition (Li et al. 2005; Marschall and Stolle 2004; Oliver and Wong 2003). However, the effects of disadvantage on an individual’s perceptions of cohesion can operate at both the individual and the community level and community disadvantage can either amplify or reduce the detrimental effects that high levels of individual disadvantage have on community cohesion.

COMMUNITY LEVEL

Research by Ross et al. (2001) in the US found that community-level deprivation had an amplifying effect on the effect of individual’s socio-economic status on perceptions of cohesion. In particular, they found that a combination of high individual and high community disadvantage was especially damaging to aspects of cohesion such as trust.

² The A8 countries are Czech Republic, Estonia, Hungary, Latvia, Lithuania, Poland, Slovakia and Slovenia. These countries joined the European Union and the European Economic Association on 1 May 2004. The A2 countries (Bulgaria and Romania) joined on 1 January 2007.

Similarly, Forrest and Kearns (2001) provide evidence to suggest that the socio-economic status of a community is a key determinant of trust, attitudes towards other racial groups and the likelihood of interaction with different ethnic groups, while, Li et al. (2005), using data from the British Household Panel Survey, found that high socio-economic ward status is strongly associated with positive attitudes towards the community. This in turn implies that highly disadvantaged areas lack the conditions that foster cohesion.

Research has also shown that the impact of deprivation at the community level on cohesion is highest amongst vulnerable groups. Elderly people and those on a low income can experience the negative effects of community disadvantage to a greater extent due to their lack of mobility. Such individuals often experience isolation due to weak social connections with mainstream society and as such become limited to whatever services and support networks exist within their disadvantaged neighbourhoods (Forrest and Kearns 2001; Green and Haines 2002). In contrast, less vulnerable individuals are more likely to have relationships outside their communities and are therefore less likely to be influenced by their neighbourhood environment, having a broader network of opportunities upon which to alleviate the negative impact of living in a deprived neighbourhood (Ellen and Turner 1997).

According to the “threat hypothesis”, minority ethnic groups can be perceived as a threat to the majority population’s position and/or as a competitor for scarce resources. As disadvantage increases, feelings of powerlessness, threat, and alienation concurrently increase, which in turn undermines trust, reciprocity and, as such, community cohesion.

Crime

Disadvantage and cohesion are also linked via a strong, positive correlation between disadvantage and crime. Research on the relationship between community cohesion and reported levels of crime using the Local Areas Boost to the 2003 Citizenship Survey found that, as “sense of community”³ increased, recorded rates of crime decreased (Wedlock 2006). Crime may therefore be a “product” of weak community cohesion. Areas with a high sense of community are communities which share similar goals and values, the strongest of which is to keep the neighbourhood safe and free from crime. To attain these goals and preserve these values, there is a degree of social control implemented which sets norms of behaviour that members of the community must abide by to remain in the community. Sampson and Raudenbush (1999) discovered that such collective efficacy is associated with lower rates of crime and social disorder even after controlling for the structural characteristics of the neighbourhood.

³ “Sense of community” is a factor is made up of questions that include elements of social control, eg whether people pull together to improve the area, whether they feel safe walking at night, whether neighbours look out for each other and whether they trust people in their neighbourhood, as well as a more general sense of camaraderie such as whether people enjoy living in the area and are proud of the neighbourhood

Crime can also weaken community cohesion. High levels of crime tend to exaggerate individuals' feelings of threat and powerlessness, which undermines trust and increases alienation within communities. Oliver and Mandelberg (2000: 576), for example, found:

[that being exposed] to a daily dose of petty crime...and social disorder...leads to a constellation of negative psychological states which are experienced by residents: feelings of anxiety and fear, alienation from neighbours, lack of trust in others, and suspicion toward out-groups in general.

This can result, for example, in people who live in high crime areas being less likely to engage in activities outside of their homes, leaving them isolated from vital social connections that foster community cohesion (Ellen and Turner 1997).

Population turnover

Along with the diversity of a community, other parts of its demographic structure can also influence perceptions of cohesion. The residential stability of a community is an important factor in the formation of cohesive communities. Length of residence is crucial to the formation of strong social bonds between individuals in a community and thus the formation of trust, shared values and reciprocity. The implication of this is that a high level of residential turnover will therefore undermine the ability of individuals to form cohesive communities based on strong ties of friendship and kinship (Thomas 1967). Research shows that there is a correlation between longevity of residence in an area and the maintenance of "active social relationships" (Travers et al. 2007), whilst research using the General Household Survey 2000 found that length of residence is linked to having more friends and relatives in the local area (Coulthard and Morgan 2002).

Civic participation and volunteering

Neighbourhood participation is perceived by some as a way of generating community cohesion via encouraging collective action (Nash 2001) and bridging which helps to create a sense of identity with the larger community (Hipp and Perrin 2006). Such participation includes formal, informal and employer supported volunteering as well as civic participation (such as attending community meetings, or writing letters about community problems). Chaskin et al. (2001) argue that civic participation can help foster a sense of collective efficacy among residents and encourage dialogue and co-operation while Green and Haines (2002) argue that such participation helps to empower individuals, where residents gain community control and become planners and decision makers. In turn, this can help residents to identify their long-term hopes and dreams for the neighbourhood, developing solutions toward a shared vision or common good (Nash 2001). For example, research by Hipp and Perrin (2006: 2514) in a recently developed "new urbanist" community in the US, found that formal volunteering was positively associated with sense of belonging and sense of morale with the larger community.

Participation is also important for the formation of local ties. Research by Varshney (2003) on ethnic conflict in India found that local networks – particularly strong inter-ethnic networks – are essential for the maintenance of cohesion during times of unrest. Varshney (2003) emphasises that the successful prevention of communal violence requires ties between large sections of the population, which can be facilitated through civic participation.

Sense of belonging

An integral feature of community cohesion is a sense of belonging. A sense of belonging is required to create “a community of individuals bound to each other in a way that they are not bound to others; a mutuality of claims and obligations” (Parekh 2000: 2). It is also important for individuals to be able to share a common loyalty to the wellbeing of that community. Community cohesion requires a common sense of belonging, so that individuals in communities will make personal concessions for the greater good of the community as a whole, for example by respecting and obeying the law. Through possessing a common sense of belonging, communities learn to be able to cope with difference and diversity (Parekh 2000). Analysis of the 2003 Citizenship Survey found that sense of belonging to the neighbourhood is a significant positive predictor of community cohesion (Kaur-Ballagan 2005).

1.3 Why we need this research

There is then, a relatively large and growing evidence base on community cohesion. However, taken together there are a number of limitations to this existing evidence: much of it is US-specific and most examines only one small facet of what is a highly complex issue. However perhaps most significantly, given the fact that an individual’s sense of cohesion is a product of both their individual characteristics and the characteristics of the community in which they reside, none of the existing research uses multi-level statistical modelling to explore the predictors of community cohesion. The current project addresses this shortcoming by using multi-level modelling to take into account the hierarchical nature of these relationships.

Chapter 2

Methodological framework

The current study builds on the existing research on the drivers of community cohesion. It adopts a multi-level approach to community cohesion and uses data from the 2005 Citizenship Survey, the 2001 Census and the Indices of Deprivation 2004. The Citizenship Survey is the primary source of data on cohesion in England and Wales and includes questions covering a wide range of related topics. See Appendix A for further details on the data sources.

A number of different statistical models were constructed using these data, considering potential socio-demographic and attitudinal predictors of community cohesion at the individual level, as well as at the community level. The first half of this chapter describes the measure of cohesion used, as well as providing further details of the predictor variables examined in this study. The second half provides an overview of the approach taken to the modelling work.

2.1 Cohesion and Predictor variables

Measure of Community Cohesion

In December 2002, the Local Government Association, Home Office, Office of the Deputy Prime Minister (now Communities and Local Government), Commission for Racial Equality and the Inter-Faith Network developed guidance for local authorities on community cohesion. The guidance suggested ten national indicators for local authorities to use to measure community cohesion. These ten indicators were organised under the headline indicator/responses to the survey question: “to what extent do you agree or disagree that this local area (within 15/20 minutes walking distance) is a place where people from different backgrounds get on well together?” This headline indicator is measured nationally by the Citizenship Survey and is broadly accepted to capture community cohesion, touching on all strands of the definition given in the introduction to this report. For this reason, it is also the measure of community cohesion used in this study.

Socio-demographic variables

A number of variables were selected in the modelling to capture the various dimensions of an individual’s socio-economic situation: income, employment status, socio-economic group, level of qualifications, and residential status. A full list of the socio-demographic variables is given in Box 2.1.

Box 2.1: Socio-demographic variables tested in model

- Years lived in neighbourhood
- Age
- Ethnicity (compared with White):
 - Indian
 - Pakistani & Bangladeshi
 - Other Asian
 - Black Caribbean
 - Black African
 - Other Black
 - Mixed Race
 - Chinese
 - Other
- Religious affiliation (compared with no religious affiliation):
 - Hindu
 - Muslim
 - Sikh
 - Christian
 - Other religion
- Income
- Gender (female, compared with being male)
- Participation in civic engagement activities in the past 12 months
- Participation in informal volunteering in the past 12 months
- Participation in formal volunteering in the past 12 months
- Participation in employer supported volunteering in the past 12 months
- Whether born outside the UK
- Employment status (being employed, compared with being either unemployed, or economically inactive due to being either retired, a student, looking after family/home or having a long-term illness or disability)
- Socio-economic group (having an upper occupation (managerial and professional occupations, and intermediate and small employers), compared with a lower occupation (lower supervisory and technical occupations, and semi- and routine occupations))
- Highest level of qualification
- Occupancy status (comparing council tenancy, housing association tenancy and private renting with home ownership)

For analytical purposes, a number of dummy variables were created for level of qualifications and socio-economic group, analysing the effect of the highest level of qualification, compared with having no qualifications, and the effect of having a managerial or professional occupation, compared with having a lower supervisory and technical occupations, and semi-routine and routine occupations. The National Statistics Socio-Economic Classification system (NS-SEC) was used to differentiate occupational groups and a binary variable distinguishing upper from lower occupations was then created to examine the effect of occupation on cohesion. Employment status was analysed comparing the effect of being unemployed, a student, retired, looking after family/home

or having a long-term illness or disability⁴ with being employed. Banded income was treated as a continuous variable for the purpose of this analysis with the lowest income bracket covering the range £0-2500 per annum. The residential status of an individual was analysed by examining the effect of council tenancy, housing association tenancy, and private renting, compared with owning a home.

Another set of variables used are related to an individual's civic participation. Civic participation includes a range of activities, including contacting a local councillor, MP, local or central government official; taking part in a public meeting, rally, public demonstration or protest, or signing a petition; completing a questionnaire, or being involved in a group set up to discuss local services or problems in the local area. Participation in formal, informal and employer supported volunteering in the last twelve months was also included.

Attitudinal variables

In order to ensure that the results from the modelling of attitudinal variables were both meaningful and robust, it was appropriate to first utilise a statistical technique known as factor analysis. Factor analysis takes a large number of variables and groups together those that appear to be measuring the same underlying concept. Further details of the methodology used are provided in Appendix A. From the results of the factor analysis six factors were obtained:

- Fear of crime
- Collective efficacy
- Trust in formal authorities (including police, courts, parliament)
- Satisfaction with local services
- Perceived racial discrimination by CJS agencies or immigration service
- Perceived racial discrimination by health services.

Additional variables were included as separate variables where they did not fit neatly into any particular factor. Box 2.2 gives a full list of attitudinal variables included in the modelling.

⁴This includes only those with a disability or long-term illness who are also economically inactive, not all individuals who are disabled or have a limiting long-term illness

Box 2.2: Attitudinal variables tested in model

- Fear of crime (F)
 - Worry about racist attack
 - Extent to which individual feels safe after dark
 - Perceptions of collective efficacy (F)
 - Extent to which individual feels people pull together to improve their neighbourhood
 - Extent to which individual feels people in area are willing to help their neighbours
 - Extent to which individual feels they can trust people in their neighbourhood
 - Perceived ability to influence decisions affecting their local area
 - Perceived ability to influence decisions affecting Great Britain
 - Trust in formal authorities (F)
 - Perceived racial discrimination by CJS agencies and immigration services (F)
 - Perceived racial discrimination by health services (F)
 - Perceived racial discrimination by local council housing department/Housing Association
 - Perceived racial discrimination in local schools
 - Perceived racial discrimination in the education system generally
 - Perceived racial discrimination by local council
 - Perceived racial discrimination by private landlords
 - Perceived change in racial prejudice in the past five years
 - Perceived change in religious prejudice in the past five years
 - Satisfaction with local services (F)
 - Sense of belonging to neighbourhood
 - Sense of belonging to Local Authority/London Borough
 - Sense of belonging to Great Britain
 - Proportion of friends an individual has with similar incomes
 - Proportion of friends an individual has of the same ethnic group
 - Proportion of people in local area an individual thinks are of the same ethnic group to themselves
- 'F' indicates that this variable is a factor constructed from a group of similar questions

The impact of crime on the individual can be measured via perceptions of crime in their local area. The factor analysis combined a number of different questions asking about fear of different types of crime, integrating them into one overall "fear of crime" factor. However, fear of racist attack was not included in this factor. This is because arguably it is a distinct form of crime, fear of which is driven by different (although probably related) variables. It is also reasonable to assume that fear of being attacked on the basis of your race or skin colour will have a unique effect on perceptions of cohesion. How safe an individual feels after dark was also included as a separate indicator covering this theme.

The 2005 Citizenship Survey asks a wide range of questions used to measure social capital and collective efficacy in the community. These were included in the models. A number of questions measuring the individual's perceptions of the willingness of neighbours to intervene to solve problems were all shown to be closely related to each other and were reduced to form a collective efficacy factor. A number of questions which also capture perceptions of collective efficacy but which did not load on to this factor, including "the

extent to which individuals feel people pull together to improve the neighbourhood” and “the willingness of people in the neighbourhood to help their neighbours” were included in the model as separate variables. Finally, the extent to which an individual feels they can trust their neighbours was included as a measure of social capital.

The multi-dimensional relationship between the individual and authorities (be they local or national government bodies) was examined using a number of questions. Two measures of an individual’s political efficacy (defined as the perceived ability to influence decisions at both the local and national level) were included, along with a factor measuring the extent to which an individual trusts authorities. Previous research has shown trust to be an important predictor of community cohesion and the Citizenship Survey asks a number of questions about the extent to which an individual has trust, for example, in the police, parliament and local council. These all loaded heavily on the single factor of trust in formal authorities.

Another important dimension is based on individuals’ perceptions of whether they would be treated worse, better or the same as people of other races by various public services organisations. The measures of perceived racial discrimination by different organisations combined into two different factors. One of these included the five CJS agencies as well as the immigration authorities, and the other covered health services. Perceived racial discrimination by a council housing department or housing association, local schools, the education system generally, the local council, and private landlords did not load onto one of these factors and were included in the model separately. Overall perceptions of racial and religious prejudice were included with the variables: perceived change in racial/religious prejudice in the past five years.

The last of the six factors listed above measured the level of satisfaction an individual feels towards various government-supplied services in the local area and was included in the model as an indicator of the extent to which an individual feels there are sufficient resources in their local area.

Also included in the model were variables measuring sense of belonging to different geographical areas, including their neighbourhood, their local authority/London borough and Great Britain. Measures looking at whether an individual thinks racial and religious prejudice has increased, decreased or stayed the same over the past five years were also added.

Measures of the connectedness of ethnic and class networks were included to measure the differing proportions of inter- and intra-class friendships and inter- and intra-ethnic friendships. Questions on the proportion of friends with similar incomes and the proportion of friends of the same ethnic group were used to capture this. These measures were included in the attitudinal model and not the socio-demographic model because of the relative subjectivity of such measures. Finally, a measure of the proportion of people in the local area perceived to be from the same ethnic group as the respondent was included.

Community level variables

As well as the socio-demographic and attitudinal characteristics of the individual, it is likely that an individual's perceptions of cohesion are also influenced by community level factors. A full list of community level variables used in the modelling is provided in Box 2.3.

Box 2.3: Community level variables tested in model

- Indices of Deprivation 2004
- Crime (using Crime domain of Indices of Deprivation 2004)
- Percentage of non-white in-migrants from outside the UK
- Population turnover/in-migration
- Population density
- Area mix (see Table 2.1 for specific ethnic breakdowns):
 - White 1
 - White 2
 - White 3
 - White 4
 - White and Pakistani & Bangladeshi
 - White and Black
 - White and Indian
 - Mixed 1 (all groups)
 - Mixed 2 (White, Indian and Pakistani & Bangladeshi)
 - Mixed 3 (White, Indian and Black)
 - Mixed 4 (White, Pakistani & Bangladeshi and Black)

The key Citizenship Survey question on cohesion defines the “local area” as being the area within a 15-20 minute walking distance of the respondents’ home. For this reason, Middle Super Output Areas (MSOAs) were identified as the most appropriate geographical level for this study. MSOAs are statistical areas defined by the Office for National Statistics (ONS) and have a minimum population of 5,000 residents and an average population of 7,200.

Level of crime and the level of disadvantage in an area are potential drivers of community cohesion. The Indices of Deprivation 2004 (ID 2004) are used to measure overall area level disadvantage. The ID 2004 measures disadvantage across a number of domains, including income, health and disability, employment, education, barriers to housing and services and the living environment at the lower layer super output area⁵.

To capture community level crime, the crime domain of the ID 2004 was used. This generates an index based on the rates of burglary (4 types of offences), theft (5 types of offences), criminal damage (10 types of offences) and violence (15 types of offences). The ID 2004 crime domain was used, rather than actual crime rates, because of issues regarding the completeness of the crime rates data.

⁵ The population-weighted values of the Index of Multiple Deprivation and Crime Domain scores were aggregated up to the MSA level. LSOAs nest within MSOAs and hence, the derived MSA scores are a weighted sum of the constituent LSOA scores. The total number of households in the LSOA was the actual weight used.

The indices of deprivation, produced by the former ODPM (now Communities and Local Government) only cover England, and although similar indices are produced for Wales, they are not directly comparable. For this reason, the Welsh sample had to be excluded from both the individual and community level analysis to maintain consistency throughout the study.

The residential turnover of a community and the population density were also included in the models. The rate of residential turnover was calculated by adding the inflow and the outflow of persons in an area per 1,000 people. The type of migration into a community is also taken into account by including the proportion of non-White people in an area born outside the UK who have moved into a community in the past 12 months. Both these variables are based on 2001 Census data, the only reliable data available to measure this.

To capture the differential effects that different minority ethnic populations may have on an individual's perception of community cohesion, a typology of diversity was created. The full details of this typology are shown in Table 2.1.

Table 2.1: Area typology

	White British	Pakistani & Bangladeshi	Black (Black Caribbean & Black African)	Indian	Number of MSOAs
Area type					
White 1	>99%	–	–	–	77
White 2	>97.5% & <99%	–	–	–	122
White 3	>95% & <97.5%	–	–	–	262
White 4	>90% & <95%	–	–	–	292
White and Pakistani & Bangladeshi	<90%	>13%	<4%	<4%	17
White and Black	<90%	<4%	>13%	<4%	78
White and Indian	<90%	<4%	<4%	>13%	24
Mixed 1 (all groups)	<90%	>4%	>4%	>4%	113
Mixed 2 (Indian and Pakistani & Bangladeshi)	<90%	>4%	<4%	>4%	49
Mixed 3 (Indian and Black)	<90%	<4%	>4%	>4%	80
Mixed 4 (Pakistani & Bangladeshi and Black)	<90%	>4%	>4%	<4%	74

Source: 2005 Citizenship Survey, Communities and Local Government; 2001 Census; ID 2004

Notes

- (1) Figures are rounded. The typology was calculated to 4 percentage points so, for example, the difference between the White 1 and White 2 group is that in White 1 = >99.0001% White British while White 2 = <98.9999% White British

In this area typology, the White category is specifically White British. Although it would be useful, especially with recent A8 and A2 immigration, to analyse the effect on cohesion of different concentrations of A8 and A2 migrants, the 2001 Census only categorises three White groups: White British, White Irish and Other White, making it impossible to isolate A8 and A2 migrants for analysis. And, in any case, A8 and A2 immigration has only increased post-accession (in 2004 for the A8 countries and in 2007 for the A2 countries).

In the community models, Black Caribbean and Black African people were amalgamated into a single Black group because of the high correlation (0.70) between the two groups in terms of the communities they reside in. Pakistani and Bangladeshi people were amalgamated into a single Pakistani & Bangladeshi variable because the size of the Pakistani and Bangladeshi samples were too small to analyse their effect independently.

The area types do not distinguish between different concentrations of the remaining ethnic groups (ie Chinese, Mixed Race, "Other Black", "Other Asian" and "Other"), as these populations are not in large enough concentrations in enough MSOAs to construct distinct categories.

As shown in Table 2.1, the categories of the typology capture a range of different areas. The White areas capture differing levels of White British homogeneity. The Mixed areas capture areas with two or three substantial minority ethnic populations and one smaller minority ethnic population, while the other categories cover areas with a significant White British population and also one substantial minority ethnic population.

The categories were constructed using the distributions of the four main minority ethnic populations across the MSOAs and includes 1,128 of the 1,492 communities represented in the 2005 Citizenship Survey. The remaining communities are predominantly White British with relatively small minority ethnic populations, but after testing were found to be not significantly different from the four White areas shown in Table 2.1.

To test the relative effects of these different concentrations of ethnic groups, a series of dummy variables were generated. Areas with White British populations greater than 99 per cent were selected as our reference category and therefore the results show the effects of living in a certain area compared with the effects of living in an area where more than 99 per cent of the population is White British.

Control variables

Control variables are variables that have the potential to affect the dependent variable (community cohesion). When we "control for a variable" we wish to balance its effect across all our models so that we are able to ignore it, and just study the relationship between the independent (our cohesion predictors) and the dependent variables (community cohesion). We control for certain variables by including them in all our models. For this reason, they are essential in allowing us to say with greater certainty what factors have an impact on an individual's perception of community cohesion. Age and gender

were kept constant throughout to minimise their effects on the modelling outcome. Whether an individual was born in the UK is also included as this may have a significant impact on perceptions of cohesion. Importantly, views on cohesion also vary by ethnicity and religion. To control for these effects we include a range of ethnic identifiers in our models based on the ethnic origin and religion of the individual.

In the Citizenship Survey, ethnicity is a self-reported measure, using the 2001 Census categories. For the purposes of modelling, the following groups were distinguished: White (including White British, White Irish and other White), Indian, Pakistani & Bangladeshi, Black Caribbean, Black African, Mixed Race, Chinese and Other.

It is important to specify here that at the individual level, the effect on community cohesion of being a member of a certain ethnic minority group is compared to the effect of being White (including White British, White Irish and "Other White"). However, at the community level, the effect of different concentrations of White British (not all white as at the individual level) was analysed. The reason for this is that at the individual level, analysis showed that being "White British" did not have a significantly different effect on cohesion scores compared to being "White Irish" or "Other White". Their similar effect and direction of effect meant that for reasons of parsimony, to improve the robustness of the model, we could amalgamate these groups into one category: White. However, analysis at the community level showed that different concentrations of White British did have a significantly different effect on perceptions of cohesion. Therefore, the decision was made to look at the effect of different concentrations of White British.

Some evidence has shown Pakistani and Bangladeshi individuals have quite different perceptions of cohesion. Data have also shown that the groups differ in a number of other ways including spatial patterns of residence (ONS 2006). However, because of their small sample size in the dataset, and also their strong cultural similarities, the decision was taken to amalgamate these two groups into one ethnic variable to improve the robustness of our models, in common with other research of this sort. Similarly, at the community level, the proportion of people in an area from a Pakistani or Bangladeshi background was used to create the ethnic mix variables.

The control variables for religion distinguished between Hindus, Muslims, Sikhs, Christians, other religions, and those with no religion. The small proportion of people affiliated to "other religions" prohibited them from being included individually and as such Buddhists, Jews, and those with "any other religion" were combined into one category.

2.2 Modelling approach

Multi-level modelling was selected as the most appropriate technique to model community cohesion. This is based on the notion that an individual's sense of cohesion is likely to be a product of both their individual characteristics and the characteristics of the community in which they live. Multi-level modelling is able to fully take into account the hierarchical nature of these relationships.

Social scientists believe that community characteristics can affect individual perceptions through a number of mechanisms. Social interaction between individuals in a neighbourhood can aid the transference of views where people can be affected by those in their social network. Another mechanism is that of neighbourhood emulation. Individuals may conform to the local customs of an area as part of their membership of the local community, even if there is little or no social interaction or pressure leading to that conformity (Johnston et al. 2004).

In examining the effect of community characteristics, it is possible that the apparent effect is simply an aggregate of individual level characteristics and that, beyond an individual's demographic characteristics and attitudes, the community has no additional effect. However, by using multi-level modelling, it is possible to control first for the effects of the individual's characteristics. If, after controlling for these, community level characteristics still have an affect, one can assume they are operating and are not simply an aggregate of individuals' characteristics⁶.

The dataset is made up a series of interval and binary variables as well as continuous variables. As many of the variables are measured on different scales, it is not possible to directly compare the size of the coefficients to compare effects. However, by standardising the variables, it is possible to directly compare the scores for the different predictors⁷. As a result, a score of 0 would indicate that that variable has no effect on cohesion, once other variables have been taken into account. The larger the positive (or negative) score of the predictor, the stronger its positive (or negative) effect on community cohesion. As we are primarily interested in comparing the relative strengths of different drivers of cohesion, this method proves extremely useful.

This research examines four separate models of community cohesion:

- individual-level socio-demographic drivers of cohesion
- individual-level attitudinal drivers of cohesion
- community-level and individual-level socio-demographic drivers of cohesion
- community-level and individual-level attitudinal drivers of cohesion

⁶ As with all modelling of this sort, one is restricted by the available variables and there is always the potential there may still be unmeasured individual level variables that could explain the contextual "effect".

⁷ In this case, standardised beta coefficients.

Initially, the variables selected for individual-level analysis from the 2005 Citizenship Survey are divided into two groups: socio-demographic drivers and attitudinal drivers. This distinction is drawn for a number of reasons.

First, socio-demographic and attitudinal variables may each have a different relationship to the community cohesion variable. Socio-demographic variables are *objective* variables. The level of qualifications of an individual, their occupation, their age and so forth are factors which are not dependent on an individual's perceptions. These characteristics will not therefore be influenced by perceptions of community cohesion in the area.

Attitudinal factors, such as perceptions of whether people in the neighbourhood would pull together to solve problems, or even how worried they are about crime, are *subjective* variables, based on the feelings of the individual. To this extent, there is the potential for problems with causality when analysing the effect of attitudinal variables on perceptions of cohesion. For example, does the fact that an individual feels that people in their local area would pull together to solve community problems influence their views on community cohesion, or is the relationship the other way around? By dividing our analysis into socio-demographic (objective) and attitudinal (subjective) models we can minimise the potential problem this causes.

Second, it is important to distinguish between socio-demographic drivers and attitudinal drivers because of the co-relationship between the two types of variables. As we are analysing the extent to which an individual's perception of community cohesion is a product of their socio-demographic characteristics, we must be equally aware that their other perceptions and attitudes may also be a product of their socio-demographic characteristics. For example, an individual's level of education is positively associated with a feeling of cohesion. It may also be associated with a positive perception of the willingness of individuals in the community to pull together to solve problems. We therefore model the two sets of variables separately to avoid problems of collinearity.

Chapter 3

Results

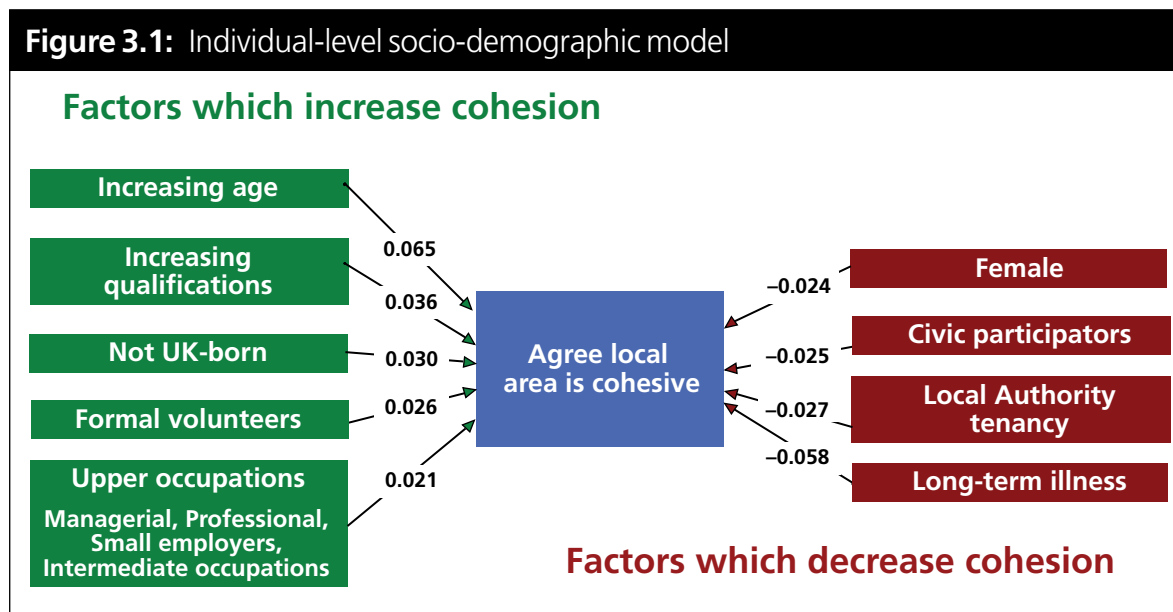
This chapter presents findings from our multi-level analysis of the 2005 Citizenship Survey. The chapter has two main sections. The first presents socio-demographic and attitudinal individual-level results and explores how these results vary among the different minority ethnic groups. The latter section presents the community-level findings which control for the effects of individual socio-demographic and individual attitudinal characteristics on community cohesion. Full results are given at Appendix B.

3.1 A note on interpreting the results

Results are presented in this chapter in a series of figures. In each figure, the strength of each predictor of cohesion is given next to each variable. While a score of 0 would indicate no effect, the larger the positive (or negative) score of the predictor, the stronger its effect on generating (or undermining) community cohesion. However, the model cannot explain causality. We cannot, for example, say whether perceptions of cohesion cause perceptions of collective efficacy or whether the relationship is the other way around (ie that perceptions of collective efficacy cause perceptions of cohesion).

The effects of each predictor have been standardised so irrespective of the measurement scale of the variable, the score for every predictor represents an equal increase in 1 level. Therefore, the relative effects of different predictors can be compared directly. If, for example, Variable A has a strength of 0.01 and Variable B has a strength of 0.1, an increase in 1 level of Variable B causes x10 more cohesion than an increase in 1 level of Variable A.

3.2 Individual-level socio-demographic model



As shown in Figure 3.1, in the individual level socio-demographic model, the strongest **positive** predictor of cohesion is **increasing age** (ie older people are more likely than younger people to think that their local area is cohesive). However, this is a curvilinear relationship⁸: cohesion is higher among younger people, lower among middle aged people and then higher among older people. This could be either a product of different life stages having a different impact on perceptions of cohesion, or different birth cohorts holding different perceptions of cohesion depending on when they were born.

Qualifications and **occupation** are also **positively associated** with community cohesion. As the level of qualifications increase, the individual's feelings of cohesion also increase and those with a degree or higher qualification have more positive views of cohesion. The results showed that individuals in managerial and professional occupations and intermediate and small employers feel more cohesive than individuals in lower supervisory and technical, semi-routine and routine occupations.

As also shown in Figure 3.1, **country of birth** is positively associated with cohesion: individuals not born in the UK are more likely than UK-born individuals to feel that their local area is cohesive. Moreover, **people from minority ethnic backgrounds** generally have more positive views of cohesion than White individuals.

Finally, individuals who have engaged in **formal volunteering** in the past 12 months also feel more cohesion than individuals who have not.

⁸ A relationship between two variables that, when plotted on a graph, forms a curve rather than a straight line (as in a linear relationship); (Vogt 1999: 67).

The strongest **negative** socio-demographic predictor of cohesion is whether an individual has a **limiting long-term illness or disability**. The undermining effect this has on cohesion is approximately twice as strong as the next negative predictor. **Females** are also more likely than males to feel that their local area is *not* cohesive, whilst individuals who rent **local authority housing** feel that there is less cohesion than individuals who own or are paying off their own homes. Renting from housing associations or renting from private landlords has no significant impact on an individual's perception of community cohesion.

Interestingly, whether an individual has engaged in **civic participation** in the last 12 months is also a negative predictor of cohesion. However, no individual mode of civic participation (for example, attending a local meeting, signing a petition etc.) is significantly associated with feelings of more or less cohesion. The negative effect of civic participation may therefore be the result of reverse causality. If an individual feels the area they live in is less cohesive then they may take action by, for example contacting their local council or signing a petition.

3.3 Individual-level socio-demographic model – interaction model

Figure 3.2: Individual-level socio-demographic model – interaction model

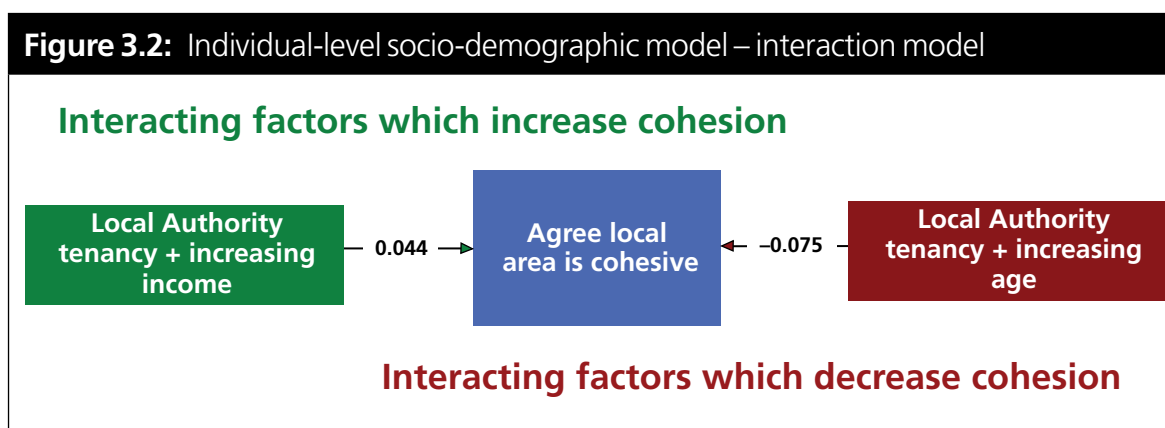
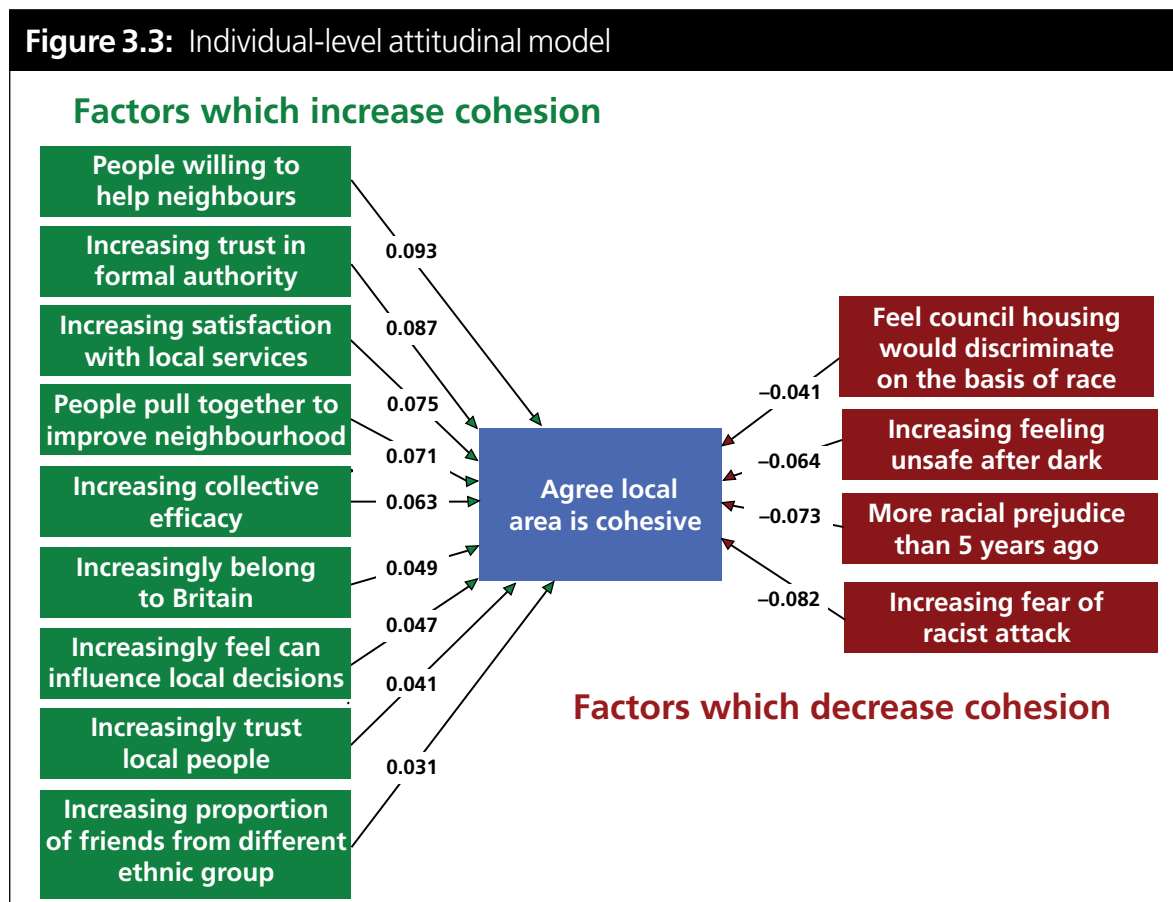


Figure 3.2 shows that certain socio-demographic characteristics interact with each other to increase positive effects or reduce negative effects on community cohesion. Individuals who live in local authority housing have less positive views of cohesion compared with individuals who own their homes. However, the negative effect of living in a local authority tenancy on cohesion depends on the income and age of the individual. As a local authority tenant's income increases, the negative effect that their tenancy has on cohesion reduces. At the same time, older local authority tenants have more negative views than younger local authority tenants.

3.4 Individual-level attitudinal model



As Figure 3.3 illustrates, in the individual level attitudinal model, a strong **positive** predictor of cohesion is **collective efficacy** (ie perceptions of neighbours' willingness to intervene to solve community issues). Two questions, which did not load on to the collective efficacy factor, "the extent to which individuals feel people would pull together to improve the neighbourhood" and "the willingness of people in their neighbourhood to help their neighbours", also have significant, positive effects on perceptions of cohesion. An individual's perception of the willingness of neighbours to help each other is the strongest predictor of an individual's sense of cohesion. However, it may be that these are highly correlated with cohesion because they are to some degree themselves measures of cohesion.

Having **trust in institutions** and being **satisfied with local services** are strong positive drivers of cohesion. The extent to which an individual feels they can **influence local decisions** is also strongly associated with positive feelings of cohesion. However, the extent to which an individual feels they can influence *national* decisions has no effect on perceptions of cohesion. How far an individual feels they **belong to Britain** has a positive effect on cohesion.

As also shown in Figure 3.3, the extent to which an individual **trusts people in their community** drives positive views on cohesion as does having friends from different ethnic backgrounds.

In terms of **negative predictors**, Figure 3.3 demonstrates that the perception that **council housing bodies would discriminate against people on the basis of race** has a strong negative effect on cohesion. Similarly, if an individual believes **racial prejudice has increased** in Britain over the last five years, they are more likely to feel that their communities are less cohesive. However, feeling that the Criminal Justice System would discriminate on the basis of race has no effect on perceptions of cohesion.

An increase in **feelings of being unsafe in the local area after dark** is also a strong negative predictor of community cohesion. However, the strongest negative predictor is the **fear of being attacked because of race** – the more likely an individual is to feel this, the more negative they are likely to feel about cohesion.

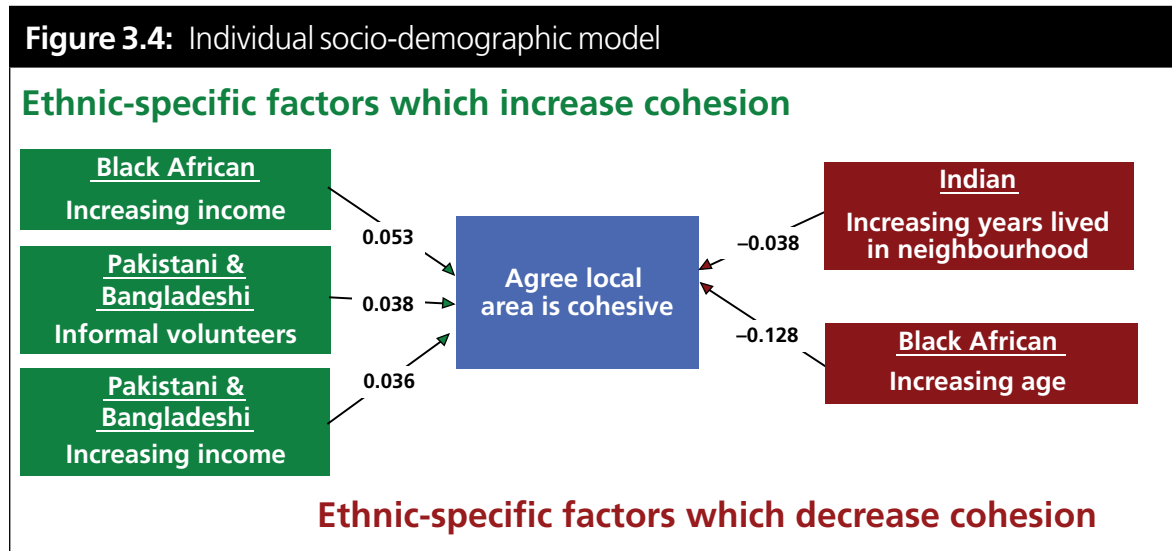
3.5 Ethnic differences

Individual socio-demographic model

As cohesion levels between different ethnic groups vary, it is likely that the socio-demographic and attitudinal predictors will have different effects among different minority ethnic groups.

To test this, we examined whether certain socio-demographic or attitudinal variables significantly interact with the ethnic origin variables (Black African, Black Caribbean, Other Black, Pakistani & Bangladeshi, Indian, Other Asian, Mixed Race, Chinese and Other). Despite having a sizeable minority ethnic boost, some groups are too small to analyse in this way using the Citizenship Survey. This study can therefore only show whether a predictor has a significant effect on an individual of minority ethnic background and no effect on an individual of White origin; or whether a predictor has a significantly stronger or weaker effect on an individual of minority ethnic background compared with the effect on a White individual. We cannot state whether a predictor has a significant effect on White people but no significant effect on minority ethnic people, as the small sample size means we cannot trust results of non-significance in our ethnic interaction model.

Figure 3.4 shows that, while income has no significant effect on cohesion for White people, it is a strong positive driver of cohesion for Black African and Pakistani & Bangladeshi individuals. Moreover, Pakistani & Bangladeshi people have more positive perceptions of cohesion if they have engaged in informal volunteering in the past 12 months.



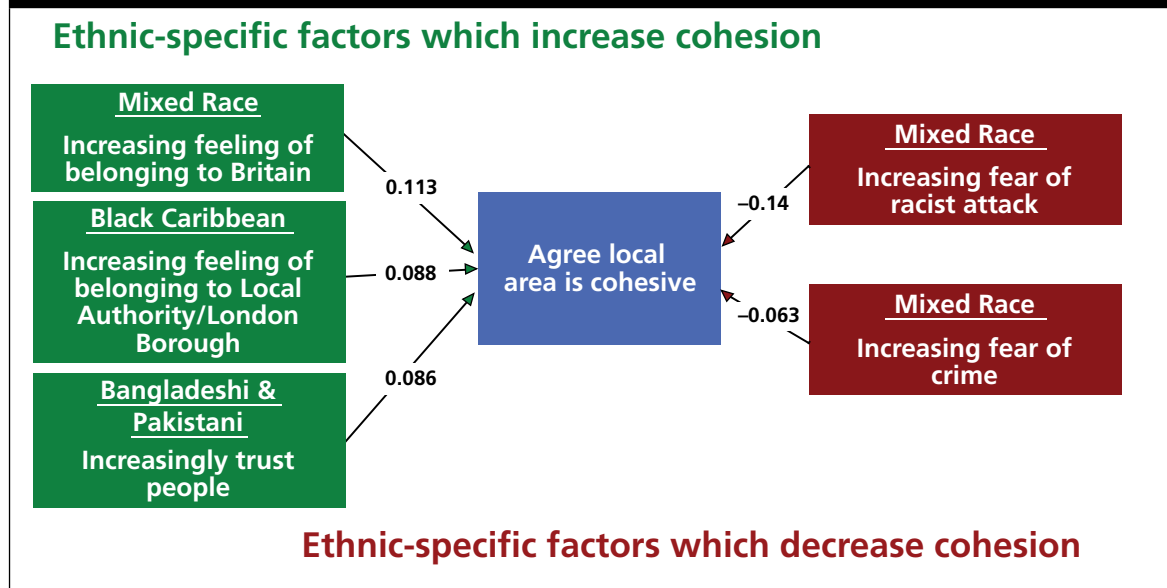
While the number of years lived in a neighbourhood has no effect on cohesion for White individuals, the longer Indian people have lived in a neighbourhood the more negative their views on cohesion become.

Unlike the more complex curvilinear relationship between age and cohesion among White people, for Black African people, the relationship between age and cohesion is linear and older people have more negative views than younger people.

Certain attitudinal predictors of cohesion also have different effects on cohesion for different minority ethnic groups. As shown in Figure 3.5, among Mixed Race people there is a strong positive relationship between belonging to Great Britain and cohesion, while among White people sense of belonging has a far weaker effect. The more Black Caribbean people feel they belong to their local authority, the more their sense of cohesion increases, while among Pakistani & Bangladeshi individuals there is a significant positive relationship between trust in others and cohesion. Among White people, these relationships are much weaker.

Individual-level attitudinal model

Figure 3.5: Ethnic differences: individual attitudinal model



Meanwhile, fear of crime and fear of racist attack have a stronger negative impact on perceptions of cohesion among Mixed Race people compared with White individuals among whom it has a far weaker effect.

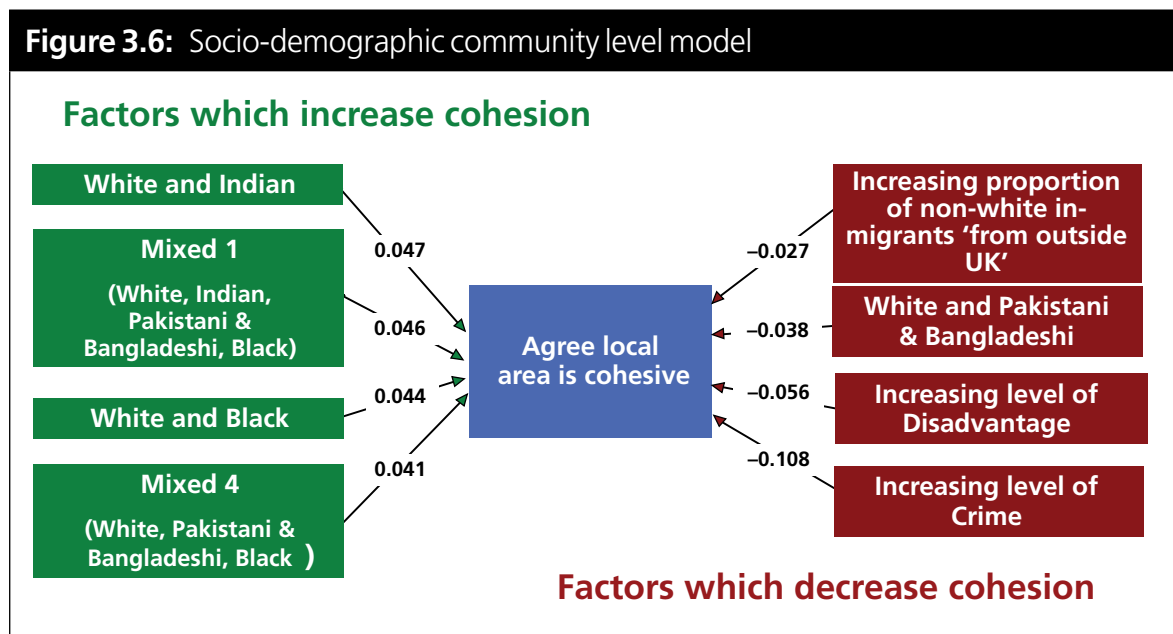
Broadly speaking however, most predictors of cohesion appear to affect all minority ethnic groups similarly. Out of all the potential interactions, there are only a small number, which are significant, and by chance we would expect a few interactions to be significant.

3.6 Community level models

The type of community that people live in also has an effect on whether they feel that their local area is cohesive. This section reports findings from the community-level analysis, which models the effect of community-level predictors on cohesion after controlling for the effects of individual socio-demographic and attitudinal characteristics.

To investigate the relative merits of the contact and threat hypotheses, differing levels of community diversity were also included in the analysis. To capture the differential effects that different minority ethnic profiles may have on an individual's perception of community cohesion, a typology of diversity was created which generated a series of area classifications whose effects could be compared. This typology is described in Table 2.1. (see page 24).

3.7 Socio-demographic community level model

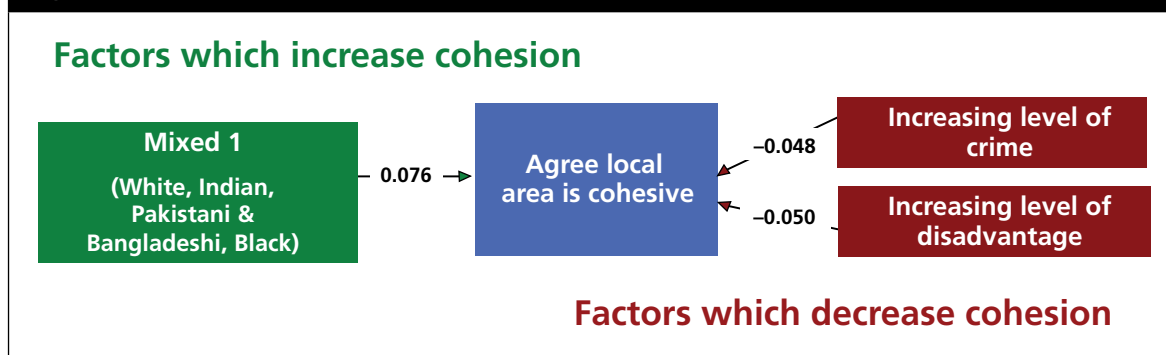


As shown in Figure 3.6, the strongest **positive**, community-level predictor of cohesion is living in a community with a large **Indian population**. That is, individuals who live in areas with a relatively large Indian population and only small Black and Pakistani & Bangladeshi populations have more positive views on cohesion than those who live in areas that are more than 99 per cent White. This is also true of people who live in areas where there is a large Black population and people who live in ethnically mixed areas with significant Indian, Pakistani & Bangladeshi and Black populations (ie the “Mixed 1” category defined in Table 2.1). Living in an ethnically mixed area with a substantial Black and Pakistani & Bangladeshi population but a smaller Indian population (“Mixed 4”) also has a significant positive effect on cohesion. However, living in a community with a large Pakistani & Bangladeshi population is a negative predictor of community cohesion.

Increasing levels of crime in an area is the strongest **negative predictor** of cohesion, followed by rising levels of **disadvantage**. The percentage of **non-White in-migrants** who moved into the area from outside the U.K is also a significant negative predictor of cohesion.

3.8 Attitudinal community model

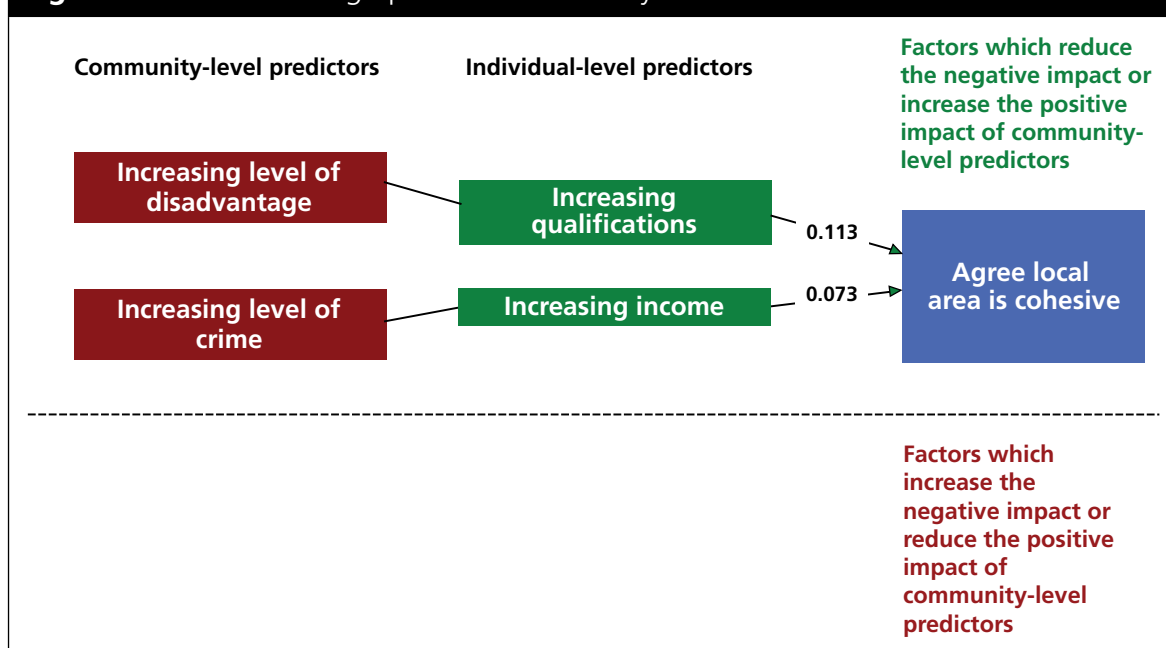
Figure 3.7: Attitudinal community level model



As shown in Figure 3.7, by applying the community level variables to the individual level attitudinal model we found that only three of the eight significant community-level predictors from the socio-demographic model are still significant: crime and disadvantage remain negative drivers of community cohesion while living in an ethnically mixed area with equally substantial Pakistani & Bangladeshi, Indian and Black populations (ie the “Mixed 1” typology defined in Table 2.1) remains a positive predictor of cohesion. However, the fact that there are fewer significant community-level variables in this model may be a result of controlling for attitudinal variables that are in some senses indicators of community cohesion. In essence, the attitudinal variables perhaps control ‘too much’. It could well be that community level factors partially explain the respondent’s subjective feelings.

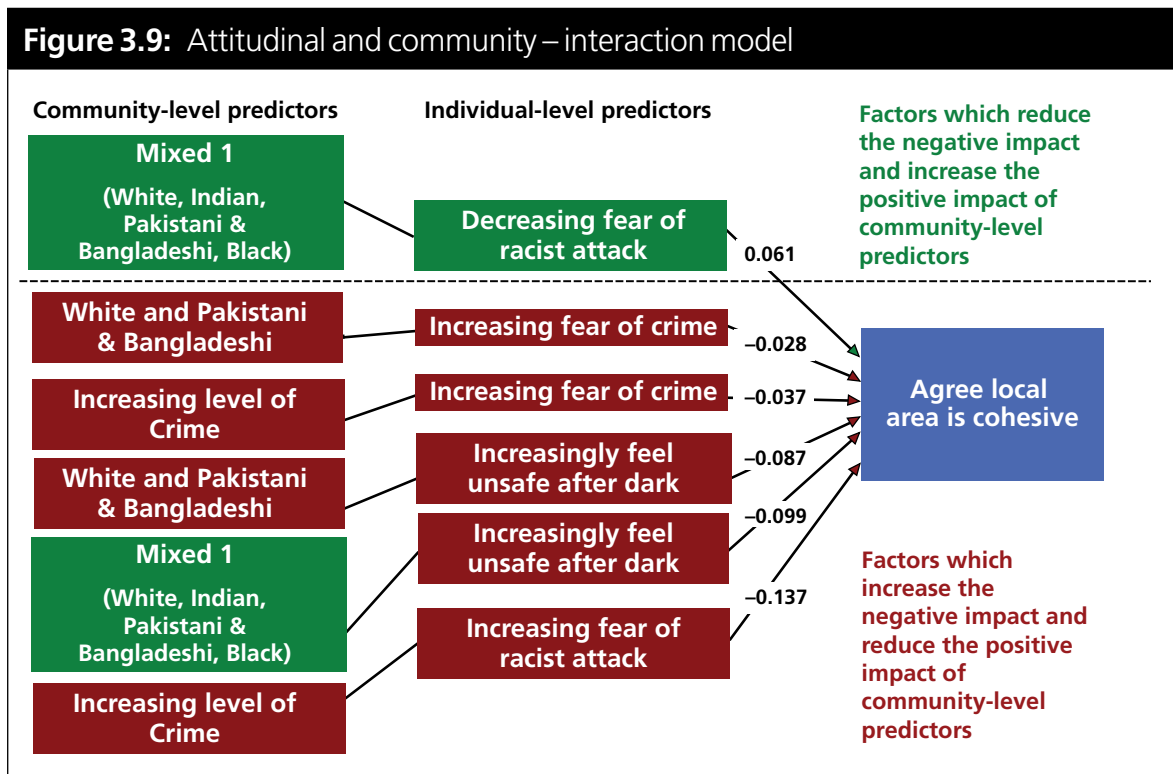
3.9 Socio-demographic and community – interaction model

Figure 3.8: Socio-demographic and community – interaction model



To test whether the effect of community-level drivers of cohesion on an individual's perception of cohesion can be increased or reduced depending on an individual's socio-demographic characteristics, interaction variables were generated between individual level and community level predictors. As shown in Figure 3.8, while living in an area with a higher crime rate has a negative impact on an individual's perception of cohesion, the greater an individual's income, the weaker the effect of this relationship. Furthermore, while living in a highly disadvantaged area has a negative effect on an individual's perception of cohesion, the higher the level of an individual's qualifications, the weaker the effect of community disadvantage on their perception of community cohesion. Income and education thus lessen the negative impact living in a high crime or disadvantaged area has on cohesion.

3.10 Attitudinal and community – interaction model



Testing for interactions highlights the centrality of both crime and the fear of crime to feelings of community cohesion – especially in relation to the level of diversity. As shown in Figure 3.9, the positive effect on cohesion of living in an ethnically mixed area is increased further still when individuals do not fear a racist attack. However, the positive effects of living in such an area are significantly *undermined* when individuals feel unsafe after dark or fear being the victim of a racist attack. These fears also exacerbate the negative effects of living in a community with a large Pakistani & Bangladeshi population. Not surprisingly, increasing fear of crime and racist attack also inflate the negative effect of higher crime rates within a community.

Chapter 4

Discussion of key findings

The results presented in the previous chapter show that an individual's perception of cohesion is a product of both their individual characteristics and the characteristics of the community in which they reside. Crime (measured using the crime domain of the ID 2004) and deprivation (measured using the ID 2004) are the two strongest negative community level predictors of cohesion. At the individual level, indicators of socio-economic disadvantage, feelings of vulnerability and powerlessness, and perceptions of crime are the strongest predictors of cohesion. In this section key findings are summarised and these key drivers of community cohesion are explored further.

4.1 Key Findings

Years spent in neighbourhood

When other factors are controlled for, the number of years an individual has lived in a neighbourhood has no effect on perceptions of community cohesion. However, for Indian people length of time spent in the neighbourhood has a negative effect (ie the longer Indian people have lived in an area, the less likely they are to think it is cohesive).

Population turnover

At the community level, population turnover/in-migration does not have a significant effect on perceptions of community cohesion. However, in-migration has a negative effect on cohesion if large proportions of the in-migrants are non-White and originate from outside the UK.

Political efficacy

Political efficacy has mixed effects. Feeling able to influence local decisions is positively associated with cohesion; feeling able to influence national decisions has no significant effect.

Civic participation

Civic participation is negatively associated with community cohesion. However, the model cannot explain causality and it is likely that people engage in civic participation when they feel that their local area is not cohesive (for example, taking action by contacting their local council or signing a petition).

Volunteering

Formal volunteering, on the other hand, is positively associated with cohesion while informal or employer supported volunteering has no effect. For Pakistani & Bangladeshi people, participation in informal volunteering is a positive predictor of community cohesion.

Crime

Both individual fear of crime (especially fear of a racist attack) and the actual level of crime in an area, have significant negative effects on cohesion. Moreover, crime can undermine the positive effects of living in an ethnically diverse neighbourhood.

Socio-economic status and deprivation

One of the main findings to emerge from this research is the consistent relationship between the dimensions of disadvantage and perceptions of cohesion. At an individual level, indicators of advantage and disadvantage strongly impact cohesion: higher levels of qualifications, higher occupational status and home ownership are all positively associated with cohesion.

The study also shows that vulnerable groups (including females, individuals with a disability or long-term illnesses and council housing tenants) have more negative perceptions of cohesion.

Ethnic diversity

This research shows that ethnic diversity in an area is generally a positive driver of community cohesion. When compared with areas where more than 99 per cent of the population is White British, ethnically diverse areas are generally more cohesive (see Table 2.1 for a full breakdown of the area typology). With the exception of areas where there is a relatively large Pakistani & Bangladeshi population and the Mixed 2 and Mixed 3 groups, cohesion is significantly higher in all the other areas tested in the model. Cohesion is particularly high among individuals who live in White and Indian communities (ie in communities where less than 90 per cent of the population is White British and more than 13 per cent of the population is Indian).

As ethnically diverse areas are also more likely to be disadvantaged, community level disadvantage and diversity are closely linked. Table 4.1 shows the number of areas (in particular, middle super output areas) in each decile of multiple deprivation for each of the ethnic area types. As shown, homogeneous White areas are principally concentrated at the least deprived end of the deprivation index, while the more ethnically diverse are concentrated at the high end of deprivation.

Table 4.1: The distribution of MSOAs, by area type and level of deprivation

Area diversity	Least deprived	ID scores (deciles)								Most deprived
		2	3	4	5	6	7	8	9	
White 1	2	8	10	13	10	9	3	6	11	6
White 2	8	11	18	20	16	14	11	8	10	6
White 3	39	35	43	26	23	30	24	12	15	15
White 4	55	38	31	28	26	28	25	20	21	20
White and Pakistani & Bangladeshi	0	0	0	1	1	0	1	3	4	7
White and Black	0	0	0	1	3	4	18	16	26	10
White and Indian	2	1	3	3	3	3	3	4	2	0
Mixed 1	0	2	1	5	13	14	17	22	20	19
Mixed 2	1	0	2	2	3	2	4	13	7	15
Mixed 3	1	4	5	15	17	10	11	6	8	3
Mixed 4	0	1	1	1	2	2	8	11	18	30

Sources: 2005 Citizenship Survey, Communities and Local Government; ID 2004; 2001 Census

Notes

(1) The numbers in each cell represent the number of MSOAs in each decile of deprivation.

(2) Only MSOAs with 4 or more responses were included.

(3) The ID 2004 measures the level of disadvantage of each MSOA on a scale of 0 (no disadvantage) to 100 (extreme disadvantage). In the Citizenship Survey, the most disadvantaged MSOA with adequate responses scored 76; the least disadvantaged MSOA scored 2.

(4) For further information on the area typology see Table 2.1. (page 24).

However, the relationship between diversity and disadvantage is far from universal (ie high area diversity is not always associated with high disadvantage). As Table 4.1 shows, White and Indian areas, ethnically mixed areas with substantial Pakistani & Bangladeshi, Indian, and Black populations (Mixed 1), and ethnically mixed areas with substantial Indian and Black populations (Mixed 3) can also be found in larger numbers at much lower levels of community disadvantage. There are therefore certain types of diversity which are quite common in areas with medium levels of disadvantage and are not exclusively found in areas with high levels of disadvantage.

While this study shows that community cohesion can be undermined by disadvantage and some types of diversity, the relationship between diversity, disadvantage and cohesion is rather more complex than it first appears. Most significantly, this study demonstrates that, far from eroding community cohesion, ethnic diversity is generally a strong positive driver of cohesion. In particular, areas with both high levels of disadvantage and high ethnic diversity record higher average cohesion scores than highly disadvantaged, homogeneous White areas. **It is thus deprivation that undermines cohesion, not diversity.**

The results show the varying effect on community cohesion of similar levels of disadvantage across different types of area diversity. For example, in areas where more than 95 per cent of the population is White British (ie White 1 through to White 3 areas), there is much less cohesion than in more ethnically diverse areas (with the exception of White and Pakistani & Bangladeshi areas).

The gradient of the effect of disadvantage on cohesion is similar across all areas, irrespective of ethnic diversity. In other words, **irrespective of the ethnic mix of the area, as disadvantage increases, its negative effect gets stronger**. Furthermore, there are no significant interaction effects between area diversity and disadvantage. Therefore, regardless of the diversity level, disadvantage operates in a similar fashion for all communities. It is just that at similar levels of disadvantage, more diverse communities tend to have higher cohesion than predominately White British communities.

4.2 Discussion

Diversity or disadvantage: which is the stronger driver of cohesion?

We have shown that, irrespective of the level of diversity in a community, disadvantage consistently undermines perceptions of cohesion. Diversity does not interact statistically with disadvantage to further divide areas with larger minority populations. Even in White homogeneous areas with little diversity, disadvantage has a similar effect on undermining cohesion between individuals. Disadvantage is thus the stronger negative predictor of cohesion: this is the case at both the individual and the community level. Disadvantage is, however, not the only negative predictor of cohesion.

Moreover, communities can build resilience to deprivation. When communities display the other characteristics which have a positive effect on community cohesion, the effect of deprivation is less profound. This finding is supported by data from the 2006 BVPI Survey which shows that high deprivation and low cohesion are not always correlated at the local authority level. Indeed, on the topic of deprivation, the Commission on Integration and Cohesion concluded that while 'deprivation remains a key influencer of cohesion... the fact that some areas have high deprivation and high cohesion shows that local action can build resilience to its effects (CIC 2007: 27).

These findings correspond with Letki's forthcoming research on whether diversity erodes cohesion in British neighbourhoods. Using 2001 Citizenship Survey data, Letki found that social interactions improve perceptions of a neighbourhood, no matter what its economic status or racial composition, but these interactions are far less frequent in poorer neighbourhoods. While there is no deficiency of social capital networks in diverse communities, there is a shortage of them in the economically disadvantaged ones. Letki concludes that disadvantage not diversity therefore erodes cohesion.

High levels of disadvantage lead to increased feelings of powerlessness, isolation and vulnerability, which in turn reduce the opportunities for social interaction between individuals (see also Forrest and Kearns 2001). Indeed, this study shows that more vulnerable groups experience weaker levels of community cohesion, while fear of crime and feelings of powerlessness, isolation, and vulnerability – all characteristics associated with increasing disadvantage also undermine cohesion.

Results also show that reducing individual level disadvantage; for example increasing income or improving an individual's level of qualifications, can offset the negative impact of high crime rates and high levels of community disadvantage.

The undermining effect of crime

The relationship between crime and deprivation varies both within and between localities. The present study shows that the strongest negative predictor of community cohesion at the community level is the level of crime. At the individual level, fear of crime and fear of racist attack are two of the strongest negative drivers of cohesion. The undermining effect of crime on cohesion can therefore not be underestimated. Moreover, feeling unsafe after dark, fear of crime and fear of being a victim of a racist attack all undermine the positive effects of living in very diverse areas and have a particularly negative effect on perceptions of cohesion amongst people living in a White and Pakistani & Bangladeshi area.

This is not the first study to find a relationship between crime and cohesion. Rarely, however, do studies examine this relationship at both the community and the individual level and the compounding effect that crime has on the other predictors of cohesion (both positive and negative).

In particular, the results support Hirschfield and Bowers' (1997) finding that levels of crime are significantly lower than expected in areas that are disadvantaged but cohesive (see also Wedlock 2006). This also shows that levels of community cohesion can transcend factors such as deprivation that have traditionally been seen to be the strongest predictors of becoming a victim of crime.

Bridging and mixing: the effect of having friends from different backgrounds

In the introductory chapter, we introduced the contact and threat hypotheses of community cohesion. This study lends support to the contact hypothesis. That is, increasing diversity leads to more cohesion as the likelihood of inter-ethnic interaction ("mixing") increases and the formation of primary and secondary bonds between different groups develop. This prevents negative perceptions, misinformation, and rumours regarding other ethnic groups from becoming cemented and builds cohesion between groups (see also Allport 1954; Gordon 1964; Varshney 2003).

In most cases, ethnic diversity is a positive predictor of cohesion once other factors have been accounted for. People in ethnically diverse communities are much more likely to mix with people from different backgrounds through sharing, among other things, educational and community facilities, and as a result may experience greater levels of cohesion. This analysis has shown that having friends from different ethnic groups has a significant positive effect on perceptions of cohesion.

To further explore the relationship between having friends from different backgrounds and cohesion, we experimented further with our regression models. To do this we modelled the effect of area diversity on individual perceptions of cohesion without the variable “what proportion of your friends are from the same ethnic group” and then compared these results to our original model which includes the “friends” variable. The results show that increasing levels of inter-ethnic friendships mediate the positive effects of diversity. In other words, part of the positive effect that diversity has on community cohesion is caused by increasing levels of inter-ethnic friendships. This lends further support to the contact theory of cohesion.

Cohesion in White and Pakistani & Bangladeshi areas: what’s different?

For the most part, ethnic diversity and cohesion are positively associated. This study reveals just one exception: living in an area with large White and Pakistani & Bangladeshi populations (but no other significant minority ethnic population) is a negative predictor of cohesion. While crime and disadvantage are three times stronger predictors, this finding is still significant and warrants some further attention.

Negative media representations of Muslims may go some way in explaining why people living in White and Pakistani & Bangladeshi areas have lower levels of cohesion compared with other areas. There is some evidence to suggest that biased reporting and institutional racism in the media can serve to alienate both Muslims and the general population (Poynting and Mason 2007). In turn, Muslims may perceive hostility from the general population and, unable to “fit in”, begin to look within their own community for support and identity (Poynting and Mason 2007). This increases levels of bonding capital and reduces bridging between different groups (Putnam 2000). Similarly, misleading media representations may perpetuate stereotypes of Muslims. While Muslims themselves may not feel less cohesive, having a significant Muslim population in an area could drive down cohesion among the White population. In these areas, group boundaries may therefore be reinforced, and negative stereotypes and perceptions not alleviated through interaction because of mutual fear and mistrust.

This study shows that in-migration per se has no relationship with cohesion at the community level. However if a large proportion of a community’s in-migrants are non-White and born outside the UK, there is a negative effect on cohesion. This may in some part be explained by limited English language skills. New migrants who lack English language skills are less likely to be able to interact and connect with individuals in their

wider communities, and be more prone to intra-group relationships for support (ie bonding social capital, rather than bridging).

The negative effect of non-White in-migration may also be a consequence of negative media reporting of migration in general. Within some media, the language used to discuss immigration can be generalised and inflammatory, perpetuating stereotypes and popular myths about specific immigrant populations (Home Office 2004; Lemos 2004; ICAR 2004). In this situation, the threat hypothesis is more applicable, ie that racial antagonism is a form of defence of a group's position, or that inter-group hostility is a result of competition for scarce resources. However, intra-group hostility is also likely to be reinforced by negative stereotypes perpetuated by both individuals and certain media sources. As cultural differences can serve to prevent interaction, such stereotypes may not be dismantled through the formation of bridging capital between disparate ethnic groups.

The positive effect of community empowerment

This study shows that people who feel they can influence local level decisions are more likely to think that their local area is cohesive (ability to influence national level decisions had no effect on cohesion). Feeling cut off from the local decision making process is thus a negative predictor of cohesion.

Similarly, individuals expect transparency and fairness in the allocation of public services. When people don't feel that services are being allocated fairly, they are less likely to think that their local area is cohesive. In this study, we show that feeling that public institutions (in particular, local housing authorities) would discriminate against individuals on the basis of their race. This corresponds with the Ipsos MORI finding that more than half of people (56%) felt that some groups in Britain get unfair priority when it comes to public services like housing, health services and schools, which was behind the CIC's (2007) decision to include procedural fairness as one of the key factors influencing community cohesion in England. In particular, the CIC identified a large national/local perceptions gap about unfair access to public services (ie that people were far more negative about the national picture than they were about what was going on locally). A similar disconnect has been identified in health and education research. Community empowerment is therefore important – communities where individuals feel empowered are generally more cohesive.

Limitations

There are some limitations to the current study, which prevent us from making further conclusions. The lack of time series data is one such limitation. Time series data would allow us to measure the impact of ethnic diversity on community cohesion over time and might show, for example, that while homogenous White British areas, when experiencing an influx of ethnic minorities, may initially experience a decrease in community cohesion (in line with the threat hypothesis), over time and as interaction increases and residents become accustomed to the change, community cohesion may return to its prior levels (in line with the contact hypothesis). In the absence of such time series data, our study offers

only a snapshot of the relationship between cohesion and diversity and those ethnically diverse areas, which have lower levels of cohesion may, in the longer term, experience higher or average cohesion levels.

Ideally, time series data would be matched with more up-to-date middle super output area (MSOA) demographic data. As the best available data on the concentrations of different ethnic populations is from the 2001 Census, it is likely that some areas have undergone significant demographic changes in the period between this and the 2005 Citizenship Survey⁹. We would especially need to do this in order to analyse the effects on cohesion caused by the current inflow of Eastern European immigrants.

⁹ ONS recently produced mid-year population estimates for ethnicity for England and Wales. However, at the MSOA level, these statistics are experimental and not developed enough for this type of analysis (ONS 2007). Nor do these statistics distinguish A8 or A2 migrants separately.

Chapter 5

Key Conclusions

Both individual and community-level factors influence cohesion

- An individual's sense of cohesion is a product of both their individual characteristics and the characteristics of the community they live in.
- Multi-level modelling is able to fully take into account the hierarchical nature of this relationship.

Ethnic diversity drives cohesion

- Once other factors are accounted for, ethnic diversity is, in most cases, positively associated with community cohesion.
- However, the relationship between diversity and cohesion is complicated and the nature of this relationship is dependent on the type of ethnic mix in an area.
- Living in an area which has a broad mix of residents from different ethnic groups was consistently shown to be a positive predictor of cohesion. However, having an increasing percentage of in-migrants born outside of the UK, is a negative predictor.
- Having friends from ethnic groups other than one's own is a strong positive predictor of cohesion.
- Part of the positive effect of diversity is a result of increased proportions of inter-ethnic friendships (ie bridging).

Disadvantage erodes community cohesion

- Irrespective of the level of ethnic diversity in a community, disadvantage consistently undermines perceptions of cohesion and operates in a similar fashion for all communities.
- However, not all deprived areas have low cohesion.
- Deprived, diverse areas generally have higher average cohesion scores than deprived, homogeneous White areas. It is thus deprivation that undermines cohesion, not diversity.
- Individual level disadvantage (ie low socio-economic status) is also a negative predictor of cohesion.
- Reducing individual level disadvantage: for example, increasing income or improving an individual's level of qualifications, can offset the negative impact of high crime rates and high levels of community disadvantage on perceptions of cohesion.

Crime and fear of crime strongly undermine cohesion

- Increasing levels of crime and fear of crime are both strong negative predictors of community cohesion.
- Feeling unsafe after dark, fear of crime and fear of being a victim of a racist attack have a particularly negative effect on perceptions of cohesion amongst those living in areas where the population is predominately made up of White and Pakistani & Bangladeshi people.
- Crime also undermines the positive effects of living in very diverse areas.

Empowerment is important

- Feeling able to influence local decisions is a strong positive predictor of community cohesion.
- Feeling that an individual would be unfairly treated because of their race (especially by local housing authorities), coupled with a feeling of racial prejudice has a strong negative impact on cohesion.

Volunteering leads to more positive views on cohesion

- Individuals who engage in formal volunteering are more positive about cohesion.
- These individuals are likely to feel more empowered, have more interaction and form networks with individuals in their communities that they may not be in contact with otherwise.

Vulnerable groups have more negative perceptions of cohesion

- Women, individuals with a disability or long-term illness, individuals who lack access to services and council tenants are all less likely to think that their local area is cohesive.

The predictors of cohesion vary across ethnic groups

- Income has no significant effect on cohesion for White people, but it is a strong positive driver for Pakistani & Bangladeshi and Black African people.
- For Pakistani & Bangladeshi people, participation in informal volunteering is a strong positive driver of cohesion.
- The longer Indian people have lived in a neighbourhood the more negative their views on cohesion become (for White people, there is no relationship).

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Appendix A

Data and technical details

We use three main data sources for the analysis in this report: the 2005 Citizenship Survey, the 2001 Census and the Indices of Deprivation 2004 (ID 2004). These data sources are described below.

A.1 Data sources

The 2005 Citizenship Survey

The Citizenship Survey is used to explore a broad range of topics including, but not limited to: family networks, views of the local area, fear of crime, local services and political institutions, volunteering and charity, civil renewal, racial and religious prejudice and discrimination and views about rights and responsibilities. It also collects demographic data and background information about respondents. Since 2007, the survey has been carried out on a continuous basis. Prior to this, the survey was carried out biennially. As full annual data is not yet available for 2007, this study made use of the 2005 wave of the survey.

The Citizenship Survey was previously known as the Home Office Citizenship Survey. However, under machinery of government changes in May 2006 responsibility for the survey passed from the Home Office to Communities and Local Government, specifically to the Race, Cohesion and Faiths Unit.

The survey is based on a nationally representative sample of approximately 10,000 adults in England and Wales with an additional sample of around 5,000 from minority ethnic groups. In 2005, face-to-face fieldwork was carried out with these samples between March and September by interviewers from the National Centre for Social Research (NatCen). More information on the Citizenship survey can be found at: www.communities.gov.uk/communities/racecohesionfaith/research/citizenshipsurvey/

The Indices of Deprivation 2004

The Indices of Deprivation 2004 (ID 2004) is a Super Output Area (SOA) measure of multiple deprivation and is made up of seven SOA level domain indices (income deprivation, employment deprivation, health deprivation and disability, education, skills and training deprivation, barriers to housing and services, living environment deprivation and crime)

The model which underpins the ID 2004 is based on the idea of distinct dimensions of deprivation which can be recognised and measured separately. These are experienced by individuals living in an area. People may be counted in one or more of the domains, depending on the number of types of deprivation that they experience. The overall index is conceptualised as a weighted area level aggregation of these specific dimensions of deprivation.

The ID 2004 is based on a revision and extension of the ID 2000. Its development was commissioned by the former Office of the Deputy Prime Minister (now Communities and Local Government). For more information see:
www.communities.gov.uk/publications/communities/englishindices

The 2001 Census

The Census is a survey of all people and households in the UK. The most recent census was on 29 April 2001. Enumerators delivered Census forms to every household and every communal establishment. Residents were asked to complete the forms on Census Day and to post the completed forms back. Where a form was not received after a specified period, the enumerator visited the address to collect the form by hand. Special arrangements were made so people in the Armed Forces and people sleeping rough were also surveyed.

The Census was followed by the Census Coverage Survey (CCS) which took place between 24 May and 18 June 2001. This was an independent doorstep survey of a sample of a third of a million households, covering every local authority, which was used to adjust the Census counts for under-enumeration.

In this study, a small selection of variables were extracted from the 2001 Census for analysis at the Middle Super Output Area (MSOA) level. These included: the percentage of the population who were White British, Indian, Pakistani, Bangladeshi, Black African or Black Caribbean, the percentage of people from Black and minority ethnic groups who had moved into an area from outside the UK, inflow of persons all ages: (Rate per 1,000 population), outflow of persons all ages: (Rate per 1,000 population).

A.2 Definition of key variables

Socio-demographic variables

COMMUNITY COHESION

Community cohesion, the dependent variable for this study, is measured using the 2005 Citizenship survey question:

To what extent do you agree or disagree that this local area (within 15/20 minutes walking distance) is a place where people from different backgrounds get on well together?

The response codes were: “definitely disagree”, “tend to disagree”, “tend to agree” or “definitely agree”. In this study we treat cohesion as a continuous variable and it is recoded so that a value of 1 = lowest cohesion and 4 = highest cohesion. There are 1,524 missing responses which are excluded from the analysis.

ETHNIC GROUPS

In the Citizenship Survey, the ethnicity question is asked via a showcard:

Please could you look at this card and tell me which of these best describes your ethnic group?

WHITE

- (1) *White – British*
- (2) *White – Irish*
- (3) *Any other White background*

MIXED

- (4) *Mixed White and Black Caribbean*
- (5) *Mixed White and Black African*
- (6) *Mixed White and Asian*
- (7) *Any other Mixed background*

ASIAN OR ASIAN BRITISH

- (8) *Asian or Asian British – Indian*
- (9) *Asian or Asian British – Pakistani*
- (10) *Asian or Asian British – Bangladeshi*
- (11) *Any other Asian/Asian British background*

BLACK OR BLACK BRITISH

- (12) *Black or Black British – Caribbean*
- (13) *Black or Black British – African*
- (14) *Any other Black/Black British background*
- (15) *CHINESE*
- (16) *ANY OTHER ETHNIC GROUP*

Despite the minority ethnic boost, there were not sufficient numbers in the sample to examine each of these groups separately in this study. For this reason, the following ethnic groups were included in the analysis:

- White
- Indian
- Pakistani & Bangladeshi
- Other Asian
- Black Caribbean
- Black African
- Other Black
- Mixed race
- Chinese
- Other

The notion of ethnicity is itself a contentious one and we acknowledge that there are difficulties in homogenising disparate groups into single ethnic categories. The White group, for example, includes a number of different white minority groups (including Eastern Europeans) that invariably exhibit different behavioural patterns and cultural backgrounds to those of the dominant White British population (Heath and Cheung 2006).

CIVIC PARTICIPATION

The civic participation variable examines whether an individual has engaged in a broad range of civic activities in the last 12 months. These activities include:

- contacting a local councillor, a member of parliament, a public official working for the local council, an elected member of the Greater London Assembly), a public official working for the GLA, an elected member of the National Assembly for Wales (NAFW), a public official working for the NAFW
- attending a public meeting or rally
- taking part in a public demonstration or protest
- signing a petition
- completing a questionnaire (about local services or problems in the local area)
- attending a public meeting (about local services or problems in the local area)
- being involved in a group to discuss local services or problems in the local area.

FORMAL VOLUNTEERING

Formal volunteering is giving unpaid help through groups, clubs or organisations to benefit other people or the environment (Kitchen et al. 2006a).

In this study we are interested in whether, in the last 12 months, an individual has taken part in, supported, or helped the following groups or organisations:

- Children's education/schools
- Youth/children's activities (outside school)
- Education for adults
- Sports/exercise (taking part, coaching or going to watch)
- Religion
- Politics
- The elderly
- Health, Disability and Social welfare
- Safety, First Aid
- The environment, animals
- Justice and Human Rights
- Local community or neighbourhood groups
- Citizens' Groups
- Hobbies/Recreation/Arts/ Social clubs
- Trade union activity
- Other.

And how, in the last 12 months, they have taken part:

- Raising or handling money/taking part in sponsored events
- Leading the group/ member of a committee
- Organising or helping to run an activity or event
- Visiting people
- Befriending or mentoring people
- Giving advice/information/counselling
- Secretarial, admin or clerical work
- Providing transport/driving
- Representing

- Campaigning
- Other practical help (eg helping out at school, shopping)
- Any other help.

ECONOMIC ACTIVITY

The economic activity variable is derived by combining the variables RIL04A and YInAct to produce a set of dummy variables, which compare the effect of being in a position other than employed, for example working in the home or being unemployed. For this study we distinguish the following groups:

- Employed (individuals who are currently in employment)
- Family worker (individuals who perform unpaid work for a family-run business)
- Unemployed (individuals who are unemployed and actively seeking work)
- Student (individuals who are currently full-time students)
- House person (individuals who look after the family/home)
- Long term illness/disability (individuals who do not work because of a long-term illness or disability)
- Retired

Temporarily sick or injured individuals were treated as missing for the effect of economic activity because of their temporary status and small sample size.

OCCUPATIONAL CLASS

For the occupation variable, we use the National Statistics-Social Economic Class (NS-SEC). The reduced version of NS-SEC has seven categories.

- Higher managerial and professional occupations
- Lower managerial and professional occupations
- Intermediate occupations
- Small employers and own account workers
- Lower supervisory and technical occupations
- Semi-routine occupations
- Routine occupations

These categories were then combined to form two dummy variables, which analyse the effect of having an upper occupation compared to a lower occupation:

- Upper occupations: managerial and professional occupations, intermediate and small employers occupations
- Lower occupations: routine and semi-routine occupations, lower supervisory and technical occupations

EDUCATION

For this study, the qualification variable was recoded into six categories:

- No qualifications
- GCSE grades D to E or equivalent
- GCSE grades A to C or equivalent
- A-level or equivalent
- Higher education below degree level
- Degree or equivalent

HOUSING TENANCY

To analyse the effect of housing status on cohesion, two variables (HLLORD and hten1) were combined to examine the effect of living in a local authority or council tenancy, housing association or charitable trust tenancy or private rental accommodation, compared with those who own or partially own their homes.

Attitudinal variables

In this study, the majority of the attitudinal variables are continuous variables coded on a scale of 1 thru to 4. Variables which were not coded with the lowest value being the more negative response were recoded so that 1=least positive view and 4=most positive view. All the attitudinal variables are listed below.

BELONG TO GREAT BRITAIN

How strongly do you belong to Britain?

1=not at all strongly

2=not very strongly

3=fairly strongly

4=very strongly

PEOPLE PULL TOGETHER TO IMPROVE THE NEIGHBOURHOOD

To what extent would you agree or disagree that people in this neighbourhood pull together to improve the neighbourhood?

1=definitely disagree

2=tend to disagree

3=tend to agree

4=definitely agree

HOW SAFE DO YOU FEEL AFTER DARK?

How safe would you feel walking alone in this neighbourhood after dark?

1=Never walks alone after dark

2=Very unsafe

3=A bit unsafe

4=Fairly safe

5=Very safe

TRUST

Would you say that...

1=none of the people in your neighbourhood can be trusted,

2=a few can be trusted,

3=some can be trusted,

4=many of the people in your neighbourhood can be trusted?

FRIENDS FROM DIFFERENT BACKGROUNDS

What proportion of your friends are of the same ethnic group as you? Would you say...

1=all the same,

2=more than a half,

3=about a half,

4=or, less than a half?

WILLINGNESS TO HELP NEIGHBOURS

To what extent do you agree or disagree that people in this neighbourhood are willing to help their neighbours?

1=Strongly disagree

2=Disagree

3=Agree

4=Strongly agree

INFLUENCING DECISIONS

Do you agree or disagree that you can influence decisions affecting your local area?

1=Strongly disagree

2=Disagree

3=Agree

4=Strongly agree

RACIAL DISCRIMINATION AND PREJUDICE

Two variables were used to measure attitudes about racial prejudice. These are detailed below.

In a moment I am going to read out a list of services. For each one, I'd like you to imagine you are a member of the public using each service, and for you to tell me, using this card, if you would expect that they might treat you better than people of other races, worse than people of other races, or about the same. It doesn't matter if you haven't had any direct contact with the organisations, it's just your opinions I'm after.

- *Local school*
- *Education system generally*
- *Council housing*
- *Local council*
- *Private landlord*
- *Formal authority (factor variable – see below)*
- *Health system (factor variable – see below)*

1=I would be treated worse than other races

2=I would be treated better than other races

3=I would be treated the same as other races

How much racial prejudice do you think there is in Britain today?

1=More than there was five years ago

and

2=About the same amount

3=Less racial prejudice than there was five years ago

FEAR OF RACIST ATTACK

How worried are you about being subject to a physical attack because of your skin colour, ethnic origin or religion?

1=Very worried

2=Fairly worried

3=Not very worried

4=Not at all worried

A.3 Factor Analysis

Factor analysis is used to uncover the latent structure of a set of variables. It reduces attribute space from a larger number of variables to a smaller number of factors and as such is a “non-dependent” procedure (that is, it does not assume a dependent variable is specified). By compiling the variables into a single factor, it reduces the potential for errors caused by multicollinearity between variables measuring the same theme. The higher the loading of a component variable the more closely it represents the underlying theme.

All the attitudinal variables were tested using this method. Cronbach’s alpha is a tool to measure the reliability of the factors. A Cronbach’s alpha of 0.7 or above is considered a satisfactory result for a scale with around 5 or 6 items. Below is a series of tables, which shows which variables each factor is comprised of, its factor analysis component scores, and its Cronbach’s alpha.

Table A.1: Fear of crime factor

Questions	Component score
How worried are you about having your home broken into and something stolen?	.790
How worried are you about being mugged and robbed?	.903
How worried are you about being physically attacked by strangers?	.905
How worried are you about being insulted or pestered by anybody, while in the street or any other public place?	.821
Thinking about all types of crime in general, how worried are you about becoming a victim of crime?	.857
<i>Cronbach's Alpha</i>	<i>0.909</i>

Source: 2005 Citizenship Survey, Communities and Local Government

Table A.2: Collective efficacy factor

Questions	Component score
If a group of local children were playing truant from school and hanging around on a street corner, how likely is it that people in your neighbourhood would do something about it?	.792
If some children were spray-painting graffiti on a local building, how likely is it that people in your neighbourhood would do something about it?	.850
If there was a fight near your home and someone was being beaten up or threatened, how likely is it that people in your neighbourhood would do something about it?	.774
If a child was being rude to an adult, how likely is it that people in your neighbourhood would tell that child off?	.721
How likely is it that people in your neighbourhood would participate if they were asked by a local organisation to help solve a community problem?	.680
<i>Cronbach's Alpha</i>	<i>0.822</i>

Source: 2005 Citizenship Survey, Communities and Local Government

Table A.3: Trust in formal authorities factor

Questions	Component score
Do you trust the police?	.747
Do you trust the courts?	.776
Do you trust parliament?	.778
Do you trust the local council?	.730
<i>Cronbach's Alpha</i>	<i>0.753</i>

Source: 2005 Citizenship Survey, Communities and Local Government

Table A.4: Satisfaction with local services factor

Questions	Component score
How satisfied or dissatisfied are you with local schools?	.522
How satisfied or dissatisfied are you with local council housing/housing association housing?	.593
How satisfied or dissatisfied are you with local street cleaning?	.633
How satisfied or dissatisfied are you with local police?	.683
How satisfied or dissatisfied are you with local health services?	.597
How satisfied or dissatisfied are you with local services for young people?	.628
How satisfied or dissatisfied are you with local public transport?	.502
<i>Cronbach's Alpha</i>	<i>0.719</i>

Source: 2005 Citizenship Survey, Communities and Local Government

Table A.5: Racial discrimination by criminal justice and immigration services factor

Table A.5: Racial discrimination by criminal justice and immigration services factor

Questions	Component score
Would you be treated worse, better or the same as people of other races by the courts?	.727
Would you be treated worse, better or the same as people of other races by the crown prosecution service?	.744
Would you be treated worse, better or the same as people of other races by the police?	.802
Would you be treated worse, better or the same as people of other races by the probation service?	.713
Would you be treated worse, better or the same as people of other races by your local police?	.728
Would you be treated worse, better or the same as people of other races by the prison service?	.755
Would you be treated worse, better or the same as people of other races by the immigration authorities?	.651
<i>Cronbach's alpha</i>	<i>0.849</i>

Source: 2005 Citizenship Survey, Communities and Local Government

Table A.6: Racial discrimination by health services factor

Questions	Component score
Would you be treated worse, better or the same as people of other races by a local doctor's surgery?	.719
Would you be treated worse, better or the same as people of other races by a local hospital?	.851
Would you be treated worse, better or the same as people of other races by the health service generally?	.833
<i>Cronbach's alpha</i>	<i>0.723</i>

Source: 2005 Citizenship Survey, Communities and Local Government

A.4 Community-level variables

ID 2004

The ID 2004 is an overall measure of the level of deprivation of an area which contains seven domains of deprivation:

- Income deprivation
- Employment deprivation
- Health deprivation and disability
- Education, skills and training deprivation
- Barriers to Housing and Services
- Living environment deprivation
- Crime

For this study, the population-weighted values of the Index of Multiple Deprivation and Crime Domain scores (see below) were aggregated up to the MSOA level. LSOAs nest within MSOAs and hence, the derived MSOA scores are a weighted sum of the constituent LSOA scores.

The ID 2004 is measured on a scale of 0 to 100. As the value increases, the level of deprivation also increases. The level of deprivation of MSOAs in the current study ranges from 2.28 to 75.69.

The indices of deprivation only cover England, and although similar indices are produced for Wales, they are not directly comparable. For this reason, the Welsh sample had to be excluded from both the individual and community level analysis to maintain consistency throughout the study.

ID 2004 – CRIME DOMAIN

This study also used the crime domain of the ID 2004 independent of the full indices. The crime domain measures the incidence of recorded crime across four themes:

- Burglary (4 recorded crime offence types)
- Theft (5 recorded crime offence types)
- Criminal damage (10 recorded crime offence types)
- Violence (14 recorded crime offence types)

The ID 2004 crime domain is a standardised index. Therefore, the mean level of crime is 0 and negative scores represent greater levels of crime than the mean whilst more positive values represent lower levels of crime. In this study the greatest crime area has a score of -1.94 and the lowest crime area has a score of 1.99.

NON-WHITE IN-MIGRATION

This variable is used to examine the effect of migration on community cohesion and is based on the 2001 Census variable *“Percentage Ethnic group other than White: Moved to area from outside UK”*. The information on this variable comes from responses to information on residents’ usual address and their address one year ago. Of the percentage of an area that is made up of immigrants (a migrant is a person with a different address one year before the Census to that on Census Day), this variable looks at the percentage of those non-white immigrants who one year before lived outside of the U.K.

As with all the other variables, the geography for this variable is England only.

PROPORTION OF POPULATION FROM DIFFERENT ETHNIC GROUPS

The ethnic composition of MSOAs was calculated using the 2001 Census data. For our analysis we distinguish the following groups:

- White British
- Indian
- Pakistani & Bangladeshi
- Black (including Black African and Black Caribbean)

The information from these variables is used to develop the area typology (see Table 2.1 in main report) which is based on different concentrations of these ethnic groups.

Appendix B

Full tables of multivariate analysis

Table B.1: Individual level socio-demographic model (no interactions, no ethnic interactions)

	All	Beta coefficients
Years lived in neighbourhood	-0.000142	-0.00292
Age	0.00318***	0.0648***
Income	0.00109	0.00519
Female	-0.0317**	-0.0239**
Civic Participation	-0.0335**	-0.0248**
Informal volunteering	0.0312*	0.0211*
Formal volunteering	0.0344**	0.0259**
Employer supported volunteering	-0.0261	-0.013
Not born in the U.K.	0.045**	0.0295**
Unemployed	-0.04	-0.011
Student	0.149	0.0097
House person	0.0117	0.00454
Long-term illness	-0.1777***	-0.0582***
Retired	-0.0182	-0.00821
Upper occupations	0.0278**	0.0205**
Qualifications	0.0132***	0.0363***
Council tenancy	-0.0588**	-0.0269**
Housing association	0.0064	0.00258
Private rental	0.0393	0.0181
Hindu	0.0659	0.022
Muslim	0.0634	0.0263
Sikh	-0.0817	-0.0194
Other religion	0.0642	0.0185
Christian	0.0401*	0.0285*
Indian	0.071	0.0308
Pakistani & Bangladeshi	0.0664	0.0227
Other Asian	0.0407	0.0081
Black Caribbean	0.0961***	0.0343***
Black African	0.0958**	0.0304**
Other Black	0.126	0.0097
Mixed race	0.0714*	0.0195*
Chinese	0.112	0.0176
Other	0.102*	0.0224*
<i>Adjusted r²</i>	<i>0.0182</i>	<i>0.0182</i>

Source: 2005 Citizenship Survey, Communities and Local Government

Notes

* = 0.1 significance level

** = 0.05 significance level

*** = 0.01 significance level

Table B.2: Individual level socio-demographic model (interactions, no ethnic interactions)

	All (with interactions)	All (with interactions) – beta coefficients
Years lived in neighbourhood	-0.00011	-0.00218
Age	-0.00545	-0.1109
Income	0.00074	0.0035
Female	-0.0304*	-0.0229*
Civic Participation	-0.0314**	-0.0232**
Informal volunteering	0.0297*	0.0201*
Formal volunteering	0.0345**	0.0259**
Employer supported volunteering	-0.025	-0.0124
Not born in the U.K.	0.0487**	-0.0078**
Unemployed	-0.0392	-0.0108
Student	0.1528	0.0099
House person	0.0136	0.0053
Long term illness	-0.166***	-0.0543***
Retired	-0.02	-0.0091
Upper occupations	0.0313*	0.0231*
Qualification	0.0133***	0.0366***
Age ²	0.00011**	0.199**
Council tenancy	-0.0402	0.0183
Housing association	0.0057	0.0023
Private rental	0.0408	0.0188
Hindu	0.0611	0.0205
Muslim	0.0555	0.0230
Sikh	-0.0846	-0.0201
Other religion	0.0638	0.0184
Christian	0.041	0.0291
Indian	0.0767	0.0333
Pakistani & Bangladeshi	0.0681	0.0233
Other Asian	0.0437	0.0086
Black Caribbean	0.0929***	0.0331***
Black African	0.0895**	0.0283**
Other Black	0.117	0.0091
Chinese	0.1098	0.0172
Other	0.1055*	0.0232*
Mixed race	0.0674	0.0184
Council*income	0.0241**	0.044**
Council*age	-0.0045***	-0.075***
<i>Adjusted r²</i>	<i>0.0201</i>	<i>0.0201</i>

Source: 2005 Citizenship Survey, Communities and Local Government

Notes

* = 0.1 significance level

** = 0.05 significance level

*** = 0.01 significance level

Table B.3: Individual level socio-demographic model (interactions, ethnic interactions)

	All (interactions and ethnic interactions)	STANDARDISED – All (interactions and ethnic interactions)
Years lived in neighbourhood	0.0000756	0.00155
Age	-0.00437	-0.0888
Income	-0.00125	-0.00595
Female	-0.0328**	-0.0247**
Civic Participation	-0.0302*	-0.0223*
Informal volunteering	0.0215	0.0145
Formal volunteering	0.0342**	0.0257**
Employer supported volunteering	-0.0265	-0.0132
Not born in the U.K.	0.0556**	0.0364**
Unemployed	-0.0371	-0.0102
Family worker	-0.0936	-0.00863
Student	0.158	0.0103
House person	0.0121	0.00472
Illness	-0.171***	-0.0558***
Retired	-0.0222	-0.00997
Upper occupations	0.0313*	0.0231*
Qualification	0.0135***	0.0371***
Age ²	0.000103**	0.183**
Council tenancy	0.0434	0.0199
Housing association	0.00878	0.00354
Private rental	0.033	0.0151
Hindu	0.057	0.0191
Muslim	0.0508	0.0211
Sikh	-0.0791	-0.0188
Other religion	0.0601	0.0175
Christian	0.0388*	0.0276*
Indian	0.141**	0.0614**
Pakistani & Bangladeshi	-0.0994	-0.034
Other Asian	0.0433	0.0086
Black Caribbean	0.0908***	0.0324***
Black African	0.329**	0.104**
Other Black	0.121	0.00935
Mixed race	0.0705*	0.0192*
Chinese	0.1089	0.0171
Other	0.105*	0.0171*
Council*income	0.0189*	0.038*
Council*age	-0.00419**	-0.0832**
Indian and years lived in neighbourhood	-0.00487**	-0.0384**
Pakistani & Bangladeshi and income	0.0185**	0.036**
Pakistani & Bangladeshi and informal	0.141**	0.0376**
Black African and age	-0.0103***	-0.128***
Black African and income	0.0281**	0.0529**
<i>Adjusted r²</i>	<i>0.0226</i>	<i>0.0226</i>

Source: 2005 Citizenship Survey, Communities and Local Government

Notes

* = 0.1 significance level

** = 0.05 significance level

*** = 0.01 significance level

Table B.4: Individual level attitudinal model (no interactions, no ethnic interactions)

	All	Beta coefficients
Belong to neighbourhood	0.0184	0.0227
Belong to local authority/London Borough	0.0187	0.0239
Belong to Great Britain	0.0416***	0.0486***
People pull together to improve neighbourhood	0.0553***	0.071***
How safe do you feel after dark?	0.0436***	0.064***
Trust	0.0335**	0.041**
Perceived proportion of area same ethnic group	0.0196*	0.0303*
Proportion of friends with similar incomes	0.0122	0.0207
Proportion of friends of same ethnic group	0.0212**	0.0331**
People are willing to help their neighbours	0.0964***	0.093***
Can you influence decisions – local area	0.0379***	0.0467***
Can you influence decisions – Great Britain	0.0039	0.0048
Perceived racial discrimination – local school	0.00642	0.0029
Perceived racial discrimination – education system	0.00021	0.00012
Perceived racial discrimination – council housing	0.0507**	0.0406**
Perceived racial discrimination – local council	0.0377	0.0227
Perceived racial discrimination – private landlord	0.0681	0.0579
Perceived racial discrimination – formal authority	0.00334	0.0059
Perceived racial discrimination – health system	0.00141	0.0023
Trust in formal authority	0.0586***	0.0867***
Satisfaction government supplied services local area	0.0502***	0.0748***
Social control and collective efficacy	0.04267***	0.0625***
Fear of crime	0.00077	0.0012
How much racial prejudice?	0.0632***	0.0734***
How much religious prejudice?	0.0026	0.0028
Worried about racist attack	0.0571***	0.082***
Hindu	0.125	0.0338
Muslim	0.237	0.105
Sikh	-0.00453	-0.001
Other religion	0.0697	0.017
Christian	0.054	0.0376
Indian	-0.0186	-0.0072
Pakistani & Bangladeshi	-0.0699	-0.0262
Other Asian	0.084	0.0136
Black Caribbean	0.124***	0.0465***
Black African	0.0382	0.0112
Other Black	0.2696	0.0194
Mixed race	0.0778	0.0219
Other	-0.0339	-0.00642
<i>Adjusted r2</i>	<i>0.1702</i>	<i>0.1702</i>

Source: 2005 Citizenship Survey, Communities and Local Government

Notes

* = 0.1 significance level

** = 0.05 significance level

*** = 0.01 significance level

Table B.5: Individual level attitudinal model (no interactions, ethnic interactions)

	All	Standardised
Belong to neighbourhood	0.0162	0.02
Belong to local authority/London Borough	0.0109	0.014
Belong to Great Britain	0.0359***	0.0423***
People pull together to improve neighbourhood	0.0528***	0.0676***
How safe do you feel after dark	0.0452***	0.0664***
Trust	0.0266*	0.0318*
Perceived proportion of area same ethnic group	0.0185	0.0285
Proportion of friends with similar incomes	0.0122	0.0206
Proportion of friends of same ethnic group	0.0211**	0.0328**
People are willing to help their neighbours	0.0943***	0.0908***
Can you influence decisions – local area	0.0388***	0.0477***
Can you influence decisions – Great Britain	0.0056	0.00687
Perceived racial discrimination – local school	0.013	0.00601
Perceived racial discrimination – education system	0.00306	0.00176
Perceived racial discrimination – council housing	0.0561***	0.0449***
Perceived racial discrimination – local council	0.0377	0.0227
Perceived racial discrimination – private landlord	0.0647	0.0549
Perceived racial discrimination – formal authority	0.00463	0.00818
Perceived racial discrimination – health system	0.00569	0.00909
Trust in formal authority	0.0575***	0.085***
Satisfaction government supplied services local area	0.0476***	0.0709***
Social control and collective efficacy	0.0453***	0.0662***
Fear of crime	0.00553	0.00804
How much racial prejudice	0.0636***	0.0739***
How much religious prejudice	0.00391	0.0041
Worried about racist attack	0.0512***	0.0732***
Hindu	0.132	0.359
Muslim	0.23***	0.102***
Sikh	-0.00247	-0.00055
Other religion	0.08	0.0196
Christian	0.055*	0.038*
Indian	-0.0259	-0.00999
Pakistani & Bangladeshi	0.147	0.0551
Other Asian	0.0815	0.0132
Black Caribbean	0.352***	0.131***
Black African	0.0309	0.00904
Black Other	0.247	0.0178
Mixed race	-0.0756	-0.0214
Chinese	0.0649	0.00782
Other	-0.0364	-0.0069
Mixed * belong to GB	-0.199***	-0.113***
Mixed * fear of crime	0.2164***	0.0634***
Mixed * worried about race attack	0.1764***	0.144***
Black Caribbean * belong to local authority/London borough	-0.112**	-0.0878**
Pakistani & Bangladeshi* trust	-0.103**	-0.0864**
<i>Adjusted r2</i>	<i>0.1757</i>	<i>0.1757</i>

Source: 2005 Citizenship Survey, Communities and Local Government

Notes

* = 0.1 significance level

** = 0.05 significance level

*** = 0.01 significance level

Table B.6: Multi-level socio-demographic model (no individual-community level interactions)

	All (interactions and ethnic interactions)	STANDARDISED – All (interactions and ethnic interactions)
Years lived in neighbourhood	0.000328	0.00657
Age	-0.000874	-0.0177
Income	-0.00282	-0.0133
Female	-0.0363**	-0.0271**
Civic Participation	-0.0298*	-0.0218*
Informal volunteering	0.00572	0.0386
Formal volunteering	0.0376**	0.0281**
Employer supported volunteering	-0.008	-0.00394
Not born in the U.K.	0.0435	0.0284
Unemployed	-0.0319	-0.00879
Family worker	-0.016	-0.00139
Student	0.013	0.00084
House person	0.00918	0.00355
Illness	-0.161***	-0.0521***
Retired	-0.014	-0.00629
Upper occupations	0.0252	0.0186
Qualification	0.00766	0.0207
Age ²	0.00766	0.0835
Council tenancy	0.0305	0.0139
Housing association	0.0357	0.0144
Private rental	0.0366	0.0163
Hindu	0.0111	0.00382
Muslim	0.0514	0.0218
Sikh	-0.116	-0.0282
Other religion	0.052	0.0147
Christian	0.0337	0.0238
Indian	0.127**	0.0565**
Pakistani & Bangladeshi	-0.00884	-0.00312
Other Asian	0.0918	0.0184
Black Caribbean	0.133***	0.0288***
Black African	0.288*	0.0907*
Other Black	0.115	0.00801
Mixed race	0.086*	0.0226*
Chinese	0.0861	0.012
Other	0.141**	0.0294**
Council*income	0.0189*	0.0386*
Council*age	-0.00297	-0.059**
Indian and years lived in neighbourhood	-0.0000887*	-0.0288*
Pakistani & Bangladeshi and income	0.0121	0.0247
Pakistani & Bangladeshi and informal volunteering	0.176**	0.0476**
Black African and age	-0.00749**	-0.0922**
Black African and income	0.0195	0.036

Table B.6: Multi-level socio-demographic model (no individual-community level interactions)

	All (interactions and ethnic interactions)	STANDARDISED – All (interactions and ethnic interactions)
Index of multiple deprivation 2004: crime domain	-0.0971***	-0.108***
Percentage of in-migrants from outside the U.K.	-0.00433**	-0.0267**
Index of multiple deprivation 2004	-0.0025**	-0.0558**
White 2 area	-0.00376	-0.0017
White 3 area	-0.0421	-0.0258
White 4 area	-0.0307	-0.0196
Pakistani & Bangladeshi area	-0.251***	-0.0378***
Black area	0.13**	0.0442**
Indian area	0.199***	0.0477***
Mixed 1 area	0.0976**	0.04676**
Mixed 2 area	-0.000977	-0.000286
Mixed 3 area	-0.00133	-0.000478
Mixed 4 area	0.112**	0.0409**
Population turnover	0.000453	0.0109
Population density	-0.0327	-0.0674
<i>Adjusted r2</i>	<i>0.0391</i>	<i>0.0391</i>

Source: 2005 Citizenship Survey, Communities and Local Government; ID 2004; 2001 Census

Notes

* = 0.1 significance level

** = 0.05 significance level

*** = 0.01 significance level

Table B.7: Multi-level socio-demographic model (individual-community level interactions)

	All (interactions and ethnic interactions)	STANDARDISED – All (interactions and ethnic interactions)
Years lived in neighbourhood	0.000508	0.0102
Age	-0.00136	-0.0275
Income	-0.00226	-0.0106
Female	-0.0368**	-0.0275**
Civic Participation	-0.03*	-0.0219*
Informal volunteering	0.00599	0.0404
Formal volunteering	0.0369**	0.0276**
Employer supported volunteering	-0.00656	-0.00323
Not born in the U.K.	0.0385	0.0251
Unemployed	-0.0337	-0.00928
Family worker	-0.0743	-0.000649
Student	0.00827	0.000534
House person	0.00305	0.00118
Illness	-0.163***	-0.0528***
Retired	-0.0089	-0.00401
Upper occupations	0.0254	0.0188
Qualification	0.0349***	0.0944***
Age ²	0.0000536	0.0954
Council tenancy	0.0532	0.0243
Housing association	0.0425	0.0171
Private rental	0.0372	0.0166
Hindu	0.00713	0.00246
Muslim	0.0496	0.0211
Sikh	-0.108	-0.0263
Other religion	0.0431	0.0122
Christian	0.0337	0.0239
Indian	0.123**	0.0549**
Pakistani & Bangladeshi	-0.00755	-0.00266
Other Asian	0.0923	0.0185
Black Caribbean	0.14***	0.0513***
Black African	0.299*	0.094*
Other Black	0.122	0.0085
Mixed race	0.0862*	0.0226*
Chinese	0.0895	0.0124
Other	0.147**	0.0306**
Council*income	0.016*	0.0328*
Council*age	-0.00325*	-0.0646*
Indian and years lived in neighbourhood	-0.000051*	-0.0164*
Pakistani & Bangladeshi and income	0.0597	0.0122
Pakistani & Bangladeshi and informal volunteering	0.198**	0.0537**
Black African and age	-0.00693**	-0.0854**
Black African and income	0.0145*	0.0267*
Index of multiple deprivation: crime domain	-0.152***	-0.169***
Percentage of in-migrants from outside the U.K.	-0.00429**	-0.0265**
ID 2004	-0.00135**	-0.0301**

Table B.7: Multi-level socio-demographic model (individual-community level interactions)

	All (interactions and ethnic interactions)	STANDARDISED – All (interactions and ethnic interactions)
White 2 area	-0.00469	-0.00212
White 3 area	-0.0445	-0.0273
White 4 area	-0.0329	-0.021
Pakistani & Bangladeshi area	-0.255***	-0.0384***
Black area	0.133**	0.0452**
Indian area	0.181***	0.0435***
Mixed 1 area	0.153***	0.0731***
Mixed 2 area	-0.0116	-0.00338
Mixed 3 area	-0.00864	-0.00311
Mixed 4 area	0.117**	0.0429**
ID 2004 * qualifications	0.0011***	0.113***
ID crime * income	0.0107***	0.0729***
Population turnover	0.000287	0.0089
Population density	-0.0301	-0.0643
<i>Adjusted r2</i>	<i>0.0415</i>	<i>0.0415</i>

Source: 2005 Citizenship Survey, Communities and Local Government; ID 2004; 2001 Census

Notes

* = 0.1 significance level

** = 0.05 significance level

*** = 0.01 significance level

Table B.8: Multi-level attitudinal model (no individual-community level interactions)

	All	Standardised
Belong to neighbourhood	0.0204	0.0249
Belong to local authority/London Borough	0.0059	0.00743
Belong to Great Britain	0.0459***	0.0531***
People pull together to improve neighbourhood	0.0437***	0.0547***
How safe do you feel after dark	0.0472***	0.0691***
Trust	0.0334**	0.0399**
Perceived proportion of area same ethnic group	0.0226	0.0347
Proportion of friends with similar incomes	0.0154*	0.0258*
Proportion of friends of same ethnic group	0.0199*	0.0305*
People are willing to help their neighbours	0.102***	0.098***
Can you influence decisions – local area	0.0346**	0.0425**
Can you influence decisions – Great Britain	0.0106	0.013
Perceived racial discrimination – local school	0.0186	0.0085
Perceived racial discrimination – education system	0.0101	0.00571
Perceived racial discrimination – council housing	0.0562**	0.0443**
Perceived racial discrimination – local council	0.0318	0.019
Perceived racial discrimination – private landlord	0.0594	0.0501
Perceived racial discrimination – formal authority	0.0173	0.0302
Perceived racial discrimination – health system	0.00839	0.0132
Trust in formal authority	0.0575***	0.0847***
Satisfaction government supplied services local area	0.0551***	0.0819***
Social control and collective efficacy	0.0468***	0.0678***
Fear of crime	0.00465	0.00677
How much racial prejudice	0.0518***	0.06***
How much religious prejudice	0.00843	0.00881
Worried about racist attack	0.0569***	0.0816***
Hindu	0.0873	0.025
Muslim	0.267***	0.123***
Sikh	-0.0661	-0.0149
Other religion	0.093	0.0225
Christian	0.071**	0.049**
Indian	-0.0654	-0.0263
Pakistani & Bangladeshi	0.108	0.0426
Other Asian	0.0577	0.00929
Black Caribbean	0.301***	0.116***
Black African	0.0332	0.00966
Black Other	0.17	0.0104
Mixed race	-0.461**	-0.124**
Chinese	0.162	0.0171
Other	-0.0827	-0.015
Mixed * belong to GB	0.0419	0.0106
Mixed * fear of crime	0.151**	0.043**
Mixed * worried about race attack	0.176**	0.135**
Caribbean * belong to local authority/London Borough	0.127***	0.103***
Black Caribbean * racial prejudice health services	0.0963***	0.0454***
Pakistani & Bangladeshi* trust	0.105**	0.093**
ID 2004 crime domain	-0.042**	-0.048**

Table B.8: Multi-level attitudinal model (no individual-community level interactions)

	All	Standardised
Percentage of in-migrants from outside the U.K.	-0.00356	-0.0217
ID 2004	-0.00215**	-0.0498**
White 2 area	-0.0508	-0.0229
White 3 area	-0.0508	-0.0409
White 4 area	-0.0792*	-0.0496*
Pakistani & Bangladeshi area	-0.1436	-0.0234
Black area	0.112	0.0378
Indian area	0.149*	0.0318*
Mixed 1 area	0.158**	0.0764**
Mixed 2 area	-0.0211	-0.00641
Mixed 3 area	0.0631	0.0204
Mixed 4 area	0.117*	0.0435*
Population turnover	0.000000557	0.000417
Population density	-0.00488	-0.0269
<i>R</i> ²	<i>0.193</i>	<i>0.193</i>

Source: 2005 Citizenship Survey, Communities and Local Government; ID 2004; 2001 Census

Notes

* = 0.1 significance level

** = 0.05 significance level

*** = 0.01 significance level

Table B.9: Multi-level attitudinal model (individual-community level interactions)

	All	Standardised
Belong to neighbourhood	0.0217	0.0264
Belong to local authority/London Borough	0.0159	0.02
Belong to Great Britain	0.0441***	0.051***
People pull together to improve neighbourhood	0.0459***	0.0576***
How safe do you feel after dark	0.0321**	0.0469**
Trust	0.0422**	0.0505**
Perceived proportion of area same ethnic group	0.028**	0.043**
Proportion of friends with similar incomes	0.0166*	0.0277*
Proportion of friends of same ethnic group	0.02*	0.0306*
People are willing to help their neighbours	0.103***	0.099***
Can you influence decisions – local area	0.0361**	0.0443**
Can you influence decisions – Great Britain	0.00665	0.00814
Perceived racial discrimination – local school	0.0149	0.0068
Perceived racial discrimination – education system	0.00749	0.00422
Perceived racial discrimination – council housing	0.0504**	0.0398**
Perceived racial discrimination – local council	0.0284	0.0398
Perceived racial discrimination – private landlord	0.0591	0.0498
Perceived racial discrimination – formal authority	0.017	0.0296
Perceived racial discrimination – health system	0.00839	0.0132
Trust in formal authority	0.0594***	0.0875***
Satisfaction government supplied services local area	0.0564***	0.084***
Social control and collective efficacy	0.0464***	0.0672***
Fear of crime	0.00384	0.00558
How much racial prejudice	0.0513***	0.0594***
How much religious prejudice	0.00848	0.00887
Worried about racist attack	0.0529***	0.0758***
Hindu	0.0739	0.0212
Muslim	0.253***	0.117***
Sikh	-0.0738	-0.0167
Other religion	0.0804	0.0194
Christian	0.0649**	0.0448**
Indian	-0.0623	-0.0251
Pakistani & Bangladeshi	-0.1	-0.0395
Other Asian	0.0723	0.0116
Black Caribbean	0.0262	0.01
Black African	-0.0283	-0.00823
Other Black	0.18	0.011
Mixed race	0.0376	0.101
Chinese	-0.156	-0.0164
Other	-0.0789	-0.0142
Mixed* belong to GB	0.172**	0.0904**
Mixed* fear of crime	0.185**	0.053**
Mixed* worried about race attack	0.184**	0.141**
Black Caribbean* belong to local authority/London borough	0.134***	0.108***
Black Caribbean* racial prejudice health services	0.099***	0.0468***
Pakistani & Bangladeshi* trust	0.0855*	0.0758*
ID 2004: crime domain	-0.164**	-0.187**

Table B.9: Multi-level attitudinal model (individual-community level interactions)

	All	Standardised
Percentage of in-migrants from outside the U.K.	-0.00351	-0.0214
Index of multiple deprivation overall 2004	-0.00204**	-0.0473**
White 2 area	-0.0574	-0.026
White 3 area	-0.0669	-0.042
White 4 area	-0.0834*	-0.0521*
Pakistani & Bangladeshi are	-0.375	-0.0611
Black area	0.131*	0.0442*
Indian area	0.157*	0.0333*
Mixed 1 area	0.246**	0.119**
Mixed 2 area	-0.0378	-0.00115
Mixed 3 area	0.0766	0.0247
Mixed 4 area	0.131**	0.0486**
ID 2004 crime* fear of crime	0.326**	0.0365**
ID 2004 crime* worried about race attack	0.0378**	0.137**
Pakistani & Bangladeshi area* how safe you feel after dark	-0.212**	-0.0886**
Pakistani & Bangladeshi area* fear of crime	0.145**	0.0279**
Ethnically mixed area (all groups)* how safe you feel after dark	-0.0787**	-0.0993**
Ethnically mixed area (all groups)* worried about race attack	0.0478**	0.0606**
Population turnover	0.00000023	0.000317
Population density	-0.00476	-0.0251
<i>R</i> ²	<i>0.194</i>	<i>0.194</i>

Source: 2005 Citizenship Survey, Communities and Local Government; ID 2004; 2001 Census

Notes

* = 0.1 significance level

** = 0.05 significance level

*** = 0.01 significance level