Quality of life
in Europe:
**Quality of society
and public services**

3rd
European
Quality
of Life
Survey

Eurofound
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3rd European Quality of Life Survey

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Abbreviations used in this report

EQLS   European Quality of Life Survey
GDP   Gross domestic product
IMF   International Monetary Fund

Country groups

EU15   15 EU Member States prior to enlargement in 2004
EU12   12 EU Member States that joined in 2004 and 2007
EU27   The 27 EU Member States (as at the time of the survey)[1]

Country codes for EU27

AT	Austria	ES	Spain	MT	Malta
BE	Belgium	FI	Finland	NL	Netherlands
BG	Bulgaria	FR	France	PL	Poland
CY	Cyprus	HU	Hungary	PT	Portugal
CZ	Czech Republic	IE	Ireland	RO	Romania
DE	Germany	IT	Italy	SE	Sweden
DK	Denmark	LT	Lithuania	SI	Slovenia
EE	Estonia	LU	Luxembourg	SK	Slovakia
EL	Greece	LV	Latvia	UK	United Kingdom

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[1]   At the time of carrying out the third EQLS and of writing this report, Croatia's status was that of a candidate country for membership to the
European Union. It became the 28th EU Member State on 1 July 2013.

Executive summary

Introduction

Quality of life depends on individual circumstances and on the quality of the society at large; this is in turn partly shaped by the availability of good-quality public services. Services such as health, education and social care enable citizens to lead fulfilling lives. The quality of society is also shaped by social relationships and how well they function: conflict or inequality between social groups, or a lack of trust between people, can affect everybody's well-being.

This report is based on the 2011 European Quality of Life Survey conducted by the European Foundation for the Improvement of Living and Working Conditions (Eurofound), the third such survey. The global economic crisis, which began after the last survey was carried out in 2007, has meant that public services have been threatened, inequalities have increased and unemployment has risen, with potentially profound implications for the quality of life in Europe.

Policy context

The Europe 2020 strategy promotes smart, sustainable and inclusive growth, and social and territorial cohesion. Increasingly, it is recognised that economic growth is not the only indicator of policy success: social cohesion is also important, EU policies stressing the importance of integrating vulnerable groups through public services. Therefore it is important to investigate how social cohesion is being maintained and how this varies across Europe so that no regions or groups are left behind. Inclusive growth cannot be pursued without considering the social consequences of economic policies.

The recently launched Social Investment Package urges Member States to focus more on the provision of key public services. The document on investing in children stresses the importance of improving access to early childhood education and care – a prerequisite for future education and employment outcomes. In addition, good childcare can enhance the labour market participation of parents who have increasingly diverse working patterns. The document on investing in health highlights access to quality healthcare as a key element in improving overall health and in maintaining the productivity of the workforce. The Commission staff document on long-term care points out that universal access to financially sustainable, high-quality long-term care is a common objective of the EU collaboration on long-term care in the Social Protection Committee.

Key findings

The perceived quality of public services varies throughout Europe. People in Austria, Luxembourg, Germany and the UK rate it best, and deem it to have improved between 2007 and 2011. In Slovakia, Poland, Bulgaria and Greece people rate it poorest, and rate its quality as decreasing. The economic well-being of countries and individuals has an important effect on how public services are perceived: those who are more prosperous evaluate them more positively than people who have difficulty making ends meet.

Access to childcare and the employment rate of women are strongly related. Women who are in employment need childcare services, but in many countries the supply of services does not meet the demand.

There is a strong relationship between access to and the perceived quality of long-term care. Better-off people, and those living in more prosperous countries, are most satisfied with long-term care while economic hardship leads to feelings of exclusion from social care. The perceived quality of health services and their accessibility vary. While perceived accessibility has improved overall in Europe, in countries such as Greece, hit hard by economic crisis, it has worsened. National expenditure on health has an effect on the perceived quality of services.

Working and care responsibilities can diminish the perceived accessibility of health services. People in employment, and women, find it more difficult to find time to see a doctor, especially if they have care responsibilities.

Across Europe, people in rural areas are more satisfied with their local neighbourhood (in terms of, for example, air quality, litter on the street and crime) than those in urban areas, while access to neighbourhood services (such as the bank or post office) is better in urban areas.

While trust in people remained largely unchanged between 2007 and 2011, trust in institutions visibly decreased throughout Europe, most dramatically in crisis-hit Greece and Cyprus. Major factors boosting trust in institutions are the perceived quality of public services, followed by satisfaction with the economic situation of one's country and a perception of little or no corruption.

Trust in people and trust in institutions are related to a sense of economic insecurity: feeling a greater likelihood of losing one's job reduces trust in institutions and in people, while feeling

more confident that one could find a new job in the event of losing one's current employment increases it.

Attitudes towards migrants and immigration are related to socio-economic status. Being a man, living in a rural area, being older or having a low income is associated with being less tolerant towards migrants.

Tensions between social groups in Europe were perceived to be lowest (in ascending order) between men and women, between old and young people, between people with different sexual orientations and those of different religions. Tensions were perceived to be highest between different racial and ethnic groups, rich and poor and management and workers.

Perceptions of the overall quality of society are negatively affected by deprivation – most important in this respect is the ability to be socioeconomically secure, followed by issues of empowerment (such as feeling that life is too complicated to control) and by poor subjective ratings of health. Feeling left out of society is also important.

An index of perceived economic insecurity ranks countries by economic risk. It shows that, in general, Europeans are only slightly affected by the economic crisis in terms of fears for their jobs or household finances. However, this is not the case in Greece, Hungary and Portugal.

Policy pointers

Policies should target inequalities at a national level where perceptions of inequality and actual inequality are highly correlated. Deprivation has a significant effect on access to and perception of a range of public services, yet the poorest are also the ones who most need such services. Ensuring access to services for all, including the economically marginalised, should be a policy priority.

Childcare services and convenient working hours can help ensure work–life integration and enable higher employment levels. They also play a role in allowing people to access services such as doctors, post offices, banks and health clinics. Family-friendly employment policies (for both men and women) can also help make life easier for working families. Opening hours for these services also need to reflect the changes in employment patterns. More flexible opening hours and other forms of access to health services (using information technology for example) could help to mitigate some of these problems.

Policies targeted at inequalities at European level should look at counteracting widening disparities between certain Member States and the rest of Europe.

In order to build trust in public institutions, corruption needs to be tackled and the economically deprived need to be able to access public services; otherwise they may lose confidence

in them. These problems are particularly acute in Greece, Romania and Bulgaria.

Some countries have been able to improve the perceived quality of their public services despite the economic crisis. These can provide examples of good practice.

Public services need to sustain citizens through the increasing risks of transition between employment, family and housing status. In the European Year of Citizens 2013, the risks of moving between countries or regions should also be taken into account.

Introduction

Policy context

Previous Eurofound research has shown that a person's quality of life is shaped both by individual preferences, choices and behaviour and by a person's surrounding environment and the available services. This includes the availability, access to and quality of public services, the quality of the local neighbourhood and neighbourhood services and a general feeling of security; the latter correlates with a high level of trust in people and institutions and low levels of tension between social groups. While public and private institutions at state and local level undertake to supply collective services of general interest, such as education, health, pensions, childcare, long-term care and transport, policy is responsible for maintaining clean and sustainable environments and managing social tensions.

EU policy has emphasised the need for high-quality public services of general interest (CEEP, 2010) and at the same time has been concerned with ensuring social inclusion and social and territorial cohesion (European Commission, 2010b). The monitoring of public services and social developments together with policy suggestions about how to improve social inclusion and cohesion has become an important issue in the current EU political agenda (European Commission, 2010e; 2013e; Council of the European Union, 2010; European Commission, 2011).

These objectives have been challenged by the economic crisis which has contributed to rising unemployment, cuts in state budgets and growing inequalities. Nevertheless, EU policy aims to support and promote social cohesion and the (re-)integration of vulnerable groups into both local communities and society at large.

> *Fighting socio-economic inequalities whilst at the same time remaining with the same old models of growth and not daring to be politically bold enough to accept the need for change will only lead to frustration and the ineffective use of our limited resources. The way forward is a new socio-ecological model which takes account of European democratic values such as equity, and will allow real progress. This will make sure that socio-economic inequalities will decline, and soon.*
> Jean-Michel Baer, Director Directorate L – Science, Economy and Society, DG Research (European Commission, 2010c)

According to the latest communication of the European Commission on social investment for growth and cohesion,

Member States are urged to put greater emphasis on public services such as '(child)care, education, training, active labour market policies, housing support, rehabilitation and health services' (European Commission, 2013a, p. 9). Social investment should 'prepare people to confront life's risks' and calls for early intervention and the enabling of access to basic services such as (among others) childcare, education and health (European Commission, 2013a, pp. 3, 10).

Access to and use of services is thus also an issue. Public services are supplied in order to ensure secure provision and fair access for everybody. They provide an important framework of conditions for maintaining each person's quality of life (Eurofound, 2003; 2009; 2012a; 2010b). People should be able to use such services according to their needs and independently of their financial means (CEEP, 2010; European Commission, 2013a). The collection of information on the use of public services is an important part of Eurofound's third European Quality of Life Survey (EQLS) 2011 and allows new insights into what services Europeans use and how they use them.

With 2013 being the European Year of Citizens, the Commission intends to support initiatives to inform people throughout Europe about their rights and opportunities related to EU citizenship – especially their right to decide to live and work anywhere in the EU (European Commission, 2012a). Following on from the year for Combating Poverty and Social Exclusion in 2010, this is an opportunity to reopen the discussion on EU societal developments, the quality of society and public services – all factors that may influence such decisions and people's general well-being and quality of life.

Aim of the report

This report investigates the perceived quality of society and public services in Europe today based on data from the third European Quality of Life Survey (EQLS), a large Europe-wide survey conducted by the European Foundation for the Improvement of Living and Working Conditions (Eurofound) for the third time in 2011, following previous waves in 2003 and 2007. The third EQLS covers the 27 European Union Member States as at the time of the survey, as well as seven other European candidate or pre-accession countries (including Croatia).

In the face of the economic crisis, the questionnaire was enlarged to include information about economic and job insecurity, allowing for interesting findings and new insights. In addition, new questions on access to and the use of vari-

ous public services make it possible to distinguish between public opinions of such services in general and more specific evaluations of them by users.

Bearing in mind the main objectives of the Europe 2020 Strategy for smart, sustainable and inclusive growth (European Commission, 2010a; 2010b), it is also important to understand how the recent economic crisis has affected social cohesion in different Member States. The report will therefore investigate citizens' current levels of trust in people and institutions and how they are changing, and tensions between social groups and how they vary between countries. The way in which people access public services at a local level and the quality of local neighbourhoods can also have an important effect on levels of social cohesion and integration.

In a previous publication Eurofound presented findings on the quality of society and public services (Eurofound, 2010b). Based on data from the second EQLS in 2007, the report developed various indicators and an overall index for perceived quality of society and public services. This time, however, the main focus will not be on building indexes but on investigating particular questions about the quality of society, such as satisfaction with various public and neighbourhood services or how the recent economic crisis and related feelings of insecurity have affected the quality of society, measured in terms of trust in people and institutions and perceived tensions in society. A general overview of first findings from the third EQLS in 2011 can be found in the survey's overview report, the basis and starting point for this in-depth analysis (Eurofound, 2012a).

Outline of the report

This report consists of six interlinked chapters, which provide a picture of the perceived quality of society and public services in Europe today. It follows Eurofound's multidimensional 'quality of life' approach concerned with the overall well-being of individuals and the quality of society (Eurofound, 2003).

Chapter 1 offers general insights on how European societies and their quality have been changing in recent years. It discusses access to public services, and the effects of recent economic developments on trust and perceived tensions between social groups. It also monitors changes in the public services index created by Eurofound, which reflects the perceived quality of major public services (Eurofound, 2010b).

Chapter 2 concentrates on public services, offering a more in-depth analysis of selected services that have become central to EU discussions in an ageing Europe: childcare services, long-term care services and healthcare services. It reveals interlinkages between the perceived quality, access to and use of these services and explores the effects of various socio-demographic characteristics and macroeconomic factors on the perceived quality of public services and above-mentioned selected services.

Chapter 3 investigates local neighbourhood issues such as access to local neighbourhood services (for instance, bank and postal services) and satisfaction with the perceived quality of local neighbourhoods (covering factors such as air and water quality, waste and crime).

Chapter 4 shifts the focus of analysis from services to the quality of society. It investigates the perceived quality of society in terms of trust in people and institutions and the perceptions of various social tensions. It also presents the main determinants of trust in institutions and factors influencing 'social quality' – a recent theoretical concept, which combines various aspects of quality of life into an overall measure of social quality (van der Maesen and Walker, 2012).

Chapter 5 deals with insecurity and the economic crisis. It investigates how better access to and use of public services can increase social inclusion. It also links perceptions of take over socioeconomic insecurity, such as fear of losing one's job, and expectations about the household's future financial situation to attitudes towards migrants and reported social tensions. A newly developed index of perceived economic insecurity ranks countries by economic risks.

Chapter 6 offers a summary of conclusions and identifies related policy pointers on perceived quality of society and public services.

Analytical concepts

In this report, the focus is on the discussion about the perceived quality of society and public services as indicated by factors contributing to a person's quality of life. The quality of life concept used by Eurofound defines the quality of a society by the presence of trust; the absence of perceived tensions between social groups indicates social cohesion (Eurofound, 2003; 2009; 2012a; 2010b). Public services are described in terms of access to and the perceived quality of such services. The report will also include neighbourhood services and environmental issues to show possible effects at local level.

Quality of life

The analysis is based on the quality of life concept, which is a broad concept of social research concerned with overall well-being within a society (Eurofound, 2003; 2005a). As a multidimensional concept, it covers objective and subjective indicators and refers to individuals' life situations. In use since the 1970s, it has been adapted over time to reflect changing social conditions and policy needs. Aiming to empower people to choose their ideal lifestyle and achieve their goals, the quality of life concept goes beyond the living conditions approach, which focuses more on the availability of material resources. The quality of life concept combines three important characteristics, which allow it to

give a reasonably complete picture of actual quality of life (Eurofound, 2005a):

- a 'micro perspective, where the conditions and perceptions of individuals play a key role';
- 'the description of several life domains' emphasising 'the interplay between domains';
- 'individual perceptions and evaluations … linked to objective living conditions'.

Quality of society

'The perceived quality of society is one of the fundamental elements of the multidimensional concept of quality of life' (Eurofound, 2009, p. 53); this refers to the importance of social and cultural settings for the quality of life in a society, including the perceptions of public services, social capital and the level of social cohesion pointed out by Eurofound (2003).

Public services

Public services are regarded as collective resources or 'public goods', which are of central importance to the quality of life. This refers to access to and perceived quality of services in areas such as education, health, housing and the social domain but – in a broader sense – also to transport, the perceived quality of the local environment and local amenities (Eurofound, 2003).

Social cohesion and social capital

The context in which people live is also determined by social cohesion – the absence of conflicts between social groups related to inequalities in income or wealth or racial or ethnic tensions. The concept of 'social capital', a person's sense of social connectedness, participation, networking, trust and cooperation, is closely related to social cohesion (Eurofound, 2003). Social cohesion is also defined as 'the capacity of a society to ensure the well-being of all its members, minimising disparities and avoiding marginalisation' (Council of Europe, 2008). It is one of the key goals of the Europe 2020 strategy for smart, sustainable and inclusive growth (European Commission, 2010a; 2010b).

As stated in Eurofound (2010b), the quality of society and public services are closely interlinked and vital parts of quality of life. However, quality of life and quality of society and public services are not identical:

> [while] *quality of life studies focus on subjective and objective conditions of individuals, a consideration of quality of society shifts the focus to collective institutions as well as characteristics of society and how individuals relate to them. For example, an individual who wants to be educated is not seeking to be self-taught*

but seeking a good school and university, and a person who needs an operation seeks a good hospital. The concept is thus oriented towards collective relationships between individuals and the public sector and civil society organisations that deliver major services; at the same time, it focuses on relationships of trust or tension between major groups in society.

(Eurofound, 2010b, p. 8)

Local neighbourhoods

Local neighbourhoods also contribute to a person's quality of life. While local neighbourhood services include public transport, postal services, banking facilities, access to recreational or green areas, cinema, theatre and cultural centres, the perceived quality of local neighbourhoods is measured by the absence of problems in the immediate neighbourhood such as litter and rubbish in the street, air pollution, crime, noise, poor water quality, lack of recreation and green areas and the quality of the local environment (Eurofound, 2009). Another Eurofound report (Eurofound, 2010b, pp. 8, 21) showed a connection between the perceived quality of local neighbourhoods and the provided services.

Inequalities

Inequalities – which impact negatively on participation, social cohesion and inclusive growth – come in three categories: social inequalities, economic inequalities and socioeconomic inequalities (a mix of both). While economic inequalities refer to disparities in earnings and income, social inequalities refer to differences in access. Such restricted access may involve social and institutional networks, and concern social commodities such as healthcare services, education, transport, childcare, eldercare or neighbourhood services (Eurostat, 2010; European Commission, 2010c). Income inequality seems to diminish the perceived quality of both society and public services.

Income inequality

The survey has been informed by the income inequality hypothesis (Wilkinson and Pickett, 2010; Eurofound, 2010a; Layte, 2011). Layte states that 'beyond a certain level of gross domestic product (GDP) per capita, the association between absolute income, health and mortality weakens, and the distribution of income across a society becomes more important as a determinant of a range of outcomes' (Layte, 2011, p. 498).

It was found that more equal societies have better physical and mental health, higher levels of trust, greater well-being of children (less poverty), better educational performance, greater social mobility and better environmental sustainability. As a result, cohesion and growth objectives seem not just complementary but actually critical for the socioeconomic well-being of EU citizens (European Commission, 2010c).

Life satisfaction

Overall life satisfaction is a frequently used measure of subjective well-being. Research differentiates between life satisfaction and other indicators of well-being, such as happiness. Life satisfaction refers more to a cognitive state, while happiness is seen as more of an affective state (McKennel and Andrews, 1980, cited in Eurofound, 2003, p. 14).

Research has shown that there is a difference between the two indicators, with 'happiness being more emotionally driven and less determined by the standard of living, while the satisfaction indicator is more strongly influenced by socioeconomic circumstances' (Eurofound, 2009, p. 16).

Since both indicators strongly correlate, research often focuses on overall life satisfaction (Eurofound, 2009; 2010c).

Social quality

Another concept based on a critique of the dominant policy paradigm (which has subordinated all other policies to economic growth) is the social-quality model (van der Maesen and Walker, 2002). In this model, an acceptable level of social quality is deemed to have been achieved if four conditions are fulfilled:

- people have access to social security;
- people experience social inclusion;
- people live in communities and societies with a sufficient level of social cohesion;
- people are empowered to participate fully, especially in times of rapid socioeconomic changes.

In a recent publication, van der Maesen and Walker indicate that to clarify complex dynamics of social systems, it is also important to distinguish 'between the social quality of the individual's everyday life and the social quality of society' (van der Maesen and Walker, 2012, p. 253).

Based on the above concepts, this report investigates the perceived quality of society and public services, and aspects of local neighbourhood and effects of the economic crisis.

- In terms of public services, it focuses on general developments over time but also on childcare, long-term care and health services. These are all issues recently discussed at EU level. With the help of new EQLS questions, it explores the use of, access to and perceived quality of such services.
- With respect to the local environment, the report analyses neighbourhood services (such as post offices and banks) and satisfaction with the local neighbourhood (absence of noise, air pollution, crime) giving insights into how the quality of collective services affects individual perceptions of local environments.

- Quality of society is investigated in terms of trust in people, trust in institutions, and the extent of perceived tensions between social groups and attitudes towards migrants. Moreover, the 'social quality model' is tested both for the situation in 2011 and changes over time.
- The impact on social cohesion is examined in respect of the absence of socioeconomic inequality and conflicts, and enhancement of trust in people and institutions. These effects are linked to insecurity in times of economic crisis.

Methodological concepts

The EQLS provides new insights into the individual situation of European citizens and thus adds value to official statistics. Policymakers need simple and clearly interpretable tools to extract information from a database as large as the EQLS findings. The combination of EQLS questions into indexes allows for such consolidation of complex information into a single numerical scale. A comparison of these indexes with macroeconomic factors like GDP, employment rates or the corruption perceptions index (CPI) shows whether official statistics reflect how people perceive their lives to be.

Constructing new indexes

Given the range of questions in the third EQLS in 2011, the focus of this report lies on constructing indexes based on new questions and on questions indicating themes of special interest for the current policy debate. These include access to services, user opinions and crisis-related insecurity. For this report eight indexes were constructed:

- public services user intensity index;
- childcare accessibility index;
- long-term care accessibility index;
- health services accessibility index (new);
- neighbourhood services accessibility index;
- satisfaction with local neighbourhood index;
- attitude to migrants index;
- economic insecurity index.

Use of existing indexes

Drawing attention to changes from 2007 to 2011 and keeping in mind the economic downturn in this period, it is reasonable to also follow already-established index constructions (Eurofound, 2010b) to monitor changes; this report has done so for three indexes:

- public services index;
- index of access to health services (old);
- trust in institutions.

Changes over time

How countries changed between 2007 and 2011 can be quickly seen from two-dimensional presentations using a Cartesian plane. These charts show deviance from the overall EU27 value in 2011, as well as changes in country value over time. For more, see Figure 4 in 'Overall public services index' in Chapter 1.

Multilevel modelling

Multilevel modelling enables the analysis of relationships between variables characterising individuals (in this report, people) and variables characterising groups (in this report, countries). Since the variability caused by individuals is much bigger than variability caused by the groups, multilevel analysis is used to test the impact of differences among individuals combined with differences among groups.

Main hypotheses

- Inequalities in income and access to resources throughout Europe have increased, resulting in negative effects on various aspects of quality of life.
- Public services are likely to have deteriorated as a result of the economic crisis, as Member States have cut back on spending. This will be reflected in the perceptions of public services.
- The quality of society has also been affected by the financial crisis, resulting in greater perceptions of tension between social groups and less trust in institutions and people. Satisfaction with life – as a measure of overall social quality – is likely to be lower.
- The perceived quality of local neighbourhoods is determined both by local services and by the quality of local environments.
- The economic crisis and related feelings of insecurity have impacted negatively on social cohesion in Europe as measured by trust and tensions.

This report is one of a series of reports by Eurofound to examine the results from the third EQLS. These include the overview report *Quality of life in Europe: Impacts of the crisis* (Eurofound 2012a) and reports on:
- subjective well-being;
- social inequalities;
- quality of society and public services;
- trends in quality of life in Europe (2003–2012).

CHAPTER 1

How society is changing in Europe

How society is changing in Europe

This chapter gives information on the situation of quality of society and public services in 2011, and recent trends from 2007 to 2011. It offers first insights into access to selected public services as a key factor in overcoming social inequalities, and on the perceived quality of public services as measured by the public services index.

Although one would expect economic growth to go hand in hand with increased social inclusion, so reducing social and economic inequalities, this is not always the case. In effect, socioeconomic inequalities have increased since the mid-1970s (European Commission, 2010c).

Policy measures may effectively intervene in the perceived quality of society and public services by increasing access to public services and reducing inequalities in participation and the use of such services. With the recent economic and financial crisis, additional concerns about how to secure high levels of social quality – as measured by high trust and low tensions within a society – in Europe have increased. Income inequality seems to diminish the perceived quality of both society and public services (Wilkinson and Pickett, 2010; Layte, 2011).

Thus, in addition to the monitoring of standard economic parameters, happiness or satisfaction with life and mental health have also become important factors in measuring a country's prosperity. As Blanchflower and Oswald (2011) point out, overall life satisfaction based on Eurobarometer data has changed during the recent years of recession, with the strongest declines in countries such as Greece and Portugal, where governments have imposed severe austerity measures. Happiness levels increased in Ireland (despite austerity also being a feature of the economic climate), the UK, Germany and Sweden. In general, they find that 'happy people are disproportionally the young and old (not middle-aged), rich, educated, married, in work, healthy, exercise-takers, with high fruit-and-vegetable diets, and slim' while happy countries are 'disproportionally rich, educated, democratic, trusting and low-unemployment'.

Before starting on the detailed analysis of perceived quality of society and public services based on EQLS 2011 data, an overview of income inequality in Europe in 2011 will allow a first glance at potential 'winners and losers' in terms of good quality of life – in other words, whether the quality of life is, as predicted, promoted by the absence (or low level) of income inequalities. As an EU report on the increase of socioeconomic inequalities puts it:

> *Inequality matters because it contravenes the values of EU citizens, the European commission objectives for economic and social cohesion and the specific objectives of the 'Europe 2020' Strategy for 'smart, sustainable and inclusive growth'.*
>
> (European Commission, 2010c, p. 8)

Income inequalities

Economic inequality is measured either by earnings inequality or income inequality. While the first relates to disparities derived from paid employment only, the second is based on disposable household income (including transfers and benefits, and net of taxes). While earning inequalities throughout the European Union are thus moderated by social transfers, income inequalities continue to exist and have been increasing over the years (Eurostat, 2010; European Commission, 2010c).

An analysis of Gini coefficients of disposable income (a measure of inequality in a society) over time shows that income disparities have decreased between Member States, but have risen between regions and are strongest within regions. Disparities within regions and within Member States account for 80% of total inequality. However, the variation of disparities between countries shows that they can be diminished by reducing earning and income differences and/or redistributive welfare state policies, something current welfare states use to

different degrees (European Commission, 2010c). Inequalities have been found to have negative effects on social welfare (resulting in greater poverty) and social cohesion, which should make their reduction a primary policy goal (European Commission, 2010c, p. 23).

Looking at changes in income inequality (Gini coefficient) within countries over time makes it possible to map their development throughout Europe, and take into account possible effects of the recent economic and financial crisis.

Figure 1 compares inequalities measured by the Gini coefficient in 2011 and tracks changes from 2005 to 2011 represented by the length of the lines. It is interesting to see that overall income inequality in the EU27 remained stable and amounted to 0.31 in 2011. However, the situation varies significantly across countries. In 2011, income inequality was highest in Latvia (0.35), Bulgaria (0.35) and Portugal (0.34), but also high in Spain (0.34), Greece (0.34), Ireland (0.33 in 2010) and Romania (0.33). It was lowest in Slovenia (0.24), Sweden (0.24) and the Czech Republic (0.25).

While some countries (such as Bulgaria, Denmark, France and Germany) have had to deal with increases in income inequality, others (Poland, Portugal and Lithuania) show visible decreases. One explanation might be that changes in disposable household income reflect labour-market developments throughout

the crisis, often resulting in reduced working hours, wage cuts or unemployment. In some countries, industry and local businesses and thus their employees have been hit harder than in others. In addition, welfare systems have been able to compensate to a greater or lesser degree.

Countries to watch are Bulgaria, Romania, Spain, Ireland and perhaps France, all showing above-EU average income inequalities in 2011, as well as a tendency towards growing inequalities over these six years. Greece and Italy, although above the EU average in 2011, have experienced only a slight increase in inequality (Greece) or even falling inequality (Italy).

Countries with above-average but decreasing inequalities (Latvia, Portugal, the UK, Lithuania, Estonia, Poland) can hope for better times, while those with below-average but rising inequalities (Germany, Denmark, Sweden) should aim to keep increases at bay.

Using EQLS data, subjective and objective perspectives on income inequality can be combined. By relating subjective feelings of financial inequality (Q57, see Eurofound, 2012b) to general economic measures of financial inequality, such as the Gini coefficient, or other income-share ratios such as S80/S20 or S10/S1, it is possible to determine how individual feelings of inequality and actual economic disparities correlate. The analysis was repeated for all three objective indicators,

Figure 1: Changes in income inequality between 2005 and 2011
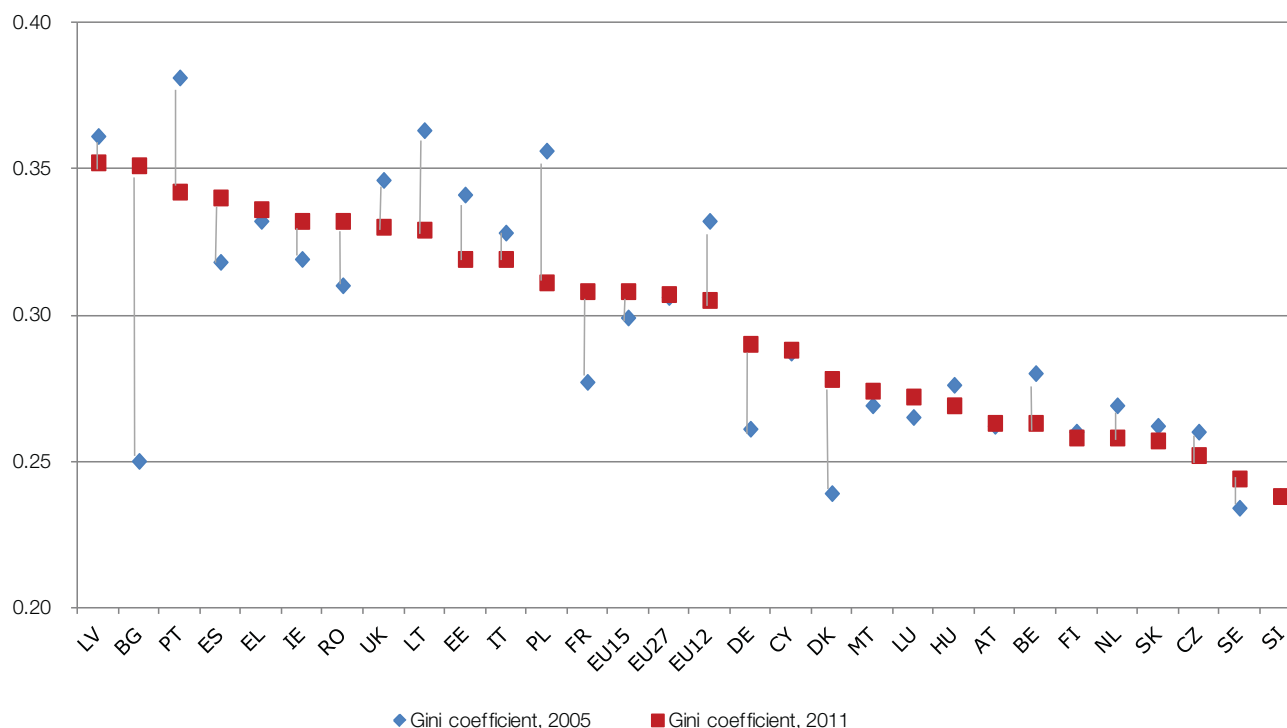
Notes: Gini coefficient; IE data (2010); break in series (2005): CY, CZ, DE, HU, LV, LT, MT, NL, PL, SK, SI, UK.
Source: Eurostat, 2005

which showed similar if slightly divergent results. The analysis below is based on the S10/S1 income decile share ratio, which proved to be the best in explaining the relationship between objective and subjectively perceived country situations for almost all countries.

Figure 2 shows positive and negative perceptions of inequality as well as objective measures of inequality. Bars are higher where more people feel that they are different from others: one can therefore see where and to what extent people feel unequal. The chart is sorted by falling S10/S1 income decile share ratios (green squares) while the blue and red bars depict country difference in responses for people feeling 'much better' and 'much worse' off about their households' financial situation in comparison to most people in their country (Q57, Eurofound 2012b).

However, throughout the EU, the category 'neither worse nor better off' ranges between 38% and 66% of respondents. The majority of people in Europe therefore feel that they live in similar financial conditions as their country peers. When

comparing S10/S1 income decile share ratios with individual perceptions of inequality, there is an overall visible relationship between the two. Higher values of objective income inequality tend to be associated with greater individual perceptions of inequality. This is the case in Bulgaria, Greece and Romania, and to a lesser extent in Latvia, Lithuania, Portugal and Estonia.

If, on the other hand, income share ratios and thus inequalities are low, one would expect more people to feel better off. This is the case in France, the Netherlands, Austria, Luxembourg and Sweden, and to a lesser extent also in Belgium and Finland where lower income inequalities co-exist with higher proportions of 'better off' people.

Interestingly, three former socialist countries (Slovakia, Hungary and Slovenia) do not exactly fit the picture regardless of the objective inequality parameter chosen. Despite a low Gini coefficient, or low income-share ratios, a large proportion of people in these countries feel 'much worse off' than others. Explanations for this might be that people are aware of grow-

Figure 2: Income inequalities: S10/S1 income share ratio and perception of household's relative financial situation
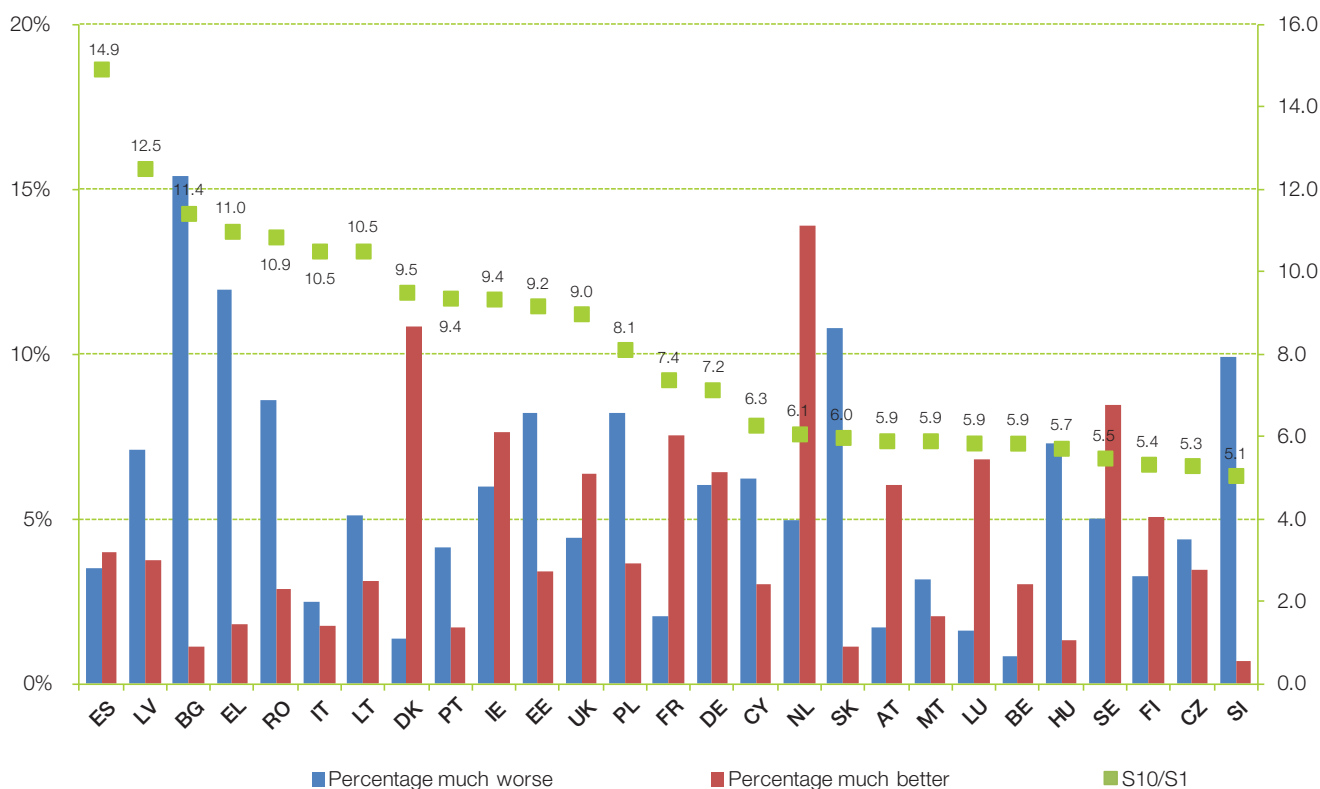
Notes: Q57, S10/S1 income decile shares ratio, authors' calculation based on Eurostat 2011, data for Ireland (2010); for Latvia (2011): break in series. S10/S1: ratio of total income received by the 10% of the population with the highest income (top decile) to that received by the 10% of the population with the lowest income (lowest decile). Income: equivalised disposable income. Q57: Could you please evaluate the financial situation of your household? In comparison to most people in your country, would you say it is: 1. Much worse; 2. Somewhat worse; 3. Neither worse nor better; 4. Somewhat better; 5. Much better?
Source: EQLS 2011, Eurostat (EU-SILC), extracted 6 March 2013.

ing inequalities in their countries, or that their expectations in relation to becoming EU citizens – especially in terms of financial improvements – have not been fulfilled.[2]

In countries such as the UK and Ireland, and to a certain extent in Spain and Italy, differences in perceptions of relative financial situations more or less even out although income inequalities – especially in Spain, but also Italy – are high. An explanation might be that people are traditionally accustomed to income inequalities and thus compare themselves with groups of peers (and not 'all others'), so reducing their subjective feeling of inequality. This is especially true at regional and local level, where income inequalities are known to be high in both Spain and Italy.

Denmark does not fit the picture in any of the three analyses. The proportion of those feeling 'much better off' strongly exceeds that of those feeling 'much worse off' although inequalities are not particularly low by comparison with the EU. However, they do increasingly shift the country into the higher inequality section when changing from the Gini coefficient to S80/S20 and S10/S1. With a very large proportion of people feeling 'better off', Denmark is however similar to Austria, France, Luxembourg, the Netherlands and Sweden.

What do these findings imply at policy level? It seems that policymakers should look both at objective measures of income inequality (such as the Gini coefficient, S80/20 or S10/S1) and also consider complementary, often divergent individual perceptions and their most likely causes when deciding on which policy actions to take.

Set against the EU target of inclusive growth, the following discussion of perceived quality of society and public services will focus on social inequalities and the question of access and use. It will also look at growing insecurity in times of economic crisis. It will try to map the situations of and changes in services, trust and possible tensions within EU societies between 2007 and 2011.

Inequalities in access to public services

Social inequality as defined by the European Commission refers to 'difference in access in social commodities, e.g. health care or education, or to social and institutional networks' (European Commission, 2010c, p. 9). As reflected both in the academic and EU policy discussion, social inequality is considered to be one of the main factors hindering inclusive growth and cohesion and should thus be monitored at all times with care. Together with income inequality, it hinders the attainment of the 'smart, sustainable and inclusive growth' target of the Europe 2020 strategy.

It seems that good access to public and neighbourhood services for all EU residents is vital for the attainment of better social inclusion and that increasing such access can further the Europe 2020 goals. The following indexes used in this report give a first overview of the use of and access to selected public services and changes between 2007 and 2011.

Use of public services

The collection of information on the use of public services is an important part of the EQLS 2011 and allows new insights into what services Europeans use and to what extent.

A new public services user intensity index was constructed to measure the intensity of use of a range of public services: health services, education systems, public transport, childcare services, long-term care services, social/municipal housing and the state pension systems (for details, see the Annex). The index rates the number of services used at between 0 and 6; the higher the score, the more public services a person uses.

The index shows that in 2011 most Europeans used either two or three of the six services respondents were asked about. Nearly half of all respondents (49.2%) in the EU27 countries used two public services, while more than a third (34.9) used three public services. Nearly 7% used more than three but only a few (0.5%) used more than four services.

Women use on average more services than men (2.44 services as against 2.35), while people living in rural areas use fewer services than those living in urban areas (2.32 compared with 2.47). Younger people between the ages of 18 and 24 use more services (2.52) than those over 65 years of age (2.28), while those in the bottom income quartiles use more than high-income earners (2.57 as against 2.22).

Figure 3 shows the proportion of users of selected public services per country based on EQLS 2011 data, sorted by median country age according to Eurostat. It quickly becomes obvious that while public transport and health services are used by a majority of respondents in all countries, this is not the case for the other public services. In the case of education, this is explained by the fact that the EQLS sample age is 18 and above.

In general, one would expect countries with markedly ageing populations to use health services, state pensions and long-term care more intensively. In countries with younger populations, education and childcare services would be the preferred services. In addition, the provision of services might play a role too: long-term care services are well developed in the Scandinavian countries due to the structure of their welfare services.

[2] Another explanation might be found in relation to the level of income in a country. If income is low (as, for instance, in Slovakia and Hungary), income differences among households may be more strongly felt despite a relatively lower overall level of income inequality.

Figure 3: Use of selected public services, by country
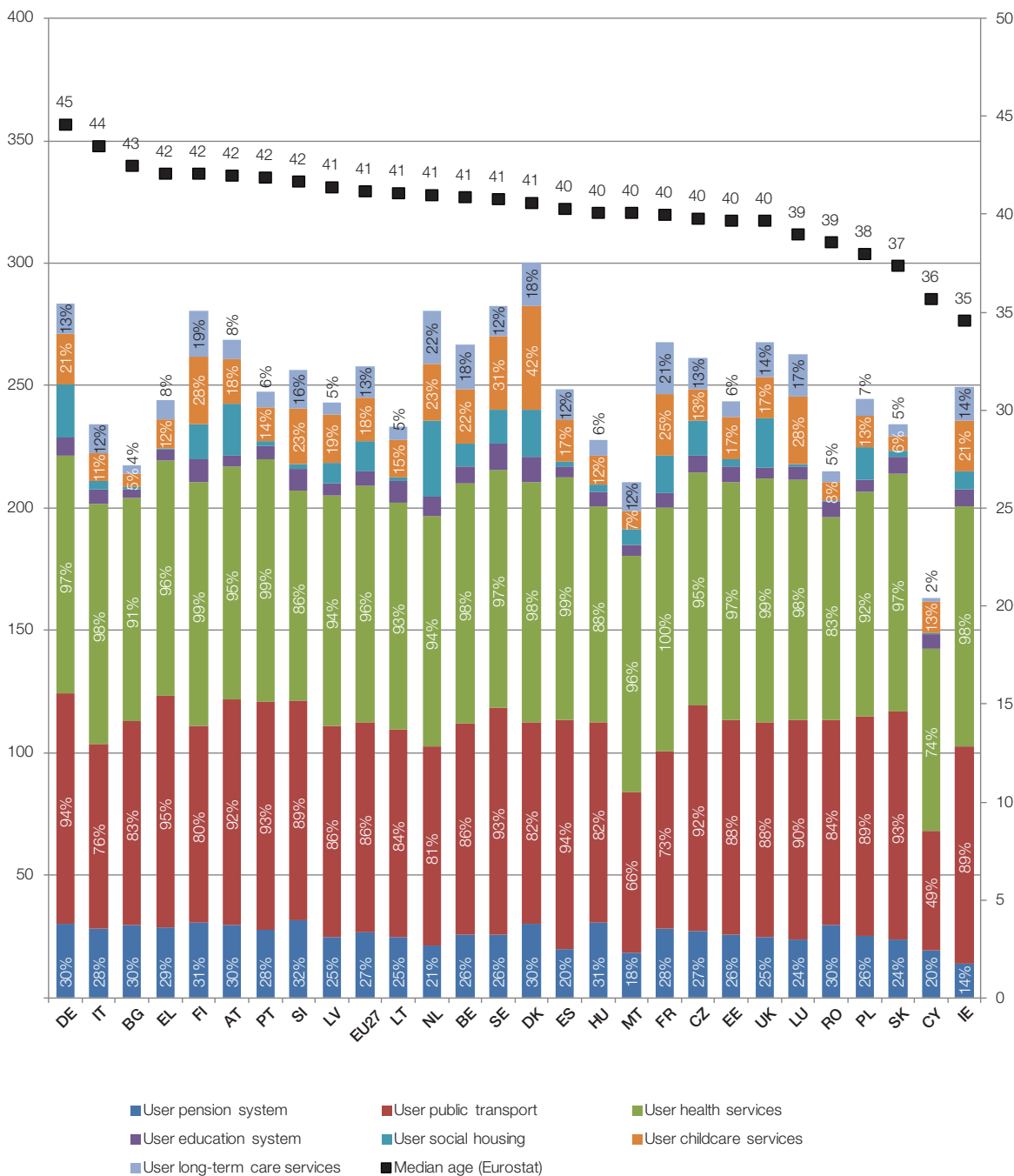
Notes: *Proportion of users in relation to all respondents for each public service category (EQLS 2011), sorted by median country age (Eurostat, 2011). Long-term care in BG and CY is based on a rather small value for N.*

Q47: On the last occasion you needed to see a doctor or medical specialist, to what extent did each of the following factors make it difficult or not for you to do so? (a. Distance to doctor's office/hospital/medical centre).

Q51: Thinking of physical access, distance, opening hours and the like, how would you describe your access to the following services? Can you access (c. public transport facilities) 1. With great difficulties, 2. With some difficulties, 3. Easily, 4. Very easily, 5. Service not used.

Q54 For each of the following care services, have you or someone close to you, used it or would have liked to use it in the last 12 months? (a. Childcare services and b. Long-term care services)

Q18 Which of the following best describes your accommodation? 1. Own without mortgage (without any loans); 2. Own with mortgage; 3. Tenant, paying rent to private landlord; 4. Tenant, paying rent in social/voluntary/municipal housing; 5. Accommodation is provided rent free. 6. Other

HH2d (question on employment status of respondent)

Eurostat, extraction 7 March 2013.

However, with the exception of Ireland, the data do not support such a hypothesis.[3] Although one cannot exclude age as an important determinant of pension use, the influence of different welfare systems (such as a higher prevalence of social housing and long-term care) seems to be the critical factor.

Access to selected public services

With the ongoing ageing of the European population and the increasing entry of women into labour markets, social services originally performed by the family such as childcare and long-term care for the elderly have shifted to the paid service sector. They have become critical services for the successful combination of work and care.

Access to health services has always been regarded as a primary right of citizenship and has thus always had high importance (European Commission, 2007). The Annual Growth Survey 2013 again underlines the importance of reforms intended to 'ensure access to high quality healthcare' (European Commission, 2013a, p. 5). With mental health issues and related possible economic losses high on the policy agenda, efficient and inclusive healthcare systems have become a focus of the political debate (European Commission, 2010d). In reaction to these trends, the most recent wave of the EQLS has included new questions on childcare and long-term care and continued its investigation of healthcare issues. A first look at the results is given here.

Two new accessibility indexes were built to reveal the extent of difficulties in using childcare and long-term care services (for details, see the Annex). They combine several factors critical for accessibility: cost of services, availability (taking into account factors such as waiting lists or lack of services), physical access (distance, opening hours), and the perceived quality of care. The indexes range from -4 to +4, depending on the number of difficulties or their absence. Higher positive scores indicate better access to childcare or long-term care services.

The first new index, the childcare accessibility index, is based on answers only of people reporting that they use childcare services or know someone close to them who uses such services. Based on this definition, 6,177 people (or 17.4% of the 35,516 EQLS respondents) were classified as 'users'.

Among these users of childcare services in all EU27 countries, 20.7% report no difficulties while 2.1% report great difficulties for all factors determining access. Not unexpectedly, countries with strong welfare systems score better in childcare access. Based on this childcare accessibility index, the EU27 average is positive at 0.85. More detail of these results is given in the section 'Childcare services' in Chapter 2.

The second new index, the long-term care accessibility index, was built in a similar way and is thus based on the answers of people reporting that they use such services or know someone close to them who does so. Based on this definition, only 12.6% (4,462) of all respondents were classified as users. Regarding long-term care services, 20.2% of the users in the EU27 countries report no difficulties, while 4.3% report great difficulties for all factors determining access.

Due to the small size of the relevant sample, the analysis at country level, although feasible, has to be interpreted with care. For more details, see 'Long-term care services' in Chapter 2.

Rose's index of access to health services was reproduced in order to map changes in access to healthcare from 2007 to 2011 (Eurofound, 2010b). When looking at possible difficulties in access, it was found that people in 2011 perceive slightly fewer difficulties in terms of distance, delay in getting an appointment, waiting time and the cost of seeing a doctor, than they did in 2007.

An intertemporal analysis of the index reveals that Greece currently fares worst of all EU countries, with decreasing country scores in the health services accessibility index and below EU27-average values in 2011. Although hit by the economic crisis, Italy, Portugal and Spain score better than in 2007. While Italy and Portugal still ranked below the EU27 average in 2011, Spain was among the top EU countries in terms of the average ranking for access to healthcare.

Overall public services index

Changes in the perceived quality of public services often go hand-in-hand with economic developments, which restrict or expand public budgets. The perceived quality of public services may reflect such development as seen by individuals. However, sometimes people's perceptions do not correspond to the situation suggested by economic statistics. Thus, the construction of a public services index based on perceived quality of services can give new insights into the actual situation.

While the indexes described above refer to access and use, the overall public services index reflects the perceived quality of a range of important public services related to the quality of life. They comprise health services, the education system, public transport, childcare services, long-term care services, social/municipal housing and state pensions. In the UN's Classification of the Functions of Government system (COFOG), which lists government expenditure by function, these services – with the exception of transport – come under the heading of individual services (United Nations, 2013). They can all be defined as services of general interest, but are provided by the state or local community to individuals

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[3]   In Ireland, a visibly lower use of pension services might be related to the relatively young population (a median age of 35 years) and the former dominance of a male breadwinner model resulting in a low female pension entitlement.

Figure 4: Public services index by country

Country changes 2011—2007 (y-axis)

Country deviance from EU27 score 2011 (x-axis)
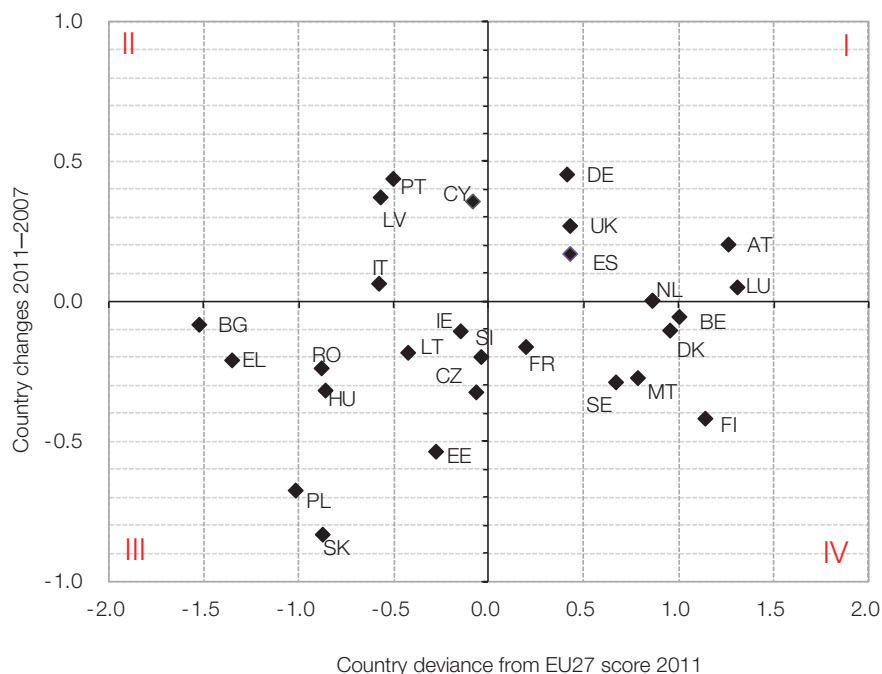
Notes: *The data cover the EU27 (as at the time of the survey) and are weighted by population. The public services index (see the Annex) is based on Q53: In general, how would you rate the quality of each of the following public services in your country? Please tell me on a scale of 1 to 10, where 1 means very poor quality and 10 means very high quality: a. Health services, b. Education system, c. Public transport, d. Childcare services, e. Long-term care services, f. Social/municipal housing, g. State pensions. Average value of responses to a–g (without f); 'Don't know' responses are excluded.*

(CEEP, 2010). In contrast to this type of provision tailored to individual needs, collective services such as transport or environmental services are provided in the interest of the general public.

In a similar way to the health services accessibility index mentioned above, the public services index is constructed following the Rose approach to index construction for public services, which considers the average of perceived values of various services (Eurofound, 2010b; also see the Annex). The index maps the relative positions of individual countries in relation to the EU27 average, and tracks changes between 2007 and 2011 (Figure 4). While above-average countries figure on the right-hand side of the chart, those with increasing perceived quality of public services appear in the upper part of the chart.

What can be deduced from the graphical presentation of the public services index? In the figure, the upper-right block (quadrant I) comprises countries with scores above the EU27 average in 2011 and in which scores rose over time, so representing the leading countries in terms of perceived quality of public services. This applies to Austria, Luxembourg, Germany, the UK, Spain and (with nearly no growth) the Nether-

lands. Despite the economic crisis, people in these countries perceived an enhancement in the quality of public services.

The lower-right block (quadrant IV) includes countries with scores above the EU27 average in 2011 but with decreasing values from 2007 to 2011. This applies to Finland, Belgium, Denmark, Malta, Sweden and France. Although all these countries show a score above the EU27 average for the public services index, people felt a slight decrease in the quality of public services in their country, indicating a process of falling behind others, even if from a starting point of high levels of perceived services. The Nordic countries rank among the best in 2011 but should watch their decreasing trends.

The upper-left block (quadrant II) includes countries that are below the EU27 average in 2011 but whose scores rose from 2007 to 2011, perhaps suggesting a catching-up process. This applies to Cyprus, Portugal, Latvia and, to a lesser extent, Italy.

The lower-left block (quadrant III) includes countries with a lower 2011 score than the EU27 average, and decreasing country scores, suggesting that these countries are falling even further behind. This applies to Slovakia, Poland, Estonia,

Hungary, Czech Republic, Romania, Greece, Bulgaria, Ireland, Lithuania and Slovenia. It should be noted that all but one of the 12 eastern European countries that joined the EU from 2004 onwards ('the EU12') can be found in this block. Particularly challenging are the situations of Slovakia and Poland, showing the biggest decrease from 2007 to 2011, and those of Bulgaria and Greece, which show the biggest deviance of all from the EU27 average for 2011.

Trust and social tensions

The perceived quality of society seems to be influenced by feelings of insecurity, especially in times of economic and financial crisis. The quality of life concept (Eurofound, 2003; 2009; 2012a; 2010b) measures quality of society by the existence of trust in institutions and people, and also the absence of perceived tensions within society (as an indication of social cohesion). When looking at changes, trust in institutions is a more critical factor than trust in people, which is always greater and more crisis-resistant than trust in institutions.

Changes in the perceived quality of society can be mapped by changes in trust and the presence of various social tensions. The following summary highlights first findings related to trust in people and to perceived social tensions, and discusses in more detail the current relevance of trust in institutions.

- Trust in people is generally very similar across EU countries. In 2011, trust in people is visibly higher in the Nordic countries (Finland, Denmark, Sweden) and the Netherlands, but much lower in Cyprus. The greatest increases in trust in people are observable in Bulgaria and Austria. A more detailed analysis is offered in Chapter 4.

- Rising social tensions are often the result of economic downturns or crisis and should therefore be expected to show in the 2011 EQLS. As discussed in the overview report (Eurofound, 2012a, p. 139), perceived social tensions between men and women and old and young people are low. At the EU level, they currently seem to be highest and growing between rich and poor, high between management and workers, and between racial and ethnic groups. On average, more than one third of respondents report such tensions (nearly one third report such tensions between religious groups). A more detailed analysis can be found in Chapter 5.

- Trust in institutions, in contrast to the rather homogeneous trust in people, varies considerably between EU countries. Figure 5 shows deviations from the EU27 average in 2011 – with higher values to the right – and changes between 2007 and 2011. Countries in which trust rose between 2007 and 2011 are above the red zero line, while those where trust in institutions fell lie below the line.

First, Figure 5 (overleaf) shows that trust in institutions all over Europe visibly decreased from 2007 to 2011. This fact can be interpreted as a direct result of the economic crisis and related financial cutbacks, but also as a reflection on how governments managed the crisis. Were they able to react with the appropriate policy measures expected by their citizens?

Greece, in the lower-left block (quadrant III) shows both the greatest decrease in trust between 2007 and 2011 and the lowest value in 2011 in the EU for trust in institutions. This is not surprising, given the severe impact of the crisis on Greece and the austerity measures that followed, which have resulted in fierce public protests and clashes with the government.

The highest scores in levels of trust in institutions in 2011 were recorded in the Nordic countries (Denmark, Finland, Sweden) and Luxembourg. Respondents reported the least trust in Greece, Romania and Bulgaria, immediately followed by Lithuania, Latvia, Slovenia and Slovakia.

Countries less affected by the crisis or loss in trust are grouped in the upper-right block of the chart (quadrant I): these are countries with scores above the EU27 average for trust in institutions in 2011 and increases or only slight decreases of trust over time. Luxembourg, Germany and the UK (above the red line) managed a slight gain in trust in institutions; however, Sweden, Finland and the Netherlands suffered slight losses, although less than the EU average of 0.5. Their good position most likely reflects the fact that their governments were able to efficiently manage the negative effects of the crisis.

The lower-right block (quadrant IV) comprises countries with above-average scores in 2011, but with decreasing values from 2007 to 2011, higher than the EU mean decrease of 0.5. This applies to Austria, Denmark, Estonia, Malta, Belgium, France and Ireland. These countries show a score above the EU27 average for trust in institutions but decreasing scores over time.

The upper-left block (quadrant II) contains countries that scored below the EU27 average in 2011 but have increasing scores for trust in institutions from 2007 to 2011. This applies to Bulgaria; it perhaps reflects high expectations due to elections and maybe a slight catching-up process. Other countries in this quadrant show a decreasing trend, although decreases do not reach the average level of decline for the EU27: the Czech Republic, Hungary, Latvia, Lithuania and Poland.

The lower-left block (quadrant III) comprises countries with a lower country score than the EU27 average and a larger decreasing country score over time for trust in institutions. This applies to Italy, Slovenia, Portugal, Spain, Slovakia, Romania, Cyprus and Greece, where trust in institutions decreased by nearly 40% from 2007 to 2011. The situation of the countries in quadrant III is critical and could indicate a process of societal fragmentation.

Figure 5: Trust in institutions index, by country
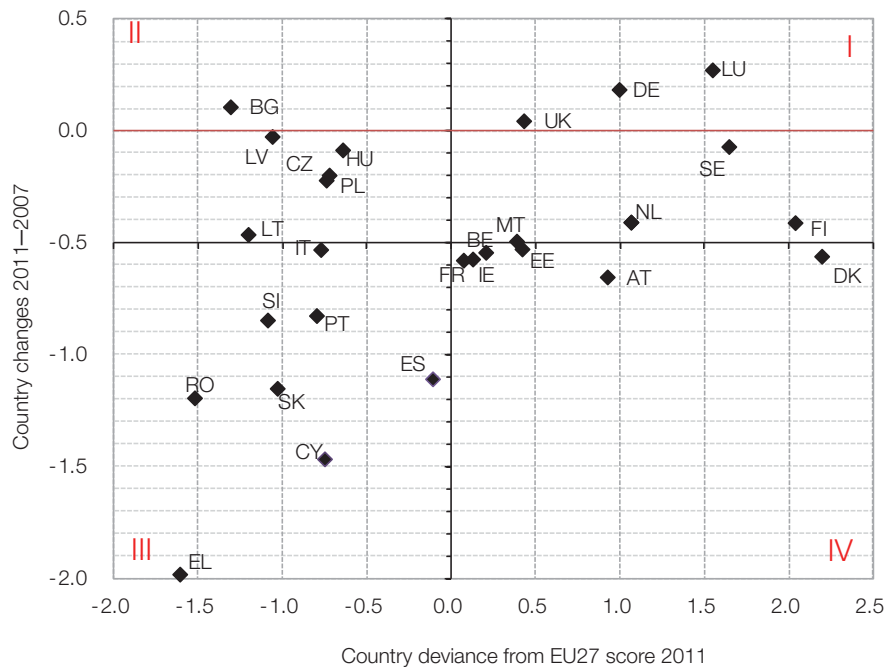
Notes: *Trust in institutions index (see the Annex) is based on Q28: Please tell me how much you personally trust each of the following institutions, on a scale of 1 to 10, where 1 means that you do not trust at all, and 10 means that you trust completely: a. parliament, b. the legal system, c. the press, d. the police, e. the government, f. the local (municipal) authorities. Average value of responses to a., b., d., e.; 'Don't know' responses are excluded.*

Key points

Inequality: When comparing income-share ratios (such as S10/S1 or S80/S20), or the Gini coefficient, with individual perceptions of inequality, there is an overall visible relationship between the two. Higher values for income-share ratio are associated with stronger individual perceptions of inequality and vice versa. However, explicable country deviations are observed that make the use of survey data (such as those from the EQLS) a necessary complement for informed decisions and well-targeted policy actions.

Access to public services: Access to services such as childcare, long-term care and health services is generally perceived to be good when measured by the indexes described in this chapter. And, while access varies between countries, Europeans in general seem to perceive fewer difficulties with access to health services, Some countries such as Italy, Portugal and Spain score visibly better than in 2007.

The public services index: The index shows varying levels and developments of perceived quality of public services in Europe. It is highest and increasing for Austria, Luxembourg, Germany and the UK, and lowest and decreasing for Slovakia, Poland, Bulgaria and Greece.

Trust: Trust in institutions decreased visibly from 2007 to 2011, most dramatically in Greece. Trust in people changed less than trust in institutions and is more similar across the EU.

CHAPTER 2

Public services

Public services

This chapter examines in detail the perceived quality of public services in Europe, and interlinkages between the perceived quality, access and the use of such services. It also explores the influence of sociodemographic characteristics and factors at national level that affect the perceived quality of public services offered.

European countries invest a large proportion of their state budgets in the provision of public services of general interest to their inhabitants. The budgets of state governments, local governments and social security funds pay for general public services, defence measures, public order and safety, economic affairs, environmental protection, housing and community amenities, health, recreation, cultural and religious provision, education and social protection (Eurostat 2012; United Nations, 2013).

In a recent Communication on social investment for growth and cohesion, the European Commission stresses the importance of investment in childcare, long-term care, health and education, all of which are part of public services (European Commission, 2013a).

Total general government expenditure varies with policy goals and the availability of state budgets (Table 1). It is more than 55% of GDP in Finland, France, Denmark and Ireland and around (or lower than) 40% in Romania, Slovakia and Bulgaria.

The EQLS analysis investigates only a selection of public services. Funds spent on such services include the provision of health, education, social protection for old age, for family and children, for housing (including social housing) and for transport services. Spending on these services amounts to between one third and more than a half of total general government expenditure, and between one fifth and one third of GDP. As percentage of GDP, such spending is highest in France, Denmark and Austria and lowest in Cyprus, Malta and Lithuania.

While France and Denmark have the highest overall expenditure on the services selected for examination by the EQLS, Ireland – despite its highest total general government expenditure – only shows moderate spending in the selected categories. Bulgaria and Estonia, on the other hand, have moderate spending on this selection of services although their total general government expenditure is relatively low.

When looking at the selected public services, general government expenditure for different subservices also varies (see Table A9 in the Annex).

While public spending on health is higher than 8.2% of GDP in the Netherlands, Denmark and Ireland, it is lower than 4.5% in Latvia and under 3.5% in Cyprus. Education amounts to 7% of GDP or more in Sweden, Cyprus and Denmark, and is only 4% or less in Greece, Bulgaria and Romania.

Within education, funds for primary and pre-primary education range between 4% of GDP in the Nordic countries (Denmark and Sweden), with their highly developed pre-school and kindergarten systems, and less than 1% in Romania, Bulgaria and the Czech Republic.

Social protection in old age (covering pension benefits and care services for elderly) amounts to 13% or more in Austria, Greece, France and Italy and 5% or less in Cyprus and Ireland. Funds for the social protection of families and children (including benefits in cash and kind, and also for day care) amount to 5.5% of GDP in Denmark, 3.9% in Luxembourg and 3% in Ireland but only 1% or less in Greece, Latvia and Spain.

Transport is above 3.5% in Latvia and more than 4% in Poland and the Czech Republic but lower than 1.5% in France, Cyprus, Malta and Romania.

Public expenditure on social protection for housing (including social housing) is highest (above 0.5% of GDP) in Denmark, Hungary, France and the UK.

As a result of different levels of funding, the provision of services varies both between countries and within countries.

A first view of the general situation of public services as perceived by European citizens can be found in the 2011 EQLS overview report (Eurofound, 2012a). Here the focus is on a selection of public services, particularly childcare and long-term care and health services, these being the services that have recently become central to local and EU discussions related to the ageing of the population and the increased labour market activity of women.

Figure 6 shows country sums of the average perceived quality of selected public services as reported by European citizens. It ranks countries by accumulated perceived qualities. This is the sum of points (between 1 and 10) given to each of the services. With seven services listed, total points can range between zero and a possible top score of 70 if all respondents in a country were to give full marks to all services. This approach, rather than one that calculates an overall average value of quality, makes it possible to distinguish between the different perceived quality levels of various services.

Table 1: Government expenditure (% of GDP)

Country	Total	Selected public services*
AT	52.5	31.7
BE	52.9	(14.1)
BG	38.0	25.0
CY	46.4	18.9
CZ	44.1	26.9
DE	47.9	24.5
DK	57.8	32.3
EE	40.6	25.1
EL	50.2	27.1
ES	45.6	22.6
FI	55.5	31.1
FR	56.5	32.7
HU	49.5	24.9
IE	66.6	24.6
IT	50.4	28.8
LT	40.9	22.3
LU	42.5	27.3
LV	44.4	23.7
MT	43.2	21.9
NL	51.2	25.7
PL	45.4	25.9
PT	51.4	29.0
RO	40.2	(7.0)
SE	52.3	30.7
IS	50.1	28.3
SK	40.1	(10.9)
UK	50.3	28.9
EU7	50.6	(13.0)

Notes: Total general government expenditure, % of GDP, 2010
* selected public services include expenditure of general government on health, education, social protection old age, family and children, (social) housing and transport; provisional data for BG, EL, HU, EU27.
BE, SK, EU27 (only health, education); RO (only health, education, transport)
Source: Eurostat, extracted 5 February 2013 (expenditure by function).

With around 50 points, Austria, Luxembourg and Finland are on average rated highest for the total quality of all the services selected by the EQLS – public health services, education systems, public transport, childcare and long-term care services, social/municipal housing and the state pension system. The lowest perceptions of total quality were recorded in Romania, Greece and Bulgaria.

High perceived quality scores: The quality of health services was perceived to be highest on average in Austria, Belgium and Luxembourg, while the perceived quality of education was rated highest in Finland, Malta and Denmark. Public transport was perceived be of high quality in Luxembourg, Austria and Germany, while childcare was perceived to be of high quality in Finland, Malta and Luxembourg. Long-term care was rated highest in Luxembourg, Malta and Belgium, while social housing was rated highest in Austria, Denmark

and Finland. The state pension system had the highest perceptions of quality in Luxembourg, Malta and Finland.

Low perceived quality scores: The quality of health services was perceived to be poorest in Bulgaria, Romania and Poland, with the quality of education being perceived as poorest in Greece, Bulgaria and Romania. Citizens in Malta, Bulgaria and Italy perceived public transport as poorest. The quality of childcare was perceived to be lowest in Greece, Romania and Bulgaria. Long-term care and social housing were rated lowest in Bulgaria, Greece and Romania, while state pension systems were rated lowest in Bulgaria, Greece and Latvia.

There is a relationship between total general government expenditure and the perceived quality of public services, although it is not as strong as expected. This suggests that other factors seem to matter. Table A10 in the Annex gives

Figure 6: Accumulated average perceived quality of public services, by country (ranking in points)
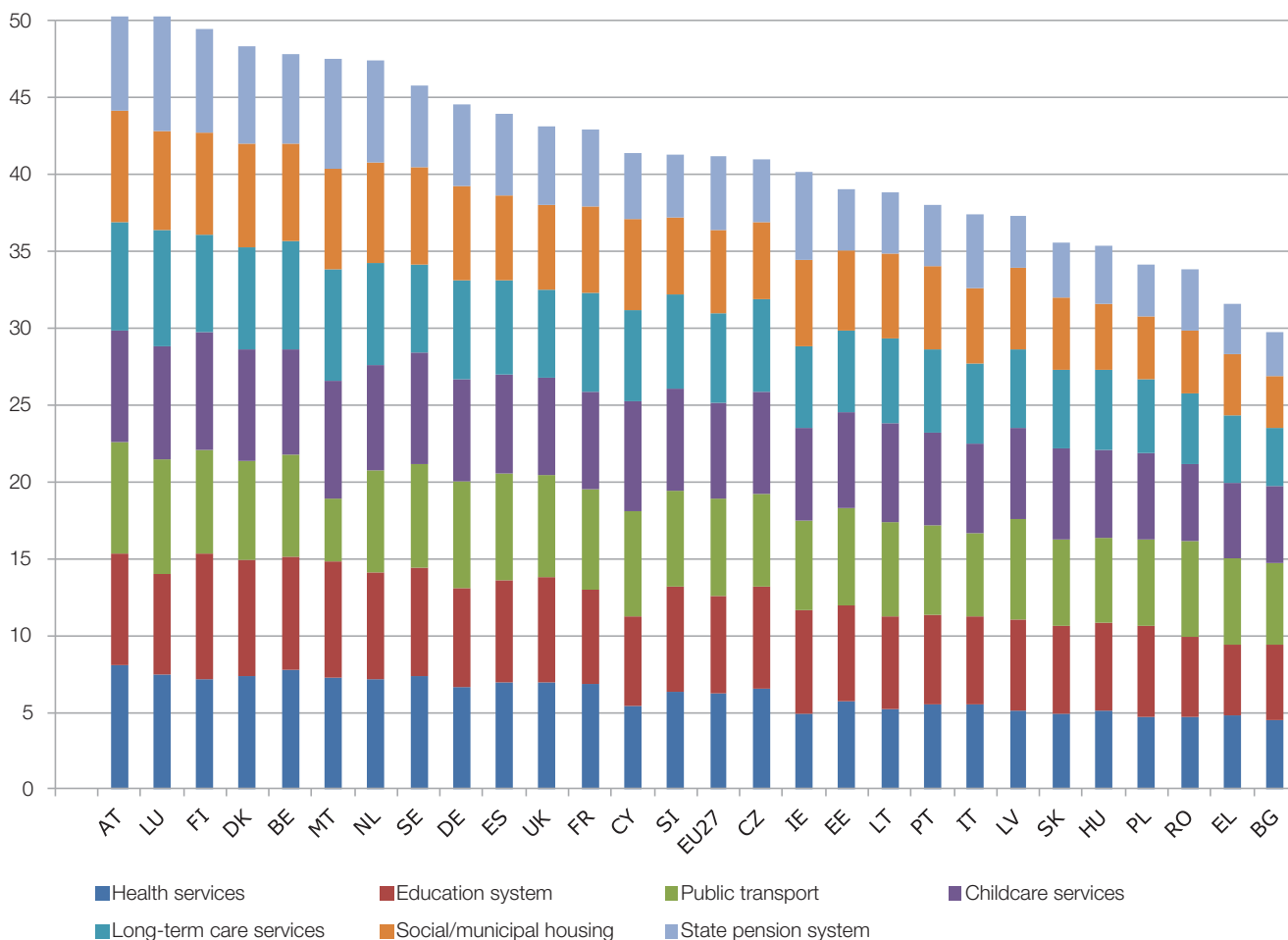
Note: Sum of average perceived quality of selected public services; score out of possible 70; based on Q53 (for question wording, see note to Figure 4); for details, see Table A10 in the Annex.

detailed country data on the perceived quality of public services as reported in the EQLS 2011.

Overall situation in 2011

Use of public services and perceived quality

The public services user intensity index shows how many services people in Europe use. Most use two or three public services. Presented in descending order in Figure 7, the country averages (bars) for the use of public services are linked with the average perceived quality of public services (line). With EU27 average at 2.4, user intensity is greatest in Germany, Denmark and Austria and least in Romania, Malta

and Cyprus. Luxembourg has extremely high perceptions of quality although user intensity is moderate. Malta combines low user intensity with moderate perceptions of quality. The perceived quality of public services is lowest in Bulgaria, followed by Greece and Poland.

Although a distinct relationship is not visible in the analysis presented by Figure 7, if recalculating the relationship without the outliers (Luxembourg, Cyprus and Malta) and keeping in mind the country composition of public services (see Figure 3), there is a correlation between the perceived quality of public services and user intensity ($R^2 = 0.5832$).[4]

The greater the usage of services, the better the rating of the perceived quality of public services in general. This can be attributed to the fact that users have first-hand experience and do not rely on public opinion for their perceptions; they

Figure 7: Public services user intensity index and perceived quality of public services, by country

■ Public services user intensity index (left-hand scale)   ■ Perceived quality of public services (right-hand scale)
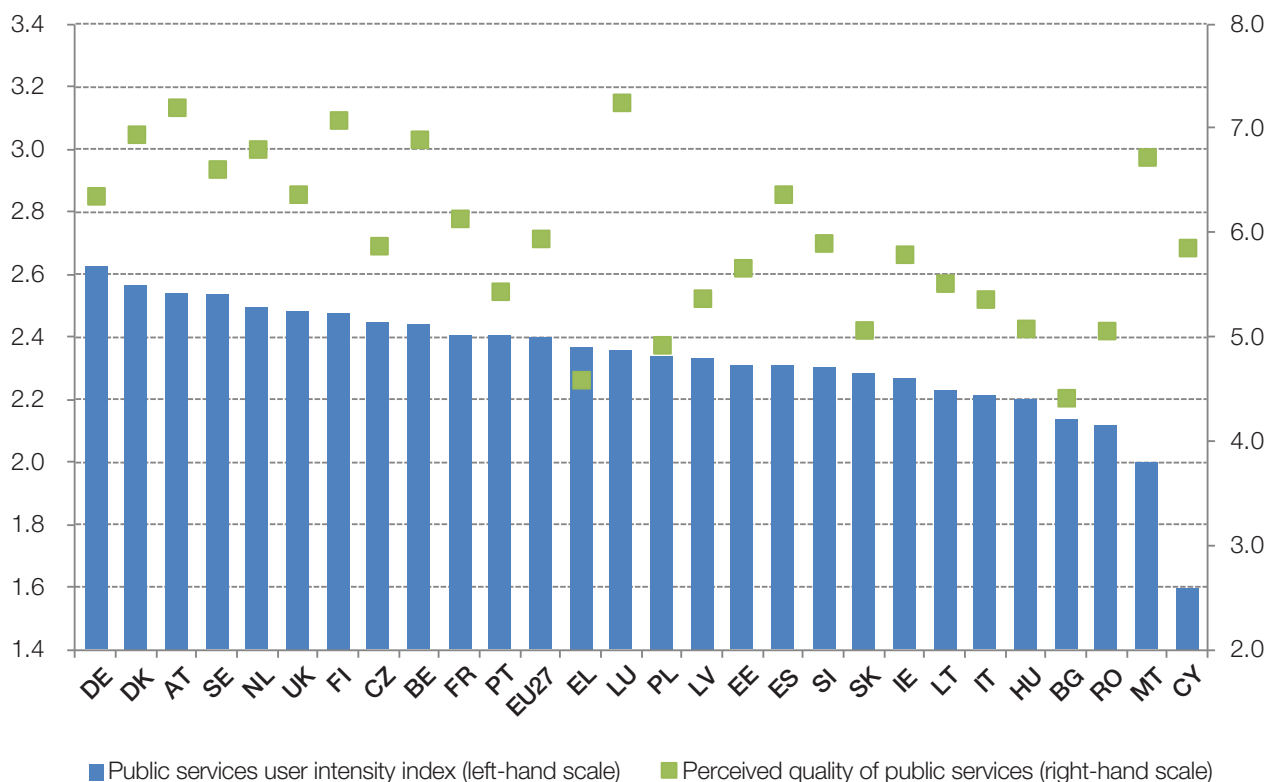
Notes: Public user intensity index, average country score, based on definition in Annex; average perceived quality of public services based on public services index (see the Annex).

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4   The R^2 value is the value of the Pearson correlation coefficient. It shows the extent of variation in a dependent variable explained by an independent variable. A value of 0 means that none of the variance is explained, and a value of 1 indicates that 100% of the variance is explained.

may also give more credit to services they use. Of course, the opposite is also true: the lower the perceived quality of services, the less likely the service is to be used.

This is confirmed when looking at standardised values of quality and use. The greatest user intensity and the highest reported quality coexist in Austria, Denmark and Finland, while the least user intensity and the lowest reported quality are found in Greece, Romania and Bulgaria. In Cyprus, there is a contradictory finding, where intensity of use is lowest but the quality of services is rated quite highly.

Determinants of perceived quality of public services

In a next step, factors that influence the quality of public services as perceived by EU residents are investigated.

The analysis offers insights into which sociodemographic and other factors impact on people's perception of the quality of public services. It indicates what policy interventions might increase satisfaction with quality of public services.

In order to investigate the determinants of perceived quality of public services, this report uses multilevel analysis (Hox, 2010) with grand mean centring. The model takes into account not only individual factors but also the country-related factors presented in Figure 8.

The dependent variable of this model is the previously described public services index (see the Annex) or the perceived overall quality of public services. The index was built as the average of Question 53, responses (a) to (g) (following Eurofound, 2010b).

The results of the multilevel model confirm the need to include both individual and national factors because they can explain

Figure 8: Determinants of perceived quality of public services

Value	Determinant
5.85	Effect of making ends meet
5.91	Effect of deprivation
5.94	Effect of income quartile
5.97	Effect of education
6.01	Cross-level interaction of government expenditure and satisfaction with own country's economic situation
6.01	Person living in EU27
6.03	Effect of number of children
6.05	Effect government expenditure
6.05	Effect of public service user's intensity
6.05	Effect of satisfaction with financial situation in comparison
6.08	Effect of urban living area
6.13	Effect of overall life satisfaction
6.15	Effect of not being in employment
6.23	Effect of satisfaction with economic situation of own country

Notes: *Perceived quality of public services by country based on public services index (see the Annex); results equally weighted.*
Source: EQLS 2011, Eurostat

more of the variation than national comparisons or comparisons of socioeconomic variables alone. Since the variance of the individual residual error is estimated to be 4.12 and the variance of the country-level residual error is estimated to be 0.87, the intra-class correlation equals 0.17. This indicates that 17% of the variance of the public services index is determined at national level.

Major factors influencing the perceived quality of public services are listed by impact in Figure 8. For a complete table of factors (with descriptive statistics), see Table A6 in the Annex.

For an average person living in an EU27 country, the perceived quality of public services is estimated to be 6.01.

Using the grandmean centring techniques for the explanatory variables, the estimated effect of an explanatory variable increases or decreases the perceived quality of public services.

Factors increasing the perceived quality of public services (in order of ascending importance): the number of children, total general government expenditure, a high user intensity index, satisfaction with the relative financial situation of one's household, living in an urban area, overall life satisfaction, not being in employment, and satisfaction with the economic situation of one's country. This means that, for example, a one-point increase in satisfaction with the economic situation of one's country increases the perceived quality of public services from 6.01 to 6.23. Although also positively related to the perceived quality of public services, GDP has not been included in the model since it lowers the model's explanatory quality (deviance).

Factors decreasing the perceived quality of public services (in order of declining importance): difficulty making ends meet, deprivation, cross-level interaction of total general government expenditure, and low levels of satisfaction with the economic situation of one's own country. For example, a one-point increase in difficulty in making ends meet decreases the perceived quality of public services from 6.01 to 5.85.

Most interestingly, the strongest positive factor influencing the perceived quality of public services is the individual assessment of the economic satisfaction with one's country – more influential than individual overall life satisfaction. A possible explanation might be that if people are satisfied with the economic situation of their own country, their government is seen as doing things 'right'. This is then reflected in a generally positive individual evaluation of various other services. It is also likely that people with a more positive attitude towards life tend to see their surroundings – including quality of society and public services – in a generally more positive light.

Attention should be drawn to the cross-level interaction effect, combining the individual assessment of satisfaction with the economic situation in one's own country with total general government expenditure. Although, when modelled separately, total general government expenditure and satisfaction

with the economic situation of one's own country increase the perceived quality of public services, the combination of both factors causes a reduction of perceived quality. It seems that government expenditure moderates the individual assessment of satisfaction with the economic situation in one's own country. For a person living in a country with a high proportion of total general government expenditure and high satisfaction with the economic situation in their country, the perceived quality of public services decreases, indicating that people's expectations of what should be provided in their country are not fulfilled.

It is possible to repeat this analysis at country level to see how country effects compare to effects found for all Europeans. Country predictions based on the same multilevel model are shown in Figure 9 (overleaf), which presents country deviations from the EU27 average. Country deviations represent the quality of public services perceived by an average person living in a specified EU country in relation to the average score for an EU27 resident.

Although higher general satisfaction increases the perceived quality of public services, as discussed above, deviations can either be positive (if the country effect of a factor is larger than the overall EU effect of this factor) or negative (if the country effect is smaller than the overall EU effect).

For each country, the bars in Figure 9 thus present the sum of deviations in all factors while the overall perceived quality of public services – as estimated by the model – is marked by black diamonds and bold numbers (so, for instance, 6.6 for a person in Austria or 5.1 for someone in Bulgaria).

In the Austrian case, most factors have an influence greater than the EU average; the bar is mostly above the x-axis. In Bulgaria, all factors have a lower than EU-average effect and thus the bar lies below the x-axis. Satisfaction with the economic situation of one's own country, the level of total general government expenditure and overall life satisfaction are the variables with the largest (positive or negative) impact in most countries.

Linking income inequality with perceived access and quality

What is the relationship between income inequality and perceived access to and quality of services? Interpreting this relationship using the inequality hypothesis (Wilkinson and Pickett, 2010), it is likely that in societies with greater inequalities, some people have less access to services and may thus rate such services lower. While it is not always clear which direct or indirect mechanisms influence each other, nor which direction such influence takes, strong correlations do undoubtedly exist.

Figure 10 (overleaf) combines the Gini coefficient in 2010 with the standardised average perceived access to selected

Figure 9: Deviation in perceived quality of public services from European average, effects by country

Legend:
- Education
- Urban living area
- Difficulty in making ends meet
- Deprivation
- Satisfaction with comparative financial situation
- Number of children
- Intensity of public service use
- Overall life satisfaction
- Satisfaction with own country's economic situation
- Income quartile
- Not being in employment
- Government expenditure
- Government expenditure: satisfaction with own country's economic situation
- Country prediction

Notes: Multilevel model based on public services index (see Table A3 in the Annex); results equally weighted.
Source: EQLS 2011

services and the standardised average perceived quality of public services measured by the EQLS 2011. What immediately becomes visible is that there is a relationship between perceived access to and perceived quality of public services and the country Gini coefficient.

Countries with a relatively low Gini coefficient form two distinct groups. As expected, countries such as Austria, Belgium, Denmark, Finland, Luxembourg, the Netherlands and Sweden combine high levels of access and perceived quality with low inequality. Countries such as the Czech Republic, Hungary, Slovakia and Slovenia report lower access and poorer perceived quality than one would expect, given their relatively low Gini coefficient: they feel worse off than the Nordic and central European countries. It would seem that people in the Czech Republic, Hungary, Slovakia and Slovenia – all formerly command economies – still feel the reduction in what were formerly good public services and feel there is a lack of new options.

Perhaps their expectations of EU integration are higher than the state or market can fulfil, thus leaving a general feeling of unsatisfied entitlement.

Countries with a relatively high Gini coefficient also form two distinct groups. As expected, a high Gini coexists with lower levels of perceived access to and quality of public services in Bulgaria, Italy, Poland, Portugal, Romania – and especially, crisis-hit Greece. Ireland, Spain and the UK follow a different pattern. Although the Gini coefficient is rather high, people feel that they have better than EU-average access and quality of public services. Estonia, Latvia and Lithuania show lower perceived access to and poorer perceived quality of public services but follow the same pattern.

France and Germany figure in the middle on all three indicators of perceived access, perceived quality and income inequality.

Figure 10: Standardised average perceived access to and quality of public services linked to Gini coefficient, by country
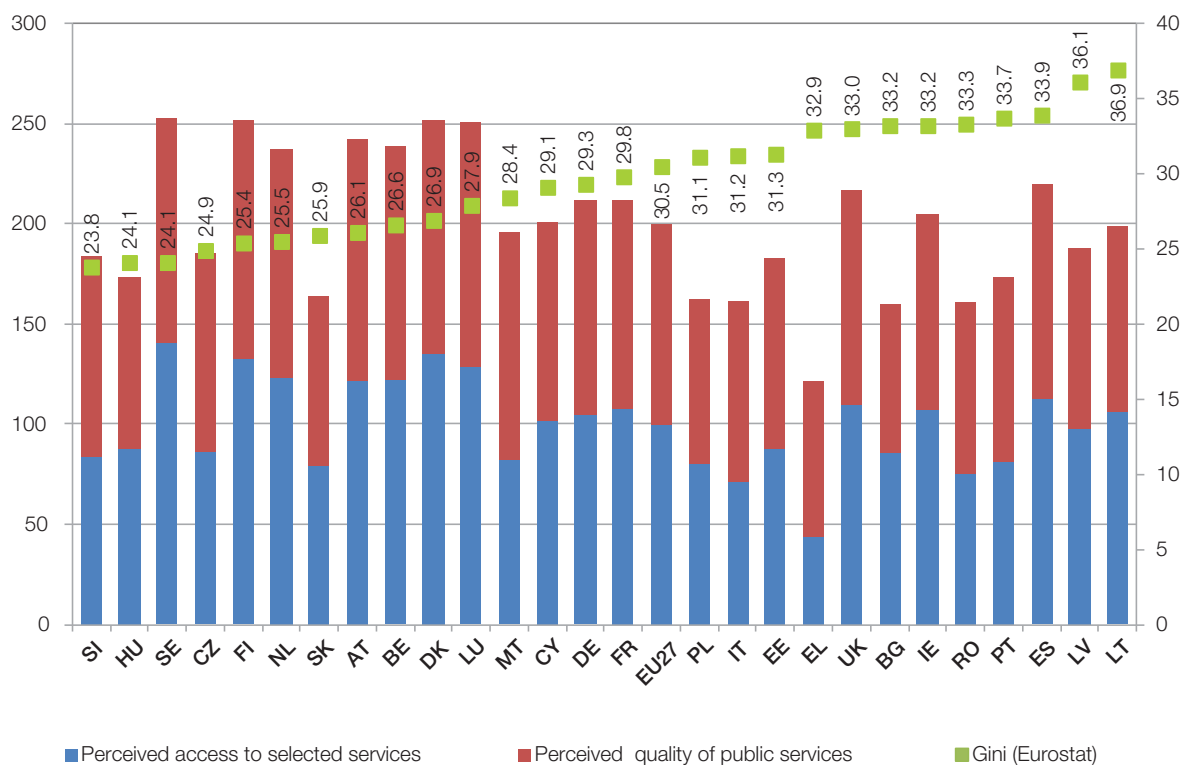
Notes: Standardised perceived access and quality of public services (based on indexes; see the Annex) and Gini coefficient based on disposable income, 2010
Source: EQLS 2011 and Eurostat (Gini coefficient)

Influence of life satisfaction on perceived quality of public services

How does a person's satisfaction with life affect their evaluation of public services and quality of society? Usually, life satisfaction is regarded as an outcome of various subjective and objective conditions faced by individuals and is analysed in the context of these factors (Eurofound, 2005b; 2010c; Abbott and Wallace, 2011; 2012).

However, it is also possible to turn this approach around and investigate how satisfaction with life may or may not be related to or contribute to perceptions of surroundings, including the quality of public services.

Intuitively, the argument is that if someone is quite satisfied with his or her general situation, they are likely to see their surroundings in a positive light. A high level of satisfaction with life as a whole is therefore likely to impact positively on survey questions that ask respondents to grade various social provisions

('How would you rate the quality of …?'). On the other hand, if dissatisfaction with life is generally strong, this is likely to impact negatively on such ratings.

Overall satisfaction with life and satisfaction with the economic situation of one's own country are factors that play an important role in the perceived quality of public services. In the multilevel model, both factors were estimated to have an increasing effect, with higher satisfaction resulting in higher perceived quality.

Overall satisfaction with life and satisfaction with the economic situation of one's own country have larger than EU-average effects on the perceived quality of public services in 14 countries: Austria, Belgium, Cyprus, Germany, Denmark, Spain, Finland, France, Ireland, Luxembourg, Malta, the Netherlands, Sweden and the UK. In contrast, effects are smaller than the EU average in Bulgaria, the Czech Republic, Estonia, Greece, Hungary, Italy, Lithuania, Latvia, Poland, Portugal, Romania, Slovenia and Slovakia.

Childcare services

The reconciliation of work and family life is one of the main challenges for families today. Improving access to childcare 'is essential in removing barriers to the labour market participation of parents' (European Commission, 2013a, p. 21), as is ensuring 'effective access to affordable, quality early childhood education and care' for all families that also fits 'increasingly diverse working patterns' (European Commission, 2013b, p. 5).

Although there are substantial differences in participation rates and the nature of female employment throughout Europe, women in the EU accounted for the majority of job growth between 2000 and the onset of the economic crisis in 2008. Since then, the female EU27 employment rate has declined less than that of men (Daly 2000, cited in Esping-Andersen et al, 2002; Eurostat, 2012).

It seems that social services such as childcare and professional care for the elderly can also provide additional employment opportunities by freeing people from domestic obligations or reducing compatibility problems, particularly relevant for women in their current role as main carers.

> [since] *female employment is one of the most effective means of combating social exclusion and poverty … women-friendly policy is, simultaneously, family- and society-friendly. If it yields a private return to individual women, it also yields a substantial collective return to society at large. (Esping-Andersen et al, 2002, p. 94)*

Following the latest communication on social investment for growth and cohesion, childcare (comprising parental leave and the provision of childcare services) 'has a protective role but also a significant investment dimension' (European Commission, 2013a, p. 3).

This communication and the Commission recommendation on investing in children stress that improving 'access to early childhood education and care (ECEC) has positive effects throughout life' and is key to the reduction of early school leaving, improving employment outcomes, addressing challenges faced by disadvantaged children, and to 'reduce inequality at a young age' (European Commission, 2013a, p. 21; 2013b, p. 6).

The following analysis of childcare services, although based on only a limited number of EQLS 2011 responses, offers interesting insights into access to, use of and the quality of childcare as perceived by Europeans.

Access, use and perceived quality of childcare services

A childcare accessibility index was developed based on Q55 ('To what extent did each of the following factors make it difficult or not for you, or someone close to you, to use childcare services? Cost, availability (waiting lists, lack of services), access (because of distance or opening-hours), quality of care').

Note that the childcare accessibility index is based only on user perceptions, while the perceived quality of childcare services (in Figure 11) is based on the evaluations of all EQLS respondents who answered Q53d.

The childcare accessibility index is based on the answers of people reporting that they use childcare services or know someone close to them using such services. Users generally rate the quality of services higher than non-users. Built to reveal difficulties, the index combines several factors critical to access. It ranges between -4 and +4, with higher positive scores indicating better accessibility.

However, users of childcare are not evenly distributed across European countries. Users from Germany, France and Denmark account for more than a quarter of all users, and this results in a certain selectivity bias. This is a result of the variation in childcare supply, which reflects the different welfare state regimes in place.

Note also that the proportion of childcare service users varies throughout Europe. It is highest in Denmark (42.2%) and Sweden (30.5%), and above 25% in Luxembourg, Finland and France; it is lowest in Bulgaria (5%), and below 10% in Slovakia, Malta and Romania (for more information, see Figure A2 in the Annex).

The analysis reveals a strong relationship between the childcare access index and the perceived quality of childcare services. In general, fewer difficulties in access to childcare services result in a higher perceived quality of services.

The size of the circles in Figure 11 indicates the sample size of those respondents across the EU who evaluated access to childcare services at a particular level. For example, those who had most difficulties with access (-4 on the scale), evaluated the quality of childcare services at the lowest level: 3.3 (on a scale of 1 to 10; the average scores given for quality are indicated by the numbers in the circles). As can be seen, at EU level most respondents reported few difficulties or none and a majority perceived the quality of childcare services as being relatively high.

Investigating the same issues at country level, one can differentiate in more detail users' perceptions and general observations of all respondents. In 16 of the EU27 countries, the quality of childcare services as reported by users is higher than that observed by the general public (which consists mainly

of non-users). In the remaining countries, users perceive the quality of childcare services to be lower.

Users rate services much better in Cyprus, Lithuania, Bulgaria and Slovenia, and much worse in Malta, Spain and Poland. No differences exist in Finland, Denmark and Luxembourg.

The highest scores for childcare accessibility (Figure 12, overleaf) can be found in Sweden (2.4), Finland (1.8) and Denmark (1.7) while the lowest scores for access are found in Greece (-0.7), Romania (-0.1) and Slovenia (0.3).

Combining questions of quality and access to childcare services, one sees that while access seems to be relatively difficult in Slovenia and Malta, both countries show rather high levels of perceived quality. However, it should be noted that both users' perceptions and overall perceptions vary. It is interesting to see that although access is rated most difficult in Greece, perceived quality equals that of Bulgaria where access is rated much better (Figure 12).

Access to and quality of childcare services are rated high in Finland (the EU country with the highest rating for quality) and Sweden (the EU country with the best access). Both factors are also high in Cyprus, Luxembourg and Austria – all countries where user ratings for quality exceed the overall quality perceptions.

An interesting conclusion comes to mind when looking at Figure 12. Is it possible that people do not use childcare services because of general assumptions of low quality or difficult access to such services? This could be the case in Slovenia, Slovakia and Hungary but also in Portugal and Italy, an issue local governments should not forget to watch.

There is a visible relationship between access to childcare (evaluated by users) and the employment rate of women, which can be interpreted in two ways (Figure 13, overleaf). Either countries with high female employment rates are those where people face fewer difficulties when using childcare services, or the existence of and good access to childcare services enables women to work. Such is the case in the Nordic countries (Denmark, Finland, Sweden) and the Netherlands, but also Germany and Austria. However, Greece, Malta and Italy show low female employment rates and limited access to childcare. This might be an outcome of the still often quite traditional assumptions about the role of women in these southern European countries. At similar levels of female employment, Italy and Malta rate accessibility better than Greece.

Figure 11: Childcare accessibility index and perceived quality of childcare services
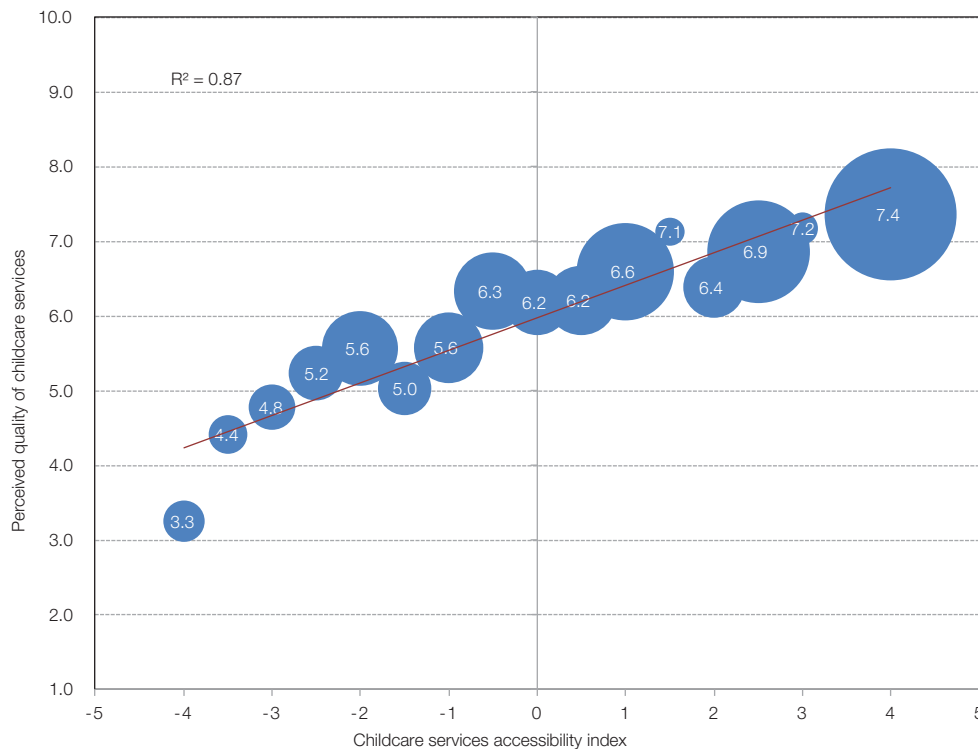
Notes: Childcare access index (see the Annex); Q53: In general, how would you rate the quality of each of the following public services in your country? Please tell me on a scale of 1 to 10, where 1 means very poor quality and 10 means very high quality: d. childcare services.

Figure 12: Childcare accessibility index, perceived quality of childcare services and users' perceived quality of childcare services, average score by country

■ Perceived quality of childcare services ■ User's perceived quality of childcare services ■ Childcare services accessibility index
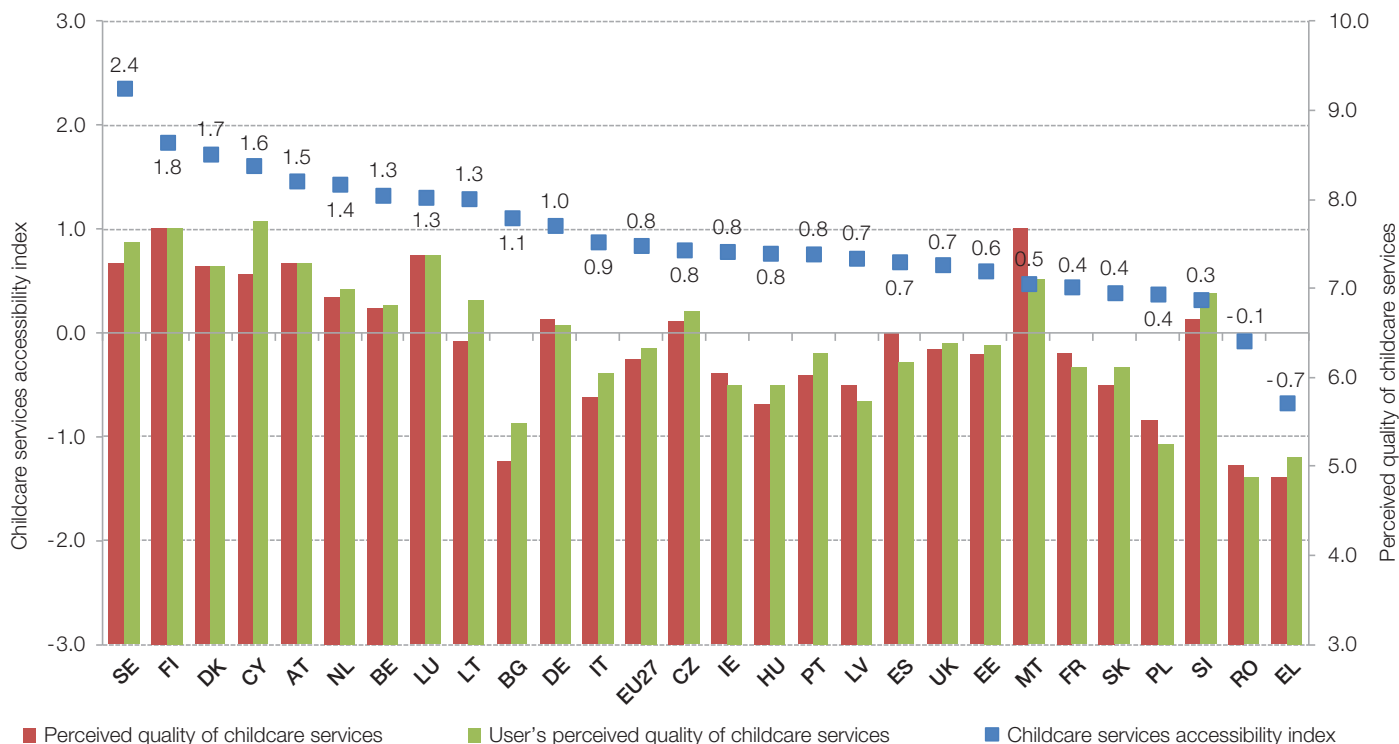
Notes: *Q53 (for question wording, see note to Figure 11): Q54: For each of the following care services, have you or someone close to you, used it or would have liked to use it in the last 12 months? a. Childcare services, b. Long-term care services; Childcare accessibility index based on Q55 (see the Annex).*

Figure 13: Correlation between female employment and perceived accessibility of childcare
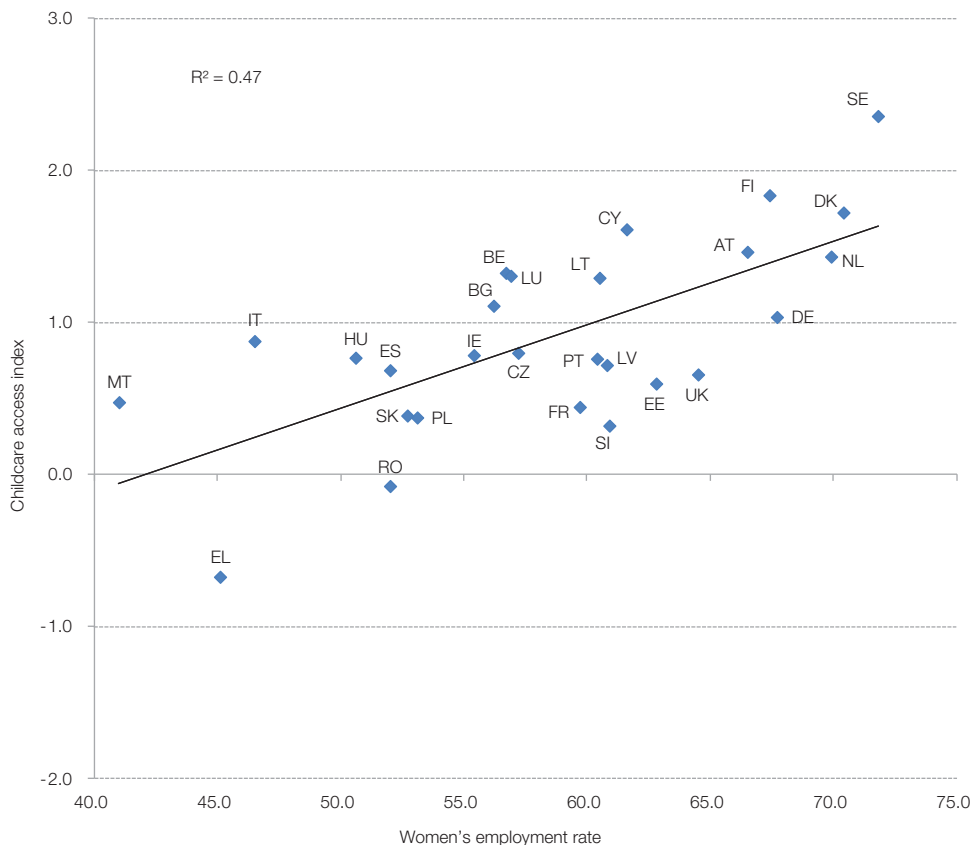
Notes: *Childcare accessibility index (see Annex) based on Q55: 5 To what extent did each of the following factors make it difficult or not for you, or someone close to you, to use childcare services? a. Cost, b. Availability (e.g. waiting lists, lack of services), c. Access (e.g. because of distance or opening hours), d. Quality of care. Source: EQLS 2011; Eurostat (women's employment 2011 rate).*

Determinants of perceived quality of childcare services

Factors that influence the quality of childcare services as perceived by EU residents are explored to add a user-related view to the usual presentation of total public expenditure and number of services supplied. The multilevel model presented in Figure 14 offers policy-relevant information on variables that impact upon the perceived quality of childcare services and which factors to watch.

In order to investigate the determinants of perceived quality of childcare services, this report uses multilevel analysis with grand mean centring (Hox, 2010). The model takes into account both individual and country-related factors.

The dependent variable of this model is the perceived quality of childcare services (Q53d), which is based on the evaluations given by all EQLS respondents.

The results of the multilevel model confirm the need to include both individual and national factors because they can explain more of the variation than national comparisons or comparisons of socioeconomic variables on their own. Since the variance of the individual residual error is estimated to be 3.91 and the variance of the country-level residual error is estimated to be 0.58, the intra-class correlation equals 0.13^5 – indicating that 13% of the variance of the quality of childcare services is determined at national level.

Major factors influencing the perceived quality of childcare services are listed by impact in Figure 14 (overleaf); a complete table of factors (with descriptive statistics) can be found in Table A4 in the Annex.

For an average person living in an EU27 country, the perceived quality of childcare services is estimated to be 6.45 (and thus higher than 'overall' public services).

Using the grand mean centring techniques for the explanatory variables, the estimated effect of an explanatory variable increases or decreases the perceived quality of childcare services. Factors increasing the perceived quality of childcare services (in order of ascending importance) are a higher female employment rate, having more children, satisfaction with the relative financial situation of one's household, overall life satisfaction and satisfaction with the economic situation of one's country. Being older, being a user of the services and not being employed also has a less significant but positive impact.

This means that, for example, a one-point change in satisfaction with the economic situation of one's country increases the perceived quality of childcare services from 6.45 to 6.6.

Thus people rating the economic situation of their own country higher also deem childcare services to be of higher quality.

Factors decreasing the perceived quality of childcare services in order of declining importance are: the cross-level interaction of both being a user and living in an urban area, deprivation, a higher level of education, being in a higher income quartile, the cross-level interaction of both the female employment rate and income quartile, and the cross-level interaction of both the female employment rate and satisfaction with economic situation of one's own country.

On first sight, it seems strange that deprivation, better education and higher income quartile are all factors decreasing the perceived quality of childcare. However, the explanation is simple and confirmed by the data.

Being deprived, a personal feeling that one is not able to have what peers have (food, vacations, inviting friends over), has the strongest negative effect of the three on the perceived quality of childcare. Such a negative effect may result from the feeling that people are not able to get what they should because they have more limited means and less empowerment to negotiate than others in their reference group.

It should be noted that, in many EU12 countries, being deprived is something that people on lower incomes as well as higher incomes seem to experience. Thus, less satisfaction with childcare related to feelings of deprivation is observable across the population, regardless of income.

A higher level of education and a higher income quartile also decrease the perceived quality of childcare services. Here, an explanation might be that people with better education and/or a higher income seem to have higher expectations of quality of childcare. More likely to be users of the services, they are also more critical of the services and care they want their children to get. These higher expectations seem to result in a poorer perception of the quality of childcare services on offer if users cannot easily find what they are looking for.

Another important fact to note is that although being a user increases the perceived quality of childcare services, and living in an urban area decreases it, the cross-level interaction of both living in an urban area and being a user of childcare services has the strongest negative impact on the perceived quality of childcare services. A possible explanation is that childcare services could be overcrowded in some urban areas, making them less attractive.

The cross-level interaction effect should be noted, combining the individual assessment of satisfaction with the economic situation of one's own country and the employment rate of women. Although the employment rate of women and

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Figure 14: Determinants of perceived quality of childcare services, by multilevel model

Value	Label
6.29	Interaction in urban living areas: being a user
6.32	Effect of deprivation
6.37	Effect of education
6.38	Effect of income quartile
6.43	Effect of urban living area
6.44	Cross-level interaction-women's employment rate: income quartile
6.44	Cross-level interaction-women's employment rate: satisfaction with own country's economic circumstancees
6.45	Person living in EU27
6.47	Effect of age
6.48	Effect of women's employment rate
6.49	Effect of number of children
6.50	Effect of satisfaction with comparative financial situation
6.51	Effect of being a user
6.51	Effect of not being in employment
6.59	Effect of overall life satisfaction
6.60	Effect of satisfaction with own country's economic situation

Notes: Perceived quality of childcare services based on Q53 d (In general, how would you rate the quality of each of the following public services in your country? Please tell me on a scale of 1 to 10, where 1 means very poor quality and 10 means very high quality: (d. childcare services.); results equally weighted (see the Annex). Colours in bars: dark blue (significant at 5% level), light blue (significant at 10% level), white (significant in interaction only; see top bar of chart).

satisfaction with the economic situation of one's own country separately increase the perceived quality of childcare services, the combination of these factors causes a reduction in the perceived quality of childcare services.

The employment rate of women moderates the individual assessment of satisfaction with the economic situation of one's own country. For a person living in a country with a high female employment rate and who gives a high satisfaction rating with the economic situation of their own country, the perceived quality of childcare services decreases, meaning that people's expectations are not fulfilled. The employment rate of women also moderates the negative effect of a higher income quartile, looking at the cross-level interaction of income quartile and the employment rate of women.

It is possible to repeat the above analysis at a country level to see how country effects relate to effects found for all Europeans. Country predictions based on the multilevel model already used are shown in Figure 15, in which country deviations from EU overall level are presented. Country deviations represent the quality of childcare services perceived by an average person living in a specified EU country in relation to that of an average European (the average EU rating of childcare services was 6.45).

Although the effects of the discussed factors do in principle impact in the same direction (for instance, greater satisfaction in any aspect of life increases the perceived quality of childcare services), the deviations can either be positive (if the country effect of a factor is larger than the overall EU effect of this factor) or negative (if the country effect is smaller than the overall EU effect).

Figure 15: Deviation in perceived quality of childcare services from EU average effects, by country
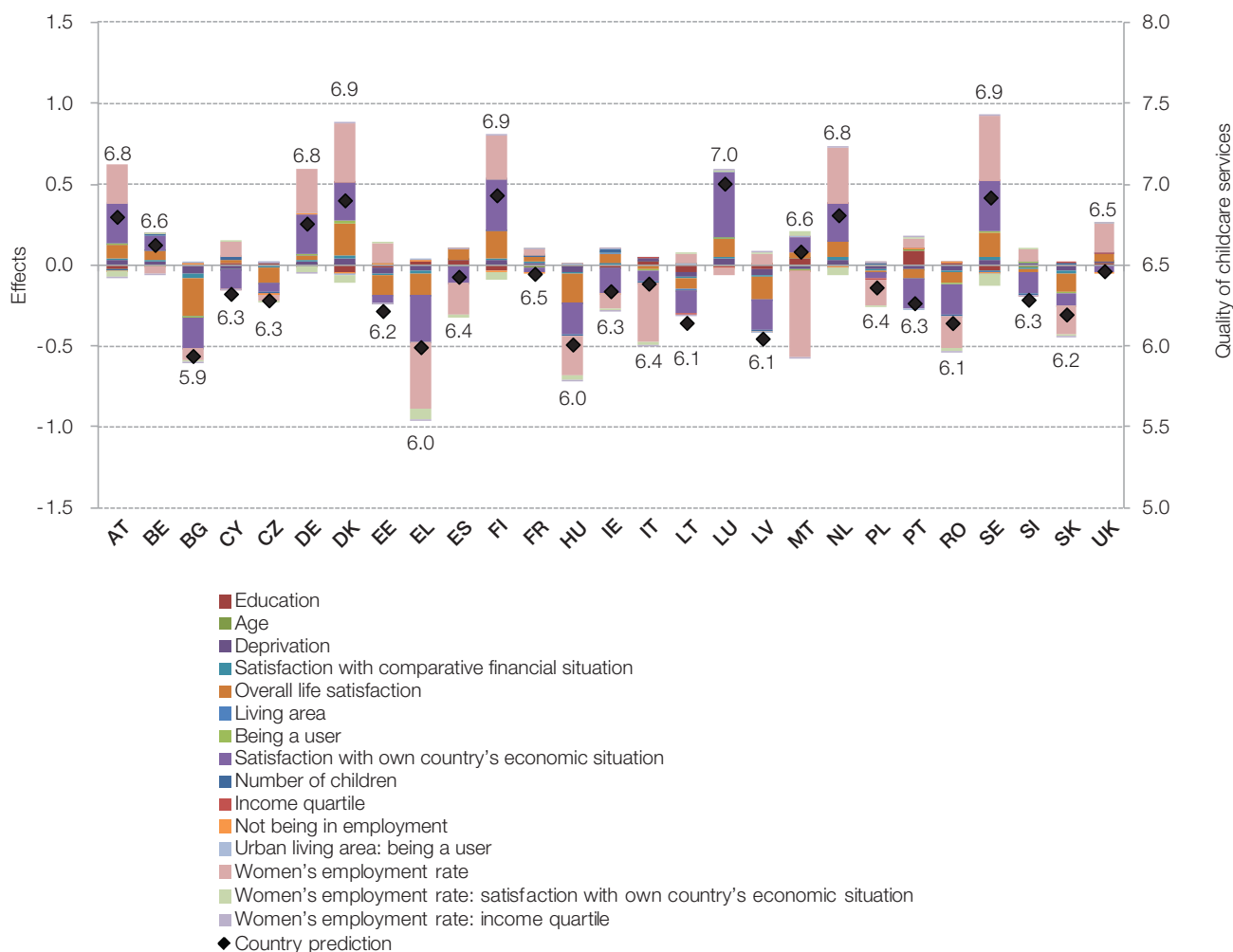
Notes: *Country deviation in perceived quality of childcare services (Q53d), multilevel model; results equally weighted.*
Source: *EQLS 2011*

For each country, the bars in Figure 15 show the sum of deviations in all factors while the overall perceived quality of childcare services as estimated by the model is marked by black diamonds (6.8 for a person in Austria or 5.9 for someone in Bulgaria).

In the Austrian case, most factors have an influence higher than the EU average: the bar is mostly above the x-axis. In Bulgaria, all factors have less of an effect than the EU average and thus the bar lies below the x-axis. Women's employment rate, satisfaction with the economic situation of one's own country and overall life satisfaction are the factors with the largest (positive or negative) impact in most countries.

Long-term care services

Like childcare, long-term care is an important service in connection with longer life spans, population ageing and the increased labour market activity of women. EU collaboration on long-term care in the Social Protection Committee is based on a set of common objectives on 'access for all to financially sustainable, high-quality long-term care' (European Commission, 2013c, p. 4).

As part of its social investment objectives, the European Commission intends to confront the need for long-term care through the promotion of 'preventive measures of healthy and

active ageing' and increasing the potential for independent living among older people as 'ways of closing the gap between long-term care needs and provision' (European Commission, 2013c, p. 26). Otherwise, long-term care is the responsibility of the Member State.

Based on EQLS 2011, this analysis investigates access, use and the perceived quality of long-term care services in Europe. With only 12.6% being users, the detailed country analysis of use and access has to be interpreted with care.

Access to and perceived quality of long-term care services

Country proportions of long-term care users in 2011 varied between more than 20% and less than 5%. They were highest in France (20.9%), Finland (18.5%), Belgium (18.3%) and Denmark (17.9%) and lowest in Latvia (5.1%), Romania (4.5%) and Slovakia (4.4%). There were too few respondents to obtain results in Bulgaria and Cyprus.

The composition of the overall long-term care user group indicates a certain selectivity bias in overall findings. Users of long-term care in 2011 were not evenly distributed throughout the EU. The largest proportion of users came from France, Germany and the UK who in total accounted for 30% of all users, while the five countries with the fewest users (Cyprus, Bulgaria, Slovakia, Latvia and Lithuania) accounted for only 5%. Overall findings will thus be dominated by the situation in those countries with the largest proportion of users (for more detailed information, see the Annex).

Access to long-term care was deemed to be easiest in Denmark (1.62), the Netherlands (1.47) Belgium (1.40), Finland (1.15) and Sweden (1.13), and deemed to be most difficult in Greece (-1.96), Estonia (-0.92), Slovenia (-0.73), Romania (-0.69) and Slovakia (-0.63). The average EU27 evaluation of access to long-term care was positive (0.39).

The long-term care accessibility index was built in a similar manner to the childcare accessibility index and is based on answers of people reporting that they use such services or know someone close to them who does so. The index is constructed based on Q56.[6]

Overall, more than 20% of users within the EU27 countries report no difficulties in access to long-term care while 4.3% report difficulties for all the above-mentioned factors determining access.

In Europe, there is a strong relationship between access (measured by the long-term care accessibility index) and the perceived quality of long-term care services. Fewer difficulties when using long-term care services are related to higher scores of quality of long-term care services.

The size of the circles in Figure 16 indicates the number of respondents who evaluated the access to long-term care at a certain level. The number in the circle indicates the score these people gave to the overall quality of long-term care. For example, those who report most difficulties with access (with a score of -4), rate the quality of the service as low (3.1), whereas those who do not have difficulties (with a score of +4), evaluate the quality of long-term care much more highly (7.3). Again, users rate quality more highly than non-users.

Determinants of perceived quality of long-term care services

Factors that influence the quality of long-term care as perceived by EU residents are explored to add a user-related view to the usual presentation of total public expenditure and numbers of services supplied. The multilevel model offers policy-relevant information on variables that impact on the perceived quality of long-term care and identifies which factors to watch.

In order to investigate the determinants of perceived quality of long-term care services, this paper uses the multilevel analysis explained in the Annex (Table A5). The model takes into account not only individual but also country-related factors listed in Figure 17 (overleaf).

The dependent variable of this model is the perceived quality of long-term care services (Q53e), which is based on the evaluation of all EQLS respondents.

The results of the multilevel model confirm the need to include both individual and national factors because they can explain more of the variation than national comparisons or comparisons of socioeconomic variables on their own. They show that 10% of the variance of the perceived quality of long-term care services is determined at national level.

Major factors influencing the perceived quality of long-term care services are listed by impact in Figure 17); a complete table of factors (with descriptive statistics) can be found in the Annex.

For an average person living somewhere in an EU27 country, the perceived quality of long-term care services is estimated to be 5.84 (and thus lower than 'overall' public services).

Using the grand mean centring techniques for the explanatory variables, the estimated effect of an explanatory variable increases or decreases the perceived quality of long-term care services. Factors increasing the perceived quality of long-term care services (in order of ascending importance) are age, satisfaction with the relative financial situation of one's household, overall life satisfaction, not being employed, less corruption (measured by the corruption perceptions index, CPI) and satisfaction with the economic situation of one's country.

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[6]   To what extent did each of the following factors make it difficult or not for you or someone close to you to use long-term care services? a. Cost, b. Availability (waiting lists, lack of services), c. Access (because of distance or opening-hours), d. Quality of care.

Figure 16: Long-term care accessibility index and perceived quality
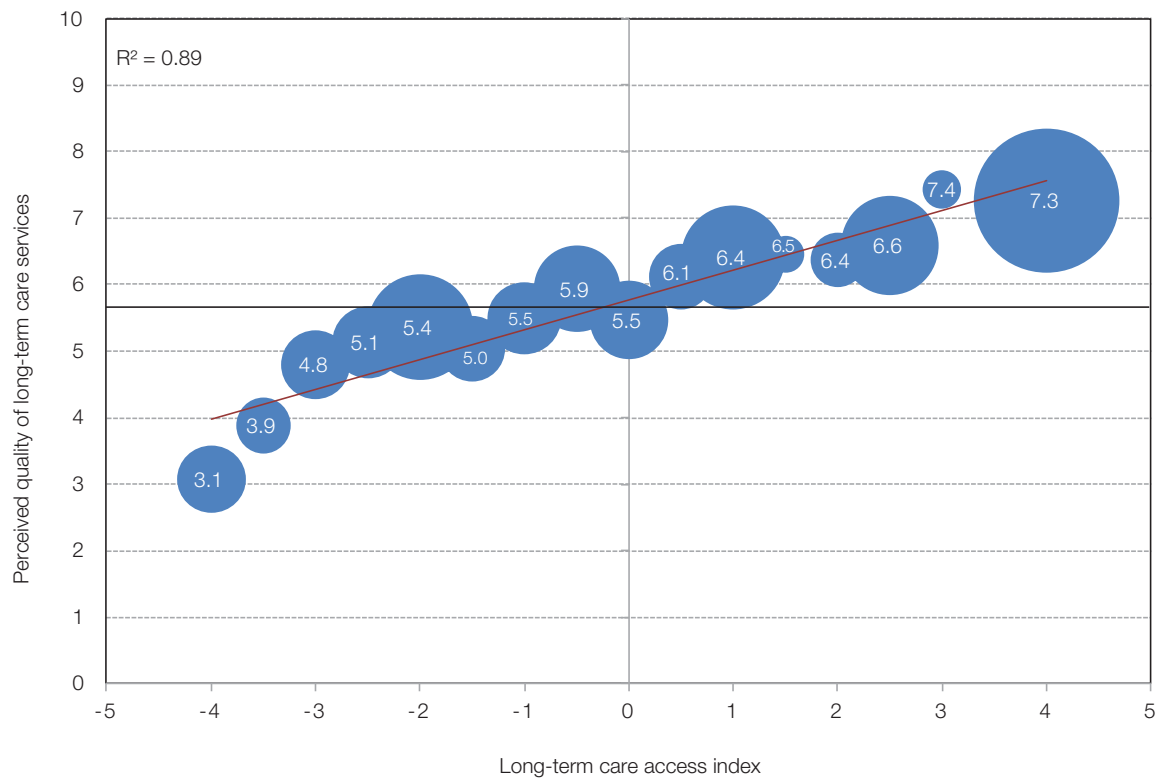
Notes: Q53: In general, how would you rate the quality of each of the following public services in your country? Please tell me on a scale of 1 to 10, where 1 means very poor quality and 10 means very high quality: e. Long-term care services (EU27). Long-term care services accessibility index based on definition in the Annex. Source: EQLS 2011

This means that, for example, a one-point change in satisfaction with the economic situation of one's country increases the perceived quality of long-term care services from 5.84 to 6.0. This means that people rating the economic situation of their own country more highly also perceive higher quality in long-term care services. Being older is associated with rating the quality of services as higher. The higher the overall level of satisfaction of a person is, the higher is their rating of the quality of long-term care services. Not being employed increases the rating of perceived quality of care services. In countries with a higher CPI (or less perceived corruption), the perceived quality of long-term care services is higher. The better the satisfaction with the relative financial situation of one's household, the higher the perceived quality of long-term care services is rated.

Factors decreasing the perceived quality of long-term care services (in order of declining importance) are deprivation, difficulties in making ends meet, living in an urban area, and the interaction of age and living in an urban area.

This means that, for example, a one-point increase in difficulty in making ends meet decreases the perceived quality of long-term care services from 5.84 to 5.7. The more difficulties a person experiences in making ends meet, the lower the perceived quality of long-term care services.

As in childcare, it can be seen that being deprived and being in a higher income quartile decreases the perceived quality of long-term care. Although this seems contradictory at first, the explanation may be straightforward. Being deprived – although generally related to income – is something even the better-off might feel in relation to their peers if they cannot attain the same standard of living. With many people in the upper income quartiles in the EU12 countries sharing this feeling, deprivation is no longer linked to lower income but exists regardless of household finances. The poorer perception of the quality of long-term care may be explained by the feeling of not having sufficient means or bargaining power to obtain a fair share of good services.

For people in higher income quartiles, the perception of a poorer quality of long-term care may be explained by initially high expectations of what should be available, followed by a feeling of disappointment if such expectations are not fulfilled. Again, those in higher income quartiles are more frequent users and as such also more critical of the services on offer.

Figure 17: Determinants of perceived quality of long-term care services, by multilevel model

Value	Determinant
5.67	Effect of deprivation
5.71	Effect of difficulty in making ends meet
5.71	Effect of urban living area
5.74	Effect of income quartile
5.75	Effect of being female
5.76	Effect of education
5.77	Effect of user
5.79	Interaction – urban living area: age
5.82	Cross-level interaction – CPI: satisfaction with own country's economic situation
5.84	Person living in EU27
5.84	Effect of age
5.87	Effect of satisfaction with comparative financial situation
5.95	Effect of overall life satisfaction
5.97	Effect of not being in employment
5.99	Effect of CPI
6.04	Effect of satisfaction with own country's economic situation

Scale: 5.00   5.50   6.00   6.50   7.00

Notes: *Perceived quality of long-term care based on Q53e (see the Annex); dark blue bars indicate significance at the 5% level; light blue bars, at the 10% level. Source: EQLS 2011*

The same applies to those with a higher level of education: the more highly educated people are, the worse they perceive the quality of long-term care services to be. Living in an urban area also decreases the perceived quality of long-term care services, which might be explained by access being more difficult than expected and less provision of high-quality long-term care. Bottlenecks in the supply of affordable care might also play a role.

Most interestingly, the individual assessment of economic satisfaction with one's country is the strongest positive factor influencing the perceived quality of long-term care services, more influential than individual overall life satisfaction.

There is an interesting interaction at the individual level. While being older increases the perceived quality of long-term care services and living in an urban area reduces it, being older and living an urban area moderates the negative effect of living in an urban area.

Attention should be given to the cross-level interaction effect combining individual assessment of satisfaction with the economic situation of one's own country and the CPI. Although a high CPI and satisfaction with the economic situation of one's own country separately increase the perceived quality of long-term care services, the combination of these factors

Figure 18: Deviation in perceived quality of long-term care from overall European effects, by country
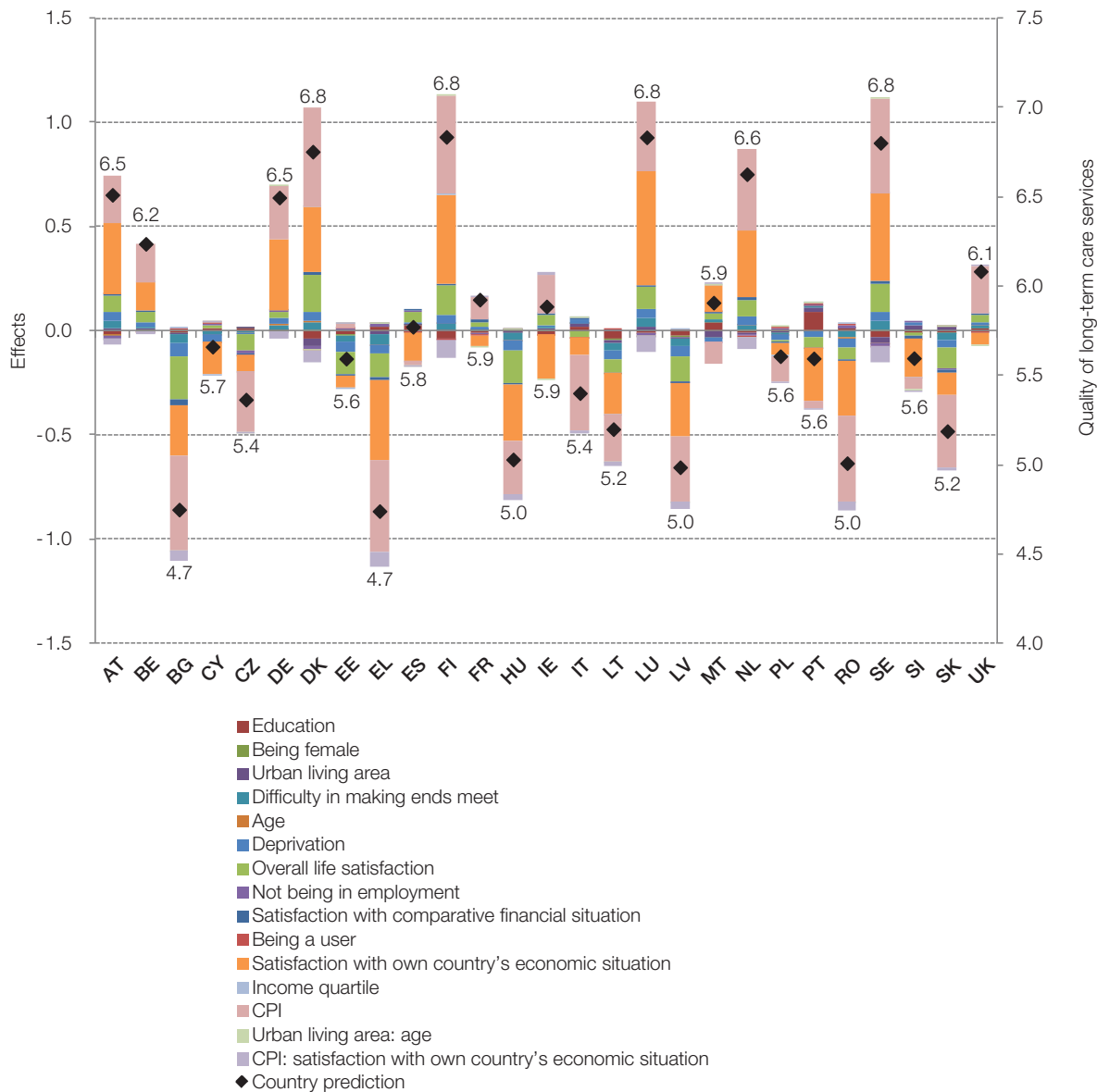
Notes: Country deviation in perceived quality of long-term care services, Q53: In general, how would you rate the quality of each of the following public services in your country? Please tell me on a scale of 1 to 10, where 1 means very poor quality and 10 means very high quality (e. Long-term care services); multilevel model, by country; results equally weighted.

causes a reduction of perceived quality of long-term care services. The CPI moderates the individual assessment of satisfaction with the economic situation of one's own country: for a person living in a country with a higher CPI and perceiving a high satisfaction with the economic situation of their own country, the perceived quality of long-term care services decreases, meaning that people's expectations are not met.

It is possible to repeat this analysis at country level to see how country effects relate to effects for all Europeans. Country

predictions based on the multilevel model are shown in Figure 18 presenting country deviations from the EU overall level. Country deviations represent the quality of long-term care perceived by an average person living in a specific EU country in relation to the rating given by the average European citizen, of 5.837.

Although the effects of the factors discussed do in principle impact in the same direction (a greater satisfaction in any of the factors – with financial situation, for instance, or life satisfaction

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– increases the perceived quality of long-term care services), deviations shown can either be positive (if the country effect of a factor is larger than the overall EU effect of this factor) or negative (if the country effect is smaller than the overall EU effect).

For each country, the bars in Figure 18 thus present the sum of deviations in all factors while the overall perceived quality of public services as estimated by the model is marked by black diamonds and bold numbers (for instance, 6.5 for a person in Austria or 4.7 for someone in Bulgaria).

In the Austrian case, most factors have an influence greater than the EU average; the bar is mostly above the x-axis. In Bulgaria, all factors have less of an effect than the EU average and so the bar lies below the x-axis. The CPI, satisfaction with the economic situation of one's own country and overall life satisfaction are the factors with the largest (positive or negative) impact in most countries.

Health services

As pointed out in the EQLS 2011 overview report, access to healthcare and its quality are important topics in the EU political debate (Eurofound, 2012a). The recently published Commission staff document *Investing in health*, one of the documents related to the 2013 Social Investment Package, says that ensuring 'access to quality healthcare is a constituent part of the maintenance of a productive workforce' and in improving the general health status of the population (European Commission, 2013d, p. 12).

The document points out that health inequalities originate from 'barriers in access to healthcare, which is often worse for disadvantaged groups/people in vulnerable situations and in less wealthy Member States' as well as their poorer diets, housing, living and working conditions, and higher levels of health-damaging behaviour. It cites the Annual Growth Survey 2013, which states that providing broad access to affordable, high-quality health services should counter the effects of the

crisis and contribute to the Europe 2020 target of enhancing social inclusion and preventing poverty (European Commission, 2013d, pp. 17, 18).

Asked if, on the last occasion they needed to see a doctor or medical specialist, distance, delays in appointments, waiting time or cost of seeing a doctor made it difficult to do so (Q47), respondents in the EU reported fewer difficulties in access to health services than previously.

Between 2007 and 2011, people in all European countries were in general quite satisfied with access to health services and experienced slight improvements in terms of access in all relevant categories especially in terms of waiting time (Figure 19). In 2011, access to health services in Europe was rated as quite good, amounting to a mean value of between 2.5 and 2.7 on a scale of 3 (Table 2). Three out of four Europeans reported no difficulties in terms of distance, finding time because of work and cost of seeing a doctor; six out of 10 had no difficulty with delays in getting appointments and waiting time.

Improvements at the level of the EU average seem, however, to hide a slight deterioration of accessibility in some countries (Greece, Malta, Estonia and Slovakia): this might need watching. National-level deterioration in access to health services may result from the economic crisis, which has aggravated factors provoking income-related health inequalities in access to health care and health status (European Commission, 2013d, pp. 17–18). Higher demand due to crisis-related stress symptoms and the fact that funds have been cut (resulting in the provision of more limited or lower quality services) may have played a role too, as might increasing demand on services due to an ageing population. In addition, changing work patterns may also make it inconvenient for people to go to those health services that are available only in working hours, as might the high cost of such services.

In order to investigate the overall effect of access issues and to map changes from 2007 to 2011, Rose's index of access to health services was reproduced (Eurofound, 2010b). Since 'finding time' is a new subquestion, it could not be included in the analysis.

Table 2: Access to health services

	Mean	Standard deviation	Very difficult %	A little difficult %	No difficulty %
Distance	2.7	0.5	5	17	78
Delay	2.5	0.7	13	26	61
Waiting time	2.5	0.7	11	31	58
Cost	2.6	0.7	9	21	70
Finding time because of work or care	2.7	0.6	7	20	73

Notes: Q47: On the last occasion you needed to see a doctor or medical specialist, to what extent did each of the following factors make it difficult or not for you to do so? a. Distance to doctor's office/hospital/medical centre, b. Delay in getting appointment, c. Waiting time to see doctor on day of appointment, d. Cost of seeing the doctor, e. Finding time because of work, care for children or for others: 1 very difficult, 2 a little difficult, 3 not difficult at all. ('Not applicable' and 'Don't know' responses are excluded).
Source: EQLS 2011

Figure 19: Access to health services, change 2007–2011 (percentage points)
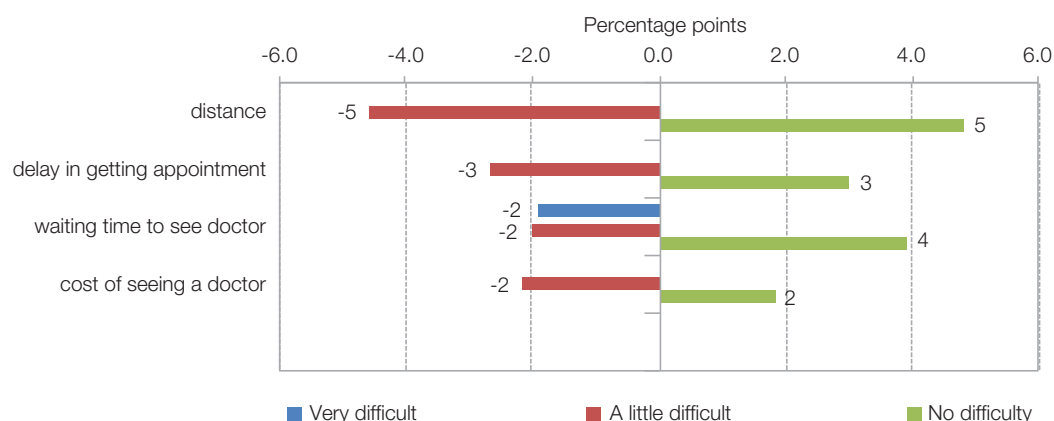
Notes: Q47: On the last occasion you needed to see a doctor or medical specialist, to what extent did each of the following factors make it difficult or not for you.

The health services accessibility index maps the countries' relative positions in relation to the EU27 average in 2011 and changes in access to healthcare between 2007 and 2011. Figure 20 (overleaf) shows country differences in access to healthcare. Four blocks can be identified bounded by the x- and y-axis. Countries above the EU27 average are on the right hand side of the quadrangle in Figure 20; those with increasing access to health services appear in the upper part of the chart.

With the exception of Greece and Italy, most countries group around the centre of the plane, indicating that neither their 2011 values nor their developments vary greatly.

The upper-right block (quadrant I) comprises countries with scores above the EU27 average in 2011 and increases over time – representing the leading countries in terms of overall access to health services. This applies to Austria, Belgium, Germany, Spain, Latvia, Luxembourg and Sweden. Despite the crisis, people in these countries experienced an improvement in access to health services. Denmark, Finland, Ireland and the Netherlands figure in quadrant I but are on the border with quadrant IV.

The lower-right block (quadrant IV) includes countries with scores above the EU27 average in 2011 but decreasing values from 2007 to 2011. This applies to a certain extent to the UK and France, although they are also quite close to quadrant I.

The upper-left block (quadrant II) includes countries with scores below the EU27 average in 2011 but with increasing scores from 2007 to 2011, indicating a possible catching-up process. This applies to Bulgaria, the Czech Republic, Hungary, Italy, Lithuania, Portugal, Romania and Slovenia. With the exception of Italy, all countries are fairly close to the centre of the plane, indicating average access and only a minor improvement in access over time.

The lower-left block (quadrant III) includes countries with a score for 2011 below the EU27 average and decreasing country scores,

representing countries falling behind other Member States. This applies to Cyprus, Estonia, Malta, Poland, Slovakia, and especially Greece, which was badly hit by the economic crisis.

To summarise, analysis of the index reveals that Greece currently fares worst of all EU countries, with a decreasing country score in the health services accessibility index and below-EU27 average values in 2011. Although hit by the economic crisis, Italy, Portugal and Spain score better than they did in 2007. While Italy and Portugal still rank below the EU27 average in 2011, perceived accessibility of healthcare in Spain is among the best in the EU.

Access, perceived quality of health services and health status

How does self-reported health correspond to the perceived ease or difficulty of access and the perceived quality of health services? If comparing access and quality, how do difficulties in access relate to the quality perceived by EU citizens?

To answer these questions, and in addition to the above reconstruction of Rose's index of access to health services (Eurofound, 2010b), a new index was constructed. It relies on the same question (Q47) but is built in a different way and includes a new item: finding time to see a doctor because of work or care for children or others. The new health services accessibility index thus combines distance, delays in appointments, waiting time, cost of seeing a doctor and finding time. It ranges between -5 and +5, depending on the number of difficulties (or their absence).

Europeans in all countries rate their health as quite good, with a EU27 value of 3.7 (on a scale between 1 and 5). However, the perceived quality of healthcare services and access are found to vary greatly between countries.

Figure 20: Health services accessibility index
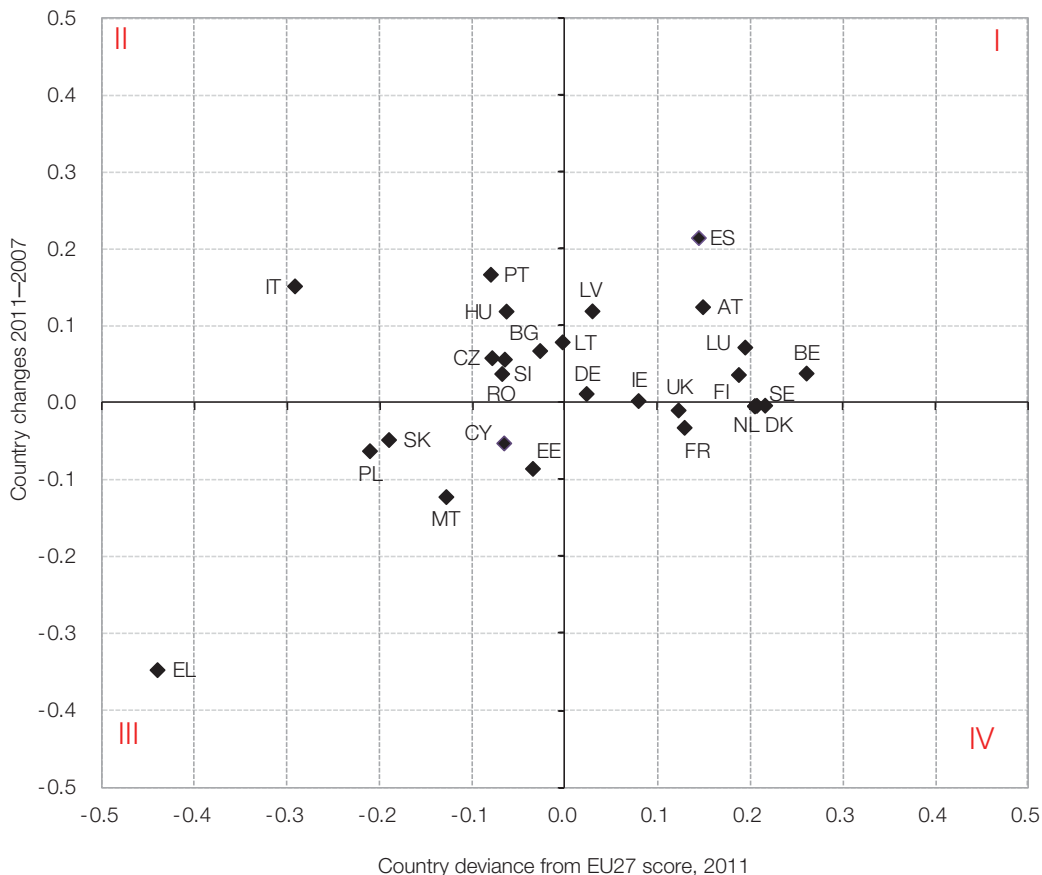
Notes: Health services accessibility index (see Annex), based on Q47 (for question wording, see note to Table 2).

Figure 21 ranks countries by accessibility, those with the best accessibility (Sweden, Finland and Denmark) being on the left. Austria and Belgium have the highest perceived quality of health services, combined with relative ease of access and good self-reported health.

Countries with many difficulties and thus very low scores for accessibility are Greece, Italy and Poland. Interestingly, Greece (together with Ireland and Cyprus) has the best self-reported health. Italy, despite scoring extremely poorly in terms of accessibility, still reports moderate levels of perceived quality of health services. Ireland, although low in terms of perceived quality, attains high self-reported health status and relatively high levels of accessibility.

Work–life balance and the economic crisis

Work–life balance-related issues (such as finding time to see a doctor or family-friendly working conditions) can also play a role in perceived access to health services. And in recent years, crisis-related job insecurity has also become an issue.

Asked whether when needing to see a doctor or medical specialist, not finding time due to work or care responsibilities was an issue, three out of four respondents (73%) said no. One-fifth found it a little difficult, while only 7% reported substantial difficulties in finding time.

Interestingly, time restrictions in access to health services vary with sociodemographic characteristics. Figure 22 (overleaf) shows difficulties in access to health services as related to work and family needs. On a scale from 1 to 3, higher values indicate lower difficulties. Although differences are not strikingly large, they do exist and are highly significant. Not surprisingly, whether individuals are in employment or not has the strongest effect, with those not in employment finding it much easier to balance healthcare needs and other obligations. Women find it more difficult to find time to see a doctor because of work or care obligations than men, while it is easier for older people, people with low incomes and the less educated.

Crisis-related factors can play a role too. If people feel, for instance, that it is very likely that they might lose their job within the next six months, they may be less likely to risk their jobs

Figure 21: Health services accessibility index, perceived quality and health status
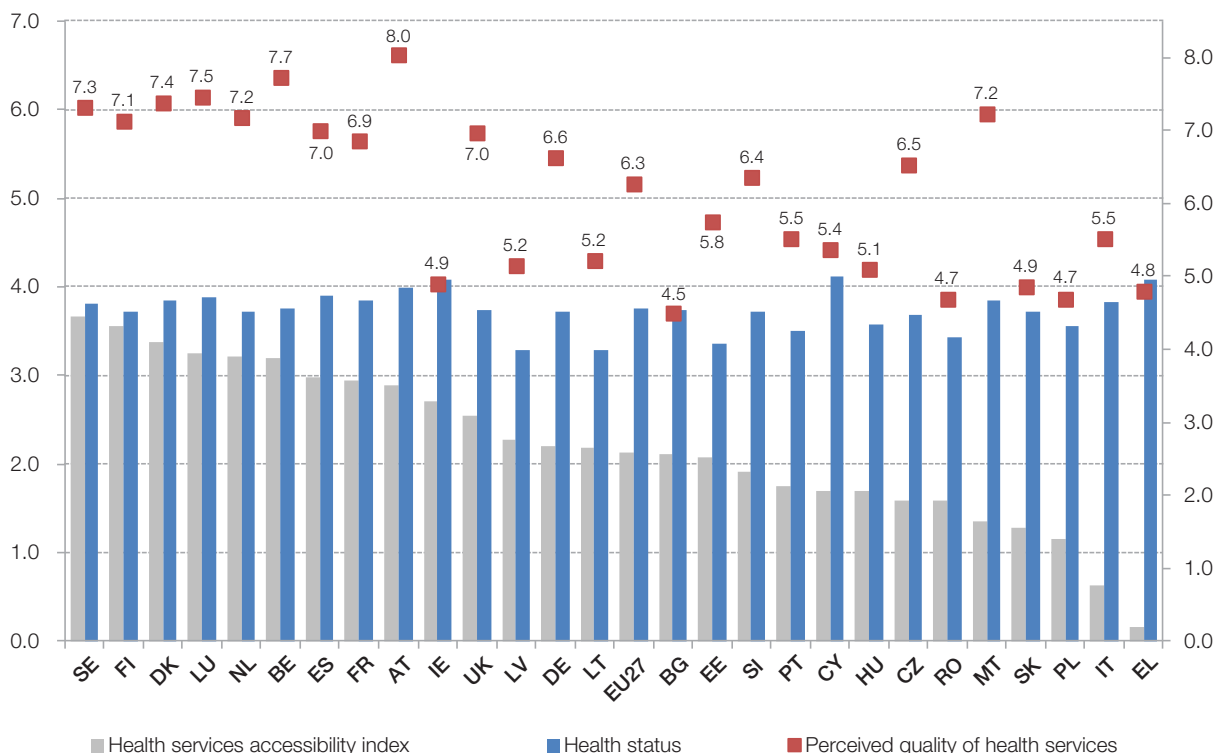
Notes: *(New) health services accessibility index based on Q47 (see the Annex).*
Health status based on Q42: In general, would you say your health is 1. Very good; 2. Good; 3. Fair; 4. Bad; 5. Very bad. Order of categories was reversed, hence: 1. Very bad; 2. Bad; 3. Fair; 4. Good; 5. Very good. Quality of health services based on Q53: In general, how would you rate the quality of each of the following public services in your country? Please tell me on a scale of 1 one to 10, where 1 means very poor quality and 10 means very high quality: a. health services. All indicators: average scores, by country.

by taking time off to access health services (Figure 23). Family-friendly working conditions can mediate between private needs and work obligations. People for whom working hours fit at least 'quite well' with family and other social commitments rate access to health services as significantly better than people for whom working hours do not fit well.

However, this should also perhaps be seen as a message to operators of public services to make opening hours more flexible to fit with current working patterns. Access hours tend to reflect outdated concepts of working time and family composition (women at home with children and available to go to health appointments) rather than the 24/7 economy in which women increasingly work outside the home, often full time.

Determinants of perceived quality of health services

Factors that influence the quality of health services as perceived by EU residents add a user-related view to the usual presentation of total public expenditure and numbers of services supplied. The multilevel model offers policy-relevant information on variables that impact on the perceived quality of health services and on which factors to watch.

In order to investigate the determinants of perceived quality of health services, this report uses multilevel analysis with grand mean centring (Hox, 2010). The model takes into account both individual and country-related factors (listed in Figure 24, overleaf).

The dependent variable of this model is the perceived quality of health services (Q53a), which is based on the evaluation of all EQLS respondents.

The results of the multilevel model confirm the need to include both individual and national factors because they can explain more of the variation than national comparisons or comparisons of socioeconomic variables can on their own. Since the variance of the individual residual error is estimated to be 4.07 and the variance of the country-level residual error is estimated to be 1.32, the intra-class correlation equals 0.24. This indicates that 24% of the variance of the perceived quality of health services is determined at national level.

Figure 22: Difficulties in finding time to see doctor because of work, care for children or other factors, by sociodemographic factors
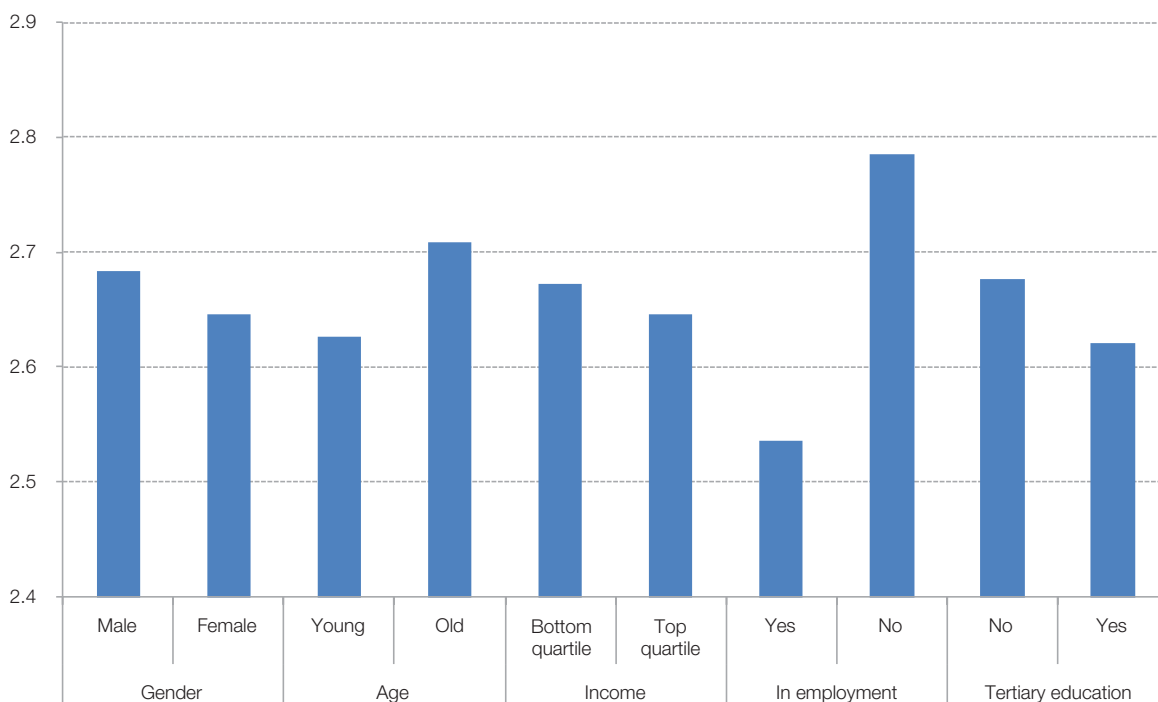
Notes: *Q47 (for question wording, see note to Table 2).*
Source: EQLS 2011

Figure 23: Difficulties in finding time to see doctor because of work, care for children or other factors, by occupational factor
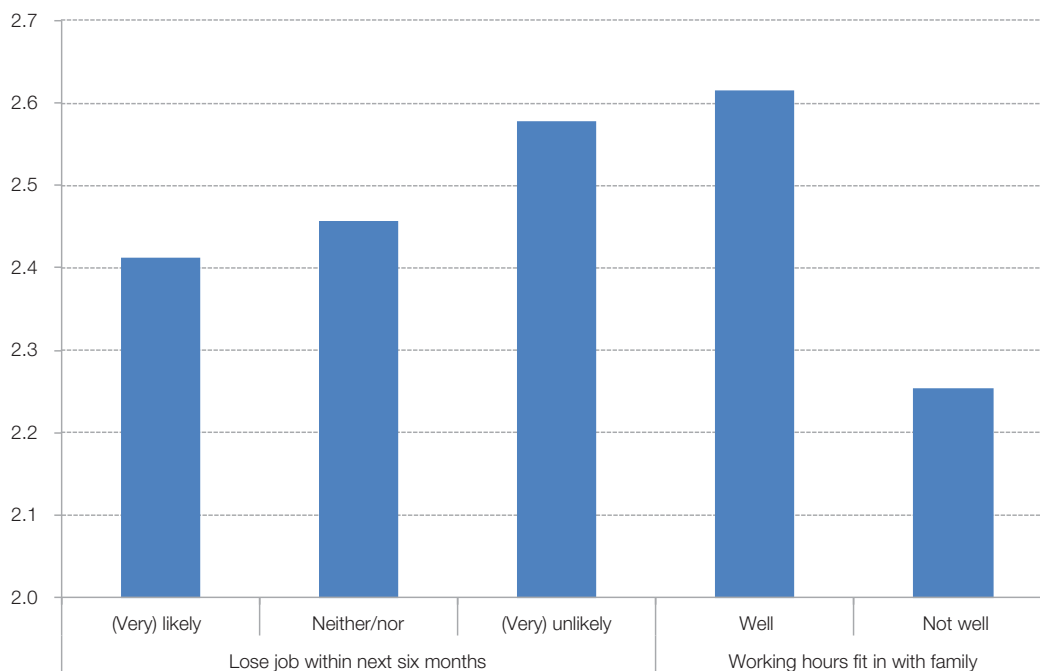
Notes: *Higher values indicate less difficulty; scale ranges from 1 to 3.*
Q47 (for question wording, see note to Table 2)
Q15: How likely or unlikely do you think is it that you might lose your job in the next 6 months? 1. Very likely, 2. Quite likely, 3. Neither likely nor unlikely, 4. Quite unlikely, 5. Very unlikely.
Q11: In general, do your working hours fit in with your family or social commitments outside work very well, quite well, not quite well or not at all well?

Factors influencing the perceived quality of health services are listed by impact in Figure 24; Table A6 in the Annex gives a complete list of factors (with descriptive statistics).

For an average person living in a EU27 country, the perceived quality of health services is estimated to be 6.32.

Using the grand mean centring techniques for the explanatory variables, the estimated effect of an explanatory variable increases or reduces the perceived quality of health services.

Factors increasing the perceived quality of health services (in order of ascending importance) are the interaction of access to health services index and health status, age, not being in employment, overall life satisfaction, health services accessibility index, government expenditure on health as a percentage of GDP and satisfaction with the economic situation of one's own country.

This means that, for example, a one-point increase in the health services accessibility index (meaning that a person perceives less difficulty in accessing health services) increases the perceived quality of health services from 6.32 to 6.46.

Factors reducing the perceived quality of health services (in order of declining importance) are difficulty in making ends meet, being female, one's income quartile, one's health status and the cross-level interaction of both government expenditure on health and health services accessibility index. Having chronic health problems has a lesser but still significant effect. This means that, for example, a one-point decrease in health status lowers the perceived quality of health services from 6.32 to 6.27.

Most interestingly, the individual assessment of the economic satisfaction with one's country is the strongest positive factor influencing the perceived quality of health services, followed

Figure 24: Determinants of perceived quality of health services, by multilevel model
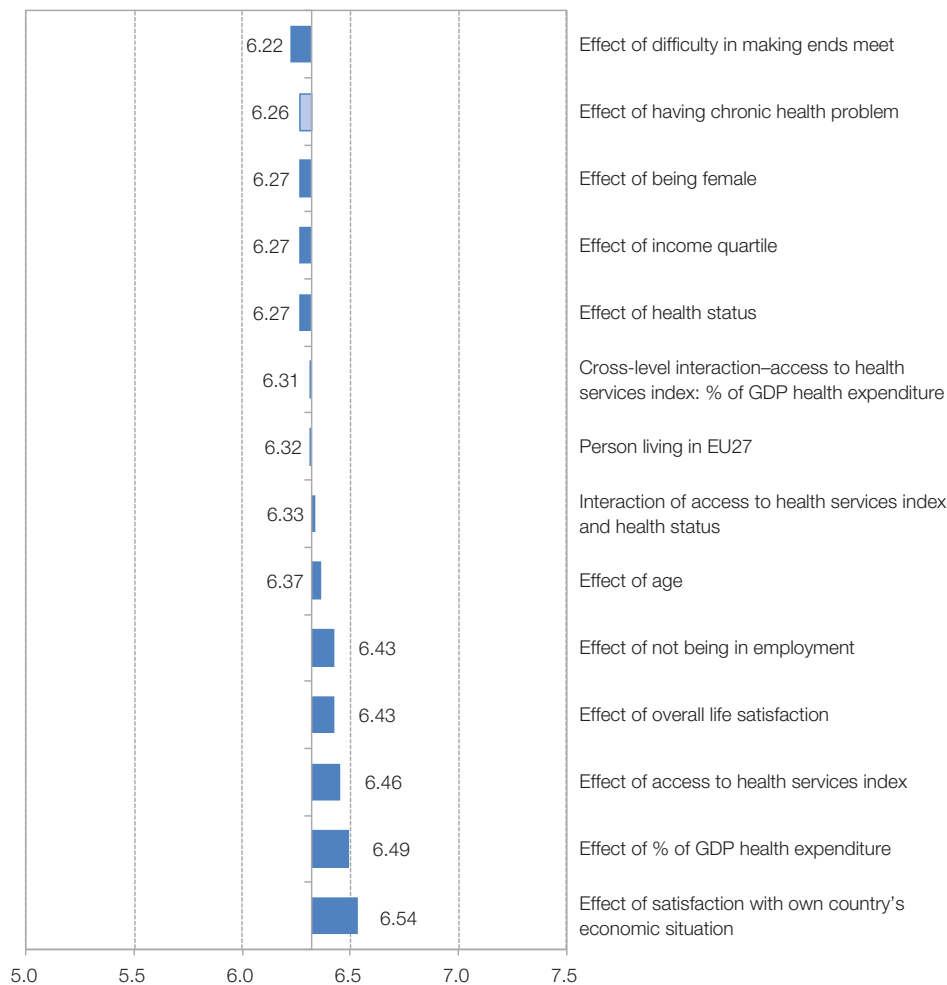
Value	Factor
6.22	Effect of difficulty in making ends meet
6.26	Effect of having chronic health problem
6.27	Effect of being female
6.27	Effect of income quartile
6.27	Effect of health status
6.31	Cross-level interaction–access to health services index: % of GDP health expenditure
6.32	Person living in EU27
6.33	Interaction of access to health services index and health status
6.37	Effect of age
6.43	Effect of not being in employment
6.43	Effect of overall life satisfaction
6.46	Effect of access to health services index
6.49	Effect of % of GDP health expenditure
6.54	Effect of satisfaction with own country's economic situation

Notes: Perceived quality of health services based on Q53: In general, how would you rate the quality of each of the following public services in your country? Please tell me on a scale of 1 one to 10, where 1 means very poor quality and 10 means very high quality: (a. Health services); dark blue bars indicate significance at the 5% level; light blue bars indicate significance at the 10% level.
Source: EQLS 2011, Eurostat

by government expenditure on health as a percentage of GDP and the health services accessibility index.

Attention should be given to the cross-level interaction effect combining the individual health services accessibility index and government expenditure on health. Although, when modelled separately, government expenditure on health and access to health services are factors that increase the perceived quality of health services, the combination of both factors causes a reduction in perceived quality of health services. It seems that government expenditure on health moderates the effect of the health services accessibility index. For a person living in a country with a high proportion of government expenditure on health and perceiving little difficulty when accessing health services, the perceived quality of health services decreases, indicating that people's expectation of what should be provided in their country is not fulfilled.

There is an interesting interaction at the individual level. While perceiving fewer difficulties when accessing health services increases the perceived quality of health services, and evaluating one's health status as worse decreases it, reporting a rather bad health status moderates the positive effect of the access to health services index.

It is possible to repeat this analysis at country level to see how country effects relate to effects found for all Europeans. Country predictions based on the multilevel model are shown in Figure 25, where country deviations from the overall EU level are presented. Country deviations represent the quality of health services perceived by an average person living in a specific EU country in relation to the quality perceived by the average European – 6.32.

Although the effects of the factors do in principle impact in the same direction (greater satisfaction in any one of the factors increases the perceived quality of health services), deviations can either be positive (if the country effect of a factor is larger than the overall EU effect of this factor) or negative (if the country effect is smaller than the overall EU effect).

For each country, the bars thus present the sum of deviations in all factors while the overall perceived quality of health services as estimated by the model is marked by black diamonds (for instance, 7.1 for someone in Austria or 5.5 for a person in Bulgaria).

In the Austrian case, most factors have an influence greater than the EU average: hence, the bar is mostly above the x-axis. In Bulgaria, all factors have less of an influence than the EU average effect and so the bar lies below the x-axis. Government expenditure on health, satisfaction with the economic situation of one's own country and the health services accessibility index are the factors with the largest (positive or negative) impact in most countries.

Figure 25: Deviation in perceived quality of health services compared with overall European effects, by country

Notes: Country deviation in perceived quality of health services (Q53a – for question wording see note to Figure 24), multilevel model, by country; results equally weighted.
Source: EQLS 2011, Eurostat

Key points

Total general government expenditure is positively (though not strongly) related to the perceived quality of public services in a country, which in addition strongly and positively correlates with the intensity of use and perceived accessibility of services. A relationship also exists between perceived quality of and access to public services and measures of inequality.

Factors that increase the perceived quality of public services are satisfaction with the economic situation of one's country, not being in employment and overall life satisfaction; not being able to make ends meet and relative deprivation reduce perceived quality.

Access to childcare and the employment rate of women are strongly related, although the direction of the effect is unclear. Major factors increasing the perceived quality of childcare services are satisfaction with the economic situation of one's country, overall life satisfaction, satisfaction with the financial situation of one's household and number of children. Factors decreasing perceived quality are being an urban user and experiencing deprivation. A higher level of education is also a factor.

There is a strong relationship between access to and perceived quality of long-term care. Major factors increasing perceived quality are satisfaction with the economic situation of one's country, a low perceived level of corruption, not being employed and overall life satisfaction. Deprivation, not being able to make ends meet and living in an urban area reduce perceived quality.

Although Europeans in all countries rate their health as quite good, the perceived quality of health services and access varies. Perceived accessibility has improved somewhat in recent years.

Major factors increasing perceived quality of health services are satisfaction with the economic situation of one's own country, government expenditure on health, and the accessibility of health services (as measured by an accessibility index). Having difficulty making ends meet and being female are the main factors reducing perceived quality; having chronic health problems is also a factor.

Working and care responsibilities can play a role in perceived access to health services. Employed people and women find it more difficult to find time to see a doctor because of work or care obligations.

Although budgets have been cut over the course of the economic crisis, in a number of countries , perception of public services has actually improved.

CHAPTER 3

Local neighbourhood

Local neighbourhood

This chapter looks in detail at access to local neighbourhood services and satisfaction with the local neighbourhood, and combines both views while distinguishing between rural and urban settings.

Concerns about the environment and social inclusion for all citizens mean that good access to neighbourhood services and good-quality local neighbourhoods – in terms of environment and safety – have become central issues in the current EU policy debate. Discussions at EU level about public services and a high quality of local neighbourhood services, and the responsibility of government at all levels to maintain clean and safe environments, have focused attention on the fact that quality of life depends on such factors (European Commission, 2010a; 2012b; CEEP, 2010). It is generally agreed that environmental and neighbourhood services strongly impact on people's quality of life (Eurofound, 2009; 2012a; 2010b).

As part of their total expenditure, governments spend money on neighbourhood services, local environment and safety. Specifically these include housing and community amenities, environmental protection, public order and safety, recreation, and cultural and religious activities (for definitions see Eurostat; United Nations, 2013).

Table 3 shows that local neighbourhood-related expenditure ranges between 3.2% and 6.8% of GDP in EU countries. It is highest in Cyprus, the Netherlands and France and lowest in Greece, Denmark and Finland. French total general government expenditure and local neighbourhood budgets are both high, while Denmark dedicates a low proportion of its GDP to local neighbourhoods but the country's total general government expenditure is high. In contrast, Romania and Slovakia have relatively low total general government expenditure, but their spending on local neighbourhoods is moderate to high.

General government expenditure for different subcategories relevant to local neighbourhoods also varies between EU countries (see Table A12 in the Annex).

While the proportion of public spending as a percentage of GDP on housing and local amenities is relatively high in Ireland (1.8%), France (2%) and Cyprus (2.8%), it is 0.3% or less in Malta, Lithuania and Greece. Spending on environmental protection is around 2% of GDP in Malta and in the Netherlands while it is only 0.3% in Cyprus, Sweden and Finland. Expenditure on public order and safety is 2.6% or more in Slovakia, the UK and Bulgaria and below 1.5% in Sweden, Denmark and Luxembourg. Government expenditure on recreation, culture and religion amounts to more than 2% of GDP in Estonia and Slovenia, while it is 0.7% or less in Ireland and Greece.

The EQLS 2011 defines local neighbourhood services as postal services, banking services, public transport facilities, cinemas, theatres or cultural centres, recreational or green areas (Eurofound, 2012b, Q51). It offers some new insights into access to such services. In addition, the data set includes information on people's satisfaction with the local neighbourhood in general, which comprises environmental and local safety issues such as noise, air pollution, quality of drinking water, crime, violence or vandalism, litter or rubbish on the street and traffic congestion in the immediate vicinity (Eurofound, 2012b, Q50).

By combining access to services and satisfaction with neighbourhood conditions, it is possible to map the situation in local neighbourhoods in Europe, to show EU-wide patterns and outliers and group countries in terms of the relative quality of their local neighbourhoods.

For this purpose, two indexes were constructed. Various neighbourhood services were combined into a 'neighbourhood services accessibility index', while local environmental framework conditions were combined into a 'satisfaction with local neighbourhood index'. For reasons of comparability, both were standardised (to values between +/-1) when related to each other.

Access to local neighbourhood services

The newly constructed access to neighbourhood services accessibility index combines the respondents' evaluation of access to local services such as postal services, banking services, public transport facilities, cinema, theatre or

Table 3: Total government expenditure and local neighbourhood expenditure, by country (%)

	Total	Selected services*
AT	52.5	3.7
BE	52.9	4.0
BG	38.0	5.2
CY	46.4	6.8
CZ	44.1	5.3
DE	47.9	3.8
DK	57.8	3.5
EE	40.6	4.6
EL	50.2	3.2
ES	45.6	5.7
FI	55.5	3.5
FR	56.6	6.3
HU	49.5	4.7
IE	66.6	5.5
IT	50.4	4.4
LT	40.9	4.6
LU	42.5	4.6
LV	44.4	5.7
MT	43.2	4.6
NL	51.2	6.4
PL	45.4	4.9
PT	51.4	5.0
RO	40.2	5.5
SE	52.3	3.6
SI	50.1	5.5
SK	40.1	5.7
UK	50.3	6.0
EU27	50.6	5.0

Notes: Total general government expenditure, % of GDP, 2010.
* selected services related to local neighbourhood include general government expenditure on housing and community amenities, environmental protection, public order and safety, recreation, culture, religion; provisional data: BG, EL, HU, EU27.
Source: Eurostat, extraction: 5 February 2013 (expenditure by function).

cultural centre and recreational or green areas in their immediate neighbourhood into a single numerical value. The index contains five items. Each can have a minimum score of -2 for very difficult access, or a maximum of +2 for very good accessibility. Hence, the index values range between -10 and +10, according to ease or difficulty of access. Higher values indicate less difficulty and thus better access to services, while lower values reflect problems with availability or access. For further details about the construction of the index, see the Annex.

Based on these criteria, respondents in all EU27 countries rate the overall accessibility of their local neighbourhood services as positive and at an average level of 4.0 (Figure 26). In general, and with no overall negative values of country scoring, access to local neighbourhood services is thus regarded as 'quite good'. The best countries in terms of accessibility are Sweden (5.3), Luxembourg (5.1) and Denmark (5.0), while countries with the lowest scores or reported levels of ease of access are Portugal and Malta (both 2.5) and Greece (2.6).

From a country perspective, and as discussed in the overview report (Eurofound, 2012a, pp. 102–103), perceptions of accessibility of individual neighbourhood services vary from country to country. People in Spain and Portugal, followed by the Czech Republic and Malta, reported the greatest overall difficulty in accessing services (Figure 27). By contrast, people in the Nordic countries (Sweden, Finland and Denmark) and Luxembourg reported a low level of difficulty, as did those in Bulgaria, Lithuania and Cyprus. At first sight this is a little surprising. Obviously, the reported ease or difficulty of access is strongly related to expectations and how the 'supply' of services has changed in relation to the past. Higher expectations may result in greater reported difficulty, especially if people feel that cutbacks have limited services. Lower expectations and recent improvements, on the other hand, may result in greater satisfaction with the availability of services and thus less reported difficulty in access.

In Italy, Belgium and France, nearly a quarter of respondents report difficulties with access to postal services (Figure 27). Access is rated to be least difficult in Bulgaria, Ireland and Lithuania, with difficulties reported by fewer than 10% of respondents. Access to banking services is rated as most difficult in Greece (30%), the Czech Republic (26%) and the Netherlands (24%), and felt to cause least difficulty in Lithuania (10%), Cyprus (9%) and Spain (7%). Difficulties with access to public transport were reported to be very high in Malta (46%) but also high in Portugal, Greece and Ireland where nearly

Figure 26: Neighbourhood services accessibility index
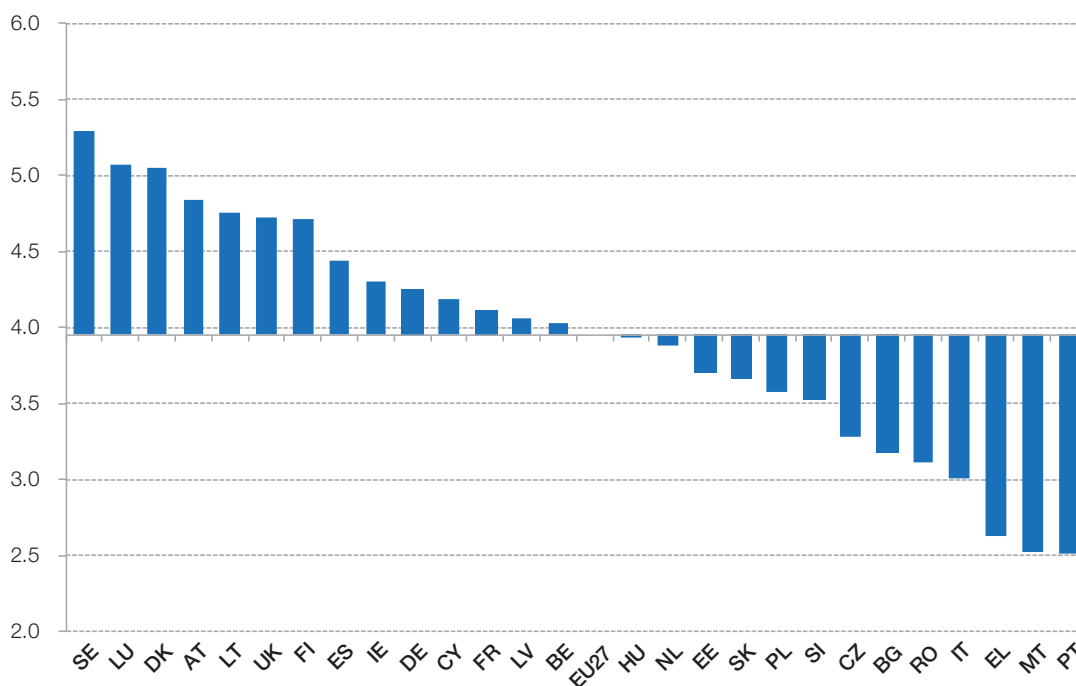
Notes: Q51: Thinking of physical access, distance, opening hours and the like, how would you describe your access to the following services? Can you access a. Postal services, b. Banking services, c. Public transport facilities, bus, metro, tram, train etc., d. Cinema, theatre or cultural centre, e. recreational or green area: 1. With great difficulties; 2. With some difficulties; 3. Easily; 4. Very easily; 5. Service not used;
(see Table A13 in the Annex)

30% of respondents had great difficulty or some difficulty in accessing public transport. In contrast, respondents in Luxembourg and Cyprus (both at 9%) reported the least difficulty. Difficulties in accessing cinema, theatre and cultural activities were highest in Greece (45%), Portugal (45%) and Germany (39%) while least difficult in France (17%), Denmark (15%) and Cyprus (13%). Access to recreational and green areas was rated as most difficult in Greece (24%), Portugal (20%) and Slovakia (17%) and least difficult in the Nordic countries (Sweden, Finland and Denmark – all between 3% and 3.5%).

For Europeans on average, access to cinema, theatre and cultural activities (28%) and public transport facilities (18%) was rated to be more difficult than access to banking or postal services (17%). With only 13% of respondents reporting great

difficulty or some difficulty, access to recreational and green areas was rated as the least difficult service to access.

Across Europe, people living in rural areas report poorer access to neighbourhood services than people living in urban areas. Overall access to neighbourhood services in Europe's urban areas (as measured by the above index) is 1.8 points higher than in rural areas. Reduced access to neighbourhood services in rural areas is most visible in Slovenia, Portugal and Poland while differences are smallest in Italy, Malta and Cyprus. In Slovenia, the difference is more than twice as high as the EU average. In terms of deviation from the EU27 average, there is no obvious pattern to differences, nor any grouping of country clusters.

However, access to neighbourhood services is often related to age. While people in urban areas report greater accessibility

Figure 27: Difficulty in accessing neighbourhood services (summed percentages)
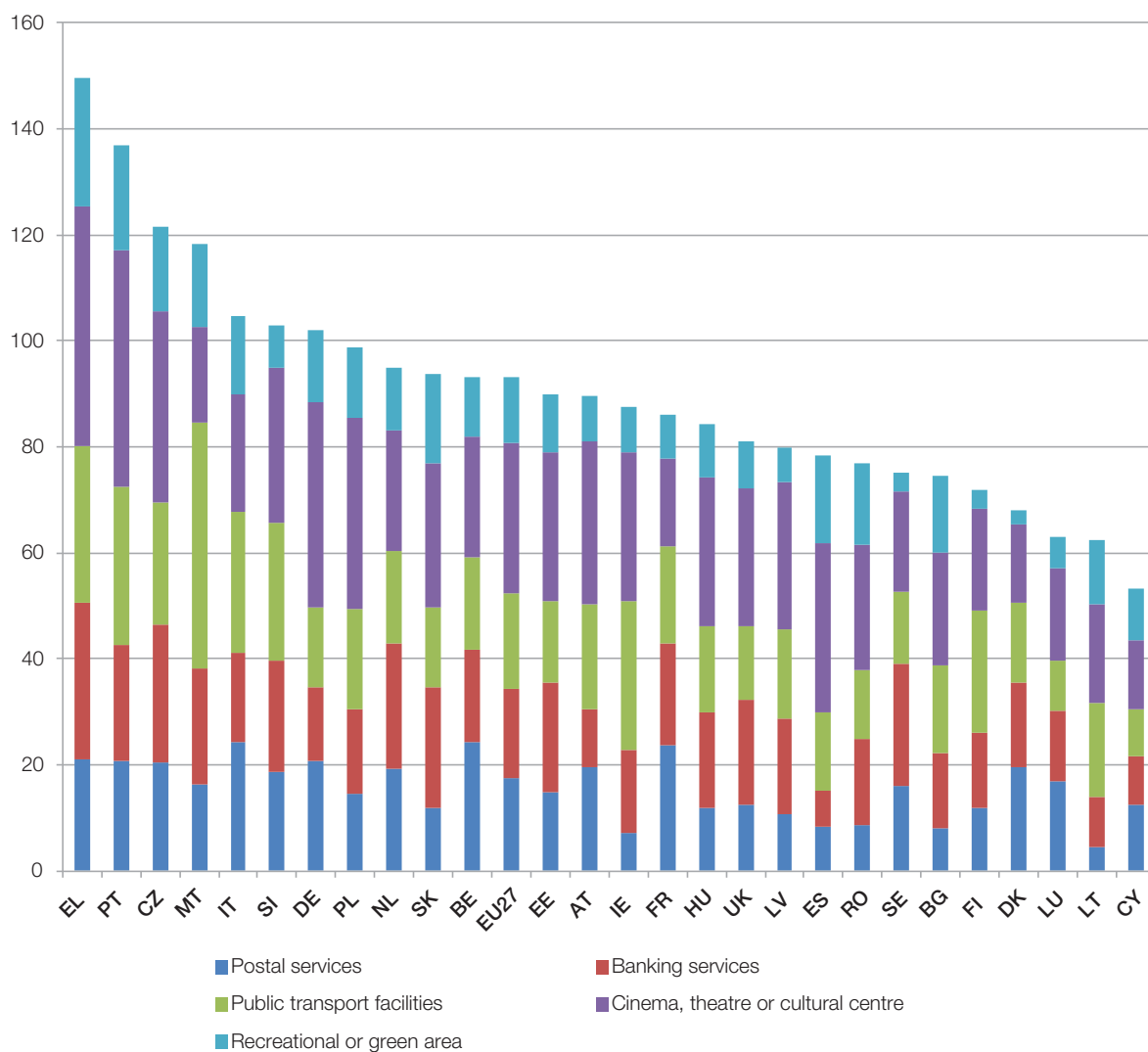
Notes: Q51 – for question wording, see note to Figure 26; aggregated proportions of respondents reporting great difficulty or some difficulty for all categories.

Figure 28: Neighbourhood services accessibility index, by age and living area
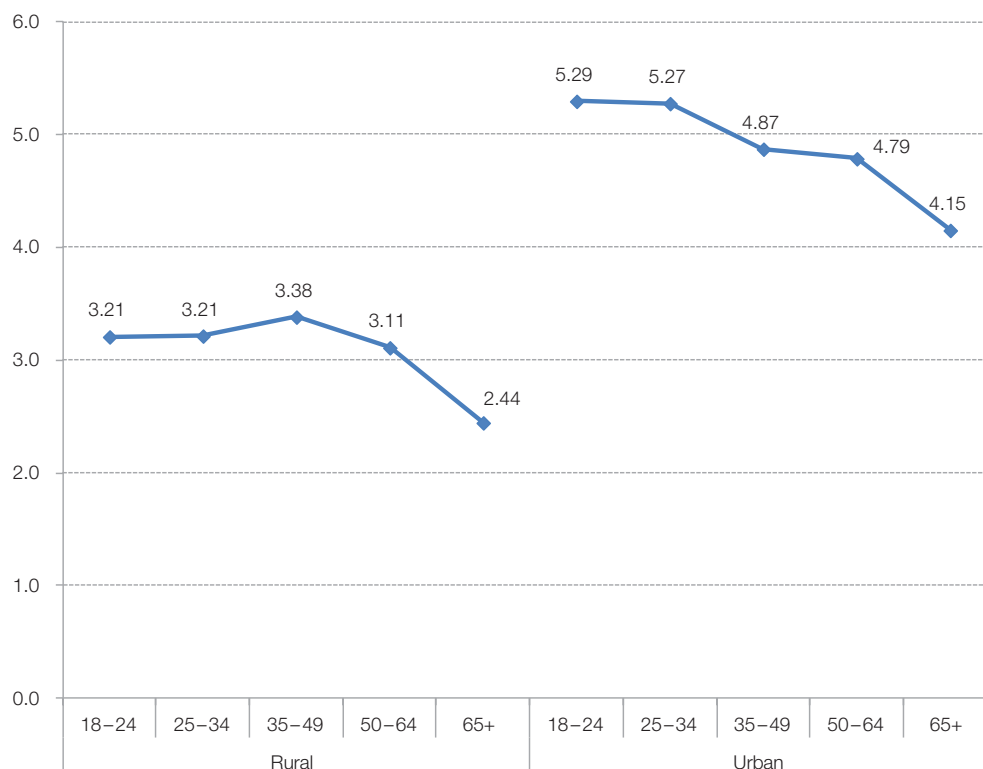
Notes: *Neighbourhood services accessibility index (see Annex) based on Q51 (for question wording, see note to Figure 26).*

of neighbourhood services independent of their age, younger people in general report better access than older people (Figure 28). While accessibility decreases with age in urban areas, in rural areas it is middle-aged people that report the best access to neighbourhood services.

Gender plays a role too. Nearly everywhere in Europe, men perceive neighbourhood services to be more accessible than women do. In Portugal, Greece, Austria, the Netherlands and Slovakia, gender differences are twice as high as the EU27 average. Only in Finland, Denmark, Poland and Lithuania can minimal gender differences in access to local neighbourhood services be detected.

Satisfaction with quality of local neighbourhood

In order to map satisfaction with the quality of local neighbourhoods as reported by the EQLS 2011, a new 'satisfaction with local neighbourhood index' was created. It combines difficulties reported in respondents' immediate neighbourhood – such as problems with noise, air quality, quality of drinking water, crime, violence or vandalism, litter or rubbish on the streets and traffic congestion – and turns them into a single numerical value. The higher the value of the index, the lower the reported problems: it ranges from -6 for a person reporting major problems for all issues to +6 for a person reporting no such problems for any issue, and thus being more satisfied with the local neighbourhood.

Average overall satisfaction with the local neighbourhood, as measured by this index, amounts to 3.1 for all Europeans (Figure 29). With higher values indicating fewer problems and thus higher satisfaction, the EU27 does not score badly in terms of quality of immediate neighbourhood. People are most satisfied with their local neighbourhood in Finland and Denmark (both with ratings of 4.7) and Slovenia (4.4). People are least satisfied in Bulgaria (1.7), Malta (1.8) and Cyprus (2.0).

Here, a certain tendency to grouping can be observed among EU15 and EU12 countries, with the EU15 countries reporting in general higher average levels of satisfaction with local neighbourhoods than the EU12 and EU27.[7] The EU12 countries tend to rank below the EU27 average. Exceptions are Slovenia, Slovakia and Latvia with quite high levels of satisfaction, and Greece and Italy, EU15 countries with rather low ratings.

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[7]   For a listing of the EU12 countries, see the table at the start of the report.

Figure 29: Satisfaction with local neighbourhood index
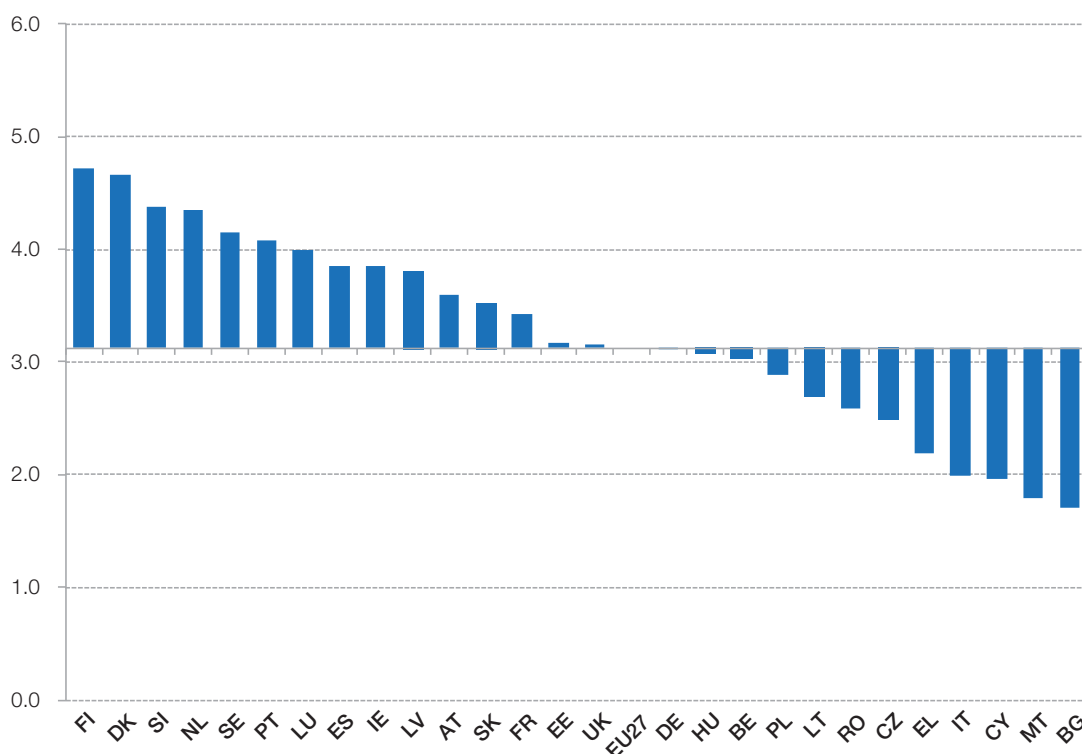
Notes: Satisfaction with local neighbourhood index (see Annex) is based on Q50: Please think about the area where you live now – the immediate neighbourhood of your home. Do you have major (1), moderate (2) or no problems (3) with the following? a. Noise, b. Air quality, c. Quality of drinking water, d. Crime, violence or vandalism, e. Litter or rubbish on the street, f. Traffic congestion in your immediate neighbourhood.

From a country perspective, and as discussed in the overview report (Eurofound, 2012a, pp. 99–100), satisfaction with the quality of various aspects of the local neighbourhood issues varies between European countries.

Figure 30 offers a view of the aggregated proportions of respondents who report major and moderate problems with the quality of their local neighbourhoods. People in Bulgaria, Malta and Italy, followed by Cyprus and Greece, report the greatest overall problems with the quality of local neighbourhoods. Those in the Nordic countries (Finland and Denmark, and to a lesser extent also Sweden) and Slovenia and the Netherlands report the least major and moderate problems with the local neighbourhood.

Related to separate local neighbourhood factors, major complaints about noise are most frequent in Cyprus, Malta, Germany and Greece (where more than 40% of respondents reported problems) and least frequent in Finland, Ireland and Denmark (fewer than 20%).

Air quality is perceived to be a major problem by more than 40% in Malta, the Czech Republic, Bulgaria and Italy while fewer than 10% report problems in Ireland and Denmark.

The quality of drinking water is seen to be most problematic in Bulgaria, Cyprus and Romania (where more than 40% report problems) but seen to be problematic by fewer than 5% in the Nordic countries and the Netherlands.

In the Czech Republic, Greece and Italy, nearly half the respondents report major problems with crime, violence or vandalism; fewer than 20% do so in Slovenia and Finland.

In Bulgaria, six out of ten people complain about rubbish on the streets, while in Denmark fewer than 8% report such problems.

Traffic congestion is reported to be a substantial problem in Italy, Malta and the UK, but much less of a problem in Latvia, Slovenia and Finland.

Looking at overall EU27 values, problems with crime, violence and vandalism (reported by 33% of respondents) together with problems with litter on the street (33%) account for the majority of major problems reported in relation to satisfaction with quality of local neighbourhood. Noise (33%) and traffic congestion (31%) come next, with the quality of air (26%) and drinking water (21%) seen as least problematic.

Figure 30: Problems in quality of local neighbourhood, by country

Legend:
- Noise
- Air quality
- Quality of drinking water
- Crime, violence or vandalism
- Litter or rubbish on the street
- Traffic congestion
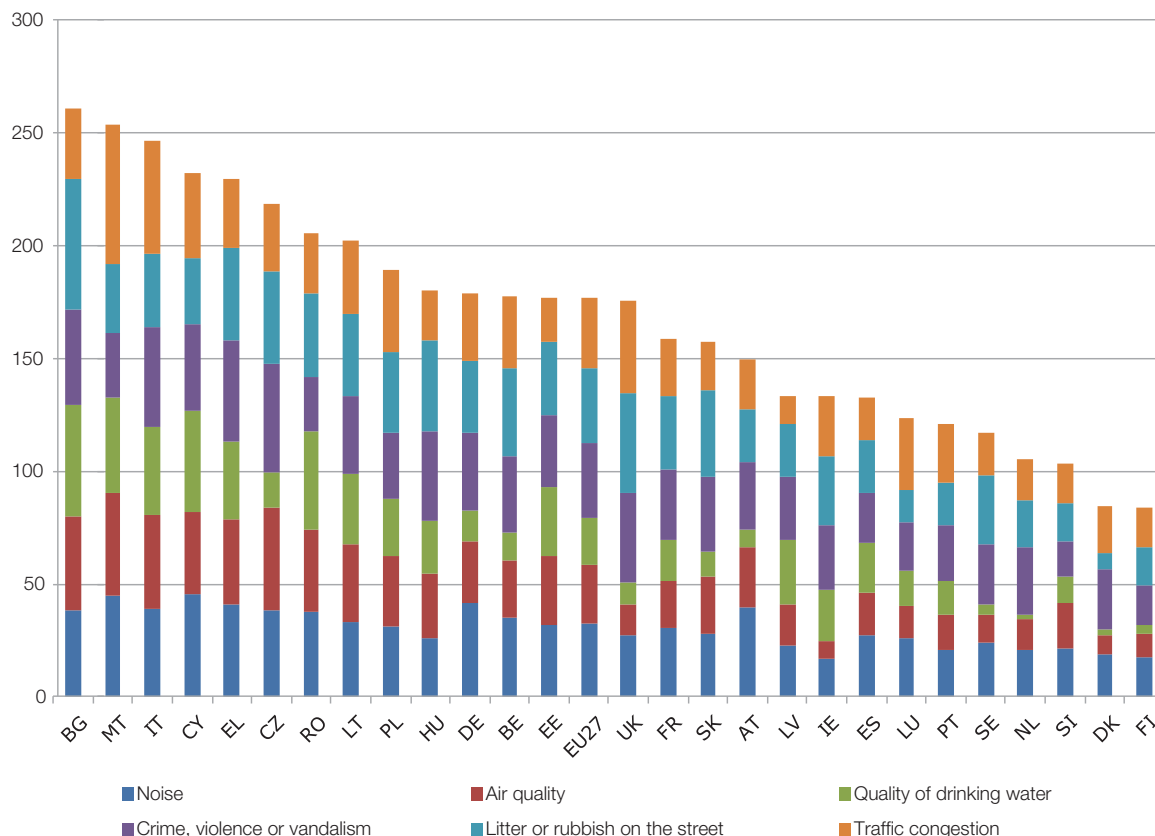
Note: Sum of proportion of respondents with major and moderate problems, Q50 (for question wording, see note to Figure 29).

Across Europe, people living in rural areas are more satisfied with the quality of their immediate neighbourhood. On a scale that runs from -6 to +6, the difference is 1.7 points in favour of rural areas. However, between countries this difference varies greatly. In Figure 31, countries to the left of the EU27 average show bigger differences between rural and urban areas in terms of satisfaction with the local neighbourhood, while differences are lower in countries to the right. In Greece, the difference in satisfaction is more than twice as high as the EU27 average. Greece, Poland and Lithuania show the biggest differences; Denmark, Malta and Finland, the smallest.

Accessibility and satisfaction

To give a complete picture of perceived neighbourhood issues, perceived accessibility of neighbourhood services is combined with reported satisfaction with the quality of local neighbourhoods. In order to allow for comparability, the new indexes were standardised – that is, transformed into a variable with a mean of 0 and a standard deviation of 1.

Figure 32 (overleaf) ranks countries by the sum of total deviations from the EU average, thus providing clusters of countries with similar overall deviations.

Countries with high satisfaction with quality of local neighbourhood and good access to local neighbourhood services are on the left-hand side of the chart (Denmark, Finland, Sweden and Luxembourg) while those with low levels of satisfaction and problems with access (Malta, Bulgaria, Greece and Italy) are on the right-hand side. Countries in the middle of the chart show approximately average access and satisfaction.

How does one interpret these results? The chart compares two different dimensions of quality of local neighbourhood and their perception by residents. Both have been shown to be important determinants of quality of life and local neighbourhood (Eurofound, 2012a). They are often but not always related. The red bars indicate problems with ease of access to local services; the blue bars show satisfaction with the quality of one's local surroundings. As one would expect, and as can be seen from Figure 32, positive (or negative) scores in terms of access to local services mostly go together with positive (or negative) scores related to satisfaction with the quality of local neighbourhood.

Figure 31: Satisfaction with local neighbourhood index, rural–urban difference, by country
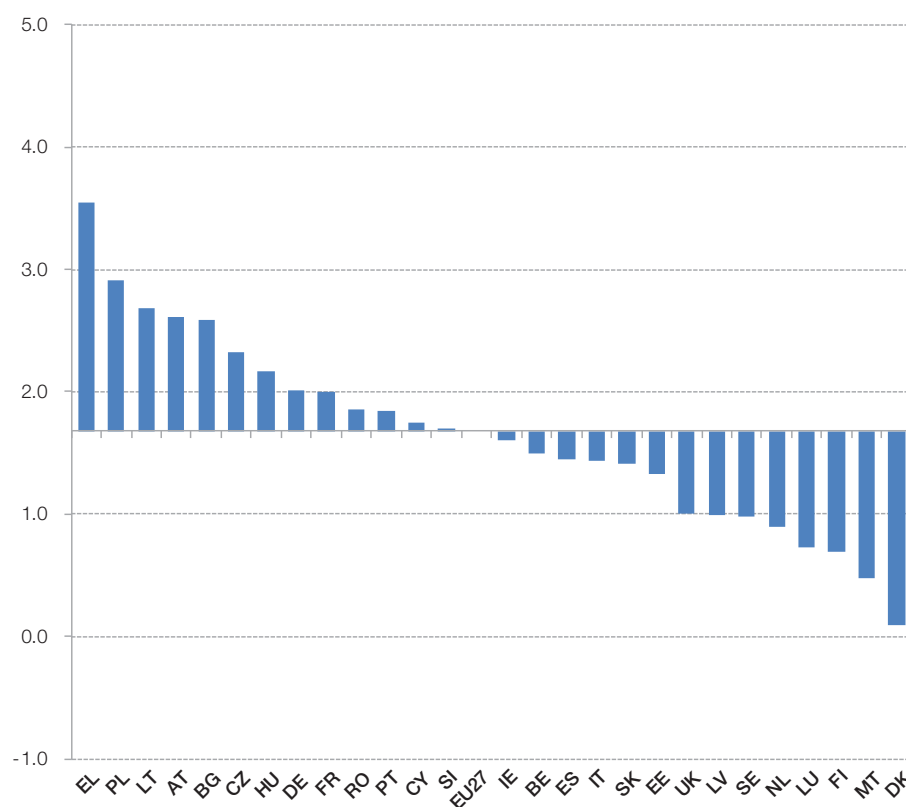
Notes: Satisfaction with local neighbourhood index (Annex) based on Q50 (for question wording, see note to Figure 28).
Source: EQLS 2011

However, some countries (such as Slovenia and Portugal) seem to do well in one but less well in terms of the other (or not at all). So, while people in these countries are satisfied with local environmental issues, they obviously have problems accessing local neighbourhood services such as the bank, post office or local transport. One explanation might be the environment is healthy, but there is a lack of funds for neighbourhood services; another may be high and later unfulfilled expectations of what standard services should be.

In Lithuania and Cyprus, the situation is reversed: there seems to be good access to local neighbourhood services but low satisfaction with the quality of the local environment.

Repeating the analysis in order to compare the effects of rural and urban settings on the perceived accessibility of local neighbourhood services and quality of local neighbourhoods, it becomes clear that living in the countryside always results in greater satisfaction (positive, blue bars in Figure 33, overleaf). Existing problems in access to local services (negative, red bars) are as a rule seen to be compensated for by the advantages of rural life, such as quiet surroundings, fresh air and good drinking water, low crime, no litter and the absence of traffic congestion.

However, in Portugal, Slovenia, Estonia, Latvia, Finland and Sweden, disadvantages in access to services in rural areas are markedly greater than the advantages related to the better quality of rural neighbourhoods. The environmental advantages of living in rural settings do not outweigh the reduced access to services.

The biggest differences in terms of accessibility and satisfaction between rural and urban areas are in Greece, Poland and Lithuania. However, satisfaction with the quality of the local neighbourhood outweighs related problems in access to local neighbourhood services.

Differences are lowest for Luxembourg, Malta and Denmark. However, in these countries, disadvantages in access outweigh satisfaction with the quality of local neighbourhoods.

On average in the EU27, living in urban areas is associated with less satisfaction with the quality of the immediate neighbourhood, while living in a rural area is related to poorer accessibility of neighbourhood services. For people living in rural areas, satisfaction with the quality of the neighbourhood outweighs the reduced access to services.

63

Figure 32: Standardised neighbourhood services accessibility index and satisfaction with local neighbourhood index, by country
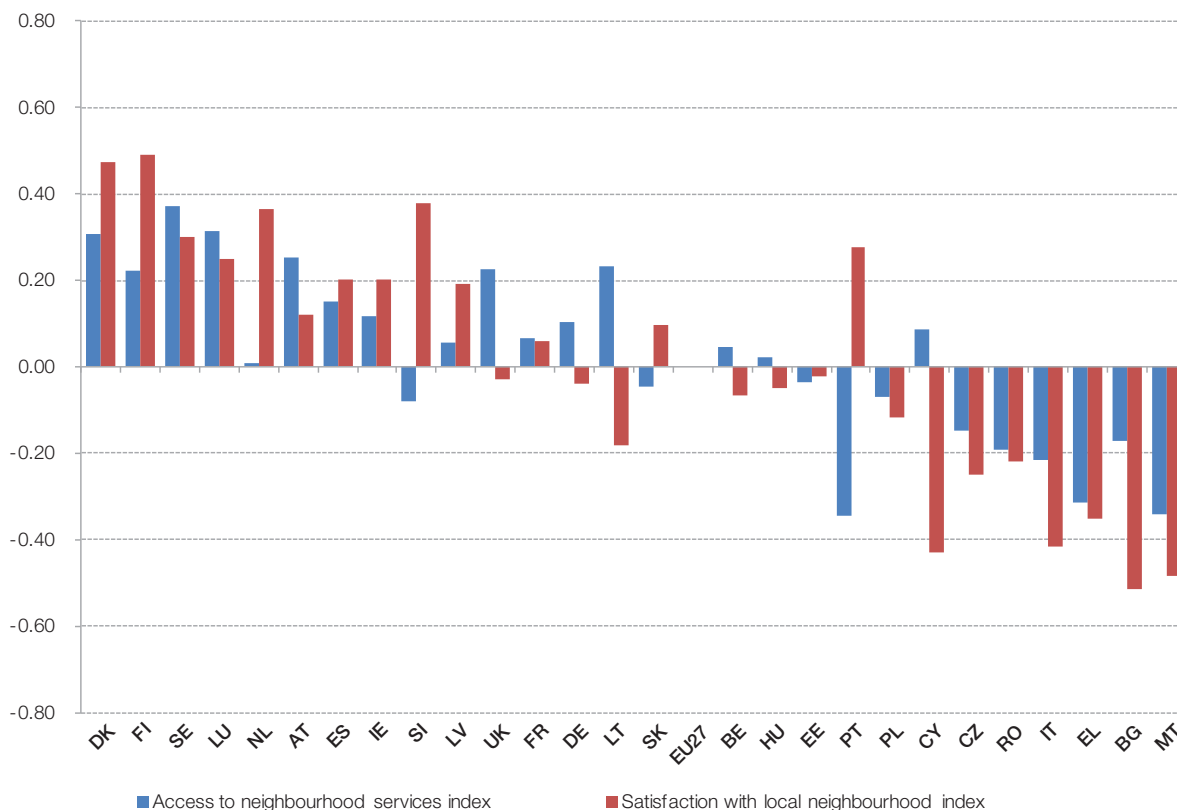
Notes: Satisfaction with local neighbourhood index based on Q50 (for question wording, see note to Figure 29).; neighbourhood services accessibility index (see Annex) based on Q51 (for question wording, see note to Figure 26).
Source: EQLS 2011

Figure 33: Standardised neighbourhood services accessibility index and satisfaction with local neighbourhood index, by country and area

Notes: Satisfaction with local neighbourhood index based on Q50 (for question wording, see note to Figure 29); neighbourhood services accessibility index (see Annex) based on Q51 (for question wording, see note to Figure 26).
Source: EQLS 2011

Key points

Good perceived access to neighbourhood services (banks, postal services and so on) is in general related to high levels of satisfaction with the local neighbourhood (factors such as air, waste, crime). However, Slovenia and Portugal show relatively high satisfaction despite low accessibility, while Lithuania and Cyprus attain only low satisfaction although offering good access to services.

Across Europe, satisfaction with the local neighbourhood is greater for people living in rural areas. The effect is greatest in Greece and least in Denmark.

With the exception of Italy and Malta, access to neighbourhood services in all EU countries is perceived to be better in urban areas. While reported accessibility in urban areas decreases with age, the best accessibility in rural areas is perceived by middle-aged people.

Men always rate neighbourhood services as more accessible than do women, except in Denmark, Finland and Poland. This is an interesting finding and might be partly related to women's role as mothers and main carers for children (which may severely restrict their time budgets).

Quality of society

Quality of society

This chapter investigates the current situation and recent trends regarding trust in people and institutions across the EU27. It explores the relationship between reported levels of trust and socioeconomic characteristics, tensions between social groups, attitudes to migrants and major factors influencing trust in institutions.

It is expected that the quality of society in Europe would be affected by the international economic and banking crisis, resulting in greater tensions between social groups and less trust in institutions and perhaps less trust in people. Similarly, satisfaction with life – as a measure of overall life quality – is expected to be lower.

Based on Eurofound's concept of quality of society, this chapter therefore shifts the focus of analysis from public and neighbourhood services to trust and tensions (Eurofound, 2009; 2012a). It also presents the main determinants for trust in institutions and factors influencing 'social quality', a recent theoretical concept which combines various aspects of quality of life into an overall measure for the quality of society (van der Maesen and Walker, 2012).

An analysis of EQLS 2011 data shows that on average in the EU27, respondents trust other people more than they trust institutions – a trust rating of 5.1, as against 4.8 (Table 4). While trust in people was reported to be highest in Finland, Denmark and Sweden, it was lowest in Cyprus, followed by the Czech Republic and Lithuania. The Nordic countries also had the highest levels of trust in institutions; the countries with the lowest scores in this respect were Greece, Bulgaria and Romania. Cyprus, despite its low levels of trust in people, showed moderate trust in institutions.

At European level, social tensions in 2011 were perceived to be greatest between different racial and ethnic groups and rich and poor people, followed by tensions between management and workers. More than one third of respondents perceived such tensions; perceived tensions between different religious groups, meanwhile, were slightly lower. At country level, perceived tensions between racial and ethnic groups were highest in the Czech Republic, Hungary and France; they were lowest in Lithuania, Latvia and Estonia. Tensions

between rich and poor were perceived to be highest in Hungary, Latvia and France but lowest in Denmark, Finland and the Netherlands. Interestingly, perceived tensions in the Netherlands were very low in terms of wealth and job position but much higher in terms of race, ethnicity and religion. Tensions between management and workers in 2011 were perceived to be highest in Hungary, Greece and Slovenia and lowest in the Nordic countries, while tensions between religious groups were highest in France, Belgium and Cyprus.

Trust in people and in institutions

Here the hypothesis that trust in institutions and trust in people may have fallen as a result of the economic crisis is tested by comparing figures for 2007 and 2011.

The main changes in trust in institutions over time have already been discussed in the first chapter. Trust in institutions was shown to have been strongly affected by the crisis, at least in the worst-hit countries. The trust in institutions index (for details, see Chapter 1) shows that trust in institutions all over Europe visibly decreased between 2007 and 2011. Greece shows both the strongest decrease and the lowest value in 2011 for trust in institutions; this is not surprising in the context of the crisis and following austerity measures its government was obliged to introduce, resulting in public protests and clashes with the government. Above the EU27 average, Luxembourg, Germany and the UK managed to gain slightly in trust in institutions; Sweden, Finland and the Netherlands suffered slight losses but kept their favourable position.

Trust in people is different. Contrary to expectations, trust in people has not fallen. Figure 34 shows deviations from the EU27 average in 2011 – with higher values to the right – and changes between 2007 and 2011. Countries in which levels of trust in other people rose sit above the black line, while those in which trust fell sit below this line.

What can be seen from this graphical presentation of trust in people is that, in general, trust in people – as represented by

Table 4: Trust and tensions, by country

Country	Trust in people	Trust in institutions	High tensions between:			
			rich and poor	management and workers	racial and ethnic groups	religious groups
AT	5.3	5.8	24	26	39	31
BE	5.5	5.1	33	30	49	39
BG	4.5	3.4	24	15	20	13
CY	1.9	4.1	41	39	47	39
CZ	4.0	4.3	48	39	68	26
DE	5.0	5.7	32	24	29	28
DK	7.0	6.9	4	5	25	21
EE	4.8	5.2	40	23	16	9
EL	4.3	3.2	52	59	47	31
ES	5.4	4.6	27	32	30	21
FI	7.1	6.6	17	15	36	19
FR	5.3	5.0	55	48	50	39
HU	4.3	4.2	71	60	60	24
IE	5.5	4.9	28	23	28	16
IT	4.8	4.0	32	32	38	28
LT	4.7	3.7	60	37	16	11
LU	5.9	6.3	30	32	29	21
LV	4.1	3.9	37	23	17	7
MT	4.7	5.1	28	24	36	20
NL	6.3	5.8	20	23	48	36
PL	4.8	4.1	35	32	23	23
PT	4.3	4.1	21	25	21	10
RO	5.0	3.5	48	44	33	19
SE	6.4	6.3	21	15	36	31
SI	5.2	3.7	42	56	32	31
SK	4.2	3.9	31	27	30	9
UK	5.5	5.2	31	23	40	34
EU27	5.1	4.8	36	32	37	28

Notes: Trust in people, trust in institutions and various high tensions by country, 2011; Q24 and 28 (average score on a scale of 1–10), Q25: (% of those reporting 'a lot of tension'):

Q24: Generally speaking, would you say that most people can be trusted, or that you can't be too careful with people? Please tell me on a scale of 1 to 10, where 1 means that you can't be too careful and 10 means that most people can be trusted.

Q28: Please tell me how much you personally trust each of the following institutions. Please tell me on a scale of 1 to 10, where 1 means that you do not trust at all, and 10 means that you trust completely: average score for trust in parliament, government, local authorities, legal system, and police.

Q25: In all countries there sometimes exists tension between social groups. In your opinion, how much tension is there between each of the following groups in your country? 1) a lot of tension; 2) some tension, 3) no tension. Only high tensions are shown. Tensions between men and women, between old and young people and between people with different sexual orientations are comparatively not high.

Source: EQLS 2011

the cluster of black diamonds around the origin of the plane in the figure – is quite similar across EU countries. Countries with the greatest trust in other people in 2011 are the Nordic countries (Finland, Denmark, Sweden) and Netherlands, while Cyprus shows by far the lowest level of trust in people. Despite the economic crisis, trust in people all over Europe has only slightly decreased from 2007 to 2011, much less than the decrease observed for trust in institutions. Thus, trust in people seems to be less affected by the economic crisis than trust in institutions.

The upper-right block of the chart (quadrant I) shows countries with scores above the EU27 average for trust in people in 2011, and increases or slight decreases of trust over time. This applies to Austria, Luxembourg, the UK, and Finland – the country with the highest overall average level of trust in people in 2011. Regardless of the sometimes difficult economic and financial situation in these countries, trust in people in these countries actually increased from 2007 to 2011. Slovenia also shows a higher than average level of trust in people in 2011; here, trust remained constant throughout the observed period.

The lower-right block (quadrant IV) includes countries with scores above the EU27 average in 2011 but with decreasing values from 2007 to 2011, possibly indicating a process of societal fragmentation. This is the case for Belgium, Denmark, France, Ireland, the Netherlands, Sweden and Spain.

The upper-left block (quadrant II) includes countries that score below the EU27 average in 2011 but have rising scores for trust in people from 2007 to 2011, indicating a possible sense of solidarity in society despite the economic crisis. This is the case for Bulgaria, Lithuania, Germany, Latvia and Greece. In Portugal and Poland, trust in people remained constant between 2007 and 2011.

Countries in the lower-left block (quadrant III) show both the greatest fall in trust between 2007 and 2011 and the lowest value for trust in people in 2011. This applies to Italy, Malta, Estonia, Hungary, Romania, Czech Republic, Slovakia and Cyprus. Trust in people in Cyprus fell strongly from 2007 to 2011, decreasing by a quarter.

Combined view of trust in institutions and people

Although trust in people across the EU27 is generally greater than trust in institutions, developments in recent years vary. Looking at Greece, it is interesting to notice that while trust in institutions fell by nearly 40%, trust in people was strengthened. Possibly, people experience solidarity in times of economic and political crisis, indicating an increasing societal cohesion. The situation in Cyprus is more difficult, with trust in both people and institutions collapsing. Positive developments can however be seen in Latvia, Lithuania and Poland,

Figure 34: Trust in people: country deviance from EU27 2011 score and changes 2011–2007
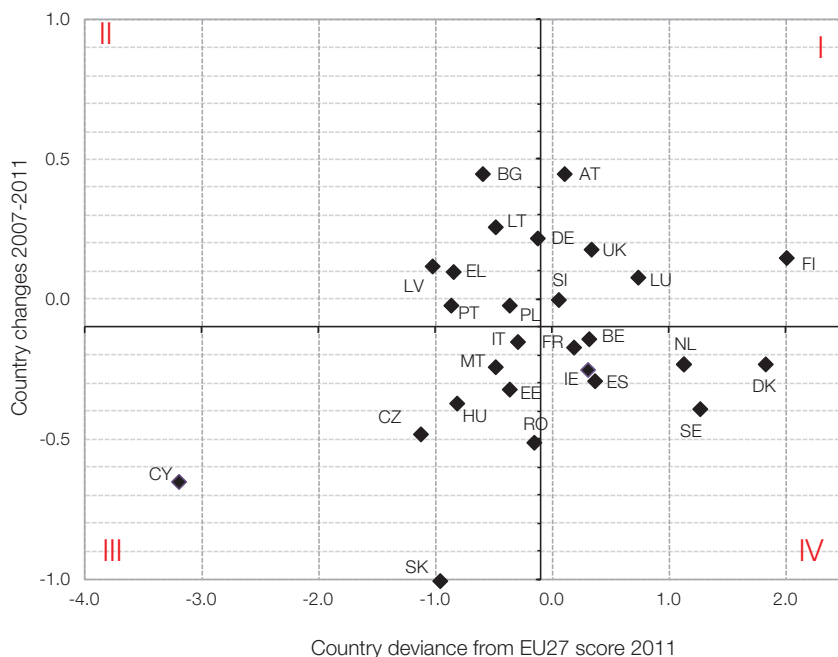
where trust in people and trust in institutions grew between 2007 and 2011.

There is a positive correlation between individual satisfaction with the general economic situation of one's country and one's level of trust in institutions ($R^2 = 0.83$). People who perceive their own country as prospering have more trust in institutions than those in unfavourable economic conditions. Or, in other words, trust in institutions increases with rising satisfaction with the economic situation in one's country, while it decreases when people are faced with economic instability.

Based on 2011 EQLS data, countries where people are highly satisfied with the economic situation of their country and thus show high trust in institutions are Luxembourg, Finland and Sweden. Austria, Denmark, Germany and the Netherlands, showing high positive values for both indicators (Figure 35). Countries with perceived unfavourable economic situations and thus low levels of trust in people and institutions are – particularly – Greece, with its economic and financial difficulties, but also Bulgaria, Hungary, Latvia, Lithuania, Portugal, Romania and Slovenia.

In addition, it has been shown that trust (in people) and societal tensions are related to the level of inequality in a society (Wilkinson and Pickett, 2010). Greater income inequalities are related to lower levels of trust and a greater prevalence of tensions. Research has found that trust in government is related to corruption; it has also found that changes in inequality and trust go together and that in 'highly unequal societies people perceive more corruption' (Uslaner, 2008, p. 91).

Using EQLS findings to investigate a possible relationship between inequality and trust in institutions and people, it transpires that the data do not completely confirm the hypothesis that greater inequalities are related to both lower levels of trust in people and trust in institutions. If negatively related, higher inequalities should coexist with lower levels of trust in both people and institutions – which is not always the case. However, it is not so much inequality in itself that is associated with loss of trust, but rather a particular form of inequality and social exclusion – the loss of employment. When this is looked at, a relationship between inequality and diminished trust is undoubtedly there: where levels of unemployment or non-employment are high, trust in public institutions

Figure 35: Correlation between satisfaction with economic situation of country and trust in institutions
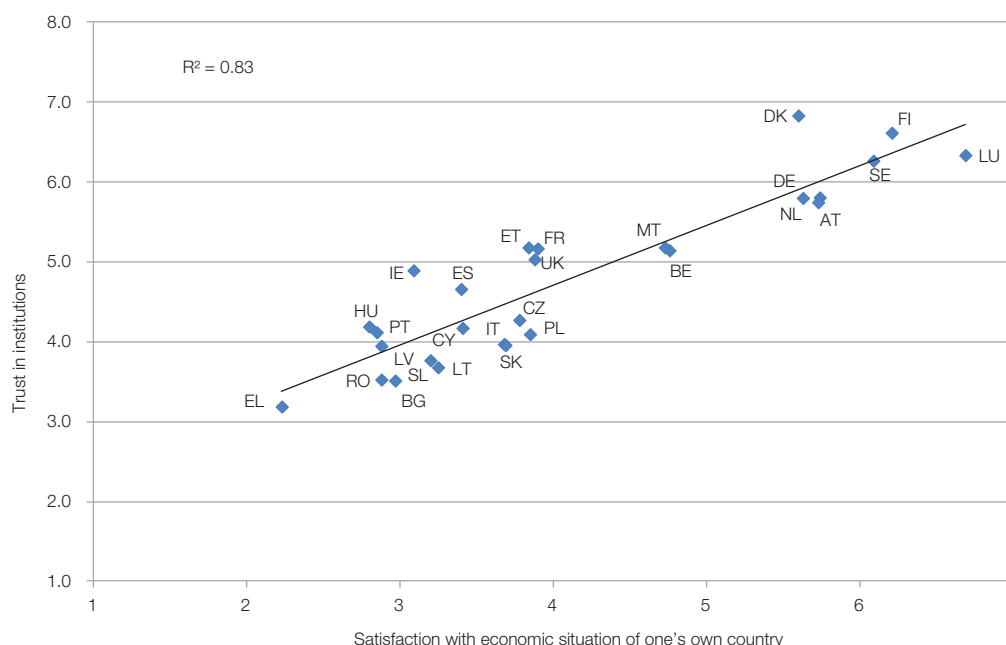
Notes: Q40: Could you please tell me on a scale of 1 to 10 how satisfied you are with each of the following items, where 1 means you are very dissatisfied and 10 means you are very satisfied? (h. Economic situation in your country). Q24: Generally speaking, would you say that most people can be trusted, or that you can't be too careful in dealing with people? Please tell me on a scale of 1 to 10, where 1 means that you can't be too careful and 10 means that most people can be trusted Q28: Please tell me how much you personally trust each of the following institutions. Please tell me on a scale of 1 to 10, where 1 means that you do not trust at all, and 10 means that you trust completely: a. National parliament, b. The legal system, c. The press, d. The police, e. The government, f. The local (municipal) authorities. Trust in institutions = average response to a., b., d., e. f. options; 'Don't know' responses are excluded. Trust in institutions and people gives average response of trust in people and trust in institutions.
Source: EQLS 2011

is undermined. So Figure 36 investigates the relationship between trust in institutions, trust in people and a country's total employment rate, which is one of the main determinants of household disposable income and thus possible inequalities. Countries with the highest levels of trust in institutions have the highest employment rates.

It can also be shown that that countries with the highest employment rates in 2011 (such as Austria, Denmark, Finland, Germany, the Netherlands, Sweden and the UK) also show the highest levels of trust in institutions, with the Nordic countries leading the field. To some extent, this is also true for trust in people, although not in all countries. While the Nordic countries again show the highest level of trust in people, Austria and Germany score only around average. Cyprus and the Czech Republic are outliers: levels of trust in institutions (and in Cyprus, trust in people) are much lower than one would expect, based on the countries' relatively high employment rates.

The relationship is less true for countries with relatively low employment rates, which in general show neither the least trust in institutions nor the least trust in people. However, it is visible, especially for Greece and Hungary, and also Bulgaria and Romania. These are all countries where low employment rates coexist with low levels of trust in institutions.

Determinants of trust in institutions

Trust in institutions is one of the main factors influencing the overall perceived quality of society. In order to investigate the determinants of trust in institutions, this report uses a multilevel analysis with grand mean centring (Hox, 2010). The model takes into account both individual and country-related factors, all of which are listed in Figure 37.

The dependent variable of this model is the level of trust in institutions, mapped by the trust in institutions index (for details of construction, see the Annex).

The results of the multilevel model confirm the need to include both individual and national factors because they can explain more of the variation than national comparisons or comparisons of socioeconomic variables on their own. Since the variance of the individual residual error is estimated to be 3.26 and the variance of the country-level residual error is estimated to be 1.1, the intra-class correlation equals 0.25, indicating that 25% of the variance of the level of trust in institutions is determined at national level.

Major factors influencing the level of trust in institutions are listed by impact in Figure 37. A complete table of factors (with descriptive statistics) can be found in the Annex (Table A7).

Figure 36: Trust in people, trust in institutions and employment rate
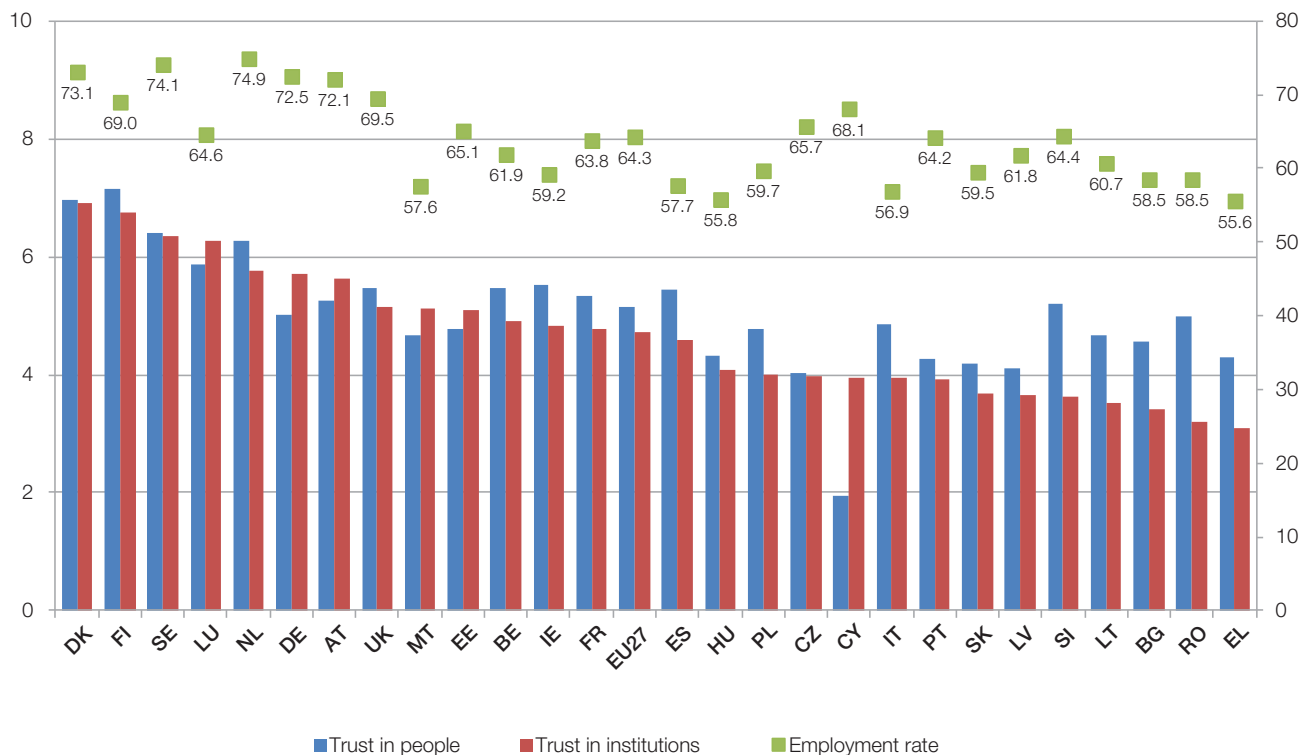
Notes: *Q24, Q28; Employment rate is total, 2011.*
Source: EQLS 2011 and Eurostat

For the average person living in an EU27 country, the level of trust in institutions is estimated to be 4.85.

Using the grand mean centring techniques for the explanatory variables, the estimated effect of an explanatory variable raises or lowers the level of trust in institutions.

Factors raising the level of trust in institutions (in order of ascending importance) are: satisfaction with the relative financial situation of one's household; being in a higher income quartile; greater overall life satisfaction; being female; being older; having a higher level of education; not being in employment; being in a country with a high CPI score; satisfaction with the economic situation of one's country; and perceived higher quality of public services. This means that, for example, a one-point change in satisfaction with the economic situation of one's country increases the trust in institutions from 4.85 to 5.1.

Only one factor decreases the levels of trust in institutions – living in an urban area. If people live in an urban area, trust in institutions falls from 4.85 to 4.76.

It is possible to repeat this analysis at country level to see how country effects relate to effects found for all Europeans. Country predictions based on the multilevel model are shown in Figure 38 (overleaf), where country deviations from the overall EU level are presented. Country deviations represent the level of trust in institutions of an average person living in a specified EU country in relation to that of an average European (for whom trust in institutions is 4.85).

Although the effects of the factors discussed do in principle impact in the same direction (greater satisfaction in any aspect – with one's financial situation, for instance, or life satisfaction – increases the level of trust in institutions), deviations can be either positive (if the country effect of a factor is larger than the overall EU effect of this factor) or negative (if the country effect is smaller than the overall EU effect).

For each country, the bars in Figure 38 thus present the sum of deviations in all factors, while the overall trust in institutions as estimated by the model is marked by black diamonds (for instance, 6.1 for a person in Austria or 3.3 for someone in Bulgaria).

Figure 37: Determinants of trust in institutions, by multilevel model
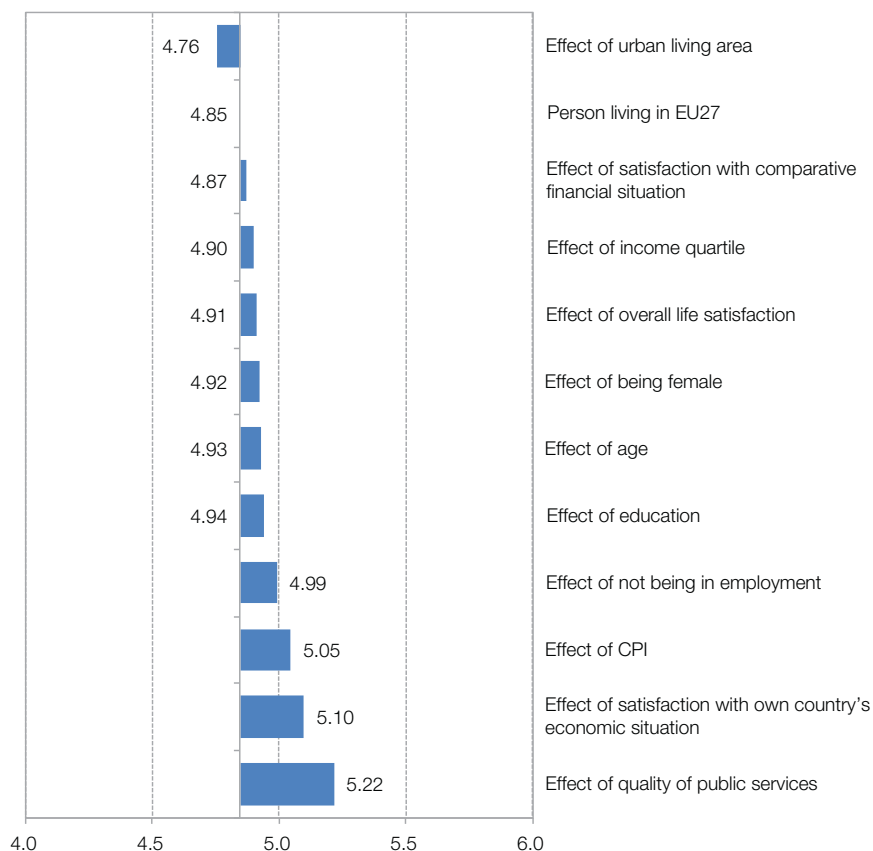
Notes: Trust in institution index based on Q28 (see the Annex)
Q28: Please tell me how much you personally trust each of the following institutions. Please tell me on a scale of 1 to 10, where 1 means that you do not trust at all, and 10 means that you trust completely: a. National parliament, b. the legal system, c. the press, d. the police, e. the government, f. The local (municipal) authorities: Trust in institutions = average response to a., b., d., e. and f. 'Don't know' responses are excluded.
Source: EQLS 2011

In the Austrian case, most factors have an influence greater than the EU average; the bar is mostly above the x-axis. In Bulgaria, all factors have a lower effect than the EU average; thus, the bar lies below the x-axis. The perceived quality of public services, CPI and satisfaction with economic situation of one's own country are the variables with the largest (positive or negative) impact in most countries.

Tensions in society

Tensions in society can be multilayered, with complex inter-relations. Some have already been investigated in the over-view report (Eurofound, 2012a) or discussed here. In this section the focus will be on migration-related issues, which gain importance in times of economic crisis when jobs become scarce and less-well educated people in particular fear losing their jobs and so their income to migrant workers or first- and second-generation immigrants.

Migration

Relating attitudes to immigration to attitudes to migrants, there is a strong correlation ($R^2 = 0.83$) between the two. People with an open approach to migration (as in Sweden, Luxembourg and Romania) think that it is not necessary to restrict access and also tend to think that immigrants enrich culture and are well-integrated. Cyprus, Greece and Malta show the most negative attitudes towards migrants and immigration, perhaps related to a long history of refugees coming by boat from Africa.

The analysis of attitudes in relation to sociodemographic characteristics shows that, in general, men are more restrictive in their attitudes towards immigrants (although the average gender difference in response to Q27 a–c is not significant), as are people living in rural areas, older people and people on low incomes (Figure 39).

Factors influencing social quality

Social cohesion and the role of public services in influencing the quality of society have so far been considered separately. However, the interaction of a range of factors is also likely to influence the quality of society and here it is possible to draw upon the social-quality model to take account of the interaction of a range

Figure 38: Deviation in trust in institutions compared with overall European effects, by country
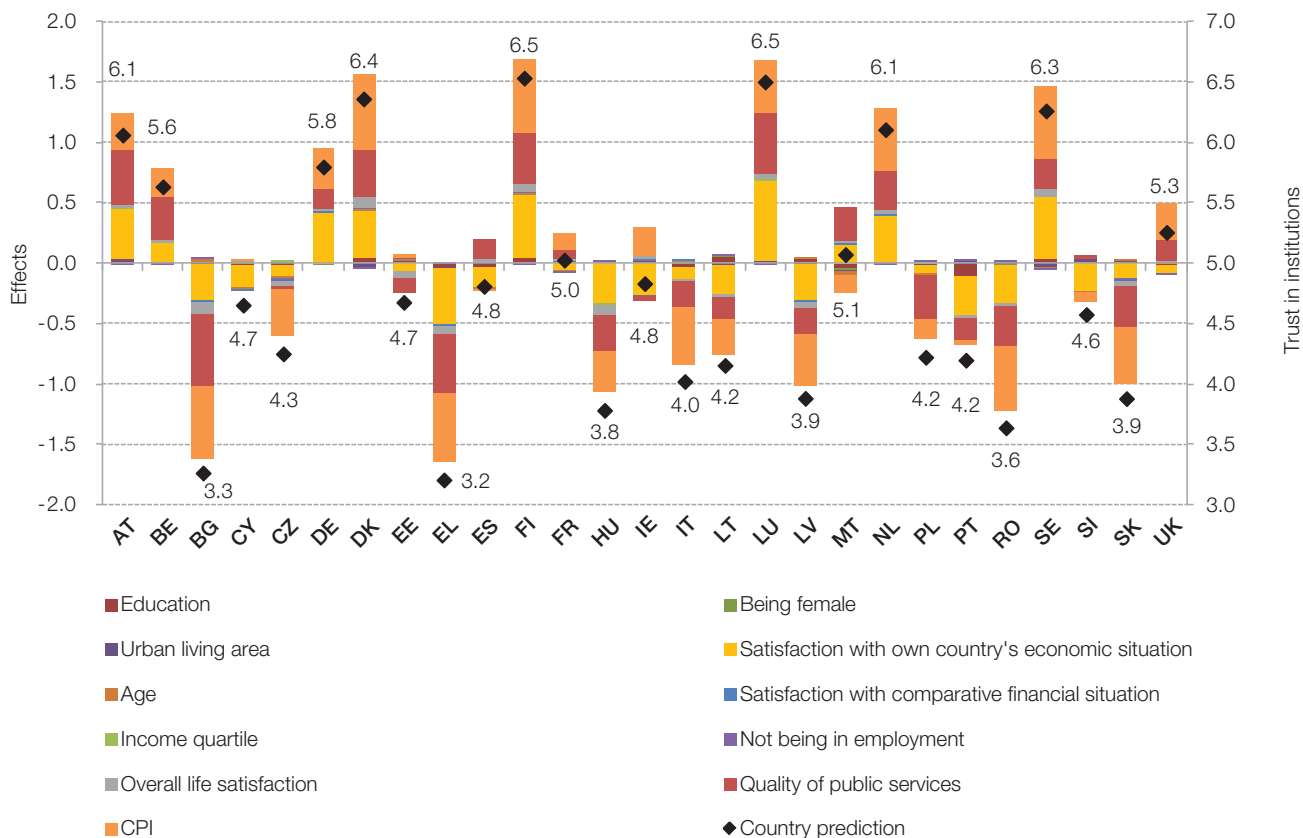
Notes: Trust in institutions index based on Q28 (see the Annex).
Source: EQLS 2011

of factors for understanding the quality of society, of which trust, social tensions and public services are just one part. Here, life satisfaction is used as the dependent variable because it gives a sense of the overall liveability of society for individuals.

Subjective well-being is mainly concerned with individual perceptions (Allardt, 1993). It is the social context that is important for determining individual well-being and this is shaped both by the structure of society and by socioeconomic conditions.

The social-quality model specifies both the conditions for individual well-being and the conditions for building and sustaining societies (Beck, van der Maesen and Walker, 1997; Phillips, 2006).

The social-quality model is derived from four elements: socioeconomic security, social cohesion (already considered in this report), social inclusion and social empowerment. The latter two factors are important in enabling people to feel part of their society and to feel empowered to make changes and to

participate in it. They encompass a sense of belonging and a sense of integration as aspects of quality of life. Social inclusion includes social support, links with friends and family and participation in public life. It also describes subjective feelings of inclusion that ensure an individual does not feel left out of society. Social empowerment takes account of the role of education and health in providing the conditions for empowerment and making people feel in control of their lives. Social quality elements and variables are summarised in Table 5.

Table 6 presents the linear regressions of social quality elements in 2007 and 2011. Some of the variables are slightly different between the two periods and are thus listed separately.

The main findings on the ability of the social system to deliver satisfaction to its citizens can be summarised as follows.

- The analysis suggests that, before and after the recession, there was remarkable stability in scores for life satisfaction and even some convergence across Europe.

Figure 39: Attitude to migrants and immigration, by socioeconomic factors

Legend: ■ Attitude to immigration ■ Attitude to migrants
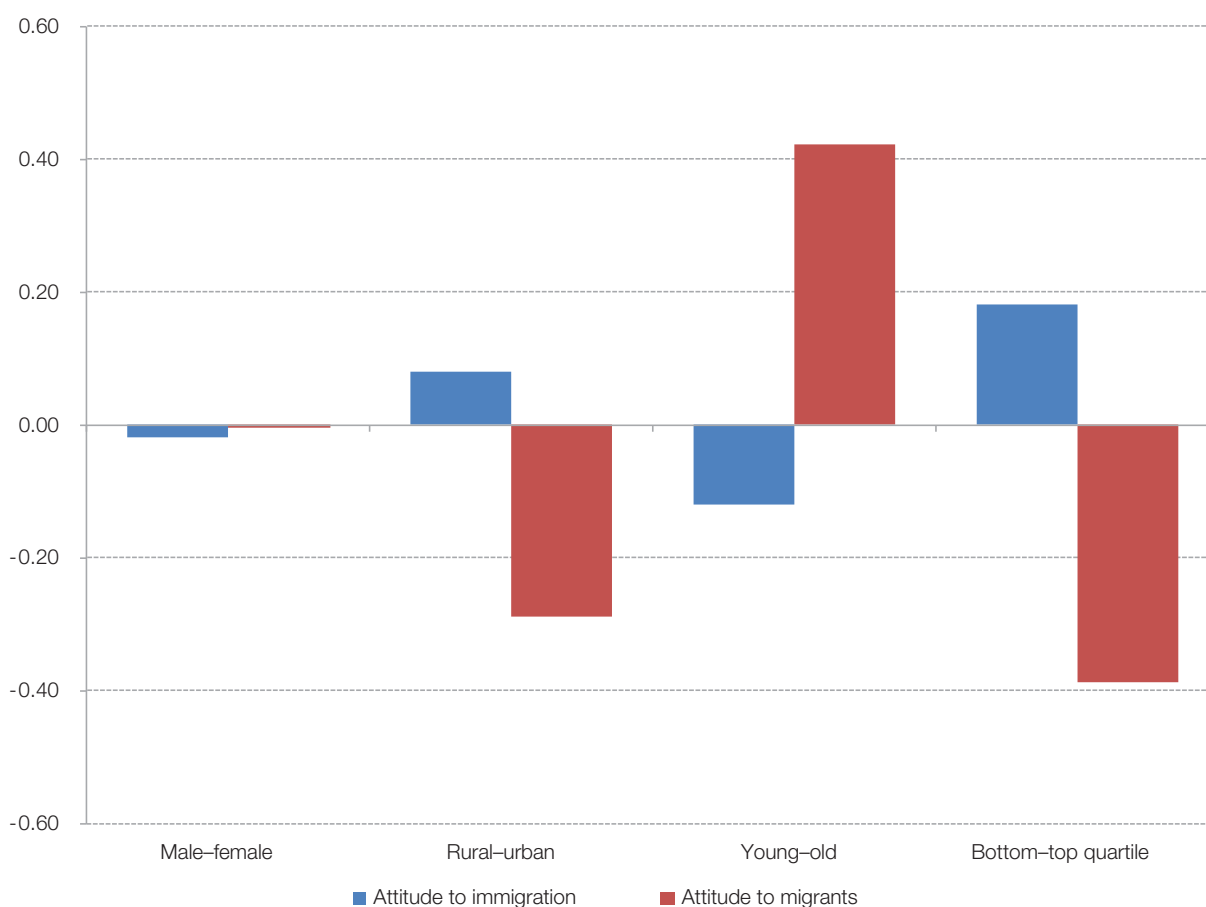
Notes: *Q27. Please look at the following statements about immigrants (i.e. people from abroad living in your country) and indicate where you would place your views on this scale. a. Immigrants are not integrated in our society, b. Immigrants are a strain on our welfare system, c. Our country's culture is undermined by immigrants. Average response of a., b. and c.*
Q26: How about people from other countries coming here to live and work? Which one of the following do you think the government should do? 1. Let anyone come who wants to, 2. Let people come as long as there are jobs available, 3. Put strict limits on the number of foreigners who can come here to work, 4. Prohibit people coming here to work.
Source: EQLS 2011

- The social-quality model explains a large amount (29%) of the variance in life satisfaction, albeit less than in 2007 when it explained nearly 40%.
- The most important factor influencing social quality in 2011 was deprivation and the economic situation of the household, and this was the same in 2007. This was followed by issues of empowerment, especially self-rated health and the feeling that life was too complicated to control. Both of these factors were important in both surveys. One aspect of social integration, feeling left out of society, was also important in both time periods.
- Although the relative importance of economic factors for life satisfaction had declined by 2011 in the overall model, they were still very important. It is possible that the lesser importance of economic factors might reflect the integration of eastern and southern European countries into the EU, despite the adverse effects of economic crisis.

Table 5: Variables used for social quality

Economic security Household income Deprivation index Financial distress scale Assessment of adequacy of income	**Social cohesion** General trust Trust in government Perception of social conflict
Social inclusion Social support Frequency of contact with friends and relatives Marital status Participation in public life Feeling left out of society	**Social empowerment** Education Self-evaluation of health Extent of control of one's life

Source: Abbott and Wallace (2011; 2012)

Table 6: Explaining general life satisfaction, 2007 and 2011

	2007		2011
Economic		Economic	
Household income	-0.001	Deprivation scale	-0.117**
Deprivation scale	0.119**	Difficulty in making ends meet	0.050**
Difficulty in making ends meet	-0.190**	Financial distress	0.050**
Food	0.020		
Social cohesion		Social cohesion	
General trust	0.106**	General trust	0.094**
Trust in government	0.132**	Trust government	0.080**
Conflict scale	0.029**	Conflict scale	0.009*
Social integration		Social integration	
Support when ill	-0.029**	Support ill	0.031**
Support advice	-0.015	Support advice	0.011*
Support depressed	-0.016	Support depressed	0.014**
Support money	-0.051**	Support money	0.031**
		Support looking for a job	-0.035**
Married	0.033**	Married	0.058**
Contact parents	0.001	Face-to-face contact relatives/friends	0.028**
Contact children/friends	-0.013	Contact over distance (letter/email) with relatives/ friends	0.012**
Feel left out	0.129**	Social capital network	0.010*
Vote	-0.023*	Feel left out	0.107
Social empowerment		Empowerment	
Life complicated	0.155**	Life complicated	0.157
Self-rated health	-0.130**	Health	-0.143
Education	-0.001	Education	-0.049
Adjusted R^2	0.398		0.292

Notes: Beta coefficients, *p<0.01 ** p<0.001 The complete regression for 2011 can be found in the Annex, Table A8.
Source: Abbott and Wallace, 2011; based on EQLS 2007, 2011.

Key points

Trust in people changed only slightly from 2007 to 2011. Cyprus was the only country with notable losses of trust and extremely low levels of trust in people in 2011.

All over Europe trust in institutions decreased in the same period. Exceptions were Bulgaria, Germany, Luxembourg and the UK, where people experienced slight increases. Greece had the greatest decreases and the lowest levels of trust for 2011. Also problematic were Cyprus, Slovakia, Spain and Romania. Major factors boosting trust in institutions are the quality of public services, followed by satisfaction with the economic situation of one's own country and a low level of perceived corruption.

There is a positive relationship between trust in institutions and satisfaction with the economic situation of one's own country; there is a negative relationship between trust in institutions and inequality (if measured by total employment rates as an indicator of income inequality).

Factors associated with being less open to migrants include being male, living in rural areas, being older and having a low income.

Tensions between social groups in Europe were perceived to be lowest between men and women, old and young people, followed by people with different sexual orientation and different religions. Tensions were perceived to be highest between different racial and ethnic groups (as reported by respondents in the Czech Republic, Hungary and France), poor and rich (Hungary, Latvia, France) and management and workers (Hungary, Greece, Slovenia).

If the additional element of societal quality is added in, as embodied in the social-quality model, it can be seen that economic factors are very important for explaining life satisfaction, but the role of social empowerment and social integration should also be taken into account in understanding the quality of society overall.

CHAPTER 5

Effects of the economic crisis

Effects of the economic crisis

This chapter deals with insecurity and the economic crisis. It investigates how better accessibility and use of public services may increase social inclusion. It also links perceptions of socioeconomic insecurity (for instance, fear of losing one's job) and expectations about a household's future financial situation to attitudes towards migrants and perceptions of social tensions. Finally, a newly developed index of perceived economic insecurity ranks countries by economic risks.

The 2011 EQLS survey included some interesting new questions related to crisis-induced insecurity, such as fear of losing one's job or not finding a similar one, fear of falling household income or not being able to make ends meet, and fear of feeling inferior to other people.

As stated by the European Commission, the resulting social, economic and socioeconomic inequality matters in terms of social inclusion because 'it contravenes the values of EU citizens, the European Commission objectives for economic and social cohesion and the specific objectives of the Europe 2020 Strategy for "smart, sustainable and inclusive growth"' (European Commission, 2010c, p. 8).

Social cohesion is defined as 'the capacity of a society to ensure the well-being of all its members, minimising disparities and avoiding marginalisation' (Council of Europe, 2008). This is also one of the important goals of the Europe 2020 strategy (European Commission, 2010 a; 2010b).

While social inclusion relates to EQLS questions of access and use, social cohesion is linked to trust and perceived tensions between social groups.

Social inclusion and public services

Figure 40 combines standardised indexes for perceived quality of public services, access to selected services, user-intensity of public services and satisfaction with the local neighbour-

hood. It maps all categories by country, allowing for an overall view of the situation.[8]

The figure shows that if public services are of good quality, people will use them. Users of services tend to rate services more highly, because they know, use and show satisfaction with the services. If people have better access to services, they are more likely to be able to use them and are thus less likely to be socially excluded. On the other hand, generally better accessibility helps to overcome inequality and furthers social cohesion.

Greece, Bulgaria and Italy have fewer than 80% of the 400 points that is the EU27 average. Romania, Cyprus, Malta and Poland have less than 90% of the EU27 average while Hungary, Slovakia, the Czech Republic, Estonia, Lithuania and Portugal score above 90% of the EU27 average but below the EU27 average itself.

Countries above the EU27 average score well in all fields, combining relatively high user intensity, access to selected services and perceived quality of public services with high values for perceived quality of the local neighbourhood. Countries with the highest overall scores are the Nordic countries (led by Denmark), the Netherlands, Luxembourg, Austria, Spain and Belgium.

Social cohesion and insecurity

Social cohesion relates to questions of trust and (the absence of or low level of) perceived social tensions. When relating trust to new EQLS 2011 questions about social insecurity, such as losing one's job or not being able to find a similar one, it can be seen that trust in people is always greater than trust in institutions (Figure 41).

If people think that losing their job is unlikely or finding a similar one will be easy, trust in people and institutions is higher.

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[8] The average of each index for all EU countries is set at 100, so the average combined score of the four indexes is 400. Each country is given a score for each of the four indexes.

Figure 40: Standardised indexes for perceived quality of public services, accessibility of selected services, user's intensity of public services and perceived satisfaction with local neighbourhood, by country
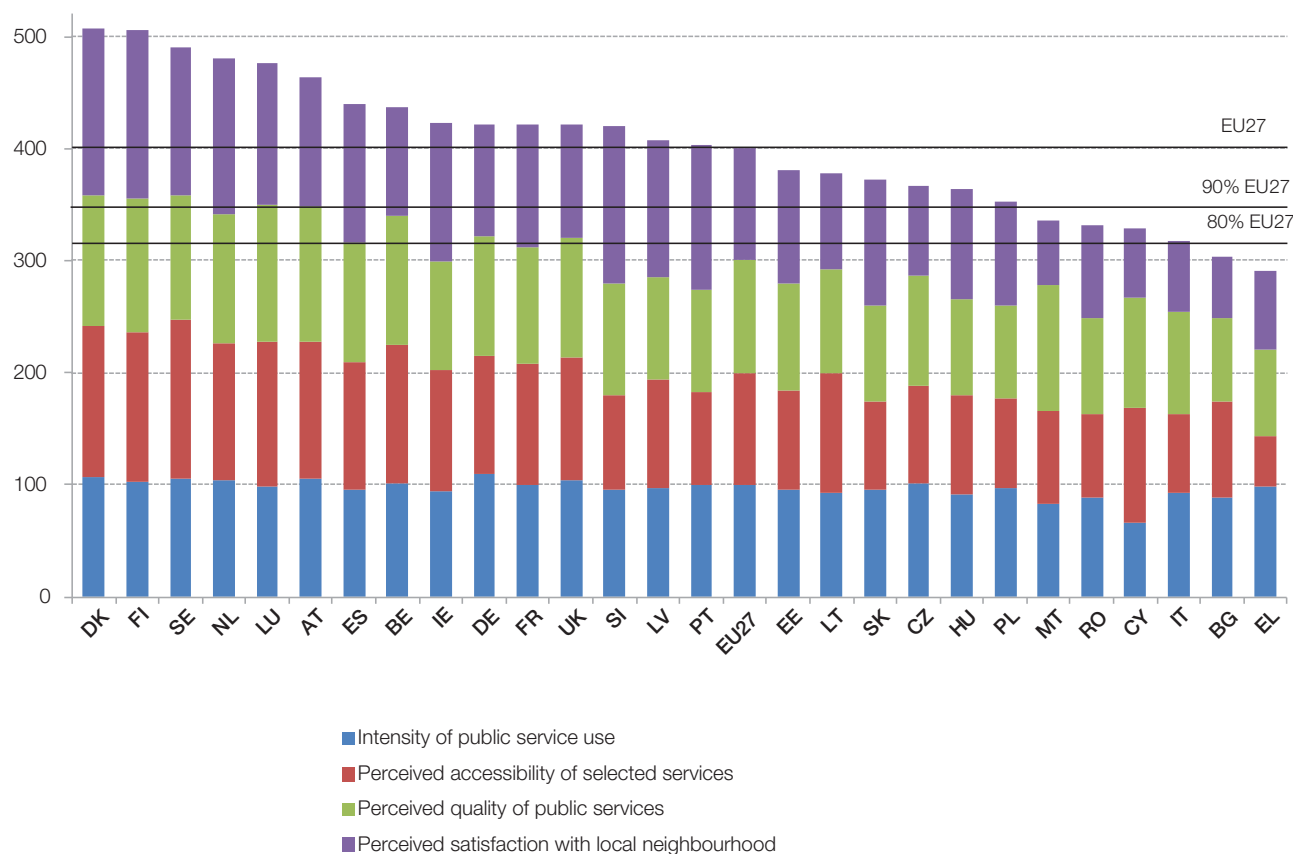
Notes: Perceived quality of public services gives average of quality of public services (Q53); access to selected services gives average of accessibility of health services (Q47), childcare services (Q55), long-term care services (Q56) and neighbourhood services (Q51); user intensity index and perceived satisfaction with local neighbourhood is based on Q50 (see the Annex).
Source: EQLS 2011

Another interesting result can be obtained from a simple addition of standardised indexes for trust in people and institutions and the country's CPI score (Figure 42). The resulting measure for social cohesion includes parameters at individual and country level, thus combining personal perceptions and objective macro-level indicators.

Countries with less than 80% of the EU27 average of 300 points are Greece, Bulgaria, Cyprus, Slovakia, Romania, Latvia, the Czech Republic and Italy. Countries below 90% of the EU27 average are Hungary, Portugal and Poland. Malta and Slovenia are above 90% of the EU27 threshold of 300 points but under the EU27 average itself.

Other findings arising from new EQLS questions

A standardised index for attitudes to immigration and migrants, and tensions between racial groups – although with variations in the underlying categories – shows no high overall country deviations from the EU average.

People facing economic insecurity because they fear losing their job or not finding a similar job feel less open towards migrants. Attitudes to immigration in general are less restrictive than attitudes towards immigrants already living in the respondents' countries.

Figure 41: Trust in institutions and people, and job security
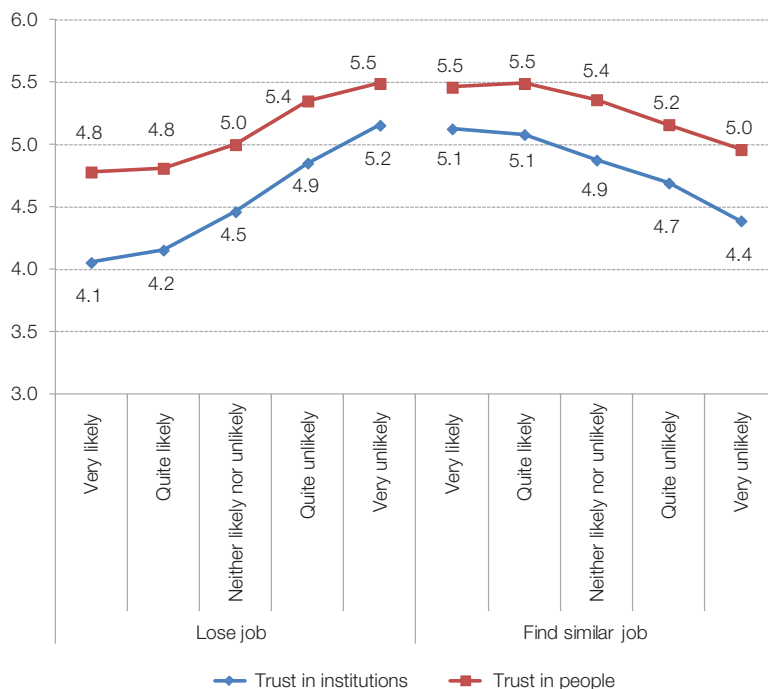
Notes: *Q28: Please tell me how much you personally trust each of the following institutions. Please tell me on a scale of 1 to 10, where 1 means that you do not trust at all, and 10 means that you trust completely: a. National parliament, b. the legal system, c. the press, d. the police, e. the government, f. The local (municipal) authorities; Trust in institutions gives average response to a., b., d., e. f. 'Don't know' responses are excluded.*

Q24: Generally speaking, would you say that most people can be trusted, or that you can't be too careful in dealing with people? Please tell me on a scale of 1 to 10, where 1 means that you can't be too careful and 10 means that most people can be trusted.

Q15: How likely or unlikely do you think is it that you might lose your job in the next 6 months? 1. Very likely, 2. Quite likely, 3. Neither likely nor unlikely, 4. Quite unlikely, 5. Very unlikely;

Q16. If you were to lose or had to quit your job, how likely or unlikely is it that you will find a job of similar salary? 1. Very likely, 2. Quite likely, 3. Neither likely nor unlikely, 4. Quite unlikely, 5. Very unlikely.

Source: EQLS 2011

Figure 42: Standardised indexes for trust in people and institutions and CPI
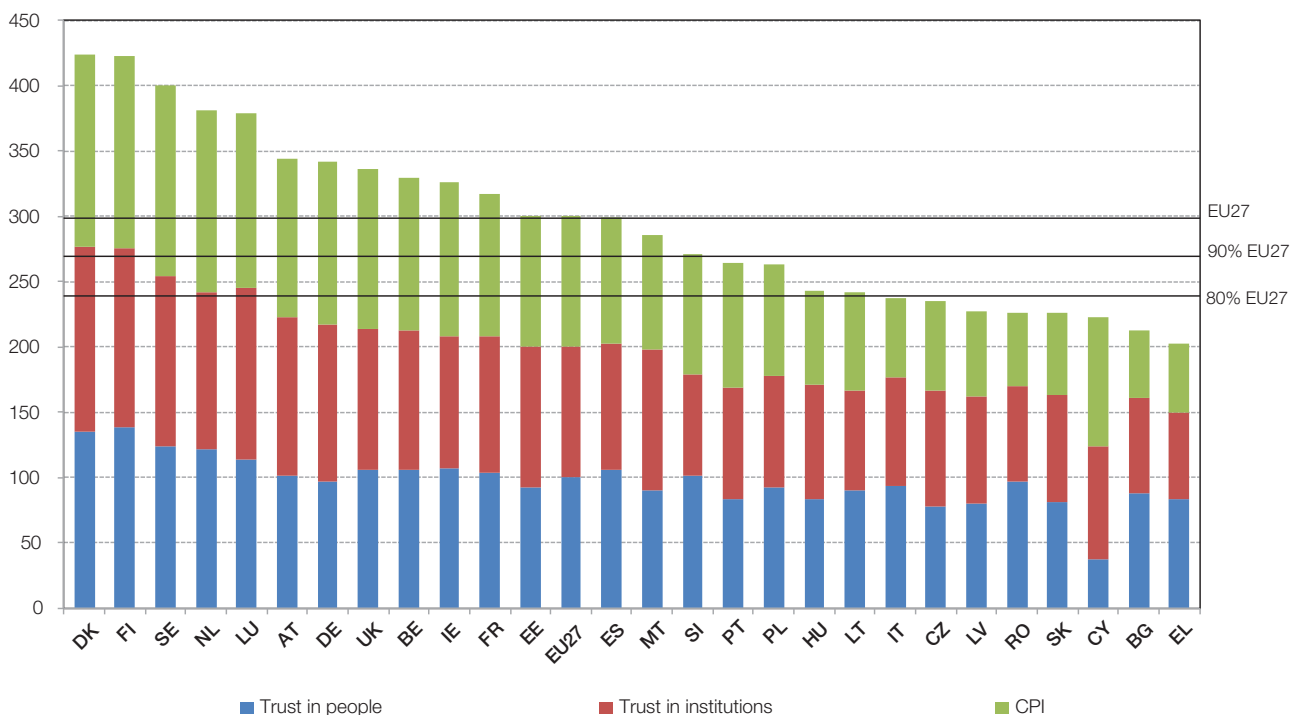
Notes: *Trust in people based on Q 24. Trust in institutions is the average of Q28 a., b., d., e. and f.*
Source: EQLS 2011, CPI from Transparency International (2011)

People facing economic insecurity because of a deterioration in their households' financial situations in the last year or expecting a deterioration in the coming year have more restrictive perceptions of migrants.

When considering tensions between social groups, the least tension is perceived between men and women, followed by tensions between the old and young and those with a different sexual orientation. The greatest tensions are perceived between poor and rich people, management and workers and different racial groups. Independent of the kind of tension reported, people facing economic insecurity (in terms of the likelihood of losing their job) perceive more tensions. Similar effects can be shown when defining insecurity by 'finding a similar job if quitting or losing job'. However, in this case there are no gender or age-related differences. Interestingly, tensions between racial and religious groups are perceived to be low even for people reporting poor chances of finding a similar job. Those who feel it more likely they will find a similar job perceived less tension between workers and management, and between rich and poor people.

Perceived tensions between social groups, when considered in the context of responses to the socioeconomic insecurity factor 'financial situation of household last year and now', were lowest among those whose financial situation remained unchanged, indicating that the stability of one's financial household situation has a positive impact. The same is true for future expectations about financial household stability.

Perceived economic insecurity index

With the global financial and banking crisis and the resulting austerity measures, feelings of economic security have been threatened in many European countries. Although the crisis hit different sectors and countries to a different degree, the EQLS found that many people fear losing their job, not finding a similar new job, and expect a deterioration of their household financial situation.

The perceived economic insecurity index is composed of responses to four EQLS questions about perceptions of socioeconomic insecurity and expectations of the future household financial situation. To reflect individual views on future insecurity, it maps perceived security on a scale of +1 to +3 (+1 if the situation is expected to become better, +3 if the situation is expected to deteriorate). Values of exactly +2 indicate that no changes in household financial situation or the labour market are expected.

Interestingly, the overall EU27 average of 2.1 shows that Europeans in general expect no (or only slightly negative) impacts on their jobs or households' financial situation. Overall feelings of economic insecurity related to the financial and banking crisis are thus not very high. In Figure 43 (overleaf), most countries come within a range of +/-0.2 points around the 'no changes expected' level of +2.

However, based on this index, respondents in 19 out of the EU27 countries report that they expect at least a slightly less favourable financial household and job situation. Despite the generally positive picture, the index reveals moderate to high feelings of insecurity in many European countries.

Only seven countries (Sweden, Denmark, Finland, Luxembourg, Austria, Germany and the Netherlands) report job security, easy access to new but similar jobs, and past and future improvements in their financial household situations. They figure on the right-hand side of the chart, indicating a situation of relative economic security. Belgium, with its average value of 2, is the only country where people on average expect neither improvements nor deteriorations.

Three EU countries visibly do not fall within this general feeling of security: Greece (with a very high average score of insecurity of 2.7), Portugal (2.4) and Hungary (2.3). Cyprus, Slovakia and Bulgaria also show comparably high values of insecurity.

The EQLS findings of perceived economic insecurity partly reflect the general economic picture related to the European financial and banking crisis which left many countries in financial trouble, with high public sector debts, low or even negative GDP growth and trade deficits. Greece, Ireland, Portugal and (to a lesser extent) Italy and Spain have been profoundly affected by the global financial crisis, bank bailouts and the resulting austerity measures.

During the global financial crisis, a number of emerging European countries received financial support from the IMF to help them overcome fiscal and external imbalances, and some EU countries (Hungary, Latvia and Romania) received funding from the IMF in conjunction with the European Commission. In December 2010, three members of the euro zone – Greece, Portugal, and Ireland – also accessed IMF resources (IMF, 2013). While some countries were able to more or less meet their economic and financial needs throughout the crisis, others were not so lucky. It is little wonder, then, that people in Greece and Portugal – the countries hit hardest – perceive particularly high levels of economic insecurity in their financial situation and job prospects.

No relationship between the crisis and insecurity related to housing (Q20) could be established. There was no connection between the expected likelihood of needing to 'leave your accommodation in the next six months because you can no longer afford it' and perceived economic insecurity in terms of household income and job. Factor analysis did not reveal a single correlation. An explanation might be that people who own their houses are not likely to readily move and that in many European countries – although renting is the norm – people tend to stay in their chosen accommodation for most of their lives. Another reason might be that decisions to move house due to financial problems do not happen fast and tend to take longer than six months.

Figure 43: Perceived economic insecurity index, by country
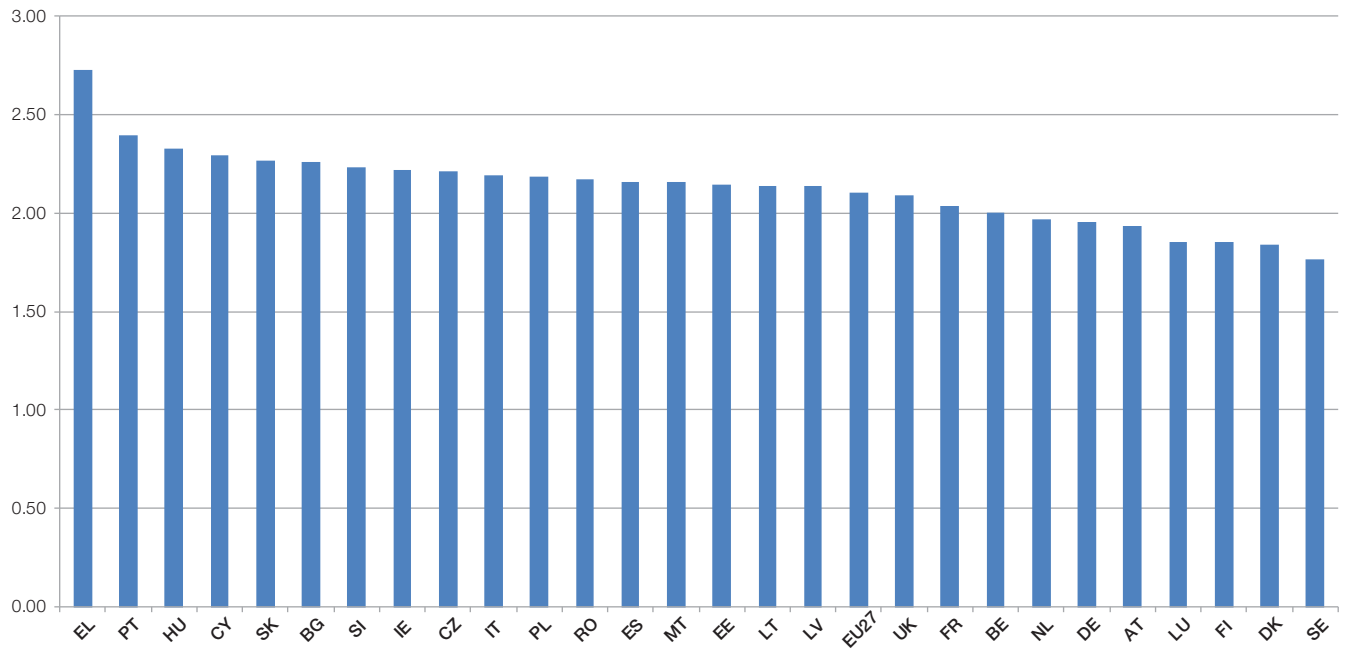
Notes: *Perceived economic insecurity index gives average of Q15, Q16, Q65 and Q66. For Q15 and Q16, the number of categories is reduced from five to three; for Q15, the categories are reversed (see the Annex).*
Source: EQLS 2011

Key points

Better access to and greater use of public services are related to higher perceived quality of such services, resulting again in higher use and (possible) improvements in accessibility, which may increase social inclusion.

Trust in people and trust in institutions are related economic-insecurity factors: a greater likelihood of losing one's job reduces trust in institutions and in people; a greater likelihood of finding a new job increases both forms of trust.

Social cohesion relies on trust, a welcoming attitude towards others (such as migrants) and the absence of tensions between social groups. While all three are negatively related to perceptions of socioeconomic insecurity, trust in institutions and people is also related to a low level of perceived corruption.

The newly developed index of perceived economic insecurity ranks countries by economic risk. It shows that Europeans in general expect no effects (or only slightly negative effects) from the crisis on their jobs or household financial situation. Exceptions are Greece, Hungary and Portugal.

CHAPTER 6

Conclusions and policy pointers

Conclusions and policy pointers

Findings, conclusions and policy pointers from this report's analysis of the current perceptions of quality of society and public services in Europe are grouped here under key headings.

Changes in society and its quality

When comparing income-share ratios (such as S10/S1 or S80/S20) or the Gini coefficient with individual perceptions of inequality, there is an overall visible relationship between the two. Higher values for income-share ratio are associated with greater individual perceptions of inequality and vice versa. However, explicable country deviations have been observed in this analysis, which suggests that the use of survey data such as the EQLS is a necessary complement for informed decisions and well-targeted policy actions. For instance, policymakers (particularly in Hungary, Ireland, Italy, Slovakia, Slovenia, Spain and the UK) should be aware of the differences between official statistics and people's perceptions. Denmark is also a special case.

Access to public services such as childcare, long-term care and health services has been shown in this report to be generally perceived as good, when measured by the indexes for accessibility of childcare, long-term care, and health services constructed for this study. However, access varies between countries some countries, such as Italy, Portugal and Spain, scored visibly better in 2011 than in 2007.

The public services index shows varying levels of and developments in perceived quality of public services in Europe. It is rated highest and improving in Austria, Germany, Luxembourg and the UK; it is rated lowest and worsening in Bulgaria, Greece, Poland and Slovakia.

Trust in institutions decreased visibly from 2007 to 2011, most dramatically in Greece. Trust in people changed less than trust in institutions and is more similar across the EU.

Public services

European governments spend between one fifth and one third of their gross domestic product (GDP) (or between one third and more than half of total general government expenditure) on the provision of public services such as health, education, support for the elderly, families and children, housing and public transport. Total general government expenditure is positively related, although not strongly, to the perceived quality of public services in a country. Perceived quality strongly and positively correlates with intensity of use and perceived access; it correlates strongly and negatively with measures of inequality (such as the Gini coefficient), although some countries show a different pattern.

Major factors that boost the perceived quality of public services are satisfaction with the economic situation of one's country, not being in employment and overall life satisfaction, while not being able to make ends meet and relative deprivation reduce perceived quality. This suggests that people who rate the actions of their national governments positively also tend to see other services in a more positive light, and that people with more positive attitudes towards life in general tend to see their surroundings more positively too.

Access to childcare and the employment rate of women are strongly related, although the direction of the effect remains unclear. Major factors increasing the perceived quality of childcare services are satisfaction with the economic situation of one's country, overall life satisfaction, satisfaction with one's economic situation and number of children. Factors decreasing the perceived quality are being an urban user and experiencing deprivation.

There is a strong relationship between access to and perceived quality of long-term care. Major factors increasing perceived quality are satisfaction with the economic situation of one's country, low perceived corruption, not being employed and overall life satisfaction. Deprivation, not being able to make ends meet, and living in an urban area are the main factors in reduced perceived quality. A possible explanation for the negative relationship between living

in urban areas and the perceived quality of long-term care might be that the demand for long-term care in urban areas is higher.

Although Europeans in all countries rate their self-reported health as quite good, perceived quality of health services and accessibility are found to vary. Perceived accessibility has improved somewhat in recent years. Badly hit by the crisis, Greece currently fares worst, while Italy, Portugal and Spain score better than in 2007. In 2011, access to health services in Europe was generally rated to be quite good, with a mean value of between 2.5 and 2.7 on a scale of 3. While Sweden, Finland and Denmark show the best access, Austria and Belgium have the highest perceived quality of health services. Countries with many difficulties and thus very low scores in accessibility are Greece, Italy and Poland.

Major factors increasing perceived quality of health services are satisfaction with the economic situation of one's own country, greater government expenditure on health as a percentage of GDP, and access to health services (as mapped in the index). Not being able to make ends meet and being female are the main decreasing factors; having chronic health problems is also a decreasing factor, although it is less significant.

Working and care responsibilities can play a role in perceived access to health services. People who are employed, and women, generally find it more difficult to find time to see a doctor because of work or care obligations. Family-friendly working conditions can mediate between personal health needs and work obligations. Job insecurity plays a role, too, since people who fear losing their job may not want to take time off.

The initial hypothesis of this report was that public services are likely to have deteriorated as a result of the economic crisis (with states having cut budgets) and this would be reflected in perceptions of public services. In fact this is only the case in some countries. In others, the perception of public services has actually improved.

Local neighbourhood quality and services

Good perceived access to neighbourhood services (for instance, banking and postal services) is in general related to high levels of satisfaction with living conditions in the local neighbourhood (such as good air quality, efficient waste disposal and low crime levels). However, Slovenia and Portugal show relatively high levels of satisfaction despite poor accessibility while Lithuania and Cyprus attain only low levels of satisfaction although offering good access to services.

Across Europe, satisfaction with the local neighbourhood is greater among people living in rural areas. The relationship is strongest in Greece and weakest in Denmark.

With the exception of Italy and Malta, access to neighbourhood services in all EU countries is perceived to be better in urban areas. While reported accessibility in urban areas decreases with age, middle-aged people in rural areas perceive accessibility as better.

Access to neighbourhood services is always evaluated as better by men except in Denmark, Finland and Poland. This is an interesting finding and might partly be related to cultures where women's traditional role as mother and main carer for children persists, and seems to severely restrict their time budgets. On the other hand, spending more time at home and thus making more use of local services might perhaps make women more critical of such services.

Quality of society

Trust in people changed only slightly from 2007 to 2011. Cyprus was the only country with notable losses and extremely low levels of trust in 2011.

All over Europe, trust in institutions fell in the same period. Exceptions were Bulgaria, Germany, Luxembourg and the UK, where people perceived slight increases. Greece showed the greatest decreases and the lowest level for 2011. Also problematic were Cyprus, Slovakia, Spain and Romania. Major factors influencing trust in institutions are the perceived quality of public services, followed by satisfaction with the economic situation of one's own country and a low level of perceived corruption.

There is a negative relationship between trust in institutions and inequality (if measured by total employment rates as main sources of household income and thus income inequality in a country).

Less open attitudes to immigration are most closely associated with being male, living in rural areas, being older and having a low income.

Tensions between social groups in Europe were perceived to be lowest between men and women, and young and old people, followed by people with different sexual orientations and of different religions. Tensions were perceived to be highest between different racial and ethnic groups (in the Czech Republic, Hungary, France), between poor and rich (Hungary, Latvia, France) and between management and workers (Hungary, Greece, Slovenia).

If the additional element of societal quality is added in as embodied in the social-quality model, it can be seen that economic factors are very important in explaining life satisfaction, but the role of social empowerment and social integration should also be taken into account in understanding the quality of society overall.

Effects of the economic crisis

Better accessibility and greater use of public services are related to a higher perceived quality of such services, resulting again in higher use and (possible) improvements in access, which may increase social inclusion.

Trust in people and trust in institutions are negatively related to economic insecurity. A greater likelihood of losing one's job reduces trust in institutions and in people, while a greater likelihood of finding a new job increases both forms of trust.

Social cohesion relies on trust, attitudes towards others (such as migrants) and the absence of tensions between social groups. All three are negatively related to perceptions of socioeconomic insecurity; in addition, trust in institutions and people is related to a low level of perceived corruption.

The newly developed index of perceived economic insecurity ranks countries by economic risks. It shows that Europeans in general expect no effects, or only slightly negative effects, on their jobs or household financial situation as a result of the crisis. Exceptions to this are Greece, Hungary and Portugal.

Main policy pointers

Policies should target inequalities at a national level, where perceptions of inequality and actual inequality are highly correlated. Deprivation has a significant effect on access to, and the perceptions of, a range of public services; yet the poorest are the ones who most need such services. Ensuring access to services for all the population, including the economically marginalised, should be a policy priority.

Policies targeted at inequalities at European level should look at counteracting widening disparities between some Member States and the rest of Europe.

Difficulties in access to health services, especially in waiting times to see a doctor (and also distance, delay in getting an appointment and cost of seeing a doctor) pose a threat to inclusive access to health services. Work-related time restrictions may play a role in restricting access, as might tight health budgets in times of austerity. In addition, problems of managing work and care responsibilities might prevent people from seeing a doctor; this is exacerbated if people are afraid of losing their jobs by taking time off. More flexible opening hours and other forms of access to health services (using information technology, for example) could help to mitigate some of these problems.

Measures are needed to build trust in public institutions, by tackling corruption, and by ensuring that the economically deprived have access to public services; otherwise, they might lose confidence in them. These problems are particularly acute in Greece, Romania and Bulgaria.

Childcare services and convenient working hours can help to ensure work–life integration and enable higher employment levels. However, they also play a role in allowing people to access services such as the doctor, post office, bank and health clinics. Family-friendly employment policies (for men as well as women) can also help make life easier for working families. On the other hand, the provision of public services needs to reflect changes in employment patterns. At present, it often reflects an outdated concept of employment and communications based upon limited opening hours and face-to-face services, often at inconvenient times. The use of information technology opens up new possibilities for interacting with public services. However, any such initiatives have to take account of the digital exclusion of parts of the population, who nevertheless are likely to own mobile phones. Another dimension of Europe 2020 is the digital agenda which, although so far focused upon firms and households, has important implications for the delivery of public services. Empowering citizens to interact effectively with public services would improve the overall quality of society as well as trust in public institutions, which is declining. Some countries have been able to improve the perceived quality of their public services despite the economic crisis; these countries can provide examples of good practice.

Public services need to sustain citizens through the increasing risks of transition between employment, family and housing statuses. In the European Year of Citizens 2013, the risks of moving between countries or regions should also be taken into account.

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Annex

Table A1: EQLS indicators used in analysis

	Minimum	Maximum	Average	Standard deviation	Median
Indexes					
Public service user intensity index	0.0	6.0	2.4	0.8	2.0
Childcare accessibility index	-4.0	4.0	0.8	2.3	1.0
Long-term care accessibility index	-4.0	4.0	0.4	2.5	0.0
Health services accessibility index	-5.0	5.0	2.1	2.6	2.5
Neighbourhood services accessibility index	-10.0	10.0	4.0	3.9	5.0
Satisfaction with local neighbourhood index	-6.0	6.0	3.1	3.1	4.5
Attitude to migrants index	1.0	10.0	5.1	2.0	5.0
Economic insecurity index	1.0	3.0	2.1	0.5	2.0
Public services index	1.0	10.0	5.9	1.7	6.0
Health services accessibility index	1.0	3.0	2.6	0.5	2.8
Trust in institutions	1.0	10.0	4.8	2.0	5.0
Sociodemographic characteristics					
Age (categories)	18–24 years	65 years +	3.30	1.27	3.00
Living area	1 (rural)	2 (urban)	1.51	0.50	2.00
Q40h satisfaction with economic situation of country	1	10	4.14	2.33	4.00
Q30 overall life satisfaction	1	10	7.11	2.09	8.00
Education	No education	tertiary education	3.05	1.34	3.00
Deprived	1 (not deprived)	2 (deprived)	1.33	0.47	1.00
HH2a Gender	1 (Male)	2 (Female)	1.52	0.50	2.00
Q58 household is able to make ends meet	1 (easy)	2 (difficult)	1.45	0.50	1.00
Income quartiles of	Lowest quartile	Highest quartile	2.52	1.13	3.00
Not being employed	1 (at work as employee or employer/ self-employed)	2 (childcare leave, unemployed, retired, homemaker, in education, assisting family member)	1.53	0.50	2.00
Q54a User of childcare service	1 (no user)	2 (user)	1.18	0.38	1.00
Q54b User of long-term care service	1 (no user)	2 (user)	1.13	0.33	1.00
Q32 number of children	0	14	1.39	1.32	1.00
Q47 User of health services	0 (no user)	1 (user)	0.96	0.19	1.00
Q42 health status	1 (very good)	5 (very bad)	2.25	0.95	2.00
Q53a perceived quality of health services	1 (very poor quality)	10 (very high quality)	6.27	2.21	7.00

	Minimum	Maximum	Average	Standard deviation	Median
Macro-level variables					
GDP per capita in purchasing power standards (PPS), 2010 (Eurostat)	10,700	66,300	24,422	5,720	26,400
Gini coefficient, 2010 (Eurostat)	23.8	36.9	30.48	2.84	31.10
S80/S20 income quintile shares ratio (2011, Eurostat)	3.5	6.8	4.8	1.06	4.5
S10/S1 income decile shares ratio (2011, Eurostat)	5.1	14.9	8.1	2.64	7.4
Corruption Perceptions Index, 2011 (Transparency International)	3.3	9.4	6.40	1.77	7.00
Government expenditure, total % of GDP, 2010 (Eurostat)	38	66.6	49.30	4.68	50.30
Government expenditure for health % of GDP, 2010, (Eurostat)	3.3	8.5	6.56	1.55	7.05
Employment rate – Women, 2011 (Eurostat)	41	71.8	58.52	7.88	59.70
Employment rate, 2011 (Eurostat)	55.6	74.9	64.0	5.93	59.7

Notes: Question numbers refer to those in the EQLS questionnaire (Eurofound, 2012b).
Source: EQLS 2011; Eurostat

Table A2: Factor analysis for indexes

Index	Principal component	Index	Principal component
Public services index	**1**	**Public services index (without f)**	**1**
% variance accounted for	59.3	% variance accounted for	**59.6**
Eigenvalue	4.15	Eigenvalue	**3.65**
Q53(a) Health services	0.78	Q53(a) Health services	0.798
Q53(b) Education systems	0.776	Q53(b) Education systems	0.797
Q53(c) Public transport	0.673	Q53(c) Public transport	0.688
Q53(d) Childcare services	0.805	Q53(d) Childcare services	0.809
Q53(e) Long-term care services	0.822	Q53(e) Long-term care services	0.811
Q53(f) Social/municipal housing	0.787	Q53(g) State pension system	0.719
Q53(g) State pension system	0.735		
Economic insecurity index	**1**	**Childcare access index**	**1**
% variance accounted for	**40.6**	% variance accounted for	**54.8**
Eigenvalue	**1.62**	Eigenvalue	**2.19**
Q16 Finding similar new job	0.495	Q55a cost	0.687
Q65 HH financial situation past	0.746	Q55b availability	0.783
Q66 HH financial situation future	0.776	Q55c access	0.787
Q15 Losing job	0.468	Q55d quality of care	0.697

Index	Principal component	Index	Principal component
Long-term care accessibility index	**1**	**Trust in institutions**	**1**
% variance accounted for	60.9	% variance accounted for	66.9
Eigenvalue	2.44	Eigenvalue	3.35
Q56a cost	0.751	Q28a parliament	0.861
Q56b availability	0.816	Q28b legal system	0.847
Q56c access	0.805	Q28d police	0.758
Q56d quality of care	0.747	Q28e government	0.864
		Q28f local authorities	0.752
Trust in institutions (without f)	**1**	**Attitude to migrants index**	**1**
% variance accounted for	71.6	% variance accounted for	66.1
Eigenvalue	2.87	Eigenvalue	1.98
Q28a parliament	0.882	Q27a integration in society	0.741
Q28b legal system	0.865	Q27b contribution to welfare system	0.86
Q28d police	0.758	Q27c enrichment of culture	0.834
Q28e government	0.873		
Health services accessibility index new	1	**Access to health services index old**	1
% variance accounted for	48.6	% variance accounted for	49.5
Eigenvalue	2.45	Eigenvalue	2.47
Q47a distance	0.654	Q47a distance	0.65
Q47b delay	0.779	Q47b delay	0.789
Q47c waiting time	0.781	Q47c waiting time	0.793
Q47d cost	0.688	Q47d cost	0.689
Q47e finding time because of work or caring	0.574	Q47e finding time because of work or caring	0.57
Access to health services index old (without e)	**1**	**Neighbourhood services accessibility index**	**1**
% variance accounted for	56.8	% variance accounted for	47.9
Eigenvalue	2.27	Eigenvalue	2.4
Q47a distance	0.678	Q51a postal services	0.726
Q47b delay	0.815	Q51b banking services	0.777
Q47c waiting time	0.811	Q51c public transport	0.699
Q47d cost	0.7	Q51d cinema, theatre	0.691
		Q51e green areas	0.551

Index	Principal Component
Satisfaction with local neighbourhood index	**1**
% variance accounted for	**46.8**
Eigenvalue	**2.81**
Q50a noise	0.709
Q50b air quality	0.748
Q50c quality drinking water	0.567
Q50d crime	0.685
Q50e litter	0.707
Q50f traffic congestion	0.673

Notes: Factors with eigenvalues < 1 are omitted. Varimax rotation used.

Table A3: Multilevel model of perceived quality of public services

Parameter	Estimate	Standard error	Degrees of freedom	T-statistic	Significance
Constant	6.01	0.09	24.85	66.72	0.00
Education	-0.05	0.01	20660.19	-6.12	0.00
Living in urban area	0.07	0.02	24116.57	3.65	0.00
Difficulty in making ends meet	-0.16	0.03	36.36	-4.80	0.00
Age	0.00	0.01	28.98	-0.20	0.84
Deprived	-0.11	0.02	23875.63	-4.27	0.00
Q57	0.04	0.01	23866.94	3.28	0.00
Q30	0.12	0.01	24.54	12.22	0.00
Number of children	0.02	0.01	24070.25	2.46	0.01
Being a user	0.04	0.01	24100.31	2.86	0.00
Q40h	0.22	0.01	27.76	26.24	0.00
Income quartile	-0.07	0.01	24009.10	-7.36	0.00
Not being in employment	0.14	0.02	24170.16	6.16	0.00
Government expenditure	0.03	0.01	24.96	2.39	0.03
Government expenditure*Q40h	0.00	0.00	27.28	-2.39	0.02

	Estimate	Standard error	Wald Z	Significance
Residual	1.83	0.02	109.78	0.00
UN (1,1)	0.22	0.06	3.47	0.00
UN (2,1)	0.02	0.02	1.01	0.31
UN (2,2)	0.02	0.01	2.12	0.03
UN (3,1)	0.00	0.01	0.57	0.57
UN (3,2)	0.00	0.00	0.79	0.43
UN (3,3)	0.00	0.00	2.27	0.02
UN (4,1)	0.00	0.00	-0.46	0.65
UN (4,2)	0.00	0.00	-0.38	0.70
UN (4,3)	0.00	0.00	-0.25	0.80
UN (4,4)	0.00	0.00	2.59	0.01
UN (5,1)	-0.01	0.00	-1.84	0.07
UN (5,2)	0.00	0.00	-0.14	0.89
UN (5,3)	0.00	0.00	-0.62	0.54
UN (5,4)	0.00	0.00	-0.78	0.44
UN (5,5)	0.00	0.00	2.49	0.01
	- 2 Log Likelihood	AIC	BIC	Deviance
	83795.07	83827.07	83956.60	4365.72 (df 29)

Notes: The perceived quality of public services is measured by the public services index. See Table A1.

Table A4: Multilevel model of childcare services

Parameter	Estimate	Standard error	Degrees of freedom	T-statistic	Significance
Constant	6.45	0.09	24.86	71.02	0.00
Education	-0.08	0.02	26.56	-3.39	0.00
Age	0.03	0.01	16978.03	1.78	0.08
Deprived	-0.13	0.04	17163.53	-3.25	0.00
Q57	0.05	0.02	17428.55	2.71	0.01
Q30	0.15	0.01	17328.58	18.55	0.00
Living in urban area	-0.02	0.03	17406.06	-0.53	0.60
Number of children	0.04	0.01	17440.27	3.03	0.00
Being a user	0.06	0.04	17446.43	1.73	0.08
Q40h	0.15	0.01	25.12	13.47	0.00
Income quartile	-0.06	0.02	29.70	-2.70	0.01
Not being in employment	0.06	0.03	17458.65	1.92	0.06
Living in an urban area * Being a user	-0.16	0.07	17433.64	-2.32	0.02
Employment rate female	0.03	0.01	24.85	2.62	0.02
Employment rate female * Q40h	0.00	0.00	22.84	-2.01	0.06
Employment rate female * Income quartile	-0.01	0.00	23.20	-2.17	0.04

	Estimate	Standard error	Wald Z	Significance
Residual	3.60	0.04	93.27	0.00
UN (1.1)	0.21	0.06	3.38	0.00
UN (2.1)	-0.01	0.01	-0.52	0.60
UN (2.2)	0.01	0.00	2.39	0.02
UN (3.1)	-0.01	0.01	-1.69	0.09
UN (3.2)	0.00	0.00	-0.46	0.65
UN (3.3)	0.00	0.00	1.95	0.05
UN (4.1)	0.02	0.01	1.88	0.06
UN (4.2)	0.00	0.00	1.11	0.27
UN (4.3)	0.00	0.00	-0.32	0.75
UN (4.4)	0.01	0.00	1.99	0.05
	- 2 Log Likelihood	AIC	BIC	Deviance
	72399.84	72421.84	72507.31	1279.58 (df 24)

Notes: The question reflects the perceived quality of childcare services; see Table A1.

Table A5: Multilevel model of perceived quality of long-term care services

Parameter	Estimate	Standard error	Degrees of freedom	T-statistic	Significance
Constant	5.84	0.12	25.28	50.22	0.00
Education	-0.07	0.02	22.00	-3.42	0.00
Being female	-0.09	0.03	16995.21	-2.89	0.00
Living urban area	-0.12	0.06	27.70	-1.92	0.07
Difficulty in making ends meet	-0.13	0.04	17087.68	-3.28	0.00
Age	0.01	0.01	16366.66	0.49	0.63
Deprived	-0.17	0.06	39.17	-2.85	0.01
Q57	0.05	0.02	17042.40	2.36	0.02
Q30	0.13	0.01	17098.97	15.87	0.00
Not being in employment	0.15	0.03	17096.05	4.24	0.00
Being an user	-0.07	0.04	17107.22	-1.66	0.10
Q40h	0.21	0.01	17100.76	27.06	0.00
Income quartile	-0.10	0.02	17111.43	-6.13	0.00
CPI	0.15	0.06	25.17	2.74	0.01
Living urban area * Age	-0.05	0.03	17108.88	-1.98	0.05
CPI * Q40h	-0.01	0.00	14252.72	-3.23	0.00

	Estimate	Standard error	Wald Z	Significance
Residual	3.72	0.04	92.30	0.00
UN (1.1)	0.35	0.10	3.46	0.00
UN (2.1)	-0.02	0.01	-1.50	0.14
UN (2.2)	0.01	0.00	2.00	0.05
UN (3.1)	-0.02	0.04	-0.38	0.70
UN (3.2)	-0.01	0.01	-0.78	0.43
UN (3.3)	0.08	0.03	2.76	0.01
UN (4.1)	-0.04	0.04	-1.00	0.32
UN (4.2)	0.00	0.01	-0.30	0.76
UN (4.3)	0.01	0.02	0.57	0.57
UN (4.4)	0.04	0.02	2.04	0.04
	- 2 Log Likelihood	AIC	BIC	Deviance
	71514.91	71536.91	71536.93	1603.26 (df 27)

Notes: The question reflects the perceived quality of long-term care services; see Table A1.

Table A6: Multilevel model of perceived quality of health services

Parameter	Estimate	Standard error	Degrees of freedom	T-statistic	Significance
Constant	6.32	0.14	25.34	45.05	0.00
Being female	-0.05	0.02	23701.49	-2.18	0.03
Difficulty in making ends meet	-0.10	0.03	23726.48	-3.29	0.00
Age	0.05	0.01	23713.96	4.01	0.00
Living urban area	-0.06	0.05	25.56	-1.12	0.27
Q30	0.11	0.01	23665.85	16.46	0.00
Health services accessibility index	0.14	0.01	23653.56	24.33	0.00
Income quartile	-0.05	0.01	23669.36	-4.29	0.00
Not being in employment	0.11	0.03	23715.25	3.74	0.00
Health status	-0.05	0.02	23719.60	-3.08	0.00
Q40h	0.22	0.01	28.64	15.13	0.00
Access to health services index: health status	0.02	0.00	23677.75	3.24	0.00
Q43	-0.06	0.03	23717.66	-1.80	0.07
Government expenditure health % GDP	0.17	0.07	23.77	2.50	0.02
Health services accessibility index: government expenditure health % GDP	-0.01	0.00	23123.89	-2.83	0.01

	Estimate	Standard error	Wald Z	Significance
Residual	3.52	0.03	108.79	0.00
UN (1.1)	0.48	0.14	3.41	0.00
UN (2.1)	0.09	0.04	2.25	0.03
UN (2.2)	0.05	0.02	2.63	0.01
UN (3.1)	-0.03	0.01	-2.29	0.02
UN (3.2)	-0.01	0.00	-2.36	0.02
UN (3.3)	0.00	0.00	2.95	0.00
	- 2 Log Likelihood	AIC	BIC	Deviance
	97602.72	97616.72	97673.24	3288.94 (df 22)

Notes: The question reflects the perceived quality of health services; see Table A1.

Table A7: Multilevel model of trust in institutions

Parameter	Estimate	Standard error	Degrees of freedom	T-statistic	Significance
Constant	4.85	0.07	24.81	74.10	0.00
Education	0.09	0.01	23814.24	11.02	0.00
Being female	0.08	0.02	23835.51	3.88	0.00
Living urban area	-0.09	0.02	23860.05	-4.39	0.00
Q40h	0.25	0.02	27.19	16.49	0.00
Age	0.08	0.01	23852.19	8.88	0.00
Q57	0.03	0.01	23858.13	2.07	0.04
Q30	0.07	0.01	23862.36	12.34	0.00
Income quartile	0.05	0.01	23849.89	5.12	0.00
Not being in employment	0.14	0.02	23842.00	6.19	0.00
Public service index	0.37	0.01	23851.02	50.67	0.00
CPI	0.20	0.03	25.46	6.01	0.00

	Estimate	Standard error	Wald Z	Significance
Residual	2.16	0.03	73.58	0.00
UN (1.1)	0.14	0.04	3.30	0.00
UN (2.1)	0.01	0.01	1.52	0.13
UN (2.2)	0.01	0.00	2.79	0.01
	- 2 Log Likelihood	AIC	BIC	Deviance
	39508.64	39516.64	39545.82	56648.7 (df 13)

Notes: The index reflects trust in institutions; see Table A1.

Table A8: Social quality model 2011 – factors explaining general life satisfaction

Variables	B	Beta	SE
Constant	5.209		0.99
Economic			
Deprivation scale	-0.246	-0.117**	0.12
Difficulty in making ends meet	-0.0252	0.050**	0.010
Financial distress	0.104	0.050**	0.010
Social Cohesion			
General trust	0.083	0.094**	0.004
Trust government	0.069	0.080**	0.004
Conflict scale	0.020	0.009*	0.10*
Social Integration			
Support ill	0.371	0.031**	0.059
Support advice	0.112	0.011*	0.054
Support depressed	0.120	0.014**	0.042
Support money	0.197	0.031**	0.031
Support looking for a job	-0.163	-0.035**	0.022
Married	0.244	0.058**	0.019
Face-to-face contact relatives/friends	0.233	0.028**	0.039
Relatives/friends letter etc.	0.075	0.012**	0.030
Social capital network	0.053	0.010*	0.026

Variables	B	Beta	SE
Feel left out	0.217	0.107	0.010
Empowerment			
Life complicated	0.276	0.157	0.009
Health	-0.314	-0.143	0.011
Education	-0.076	-0.049	0.008
Adjusted R²	0.292		

Notes: *p<0.01; ** p<0.001
Each scale was constructed after carrying out a factor analysis with varimax rotation and calculating the Cronbach's Alpha to ensure internal reliability. Scales were used because they even out random variability and are more stable.

Table A9: Government expenditure (total and public services), by country (%)

	Total	Health	Education: total	Education pre-primary and primary	Social protection: Old age	Social protection: Family and children	Economic affairs: Transport
AT	52.5	8.1	5.7	1.5	13.0	2.5	2.3
BE	52.9	7.9	6.2	n.a.	n.a.	n.a.	n.a.
BG	38.0	4.8	3.8	0.8	10.3	2.6	3.5
CY	46.4	3.3	7.5	2.3	5.0	1.9	1.2
CZ	44.1	7.8	4.8	0.5	7.7	1.7	4.8
DE	47.9	7.1	4.3	1.1	9.9	1.6	1.6
DK	57.8	8.4	8.0	4.0	7.7	5.5	2.0
EE	40.6	5.3	6.8	2.4	8.0	2.1	2.8
EL	50.2	7.1	4.0	1.3	13.4	1.0	1.5
ES	45.6	6.6	4.9	1.8	7.6	0.7	2.7
FI	55.5	7.9	6.6	1.3	11.1	2.8	2.4
FR	56.6	8.2	6.1	1.7	13.5	2.5	1.3
HU	49.5	5.2	5.6	1.8	7.5	2.7	3.1
IE	66.6	8.5	6.0	2.2	4.5	3.0	2.6
IT	50.4	7.5	4.5	1.6	13.7	1.1	2.0
LT	40.9	5.4	6.1	1.0	6.6	2.1	2.0
LU	42.5	5.0	5.2	2.0	10.3	3.9	2.9
LV	44.4	4.2	6.1	2.1	8.8	0.9	3.6
MT	43.2	5.5	5.7	1.3	8.2	1.2	1.1
NL	51.2	8.3	5.8	2.0	6.9	1.3	3.0
PL	45.4	5.0	5.6	1.9	9.8	1.3	4.1
PT	51.4	7.0	6.5	1.7	10.8	1.5	3.2
RO	40.2	3.6	3.3	0.9	n.a.	n.a	0.1
SE	52.3	7.1	7.0	4.0	10.6	2.6	3.1
SI	50.1	6.9	6.6	2.3	9.7	2.5	2.6
SK	40.1	6.4	4.5	n.a.	n.a	n.a.	n.a.
UK	50.3	8.2	6.9	2.1	8.4	2.2	1.7
EU27	50.6	7.5	5.5	n.a.	n.a	n.a.	n.a.

Notes: Total general government expenditure as % of GDP in 2010 (the total expenditure of general government, including central government, state government, local government, social security funds for all government functions and by functions: GF07 Health; GF09 Education: total and 09.1. pre-primary and primary education (including provision of pre-primary education, ISCED-0 and primary education, ISCED-1); GF10 Social protection: 10.2.0 Old age, including old-age pensions and care services for elderly (lodging, board for elderly in specialised homes, assistance provided to elderly to help them with daily tasks), 10.4.0 Family and children, including cash benefits and child daycare (shelter and board for pre-school children during the day, financial assistance towards payment of a nurse to look after children; GF04 Economic Affairs: 04.5 Transport; expenditure on GF 10.6.0 Housing (including support for housing cost and social housing) is not presented due to its small size (United Nations, 2013)
Provisional data: BG, EL, HU, EU27
Source: Eurostat, extraction: 5 February 2013 (expenditure by function).

Table A10: Perceived quality of selected public services, by country

| Country	Health services	Education system	Public transport	Childcare services	Long-term care services	Social/ municipal housing	State pension system
AT	8.04	7.25	7.26	7.28	7.05	7.22	6.23
BE	7.73	7.44	6.62	6.78	7.09	6.31	5.84
BG	4.50	4.93	5.28	5.05	3.75	3.35	2.85
CY	5.37	5.92	6.81	7.16	5.95	5.90	4.30
CZ	6.53	6.64	6.09	6.64	5.95	5.03	4.15
DE	6.63	6.45	6.96	6.65	6.41	6.16	5.26
DK	7.38	7.51	6.45	7.24	6.70	6.75	6.35
EE	5.75	6.20	6.36	6.25	5.32	5.22	3.94
EL	4.80	4.63	5.62	4.88	4.44	3.98	3.28
ES	7.00	6.59	6.91	6.49	6.15	5.50	5.31
FI	7.13	8.17	6.81	7.68	6.33	6.65	6.67
FR	6.86	6.12	6.55	6.28	6.52	5.62	4.99
HU	5.10	5.74	5.52	5.70	5.20	4.37	3.78
IE	4.90	6.80	5.76	6.04	5.34	5.63	5.71
IT	5.52	5.75	5.41	5.77	5.20	5.00	4.72
LT	5.22	6.04	6.16	6.41	5.49	5.51	3.97
LU	7.46	6.51	7.51	7.38	7.57	6.35	7.55
LV	5.15	5.87	6.52	5.92	5.18	5.31	3.40
MT	7.23	7.59	4.04	7.67	7.29	6.52	7.22
NL	7.18	6.92	6.62	6.90	6.64	6.49	6.65
PL	4.69	5.94	5.67	5.52	4.86	4.06	3.42
PT	5.52	5.84	5.79	6.03	5.40	5.45	3.98
RO	4.69	5.27	6.21	5.01	4.60	4.05	3.97
SE	7.32	7.05	6.80	7.29	5.67	6.37	5.33
SI	6.36	6.83	6.20	6.65	6.12	5.07	4.04
SK	4.86	5.73	5.67	5.91	5.09	4.72	3.61
UK	6.97	6.83	6.63	6.32	5.78	5.53	5.09
EU27	6.27	6.28	6.36	6.21	5.84	5.43	4.84

Notes: Q53, mean scores by country

Figure A1: Childcare users – proportion of all European childcare users, by country (%)
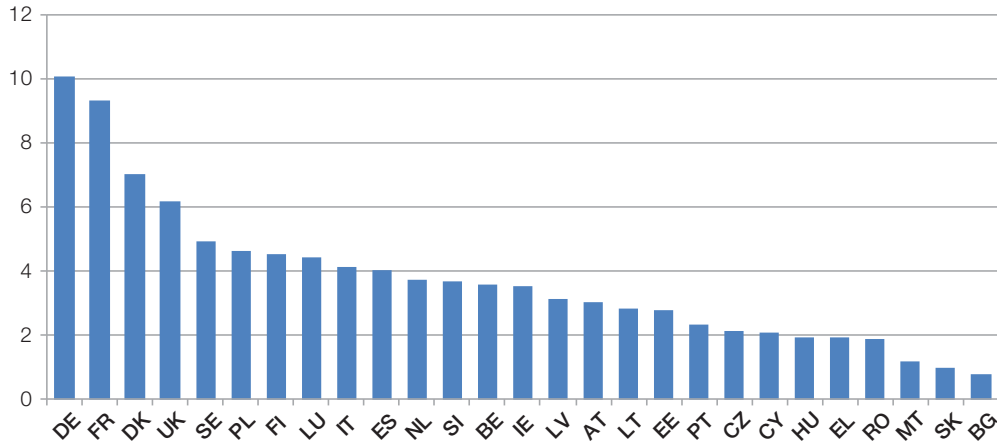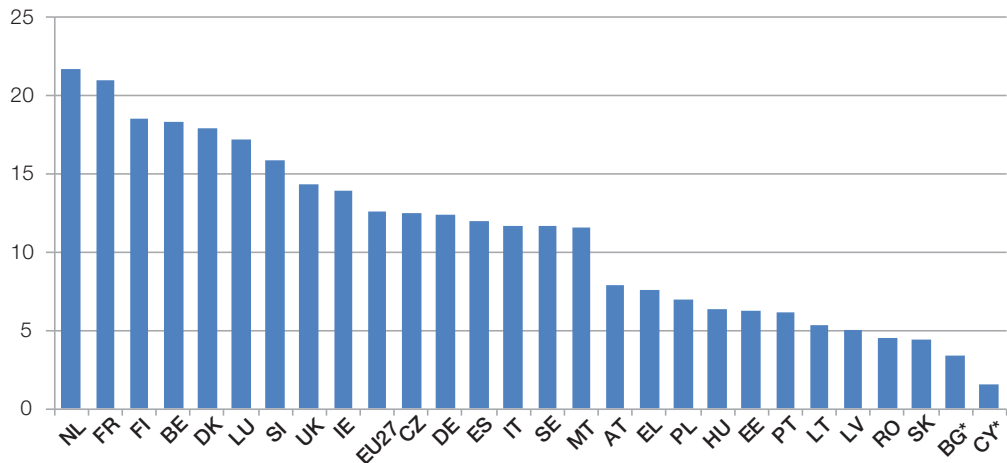

Notes: N = 6,177; Q54: For each of the following care services, have you or someone close to you, used it or would have liked to use it in the last 12 months? (a. Childcare services)

Figure A2: Childcare users – proportion of national population, by country (%)
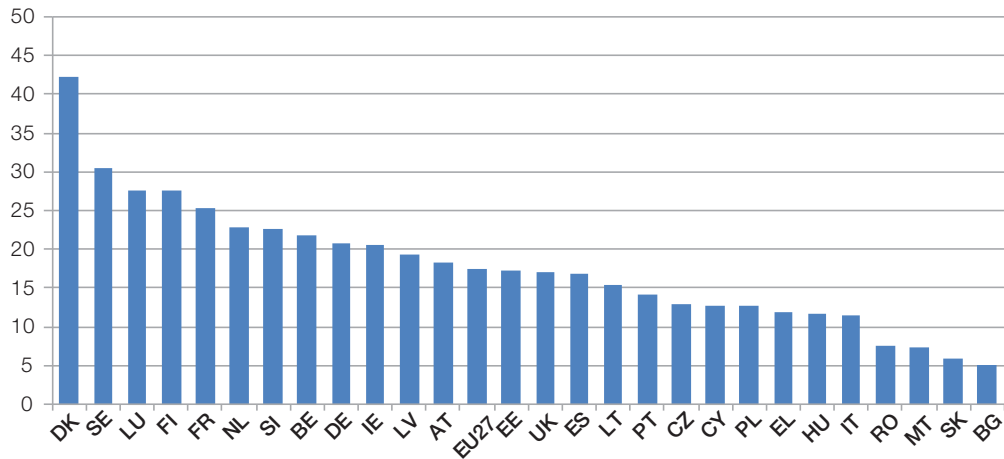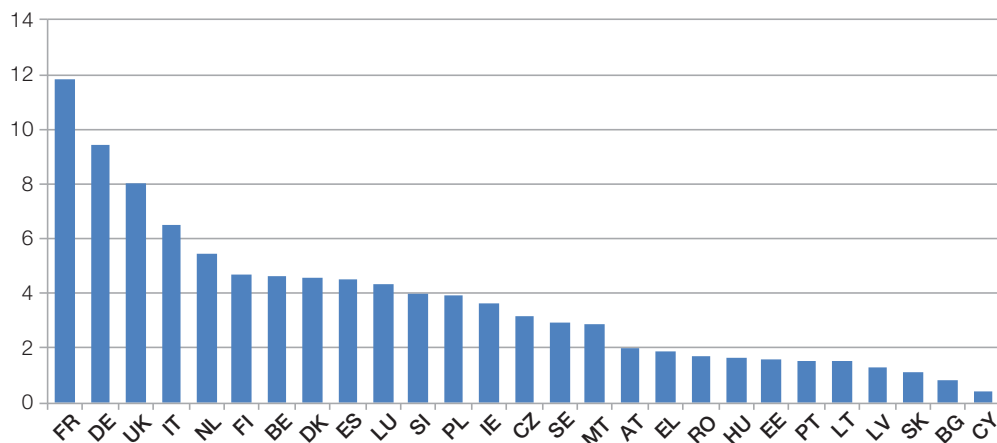

Notes: Q54a (for question wording, see note to Figure A1).

Figure A3: Childcare users – proportion of all European long-term care users, by country (%)

Notes: N = 4,462; Q54 For each of the following care services, have you or someone close to you, used it or would have liked to use it in the last 12 months? (b. Long-term care services)

Figure A4: Long-term care users – proportion of national population, by country (%)

Notes: N in Bulgaria and Cyprus is low (< 30); Q54b (for question wording, see note to Figure A3)

Table A11: Long-term care

Country	Mean	N
AT	0.83	81
BE	1.40	185
BG*	-1.32	34
CY*	0.45	16
CZ	-0.06	126
DE	0.59	378
DK	1.62	183
EE	-0.92	63
EL	-1.96	76
ES	0.47	181
FI	1.15	189
FR	0.45	475
HU	-0.55	65
IE	0.22	146
IT	-0.45	262
LT	0.02	61
LU	1.30	173
LV	-0.29	51
MT	0.84	116
NL	1.47	218
PL	-0.14	158
PT	-0.25	62
RO	-0.69	69
SE	1.13	117
SI	-0.73	160
SK	-0.63	44
UK	0.54	322
EU27	0.39	4462

Notes: Mean access based on long-term care accessibility index; number of users (p. 43)
* Sample size in Bulgaria and Cyprus is very low – results not interpreted.

Table A12: Government expenditure by country – total and local environment (%)

	Total	Housing and community amenities	Environmental protection	Public order and safety	Recreation, culture, religion
AT	52.5	0.6	0.6	1.5	1.0
BE	52.9	0.4	0.6	1.8	1.2
BG	38.0	1.0	0.7	2.7	0.8
CY	46.4	2.8	0.3	2.4	1.3
CZ	44.1	0.9	1.0	2.0	1.4
DE	47.9	0.7	0.7	1.6	0.8
DK	57.8	0.4	0.4	1.1	1.6
EE	40.6	0.6	-0.3	2.2	2.1
EL	50.2	0.2	0.6	1.8	0.6
ES	45.6	0.7	1.0	2.3	1.7
FI	55.5	0.5	0.3	1.5	1.2
FR	56.6	2.0	1.1	1.8	1.4
HU	49.5	0.4	0.6	1.9	1.8
IE	66.6	1.8	1.1	1.9	0.7
IT	50.4	0.7	0.9	2.0	0.8
LT	40.9	0.3	1.4	1.9	1
LU	42.5	0.7	1.1	1.0	1.8
LV	44.4	1.5	0.6	2.0	1.6
MT	43.2	0.3	2.0	1.5	0.8
NL	51.2	0.7	1.8	2.1	1.8
PL	45.4	1.0	0.7	1.9	1.3
PT	51.4	0.6	0.7	2.4	1.3
RO	40.2	1.3	0.7	2.4	1.1
SE	52.3	0.7	0.3	1.4	1.2
SI	50.1	0.7	0.8	1.8	2.2
SK	40.1	1.0	0.9	2.6	1.2
UK	50.3	1.3	1.0	2.6	1.1
EU27	50.6	1.0	0.9	1.9	1.2

Notes: Detailed split for various services
Total general government expenditure as % of GDP (the total expenditure of general government, including central government, state government, local government, social security funds for all government functions and by functions: GF06 Housing and community amenities; GF05 Environment protection; GF03 Public order and safety; GF08 Recreation, culture, religion (United Nations, 2013)
Provisional data: BG, EL, HU, EU27
Source: Eurostat, extraction 5 February 2013 (expenditure by function).

Table A13: Perceived difficulties in access to local neighbourhood services, by country (%)

Country	Postal services	Banking services	Public transport facilities	Cinema, theatre or cultural centre	Recreational or green area
AT	19.4	11.0	19.9	30.8	8.5
BE	24.3	17.4	17.5	22.6	11.4
BG	8.1	14.0	16.6	21.2	14.7
CY	12.4	9.2	8.8	13.1	9.6
CZ	20.5	25.9	23.1	36.0	16.1
DE	20.6	13.9	15.1	38.8	13.5
DK	19.4	16.0	15.3	14.5	2.9
EE	14.9	20.6	15.4	28.0	10.9
EL	20.9	29.7	29.6	45.2	24.1
ES	8.2	6.9	14.9	31.8	16.6
FI	11.8	14.3	22.9	19.2	3.5
FR	23.7	19.3	18.2	16.6	8.2
HU	11.9	18.0	16.2	28.2	10.1
IE	7.1	15.6	28.1	28.0	8.7
IT	24.3	16.7	26.6	22.4	14.7
LT	4.4	9.6	17.6	18.8	12.0
LU	16.9	13.4	9.2	17.6	5.8
LV	10.7	17.9	17.0	27.6	6.5
MT	16.2	21.9	46.5	18.1	15.6
NL	19.3	23.7	17.3	22.8	11.9
PL	14.5	16.1	18.7	36.0	13.4
PT	20.7	22.0	29.8	44.7	19.7
RO	8.7	16.0	13.2	23.6	15.3
SE	16.0	23.0	13.5	19.0	3.5
SI	18.6	20.9	26.1	29.4	7.8
SK	11.7	22.8	15.1	27.3	16.8
UK	12.5	19.8	13.8	26.0	8.9
EU27	17.4	16.8	18.2	28.3	12.5

Notes: Q51 Thinking of physical access, distance, opening hours and the like, how would you describe your access to the following services? Can you access a. postal services, b. banking services, c. public transport facilities, d. cinema, theatre or cultural centre, e. recreational or green area: 1. With great difficulties, 2. With some difficulties, 3. Easily, 4. Very easily, 5. Service not used. The table gives the proportion of respondents reporting great difficulties or some difficulties. Source: EQLS 2011

Table A14: Problems in local neighbourhood, by country (%)

Country	Noise	Air quality	Quality of drinking water	Crime, violence or vandalism	Litter or rubbish on the street	Traffic congestion
AT	39.5	26.6	7.8	30.2	23.7	21.8
BE	35.3	24.9	12.4	34.1	39.0	32.0
BG	38.4	41.8	49.0	42.7	57.7	31.1
CY	45.7	36.1	44.9	38.5	29.1	37.7
CZ	38.7	45.2	15.7	47.9	40.9	30.0
DE	41.7	27.0	13.9	34.4	31.8	29.8
DK	18.9	8.6	2.2	26.9	7.4	20.4
EE	31.6	30.8	30.8	31.8	32.7	19.4
EL	41.2	37.7	34.2	45.0	41.0	30.2
ES	27.4	18.6	22.2	21.9	23.6	18.8
FI	17.3	10.6	4.2	17.3	16.7	17.6
FR	30.8	20.7	18.3	30.9	32.6	25.6
HU	26.1	28.4	23.6	39.8	39.9	22.1
IE	16.9	7.9	22.7	28.3	30.9	26.7
IT	38.9	41.6	39.2	44.0	32.7	49.8
LT	32.9	34.7	31.0	34.7	36.4	32.3
LU	26.0	14.4	15.6	21.5	14.5	31.8
LV	22.7	18.1	29.0	27.5	23.7	12.6
MT	44.8	45.7	42.0	28.9	30.6	61.4
NL	21.0	13.2	2.2	30.2	20.8	18.2
PL	31.4	31.0	25.7	29.0	35.6	36.6
PT	20.8	15.7	15.0	24.4	18.8	26.6
RO	37.7	36.5	43.4	24.1	37.4	26.6
SE	24.3	11.9	4.8	26.5	30.7	18.9
SI	21.2	20.3	11.8	15.9	16.7	17.3
SK	28.2	24.9	11.1	33.4	38.4	21.4
UK	27.4	13.5	9.9	39.3	44.6	41.2
EU27	32.8	25.7	20.7	33.4	33.2	31.2

Notes: Q50: Please think about the area where you live now – the immediate neighbourhood of your home. Do you have major, moderate or no problems with the following? a. noise, b. air quality, c. quality of drinking water, d. crime, violence or vandalism, e. litter or rubbish on the street, f. traffic congestion in your immediate neighbourhood, 1. Major problems, 2. Moderate problems, 3. No problems. The table gives the proportion of respondents reporting 'major problems' and 'moderate problems'.
*Source: EQLS 2011*

Figure A5: Attitude to immigration and attitude to migrants by socioeconomic insecurity
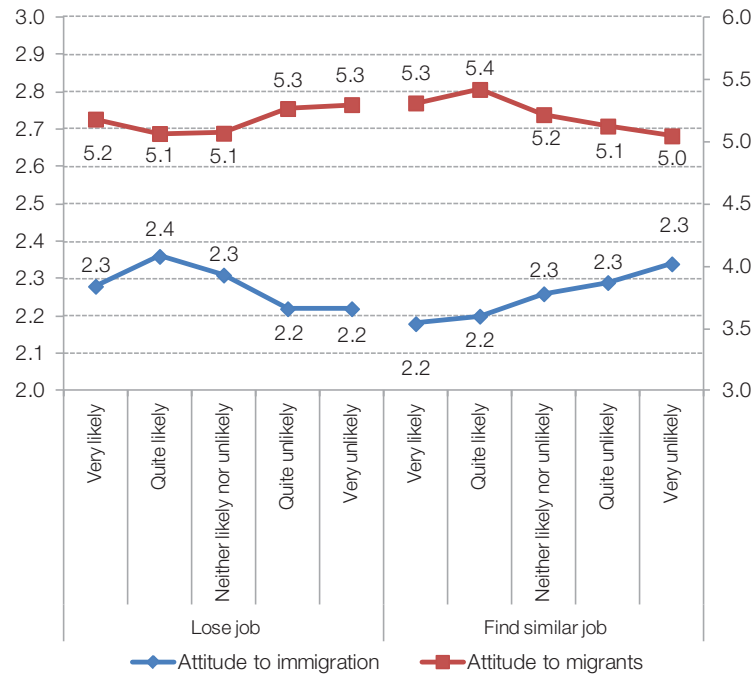
Notes: Socioeconomic insecurity factors in this case are the likelihood of losing one's job, and the likelihood of finding a similar job in the event that one quits or loses one's present job.

Q26, Q27, Q15: Using this card, how likely or unlikely do you think is it that you might lose your job in the next 6 months? 1.Very likely; 2. Quite likely; 3. Neither likely nor unlikely; 4. Quite unlikely; 5. Very unlikely.

Q16: If you were to lose or had to quit your job, how likely or unlikely is it that you will find a job of similar salary? 1. Very likely; 2. Quite likely; 3. Neither likely nor unlikely; 4. Quite unlikely; 5. Very unlikely.

Figure A6: Perceived tensions between social groups by socioeconomic insecurity
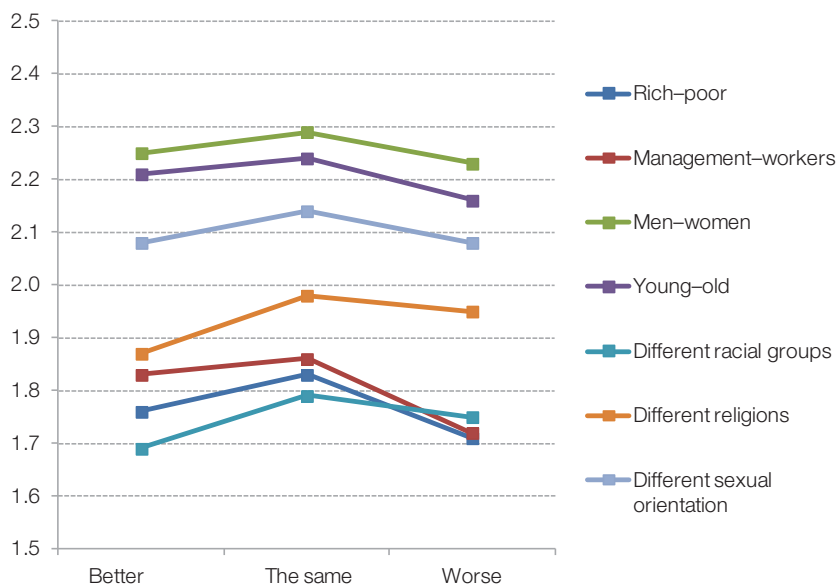
Notes: The socioeconomic insecurity factor in this case is the financial situation of household at the time of the survey and a year previously.

Q25: In all countries there sometimes exists tension between social groups. In your opinion, how much tension is there between each of the following groups in this country? a. Poor and rich people; b. Management and workers; c. Men and women; d. Old people and young people; e. Different racial and ethnic groups; f. Different religious groups; g. People with different sexual orientations. A lot of tension (1); Some tension (2); No tension (3).

Q65: When you compare the financial situation of your household 12 months ago and now would you say it has become: better (1); worse (3); or remained the same (2)?

Methodological details

Standardising occurs in two different ways: either the index is transformed to a variable with mean zero and standard deviation 1 (for instance, a comparison of access to neighbourhood services and satisfaction with local neighbourhood index), or the average for all EU countries is set at 100 and each country is given a score according the deviance from the EU27 score – for instance, a country comparison of trust in people and institutions and the corruption perceptions index (CPI). Presentation in this way makes it easy to determine if countries lie below or above the EU27 score, and moreover to identify if Member States are converging or drifting apart.

Missing values, variability: Since indexes like the public services index or the attitude to migrants index are constructed by averaging at the individual and national level, variability is strongly reduced. The category 'Don't know' is treated as a missing value. In the case of a number of indexes (the public service user intensity index, the childcare access index, the long-term care access index, the access to health services index, the access to neighbourhood services index, the satisfaction with local neighbourhood index, and the economic insecurity index) the category 'Don't know' is treated not as a missing value but rather as a kind of neutral position of a respondent.

Multilevel modelling: For interpretation of the effects, a multilevel model with centring on the grand mean (Hox, 2010) is used. The advantage of centring all explanatory variables at the grand mean is that the intercept in the equation is always interpretable at the expected value of the outcome variable, when all explanatory variables have their mean value. Moreover, this procedure has the added value that variances of the intercept and the slopes have a clear interpretation. They are the expected variances when all explanatory variables are equal to 'zero' or the expected variances for an 'average' person (Hox, 2010). Grand mean centring is especially important when the model includes interactions. For each of the explanatory variables in the interaction, the interpretation of its slope is the expected value of the slope when the other variable is zero. This method of analysis is especially important for the interpretation of cross-level interaction, and the combining of explanatory variables at the individual level with explanatory variables at the group level (such as difficulty in making ends meet and CPI). Without grand mean centring, cross-level interactions are rarely interpretable. Cross-level interaction effects are often interpreted as moderator effects. So, for example, the effect of an individual's difficulty in making ends meet is moderated by the country's CPI. Grand mean centring easily enables one to estimate the outcome variable at the country level and present the expected outcome variable for an average person in, say, Austria or Italy, for example.

Index composition

For the **public service user intensity index** every person (p_i) is dedicated a number of points given by the following definitions:

$$user\ of\ health\ services\ (p_i): f_1(p_i) = \{1, if\ (Q47a \neq 4 | Q47b \neq 4 | Q47c$$
$$\neq 4 | Q47d \neq 4 | Q47e \neq 4)\}$$

$$user\ of\ education\ system\ (p_i): f_2\ (p_i) = \{1,\ if\ HH2d = 9\}$$

$$user\ of\ public\ transport\ (p_i): f_3\ (p_i) = \{1,\ if\ Q51c < 5\}$$

$$user\ of\ childcare\ services\ (p_i): f_4\ (p_i) = \{1,\ if\ Q54a = 1\}$$

$$user\ of\ long\text{-}term\ care\ services\ (p_i): f_5\ (p_i) = \{1,\ if\ Q54b = 1\}$$

$$user\ of\ social\ housing\ (p_i): f_6\ (p_i) = \{1,\ if\ Q18 = 4\}$$

$$user\ of\ state\ pension\ services\ (p_i): f_7\ (p_i) = \{1,\ if\ HH2d = 7\}$$

$$public\ services\ user\ intensity\ index\ (p_i) = \sum_{j=1}^{7} f_j\ (p_i) \qquad j = 1, .., 7$$

Theoretically a person (p_i) can be dedicated a minimum of zero points if they use none of the services or a maximum of seven points if they use every kind of service. Since there were no respondents using both education and pensions in the dataset, the maximum is six points. The more points, the higher the intensity of use of public services mapped by the public services user intensity index. On average, the public services user intensity is 2.4 with a standard deviation of 0.8; 49.2% of people use two public services; 34.9% use three.

Figure A7: Public services user intensity index, distribution
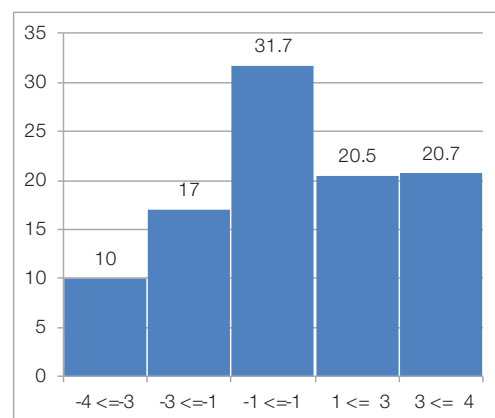
In the case of the **childcare accessibility index**, every person (p_i) is dedicated a number of points given by the following definitions:

$$cost\left(p_i\right): g_1(p_i) = \begin{cases} -1, & Q55a = 1 \\ -0.5, & Q55a = 2 \\ 1, & Q55a = 3 \\ 0, & Q55a = 98 \end{cases}$$

$$availability\left(p_i\right): g_2(p_i) = \begin{cases} -1, & Q55b = 1 \\ -0.5, & Q55b = 2 \\ 1, & Q55b = 3 \\ 0, & Q55b = 98 \end{cases}$$

$$access\left(p_i\right): g_3(p_i) = \begin{cases} -1, & Q55c = 1 \\ -0.5, & Q55c = 2 \\ 1, & Q55c = 3 \\ 0, & Q55c = 98 \end{cases}$$

$$quality\left(p_i\right): g_4(p_i) = \begin{cases} -1, & Q55d = 1 \\ -0.5, & Q55d = 2 \\ 1, & Q55d = 3 \\ 0, & Q55d = 98 \end{cases}$$

$$\text{childcare accessibility index } (p_i) = \sum_{j=1}^{4} g_j\left(p_i\right) \quad j = 1, .., 4$$

A person (p_i) is given the minimum possible -4 points if they experienced lots of difficulty for all four factors. If they experienced no difficulties for any of the four factors, they are given the maximum score of +4 points. The higher the score, the better the access to childcare services. The childcare access index is based on the answers of people reporting that they themselves use childcare services, or know someone close to them who does (Q54a). Of the sample, 17.4% (or 6,177 people) are 'users' of childcare services following this definition. On average, the childcare access index is 0.8 with a standard deviation of 2.3. When using childcare services, 10% of the respondents perceive great difficulty, but more than 40% perceive little difficulty.

Figure A8: Childcare accessibility index, distribution
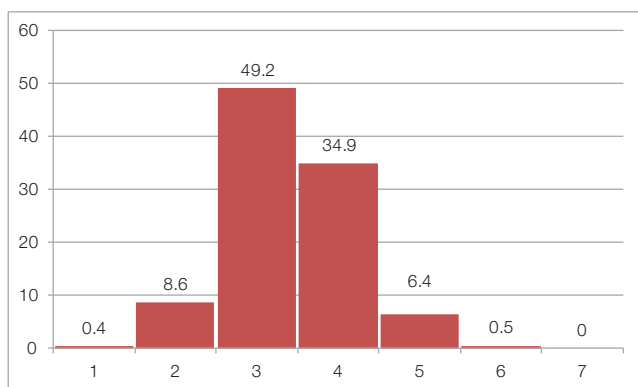
In the case of the **long-term care accessibility index**, every person (p_i) is assigned a number of points given by the following definitions:

$$cost\left(p_i\right): h_1(p_i) = \begin{cases} -1, & Q56a = 1 \\ -0.5, & Q56a = 2 \\ 1, & Q56a = 3 \\ 0, & Q56a = 98 \end{cases}$$

$$availability\left(p_i\right): h_2(p_i) = \begin{cases} -1, & Q56b = 1 \\ -0.5, & Q56b = 2 \\ 1, & Q56b = 3 \\ 0, & Q56b = 98 \end{cases}$$

$$access\left(p_i\right): h_3(p_i) = \begin{cases} -1, & Q56c = 1 \\ -0.5, & Q56c = 2 \\ 1, & Q56c = 3 \\ 0, & Q56c = 98 \end{cases}$$

$$quality\left(p_i\right): h_4(p_i) = \begin{cases} -1, & Q56d = 1 \\ -0.5, & Q56d = 2 \\ 1, & Q56d = 3 \\ 0, & Q56d = 98 \end{cases}$$

$$\text{long-term care accessibility index } (p_i) = \sum_{j=1}^{4} h_j\left(p_i\right) \quad j = 1, .., 4$$

If a person (p_i) experienced lots of difficulty for all four factors, they are given the minimum possible score of -4 points. If they experienced no difficulty for any of the four factors, they are given the maximum score of +4 points. The higher the score, the better the access to long-term care services. The long-term care accessibility index is based on the answers of people reporting that they themselves use long-term care services or know someone close to them who does (Q5ba). Of the sample, 12.6% (or 4,462 people) are 'users' of long-term care services following this definition. On average the long-term care access index is 0.4 with a standard deviation of 2.5. When using long-term care services, 11.7% of the respondents perceive lots of difficulty, while 20.2% perceive little difficulty.

Figure A9: Long-term care accessibility index, distribution
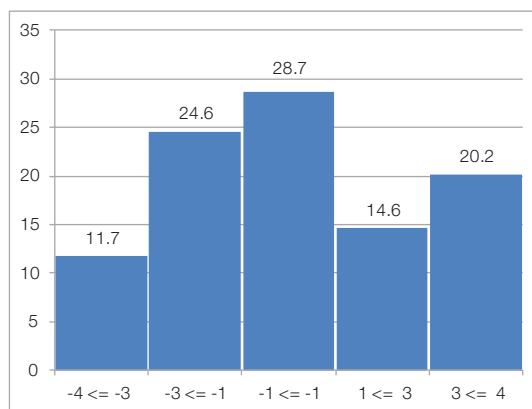
In the case of the **health services accessibility index**, every person (p_i) is assigned a number of points given by the following definitions:

$$distance\left(p_i\right):k_1(p_i)=\begin{cases}-1,Q47a=1\\-0.5,Q47a=2\\0,Q47a=4\\0,Q47a=98\\1,Q47a=3\end{cases}$$

$$delay\left(p_i\right):k_2(p_i)=\begin{cases}-1,Q47b=1\\-0.5,Q47b=2\\0,Q47b=4\\0,Q47b=98\\1,Q47b=3\end{cases}$$

$$waiting\,time\left(p_i\right):k_3(p_i)=\begin{cases}-1,Q47c=1\\-0.5,Q47c=2\\0,Q47c=4\\0,Q47c=98\\1,Q47c=3\end{cases}$$

$$cost\left(p_i\right):k_4(p_i)=\begin{cases}-1,Q47d=1\\-0.5,Q47d=2\\0,Q47d=4\\0,Q47d=98\\1,Q47d=3\end{cases}$$

$$finding\,time\left(p_i\right):k_5(p_i)=\begin{cases}-1,Q47e=1\\-0.5,Q47e=2\\0,Q47e=4\\0,Q47e=98\\1,Q47e=3\end{cases}$$

$$health\ services\ accessibility\ index\ (p_i)=\sum_{j=1}^{5}k_j\left(p_i\right)\quad j=1,..,5$$

If a person experiences lots of difficulty for all five factors, they are given the minimum possible score of -5 points. If they experience no difficulty for any of the five factors, they are given the maximum possible score of +5 points. The higher the score, the better the access to health services. On average, the health services accessibility index is 2.1, with a standard deviation of 2.6.

Figure A10: Health services accessibility index, distribution
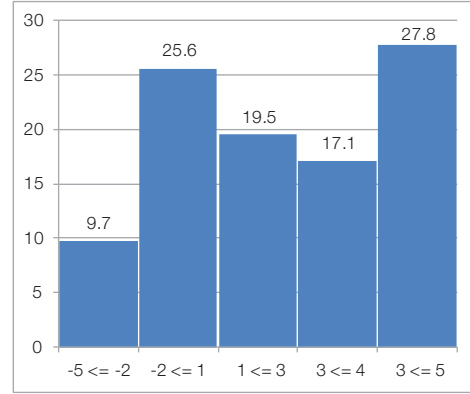
In the case of the **neighbourhood services accessibility index**, every person (p_i) is assigned a number of points given by the following definitions:

$$postal\,services\left(p_i\right):l_1(p_i)=\begin{cases}-2,Q51a=1\\-1,Q51a=2\\0,Q51a=5\\0,Q51a=98\\1,Q51a=3\\2,Q51a=4\end{cases}$$

$$banking\,services\left(p_i\right):l_2(p_i)=\begin{cases}-2,Q51b=1\\-1,Q51b=2\\0,Q51b=5\\0,Q51b=98\\1,Q51b=3\\2,Q51b=4\end{cases}$$

$$public\,transport\,facilities\left(p_i\right):l_3(p_i)=\begin{cases}-2,Q51c=1\\-1,Q51c=2\\0,Q51c=5\\0,Q51c=98\\1,Q51c=3\\2,Q51c=4\end{cases}$$

$$cinema,\,theatre\,or\,cultural\,centre\left(p_i\right):l_4(p_i)=\begin{cases}-2,Q51d=1\\-1,Q51d=2\\0,Q51d=5\\0,Q51d=98\\1,Q51d=3\\2,Q51d=4\end{cases}$$

$$recreational\,or\,green\,areas\left(p_i\right):l_5(p_i)=\begin{cases}-2,Q51e=1\\-1,Q51e=2\\0,Q51e=5\\0,Q51e=98\\1,Q51e=3\\2,Q51e=4\end{cases}$$

$$\text{neighbourhood services accessibility index } (p_i) = \sum_{j=1}^{5} l_j(p_i)$$

$$j = 1, .., 5$$

If a person reports great difficulty with all aspects of neighbourhood services, they receive the minimum possible score of -10 points. If, on the other hand, they report no difficulty with any of these aspects, they receive the maximum score of +10 points. The higher the score, the less difficulty with, and hence better access to, neighbourhood services. On average the neighbourhood services accessibility index is 4, with a standard deviation of 3.9.

Figure A11: Neighbourhood services accessibility index, distribution
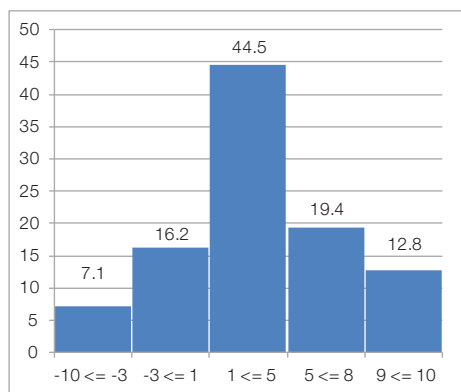
In the case of the **satisfaction with local neighbourhood index**, every person (p_i) is assigned a number of points given by the following definitions:

$$noise(p_i) : m_1(p_i) = \begin{cases} -2, Q50a = 1 \\ -1, Q50a = 2 \\ 0, Q51a = 98 \\ 1, Q51a = 3 \end{cases}$$

$$air\,quality(p_i) : m_2(p_i) = \begin{cases} -2, Q50b = 1 \\ -1, Q50b = 2 \\ 0, Q51b = 98 \\ 1, Q51b = 3 \end{cases}$$

$$quality\,of\,drinking\,water(p_i) : m_3(p_i) = \begin{cases} -2, Q50c = 1 \\ -1, Q50c = 2 \\ 0, Q51c = 98 \\ 1, Q51c = 3 \end{cases}$$

$$crime, violence\,or\,vandalism\,(p_i) : m_4(p_i) = \begin{cases} -2, Q50d = 1 \\ -1, Q50d = 2 \\ 0, Q51d = 98 \\ 1, Q51d = 3 \end{cases}$$

$$litter\,or\,rubbish\,on\,street(p_i) : m_5(p_i) = \begin{cases} -2, Q50e = 1 \\ -1, Q50e = 2 \\ 0, Q51e = 98 \\ 1, Q51e = 3 \end{cases}$$

$$traffic\,congestion(p_i) : m_5(p_i) = \begin{cases} -2, Q50f = 1 \\ -1, Q50f = 2 \\ 0, Q51f = 98 \\ 1, Q51f = 3 \end{cases}$$

$$\text{satisfaction with local neighbourhood index } (p_i) = \sum_{j=1}^{5} m_j(p_i)$$

$$j = 1, .., 5$$

A person (p_i) is given the minimum score of -6 points if they report great difficulty with all aspects of the local neighbourhood; they are given the maximum score of +6 points if they report no difficulty with any of the aspects. The higher the score, the greater the satisfaction with the local neighbourhood. On average the satisfaction with local neighbourhood index is 3.2 with a standard deviation of 3.0.

Figure A12: Satisfaction with local neighbourhood index, distribution
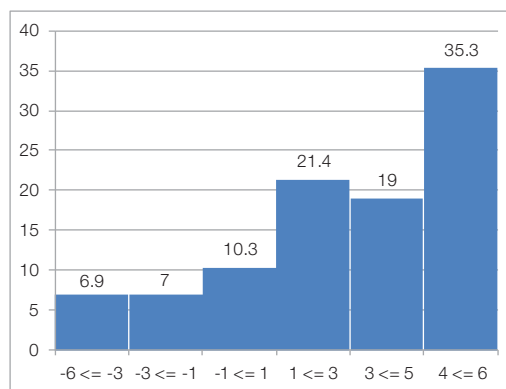
The **attitude to migrants index** is defined as the average value of the questions Q27a, Q27b and Q27c. Factor analysis is used to ensure statistical validity.

In the case of the **economic insecurity index**, every person (p_i) is assigned an average score by the following definitions:

economic insecurity index (p_i) =

$$= \frac{Q65_i + Q66_i + Q15\_new_i + Q16\_new_i}{4}$$

$$Q15\_new(p_i) = \begin{cases} 1, Q15 = 5 \\ 1, Q15 = 4 \\ 2, Q15 = 3 \\ 3, Q15 = 2 \\ 3, Q15 = 1 \end{cases}$$

$$Q16\_new(p_i) = \begin{cases} 1, Q16 = 1 \\ 1, Q16 = 2 \\ 2, Q16 = 3 \\ 3, Q16 = 4 \\ 3, Q16 = 5 \end{cases}$$

For question Q15 and Q16 the number of categories is reduced from five to three, and for question Q15 the categories were reversed. Factor analysis is used to ensure statistical validity. On average, the economic insecurity index is 2.2 with a standard deviation of 0.5.

The **public services index** is defined as the average value of the questions Q53a, Q53b, Q53c, Q53d, Q53e, Q53f and Q53g. Factor analysis is used to ensure statistical validity. When comparing with EQLS 2007, the category f (social/municipal housing) is omitted.

The **health services accessibility index** is defined as the average value of the questions Q47a, Q47b, Q47c, Q47d and Q47e. Factor analysis is used to ensure statistical validity. When comparing with EQLS 2007, the category e (finding time because of work, care of children or others) is omitted.

Trust in institutions is defined as the average value of the questions Q28a, Q28b, Q28d, Q28e and Q28f. Factor analysis is used to ensure statistical validity. When comparing with EQLS 2007, the category f (local (municipal) authorities) is omitted.

European Foundation for the Improvement of Living and Working Conditions

Third European Quality of Life Survey – Quality of society and public services

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This report explores how Europeans perceive the quality of their societies, and of their public services. It looks at such aspects of society as trust in institutions and other people, perceived tensions between social groups, attitudes towards migrants and the effects of the economic crisis on social inclusion and social cohesion. It finds that satisfaction with the economic situation of one's country, not being in employment and overall life satisfaction appear to boost satisfaction with public services; hardship appears to reduce it. In societal terms, trust in institutions decreased visibly from 2007 to 2011. Trust in people however changed less than trust in institutions and is more similar across the EU. A positive relationship exists between trust in institutions and satisfaction with the economic situation of one's own country; a negative relationship between trust in institutions and inequality. And tensions were perceived to be highest between different racial and ethnic groups and between rich and poor.