



GL Hearn

Part of Capita plc

Peterborough Sub-Region Strategic Housing Market Assessment

2015 Update Report

October 2015

Prepared by

GL Hearn Limited
280 High Holborn
London WC1V 7EE

T +44 (0)20 7851 4900
glhearn.com

Contents

Section	Page
1 INTRODUCTION	7
2 TREND-BASED DEMOGRAPHIC PROJECTIONS	14
3 ECONOMIC-LED HOUSING NEEDS	40
4 AFFORDABLE HOUSING NEED	51
5 HOUSING MARKET DYNAMICS AND MARKET SIGNALS	73
6 CONCLUSIONS	77

LIST OF FIGURES

FIGURE 1: OVERVIEW OF APPROACH	12
FIGURE 2: INDEXED POPULATION GROWTH (1981-2014)	15
FIGURE 3: INDEXED POPULATION GROWTH (1981-2014) – BY LOCAL AUTHORITY	15
FIGURE 4: COMPONENTS OF POPULATION CHANGE, MID-2001 TO MID-2014 – PETERBOROUGH HMA	17
FIGURE 5: POPULATION AGE STRUCTURE (2014)	20
FIGURE 6: PAST AND PROJECTED POPULATION GROWTH – PETERBOROUGH HMA	24
FIGURE 7: PAST AND PROJECTED POPULATION GROWTH – BY LOCAL AUTHORITY	25
FIGURE 8: COMPONENTS OF POPULATION CHANGE, MID-2001 TO MID-2036 – PETERBOROUGH HMA	26
FIGURE 9: INDEXED HOUSEHOLD GROWTH (1991-2036)	35
FIGURE 10: INDEXED HOUSEHOLD GROWTH (1991-2036) – BY LOCAL AUTHORITY	36
FIGURE 11: PROJECTED HOUSEHOLD FORMATION RATES BY AGE OF HEAD OF HOUSEHOLD – PETERBOROUGH HMA	37
FIGURE 12: PAST TRENDS AND PROJECTED EMPLOYMENT RATES – ENGLAND – RANGE OF DIFFERENT SCENARIOS	44
FIGURE 13: PROJECTED EMPLOYMENT RATES – PETERBOROUGH HMA	46
FIGURE 14: INDICATIVE INCOME REQUIRED TO PURCHASE/RENT WITHOUT ADDITIONAL SUBSIDY	56

FIGURE 15:	DISTRIBUTION OF HOUSEHOLD INCOME IN PETERBOROUGH HMA	57
FIGURE 16:	OVERVIEW OF BASIC NEEDS ASSESSMENT MODEL	58
FIGURE 17:	INDEXED SALES VOLUME, 1998-2014	75
FIGURE 18:	COMPARING DEMOGRAPHIC- AND ECONOMIC-LED ASSESSMENTS OF HOUSING NEED, 2011-36	79
FIGURE 19:	ADJUSTMENTS TO IMPROVE AFFORDABILITY FOR THOSE AGED 25-34 – PETERBOROUGH HMA	82
FIGURE 20:	COMPOSITION OF OAN, DISTRICTS 2011-36	83
FIGURE 21:	PROJECTED HOUSEHOLD FORMATION RATES BY AGE OF HEAD OF HOUSEHOLD – PETERBOROUGH	86
FIGURE 22:	PROJECTED HOUSEHOLD FORMATION RATES BY AGE OF HEAD OF HOUSEHOLD – RUTLAND	87
FIGURE 23:	PROJECTED HOUSEHOLD FORMATION RATES BY AGE OF HEAD OF HOUSEHOLD – SOUTH HOLLAND	88
FIGURE 24:	PROJECTED HOUSEHOLD FORMATION RATES BY AGE OF HEAD OF HOUSEHOLD – SOUTH KESTEVEN	89

LIST OF TABLES

TABLE 1:	COMPONENTS OF POPULATION CHANGE (2001-14) – PETERBOROUGH HMA	17
TABLE 2:	COMPONENTS OF POPULATION CHANGE (2001-14) – PETERBOROUGH	18
TABLE 3:	COMPONENTS OF POPULATION CHANGE (2001-14) – RUTLAND	18
TABLE 4:	COMPONENTS OF POPULATION CHANGE (2001-14) – SOUTH HOLLAND	19
TABLE 5:	COMPONENTS OF POPULATION CHANGE (2001-14) – SOUTH KESTEVEN	19
TABLE 6:	CHANGE IN AGE STRUCTURE 2001 TO 2014 – PETERBOROUGH HMA	21
TABLE 7:	CHANGE IN AGE STRUCTURE 2001 TO 2014	21
TABLE 8:	PROJECTED POPULATION GROWTH (2011-2036)	23
TABLE 9:	PAST TRENDS IN INTERNAL AND INTERNATIONAL MIGRATION – DATA FEEDING INTO SUBNATIONAL POPULATION PROJECTIONS	28
TABLE 10:	PROJECTED POPULATION GROWTH (2011-2036) – SNPP AND ALTERNATIVE SCENARIOS	30

TABLE 11: PROJECTED POPULATION GROWTH (2011-2036) – ALTERNATIVE SCENARIOS (PETERBOROUGH)	30
TABLE 12: PROJECTED POPULATION GROWTH (2011-2036) – ALTERNATIVE SCENARIOS (RUTLAND)	30
TABLE 13: PROJECTED POPULATION GROWTH (2011-2036) – ALTERNATIVE SCENARIOS (SOUTH HOLLAND)	31
TABLE 14: PROJECTED POPULATION GROWTH (2011-2036) – ALTERNATIVE SCENARIOS (SOUTH KESTEVEN)	31
TABLE 15: PROJECTED HOUSING NEED (PER ANNUM) UNDER A RANGE OF DIFFERENT SCENARIOS AND 2012-BASED HEADSHIP RATES	32
TABLE 16: POPULATION CHANGE 2011 TO 2036 BY FIFTEEN YEAR AGE BANDS (2012-BASED SNPP (AS UPDATED)) – PETERBOROUGH HMA	33
TABLE 17: POPULATION CHANGE 2011 TO 2036 BY FIFTEEN YEAR AGE BANDS (2012-BASED SNPP (AS UPDATED))	33
TABLE 18: PROJECTED HOUSEHOLD GROWTH (2011-2036)	34
TABLE 19: PROJECTED HOUSEHOLD GROWTH 2011-36 – 2012-BASED SNPP AND 2012-BASED HEADSHIP RATES	38
TABLE 20: FORECAST EMPLOYMENT GROWTH, BASELINE SCENARIO (2011-36)	40
TABLE 21: FORECAST EMPLOYMENT GROWTH, ASPIRATIONAL SCENARIO (2011-36)	41
TABLE 22: COMMUTING PATTERNS IN PETERBOROUGH HMA (2011)	41
TABLE 23: RELATING EMPLOYMENT GROWTH AND CHANGE IN RESIDENT WORKFORCE, BASELINE SCENARIO (2011-36)	42
TABLE 24: RELATING EMPLOYMENT GROWTH AND CHANGE IN RESIDENT WORKFORCE, ASPIRATIONAL SCENARIO (2011-36)	43
TABLE 25: EMPLOYMENT RATES BY AGE AND SEX – PETERBOROUGH HMA	47
TABLE 26: CHANGES TO ECONOMIC ACTIVITY RATES (2001-11)	48
TABLE 27: HOUSING NEED TO SUPPORT BASELINE ECONOMIC FORECASTS (2011-36)	49
TABLE 28: HOUSING NEED TO SUPPORT ASPIRATIONAL ECONOMIC SCENARIO (2011-36)	50
TABLE 29: LOWER QUARTILE SALES PRICES BY TYPE (2014)	54
TABLE 30: LOWER QUARTILE PRIVATE RENTS BY SIZE (YEAR TO MARCH 2015) – PER MONTH	54
TABLE 31: MONTHLY LOWER QUARTILE SOCIAL RENT LEVELS	55
TABLE 32: HOUSEHOLD INCOME LEVELS BY LOCAL AUTHORITY, 2014	57

TABLE 33:	MAIN SOURCES FOR ASSESSING THE CURRENT UNMET NEED FOR AFFORDABLE HOUSING	60
TABLE 34:	INITIAL ESTIMATE OF HOUSEHOLDS LIVING IN UNSUITABLE HOUSING	61
TABLE 35:	UNSUITABLE HOUSING BY TENURE AND NUMBERS TO TAKE FORWARD INTO AFFORDABILITY MODELLING	61
TABLE 36:	ESTIMATED CURRENT NEED	62
TABLE 37:	PIPELINE AFFORDABLE HOUSING SUPPLY (APRIL 2015 – MARCH 2020)	63
TABLE 38:	ESTIMATED LEVEL OF AFFORDABLE HOUSING NEED FROM NEWLY FORMING HOUSEHOLDS (PER ANNUM)	64
TABLE 39:	ESTIMATED LEVEL OF HOUSING NEED FROM EXISTING HOUSEHOLDS (PER ANNUM)	65
TABLE 40:	ANALYSIS OF PAST SOCIAL/AFFORDABLE RENTED HOUSING SUPPLY (PER ANNUM – PAST 2 YEARS (2012-14))	65
TABLE 41:	SUPPLY OF AFFORDABLE HOUSING FROM RELETS	66
TABLE 42:	ESTIMATED LEVEL OF AFFORDABLE HOUSING NEED (2014-36)	67
TABLE 43:	RELATING AFFORDABLE HOUSING NEED AND DEMOGRAPHIC PROJECTIONS	68
TABLE 44:	LHA CLAIMANTS IN THE PRIVATE RENTED SECTOR	71
TABLE 45:	CHANGE IN HOUSE PRICES BY AUTHORITY, 2012-2014	74
TABLE 46:	MEDIAN RENTAL VALUES, MARCH 2013 – MARCH 2015	74
TABLE 47:	AFFORDABILITY RATIO, 2012 V 2013	75
TABLE 48:	DEMOGRAPHIC PROJECTIONS SUMMARY, 2011-36	78
TABLE 49:	ANNUAL NEED FOR AFFORDABLE HOUSING	79
TABLE 50:	PROJECTED HOUSEHOLD GROWTH 2011-36 – WITH AFFORDABILITY ADJUSTMENTS	82
TABLE 51:	COMPOSITION OF OAN, 2011-36	84
TABLE 52:	COMPARISON OF THE 2014 SHMA AND THE 2015 UPDATE	85

Appendices

APPENDIX A:	HOUSEHOLD FORMATION RATES BY AGE IN EACH LOCAL AUTHORITY	86
--------------------	---	-----------

Quality Standards Control

The signatories below verify that this document has been prepared in accordance with our quality control requirements. These procedures do not affect the content and views expressed by the originator.

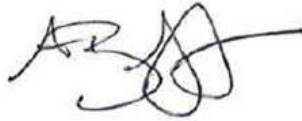
This document must only be treated as a draft unless it has been signed by the Originators and approved by a Business or Associate Director.

DATE

October 2015

ORIGINATORS

Aled Barcroft, Planner
Justin Gardner, JGC



APPROVED

Nick Ireland
Planning Director



Limitations

This document has been prepared for the stated objective and should not be used for any other purpose without the prior written authority of GL Hearn; we accept no responsibility or liability for the consequences of this document being used for a purpose other than for which it was commissioned.

1 INTRODUCTION

- 1.1 GL Hearn (GLH) and Justin Gardner Consulting (JGC) have been jointly commissioned by Rutland County Council, South Holland District Council, South Kesteven District Council, and Peterborough City Council to prepare an update to the 2014 Strategic Housing Market Assessment (SHMA) for the Peterborough Sub-Regional Housing Market Area (HMA).
- 1.2 The purpose of the 2014 SHMA was to develop a robust understanding of housing market dynamics, to provide an assessment of future needs for both market and affordable housing and the housing requirements of different groups within the population.
- 1.3 The 2014 SHMA included analysis of housing market area geographies. It defined a Peterborough Sub-Regional Housing Market as including the following, on the basis of the best fit to local authority boundaries:
- Peterborough;
 - Rutland;
 - South Holland; and
 - South Kesteven.
- 1.4 It also identifies localised interactions with adjoining areas around the boundaries of the housing market, including links from South Holland to Boston, from Peterborough to Yaxley in Huntingdonshire, Whittlesey in Fenland, and towards Wisbech; and between Rutland and Corby.
- 1.5 The 2014 SHMA considered the future need for housing in the four local authorities of the Peterborough Sub-Regional HMA over the period to 2036. It considered how many homes are needed; what types of homes – both market and affordable; as well as what housing is needed to meet the needs of specific groups within the population, including older people and those with disabilities.
- 1.6 The SHMA does not take account of development constraints or land availability. It was intended to inform the Councils' work in developing future planning policies and housing strategies. It thus forms an input to the development of new local plans; and an evidence base to support discussions regarding the mix of housing on new development schemes.

Purpose of this Report

- 1.7 The purpose of this report is to provide an update to analysis of objectively-assessed housing need (OAN) for the Peterborough Sub-Regional HMA to take account of the latest official projections – the 2012-based Population Projections, released by CLG in May 2014, and the 2012-based

Household Projections, released February 2015. In line with PPG guidance this report takes account of these latest projections and provides a single figure of OAN for each of the HMA authorities.

- 1.8 It also provides an updated assessment of affordable housing need and market signals. As with the previous 2014 SHMA, the approach used herein to define OAN follows that set out by Government in Planning Practice Guidance.
- 1.9 The report does not update analysis regarding the need for different types of homes, or the needs of specific groups within the community. It should be read alongside the 2014 SHMA which provides a full assessment of need for different types of accommodation.
- 1.10 It should be borne in mind that OAN figures are not plan targets. This was emphasised in the letter, dated 19th December 2014, from Planning and Housing minister Brandon Lewis to the Chief Executive of the Planning Inspectorate. In this letter Mr Lewis states that SHMAs are untested and “should not automatically be seen as a proxy for a final housing requirement in local plans”. It continues:

‘Councils will need to consider Strategic Housing Market Assessment evidence carefully and take adequate time to consider whether there are environmental and policy constraints, such as Green Belt, which will impact on their overall final housing requirement’.

- 1.11 The soundness test for local plans is that they meet objectively assessed development needs for their areas, and unmet need from adjoining authorities, where it is reasonable to do so and consistent with achieving sustainable development. This report focuses on what the OAN is, not what the housing target should be.

National Policy and Guidance

National Planning Policy Framework (NPPF)

- 1.12 The National Planning Policy Framework (NPPF) was published in March 2012. The Framework sets a presumption in favour of sustainable development whereby local plans should meet objectively assessed development needs, with sufficient flexibility to respond to rapid change, unless the adverse impacts of doing so would significantly or demonstrably outweigh the benefits or policies within the Framework indicate that development should be restricted.
- 1.13 The NPPF highlights the Strategic Housing Market Assessment (SHMA) as a key piece of evidence in determining housing needs. Paragraph 159 in the Framework outlines that this should identify the scale and mix of housing and the range of tenures which the local population is likely to need over the plan period which:

- Meets household and population projections, taking account of migration and demographic change;
- Addresses the need for all types of housing, including affordable housing and the needs of different groups in the community; and
- Caters for housing demand and the scale of housing supply necessary to meet this demand.

1.14 This is reaffirmed in the NPPF in Paragraph 50. The SHMA is intended to be prepared for the housing market area, and include work and dialogue with neighbouring authorities where the HMA crosses administrative boundaries. Paragraph 181 sets out that LPAs will be expected to demonstrate evidence of having effectively cooperated to plan for issues with cross-boundary impacts when their Local Plans are submitted for examining.

1.15 Paragraph 158 of the NPPF also emphasises the alignment of the housing and economic evidence base and policy. Paragraph 17 in the NPPF reaffirms this, and outlines that planning should also take account of market signals, such as land prices and housing affordability.

Planning Practice Guidance

1.16 Planning Practice Guidance was issued by Government in March 2014 on '*Housing and economic development needs assessments*' and is maintained as an online resource which is updated periodically. This SHMA update complies with the latest version of this guidance. The PPG is relevant to this report in that it provides clarity on how key elements of the NPPF should be interpreted, including the approach to deriving an objective assessment of the need for housing. The approach in this report takes account of this Guidance.

1.17 The Guidance defines "need" as referring to

"the scale and mix of housing and the range of tenures that is likely to be needed in the housing market area over the plan period – and should cater for the housing demand of the area and identify the scale of housing supply necessary to meet that demand."

1.18 It sets out that the assessment of need should be realistic in taking account of the particular nature of that area, and should be based on future scenarios that could be reasonably expected to occur. It should not take account of supply-side factors or development constraints. Specifically the Guidance sets out that:

"plan makers should not apply constraints to the overall assessment of need, such as limitations imposed by the supply of land for new development, historic under performance, viability, infrastructure or environmental constraints. However, these considerations will need to be addressed when bringing evidence bases together to identify specific policies within development plans."

1.19 The Guidance outlines that estimating future need is not an exact science and that there is no one methodological approach or dataset which will provide a definitive assessment of need. However, the starting point for establishing the need for housing should be the latest household projections

published by the Department for Communities and Local Government (CLG). This report takes account of 2012-based Household Projections published by CLG in February 2015.

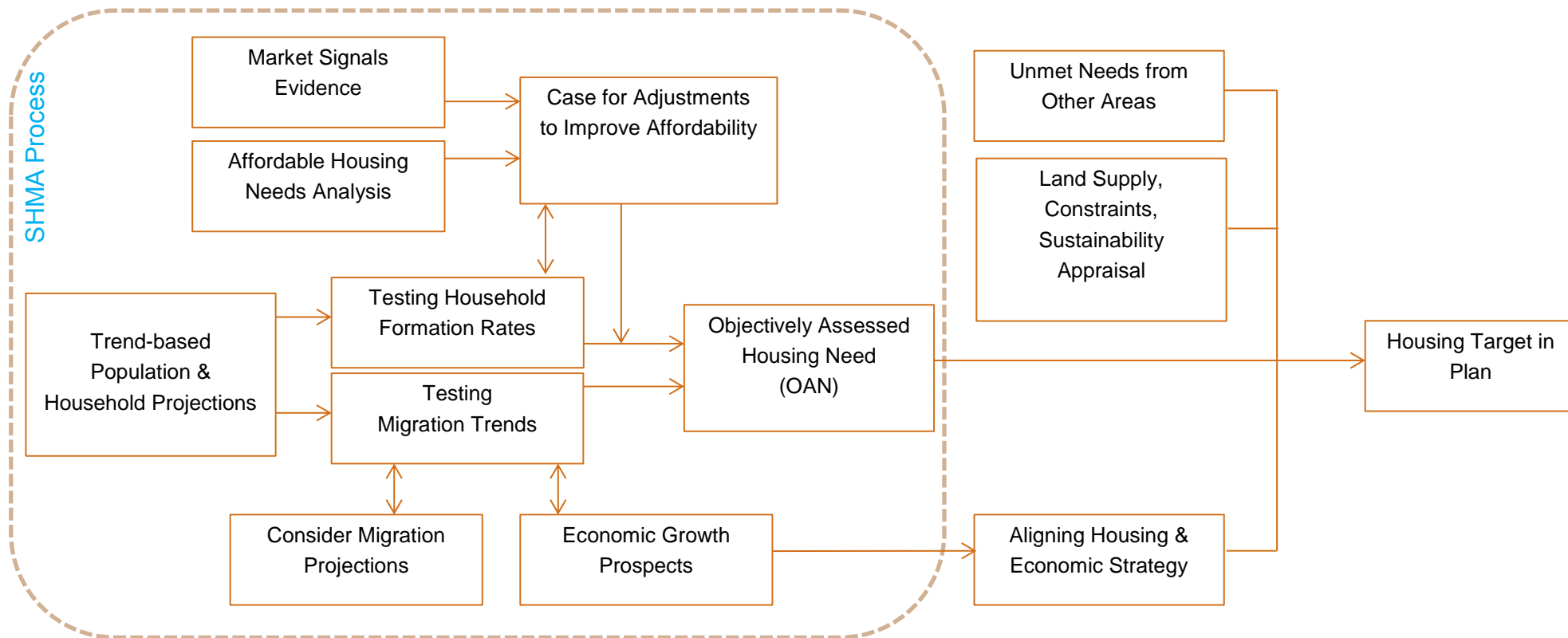
- 1.20 The Guidance sets out that there may be instances where these national projections require adjustment to take account of factors affecting local demography or household formation rates, including where there is evidence that household formation rates are or have been constrained by supply. It suggests that proportional adjustments should be made where the market signals point to supply being constrained relative to long-term trends or to other areas in order to improve affordability.
- 1.21 Evidence of affordable housing needs is also relevant, with the Guidance suggesting that the total affordable housing need should be considered in the context of its likely delivery as a proportion of mixed market and affordable housing. In some instances it suggests this may provide a case for increasing the level of overall housing provision.
- 1.22 In regard to employment trends, the Guidance indicates that job growth trends and/or economic forecasts should be considered having regard to the growth in working-age population in the housing market area. It sets out that where the supply of working age population that is economically active (labour force supply) is less than the projected job growth, this could result in unsustainable commuting patterns (depending on public transport accessibility and other sustainable options such as walking and cycling) and could reduce the resilience of local businesses. In such circumstances, plan makers will need to consider how the location of new housing and infrastructure development could help to address these problems.

Overview of the Approach to Deriving OAN

- 1.23 The NPPF and Planning Practice Guidance set out a clear approach to defining OAN for housing. We have sought to summarise this within the diagram overleaf, Figure 1. This summarises the approach we have used to considering OAN.
- 1.24 This report does not seek to set out what the housing target should be. It focuses on assessing housing need which will be an important consideration for each Council in determining its housing requirement.
- 1.25 In addition to OAN, plan makers should consider land supply, development constraints and infrastructure provision / requirements when considering whether the housing need can be met, and informing targets set out for housing provision within the plan.

- 1.26 The distinction between household projections, an objective assessment of housing need, and a 'policy on' housing requirement are set out in Paragraph 37 of the High Court judgement in the case of *Solihull MBC vs. Gallagher Estates*.

Figure 1: Overview of Approach



Report Structure

1.27 The remainder of this report is structured as follows:

- Section 2: Trend-based Demographic Projections;
- Section 3: Economic-Led Projections;
- Section 4: Affordable Housing Need;
- Section 5: Housing Market Dynamics and Market Signals;
- Section 6: Conclusions.

2 TREND-BASED DEMOGRAPHIC PROJECTIONS

2.1 In this section consideration is given to demographic evidence of housing need. The analysis begins by considering the most recent population and household projections published by ONS/CLG. These are the 2012-based Population published by The Department for Communities and Local Government (DCLG) in May 2014 and the 2012-based Household Projections published in February 2015.

2.2 The core projections in this section look at housing needs in the period from 2011 to 2036 to be consistent with previous research carried out in the HMA. Data about the population size and structure is available up to mid-2014 and so within the projections developed, the data in the 2011-14 period is fixed to published population data (from ONS).

Demographic Profile of Peterborough HMA

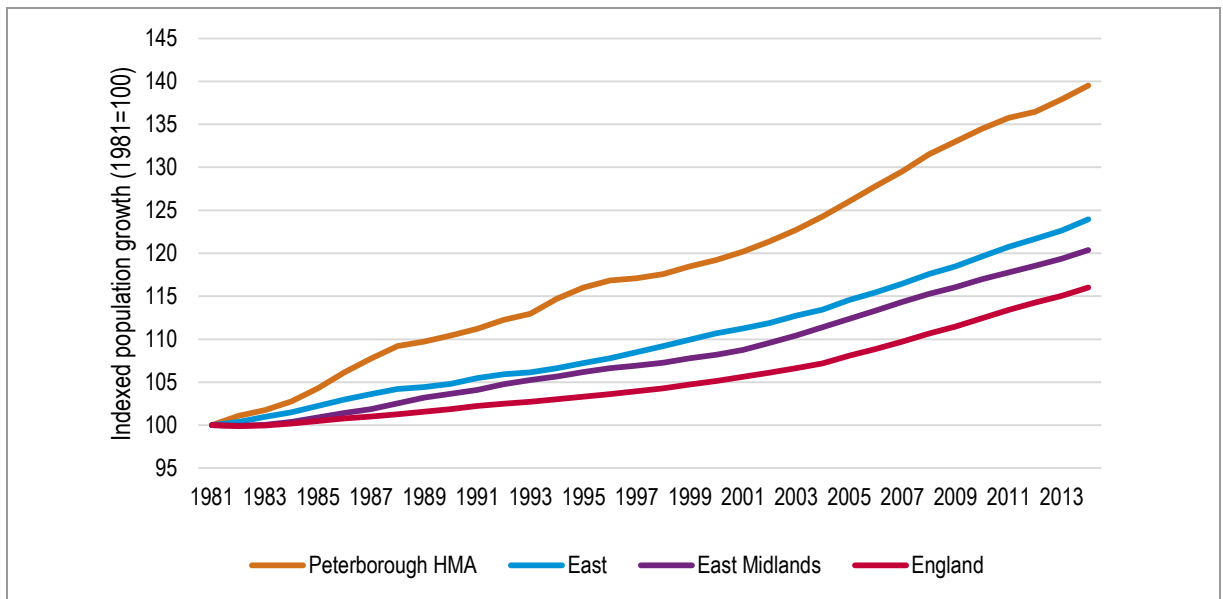
Historical Population Growth

2.3 The population of the Peterborough HMA in 2014 is estimated to be 456,900. This is an increase of 63,300 people since 2001 – a 16.1% increase over the 13-year period. This level of population growth is above that seen across the Eastern region (11.4%), the East Midlands (10.7%) and also well above the average for England as a whole (9.8%). Over the period from 2001, population growth was strongest in Peterborough (21.0% increase), and weaker in Rutland (9.8%), but with growth in Rutland still consistent with the England average.

2.4 We can also consider longer-term trends in population growth with data being available back to 1981. The figure below shows that population growth in Peterborough HMA has historically been quite strong although since about 2001, the rate of growth looks to have accelerated. The trend in the HMA is broadly similar to that seen across the relevant regions and England, albeit at a notably higher level. Overall, the population of Peterborough HMA has grown by 40% since 1981 - well above the growth level seen in the relevant regions (20%-24%) and across England (16%).

2.5 Strong growth in Peterborough in particular is likely to have been influenced by its designation by Government in the 2000s as part of a “growth area.”

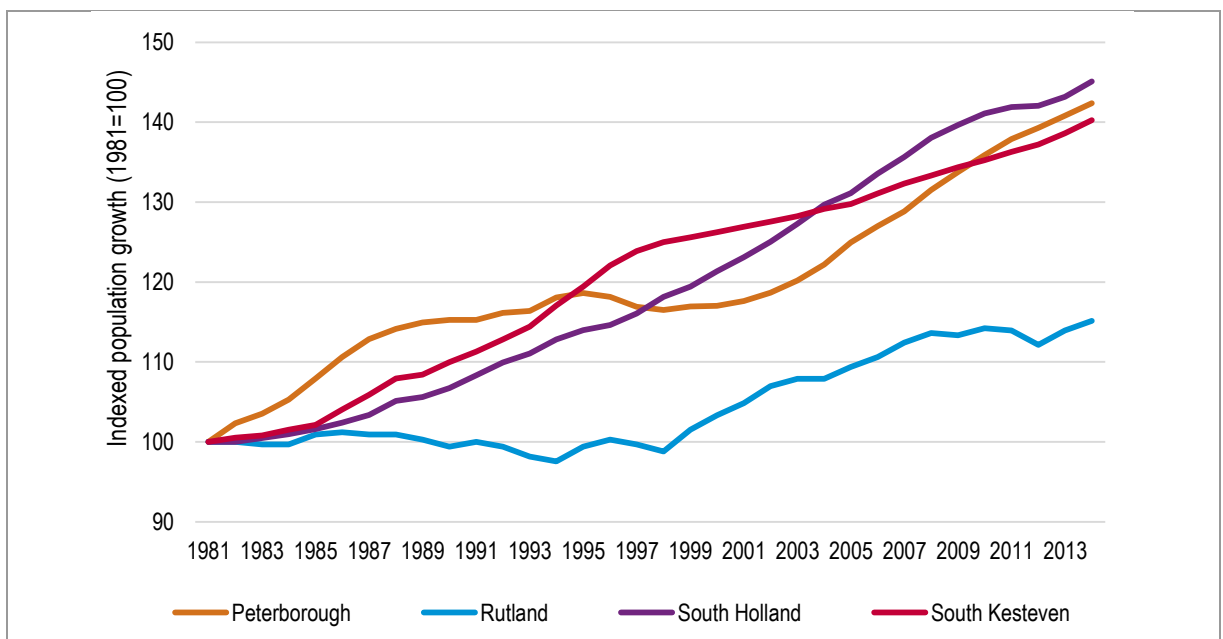
Figure 2: Indexed Population Growth (1981-2014)



Source: ONS

2.6 The figure below shows the same information for individual local authority areas. The data shows variations between areas and over time. The key trends emerging are the very strong growth in all of Peterborough, South Holland and South Kesteven and more moderate growth in Rutland – indeed the data shows no population growth in Rutland from 1981 until about 1998.

Figure 3: Indexed Population Growth (1981-2014) – by Local Authority

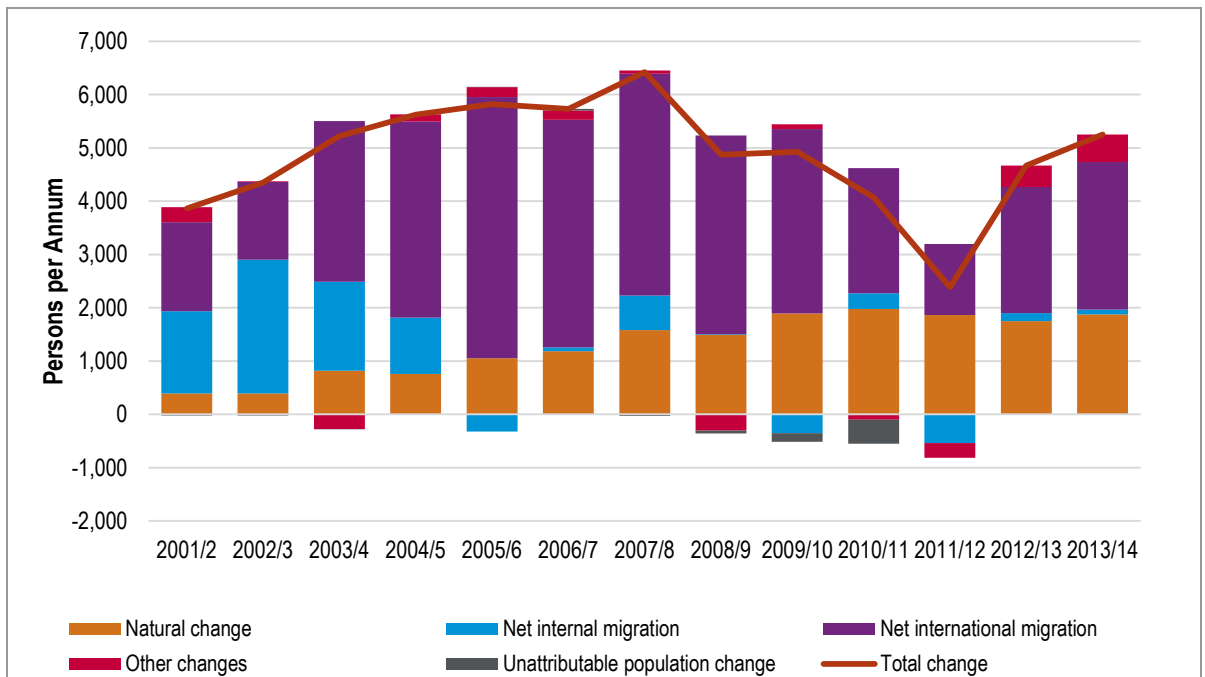


Source: ONS

Components of Population Change

- 2.7 The figure and table below consider the drivers of population change in the HMA. Population change is largely driven by natural change (births minus deaths) and migration although within ONS data there is also a small other changes category (mainly related to armed forces and prison populations) and an unattributable population change (UPC). UPC is an adjustment made by ONS to mid-year population estimates where Census data suggests that population growth could have either been over- or under-estimated in the inter-Census years or whether the Census data itself could have been inaccurate. Because UPC links back to Census data a figure is only provided for 2001 to 2011.
- 2.8 The figure shows that both natural change and net migration have been key drivers of population change. The number of births has typically exceeded the number of deaths by around 1,310 per annum over the period from 2001. The level of natural change has generally been increasing over time, although the more recent evidence suggests that this may now be levelling off. The data also shows that migration is a key component of change – particularly international migration. Over the period from 2001, net international migration into the Peterborough HMA has averaged 3,010 people per annum and net internal migration (i.e. moves from one part of the Country to Peterborough HMA) 530 per annum on average. Migration levels dropped in 2011/12 but now look to have picked up again.
- 2.9 “Other changes” (which include changes to prison and boarding school populations) are quite small and the data also shows a small (and negative) level of UPC. This latter finding could suggest that ONS has previously over-estimated migration and population growth in the HMA and this could potentially have an impact on forward projections. The implication of UPC for housing need is discussed later in this section.

Figure 4: Components of Population Change, mid-2001 to mid-2014 – Peterborough HMA



Source: ONS

Table 1: Components of Population Change (2001-14) – Peterborough HMA

Year	Natural change	Net internal migration	Net international migration	Other changes	Other (unattributable)	Total change
2001/2	390	1,545	1,671	281	-23	3,864
2002/3	390	2,515	1,458	14	-24	4,353
2003/4	818	1,671	3,013	-276	-2	5,224
2004/5	756	1,058	3,687	132	-6	5,627
2005/6	1,051	-321	4,902	188	5	5,825
2006/7	1,183	76	4,271	173	31	5,734
2007/8	1,581	652	4,160	58	-26	6,425
2008/9	1,493	12	3,728	-304	-54	4,875
2009/10	1,897	-351	3,454	92	-166	4,926
2010/11	1,977	294	2,353	-100	-452	4,072
2011/12	1,866	-541	1,332	-272	0	2,385
2012/13	1,751	147	2,369	402	0	4,669
2013/14	1,876	88	2,771	515	0	5,250

Source: ONS

2.10 The tables below provide this information for individual local authorities. The key findings from these tables include the high levels of international migration to Peterborough, a high level of 'other' changes in Rutland (likely to be linked to changes in armed forces personnel). Also shown are high level of population growth in South Kesteven over the past two years and generally lower levels in

Peterborough. The implications of recent trends in population growth and migration are discussed later in this section.

Table 2: Components of Population Change (2001-14) – Peterborough

Year	Natural change	Net internal migration	Net international migration	Other changes	Other (unattributable)	Total change
2001/2	617	-598	1,076	39	221	1,355
2002/3	637	77	1,002	26	242	1,984
2003/4	945	-647	2,167	-10	252	2,707
2004/5	938	-770	3,246	59	262	3,735
2005/6	1,067	-2,042	3,258	130	254	2,667
2006/7	1,255	-1,886	2,846	55	286	2,556
2007/8	1,493	-982	2,757	46	270	3,584
2008/9	1,526	-980	2,220	-54	224	2,936
2009/10	1,694	-1,348	2,279	-8	182	2,799
2010/11	1,715	-704	1,740	-8	-48	2,695
2011/12	1,793	-1,002	1,115	9	0	1,915
2012/13	1,758	-1,357	1,709	-109	0	2,001
2013/14	1,779	-1,642	1,843	82	0	2,062

Source: ONS

Table 3: Components of Population Change (2001-14) – Rutland

Year	Natural change	Net internal migration	Net international migration	Other changes	Other (unattributable)	Total change
2001/2	25	401	146	207	-82	697
2002/3	-18	227	88	57	-90	264
2003/4	38	279	66	-249	-70	64
2004/5	48	471	-20	82	-89	492
2005/6	84	285	34	66	-74	395
2006/7	47	452	45	134	-78	600
2007/8	22	385	40	9	-88	368
2008/9	2	199	63	-246	-79	-61
2009/10	21	209	12	114	-103	253
2010/11	13	115	25	-149	-93	-89
2011/12	-64	-147	-91	-264	0	-566
2012/13	22	207	-96	458	0	591
2013/14	17	33	40	326	0	416

Source: ONS

Table 4: Components of Population Change (2001-14) – South Holland

Year	Natural change	Net internal migration	Net international migration	Other changes	Other (unattributable)	Total change
2001/2	-318	1,435	161	0	-74	1,204
2002/3	-247	1,537	183	-12	-80	1,381
2003/4	-208	1,361	462	1	-83	1,533
2004/5	-278	852	365	-5	-70	864
2005/6	-143	585	1,111	-7	-84	1,462
2006/7	-216	736	909	-14	-67	1,348
2007/8	-118	736	928	-5	-90	1,451
2008/9	-176	318	956	1	-69	1,030
2009/10	-31	287	781	-10	-109	918
2010/11	-32	171	476	8	-138	485
2011/12	-8	-185	327	-6	0	128
2012/13	-95	177	657	-14	0	725
2013/14	-71	534	678	35	0	1,176

Source: ONS

Table 5: Components of Population Change (2001-14) – South Kesteven

Year	Natural change	Net internal migration	Net international migration	Other changes	Other (unattributable)	Total change
2001/2	66	307	288	35	-88	608
2002/3	18	674	185	-57	-96	724
2003/4	43	678	318	-18	-101	920
2004/5	48	505	96	-4	-109	536
2005/6	43	851	499	-1	-91	1,301
2006/7	97	774	471	-2	-110	1,230
2007/8	184	513	435	8	-118	1,022
2008/9	141	475	489	-5	-130	970
2009/10	213	501	382	-4	-136	956
2010/11	281	712	112	49	-173	981
2011/12	145	793	-19	-11	0	908
2012/13	66	1,120	99	67	0	1,352
2013/14	151	1,163	210	72	0	1,596

Source: ONS

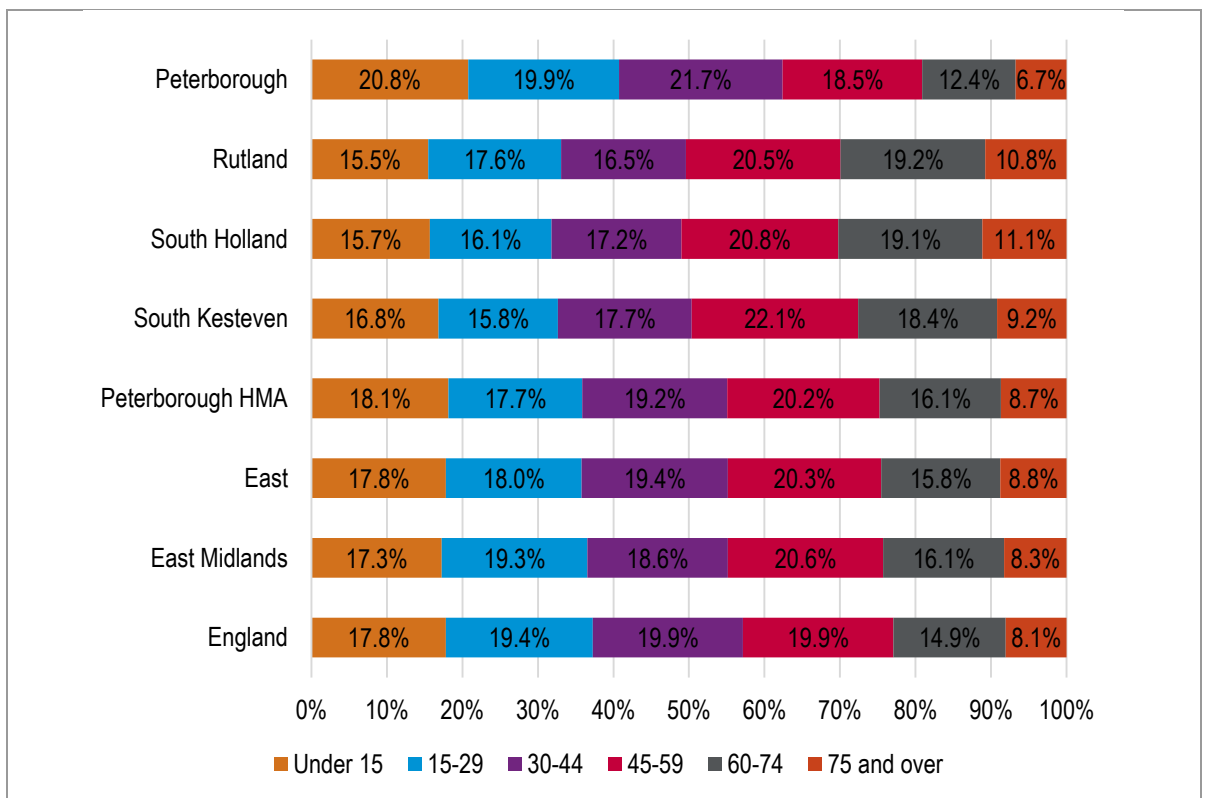
Population Age Structure

- 2.11 The population age structure has an important influence on housing need, as a growing older population will for instance drive reductions in average household sizes meaning more homes are needed to house a given population.
- 2.12 The age profile of the population of the HMA is generally similar to that seen across the regions and nationally with 25% of people aged 60 and over, this compares with 25% in the Eastern region,

24% in the East Midlands and 23% for the whole of England. The proportion of people aged Under 30 is 36%, compared with 36%-37% in the relevant regions and 37% nationally.

2.13 For individual local authority areas there are some notable differences with Rutland and South Holland (and to a lesser extent South Kesteven) having an older population; and the opposite being true for Peterborough.

Figure 5: Population Age Structure (2014)



Source: ONS 2014 mid-year population estimates

2.14 The table below shows how the age structure of the population has changed over the 2001 to 2014 period. The data shows the most significant growth to have been in the 60-74 age group: this age group also shows the highest proportionate increase (linked to improvements in life expectancy).

2.15 In number terms, there has also been notable growth in the population aged 45-59 and 15-29 with the population aged 75 and over seeing a 32% increase. The number of children (population aged under 15) has increased by about 11% and there has been only a modest increase in the population aged 30-44.

2.16 It is notable that population growth has been spread across a number of age groups, with growth in the working-age population, those of school age and older persons.

Table 6: Change in Age Structure 2001 to 2014 – Peterborough HMA

Age group	2001	2014	Change	% change
Under 15	75,000	82,900	7,900	10.5%
15-29	68,500	81,100	12,600	18.4%
30-44	87,200	87,600	400	0.5%
45-59	78,000	92,200	14,200	18.2%
60-74	55,200	73,500	18,300	33.2%
75 and over	30,100	39,700	9,600	31.9%
Total	393,600	456,900	63,300	16.1%

Source: ONS mid-year population estimates (2001 and 2014)

2.17 The same analysis has been carried out for the individual local authorities and a range of comparator areas (in the table below). The data identifies that population profile changes in the HMA are fairly similar to that seen in the regions and nationally – albeit that with higher population growth overall, the proportionate increases are typically higher.

2.18 However, for individual local authorities a different picture emerges – most notably, all areas other than Peterborough have seen significant growth in the population aged 60 and over; in Peterborough, population change has been seen across all age groups.

Table 7: Change in Age Structure 2001 to 2014

	Under 15	15-29	30-44	45-59	60-74	75 and over	Total
Peterborough	23.4%	20.3%	13.8%	23.5%	24.9%	26.7%	21.0%
Rutland	-1.7%	11.7%	-14.9%	6.8%	43.1%	51.9%	9.8%
South Holland	10.1%	33.9%	1.3%	16.8%	22.7%	36.5%	17.9%
South Kesteven	-3.3%	9.0%	-13.2%	16.5%	48.0%	28.3%	10.5%
Peterborough HMA	10.5%	18.4%	0.5%	18.2%	33.2%	31.9%	16.1%
East	5.6%	13.0%	-3.9%	15.4%	29.5%	25.0%	11.4%
East Midlands	2.0%	17.0%	-8.0%	16.0%	31.8%	21.0%	10.7%
England	4.2%	12.9%	-4.0%	16.0%	24.1%	17.5%	9.8%

Source: Mid-Year Population Estimates

Interrogating the 2012-based Population and Household Projections

2.19 The PPG states that *'household projections published by the Department for Communities and Local Government should provide the starting point estimate of overall housing need. The household projections are produced by applying projected household representative rates to the population projections published by the Office for National Statistics. Projected household representative rates are based on trends observed in Census and Labour Force Survey data.'*

2.20 The most up-to-date projections are the 2012-based CLG Household Projections published in February 2015. These projections were underpinned by ONS (2012-based) subnational population

projections (SNPP) – published in May 2014. Our analysis therefore initially considers the validity of the population projections and their consistency with past trends.

2012-Based Sub-National Population Projections

- 2.21 The latest set of sub-national population projections (SNPP) were published by ONS on the 29th May 2014. They replace the 2010- and 2011-based projections. Subnational population projections provide estimates of the future population of local authorities, assuming a continuation of recent local trends in fertility, mortality and migration which are constrained to the assumptions made for the 2012-based national population projections. The new SNPP are largely based on trends in the 2007-12 period (2006-12 for international migration trends). The SNPP are only population projections and do not contain headship rates (which are needed to convert into household estimates).
- 2.22 The SNPP are not forecasts and do not attempt to predict the impact that future government or local policies, changing economic circumstances or other factors might have on demographic behaviour. The primary purpose of the subnational projections is to provide an estimate of the future size and age structure of the population of local authorities in England. These are used as a common framework for informing local-level policy and planning in a number of different fields as they are produced in a consistent way.

Overall Population Growth

- 2.23 The table below shows projected population growth from 2011 to 2036 in each local authority and other areas. The data shows that the population of the HMA is expected to grow by around 92,000 people; this is a 20.7% increase – substantially above that expected across the East Midlands (14.8%) and also slightly above the figure for the Eastern region (20.3%). Projected population growth is also some way above the figure for England as a whole (16.5%). Population growth is expected to be particularly strong in Peterborough and weaker in Rutland.
- 2.24 It should be noted that due to inclusion within the modelling of mid-2014 population estimates for Peterborough HMA (and the individual local authorities) the figures for the HMA do not exactly match those in the SNPP as published. Figures for comparator areas are however taken directly from the SNPP. It is appropriate for the projections to take account of the latest ONS Mid-Year Population Estimates – the PPG supports this.

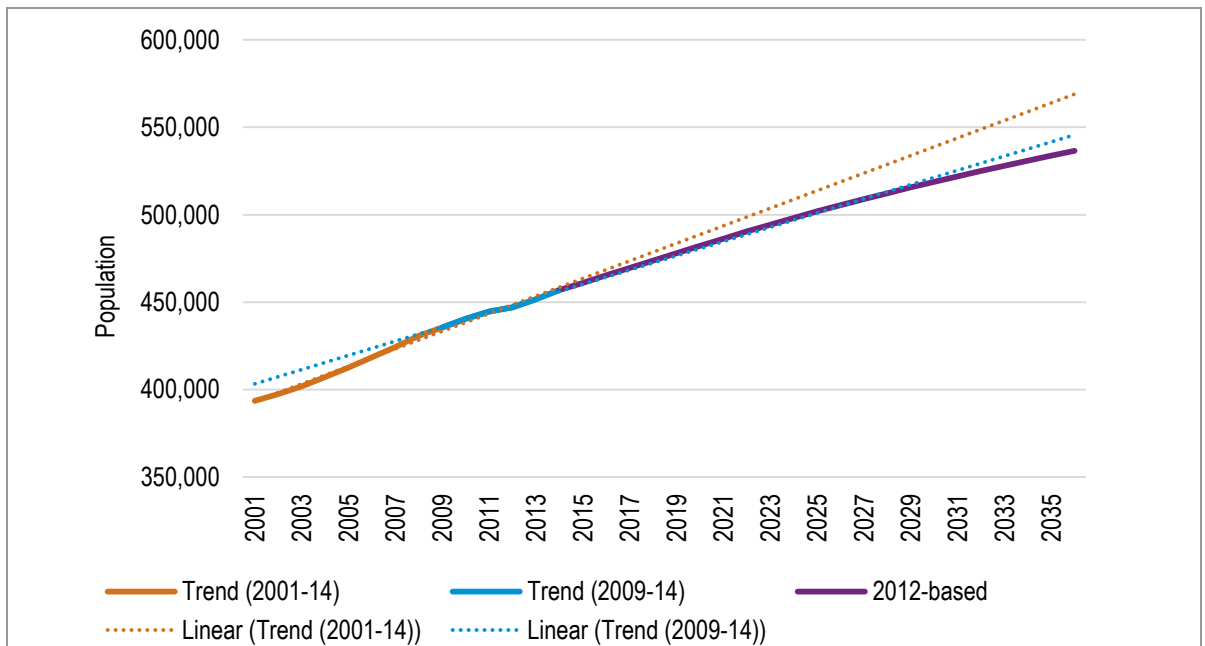
Table 8: Projected Population Growth (2011-2036)

	Population 2011	Population 2036	Change in population	% change
Peterborough	184,457	227,890	43,433	23.5%
Rutland	37,581	41,901	4,320	11.5%
South Holland	88,390	107,675	19,285	21.8%
South Kesteven	134,125	159,120	24,995	18.6%
Peterborough HMA	444,553	536,586	92,033	20.7%
East	5,862,418	7,053,100	1,190,682	20.3%
East Midlands	4,537,448	5,209,400	671,952	14.8%
England	53,107,169	61,886,100	8,778,931	16.5%

Source: ONS

- 2.25 The figure below shows past and projected population growth in the period 2001 to 2036. The data also plots a linear trend line for the last five years for which data is available (2009-14) and also a longer-term period from 2001 to 2014 – this being the longest period for which reasonable quality data about the components of population change (e.g. migration) is available.
- 2.26 The data shows that the population is expected to grow at a rate which is below long-term past trends but at a level which is very similar to that seen over the past five years. This is an important finding given that ONS typically consider short-term trends when developing the SNPP (looking at the last 5-years for internal migration and the last 6-years for international migration).
- 2.27 The rate of population growth is also shown to gradually reduce over time – this is consistent with ONS national projections, although the rate of change in the Peterborough HMA is more marked than expected nationally. The decline in the growth rate over time is due to a falling level of natural change rather than any expected changes to migration levels (this is discussed in more detail below).

Figure 6: Past and Projected Population Growth – Peterborough HMA



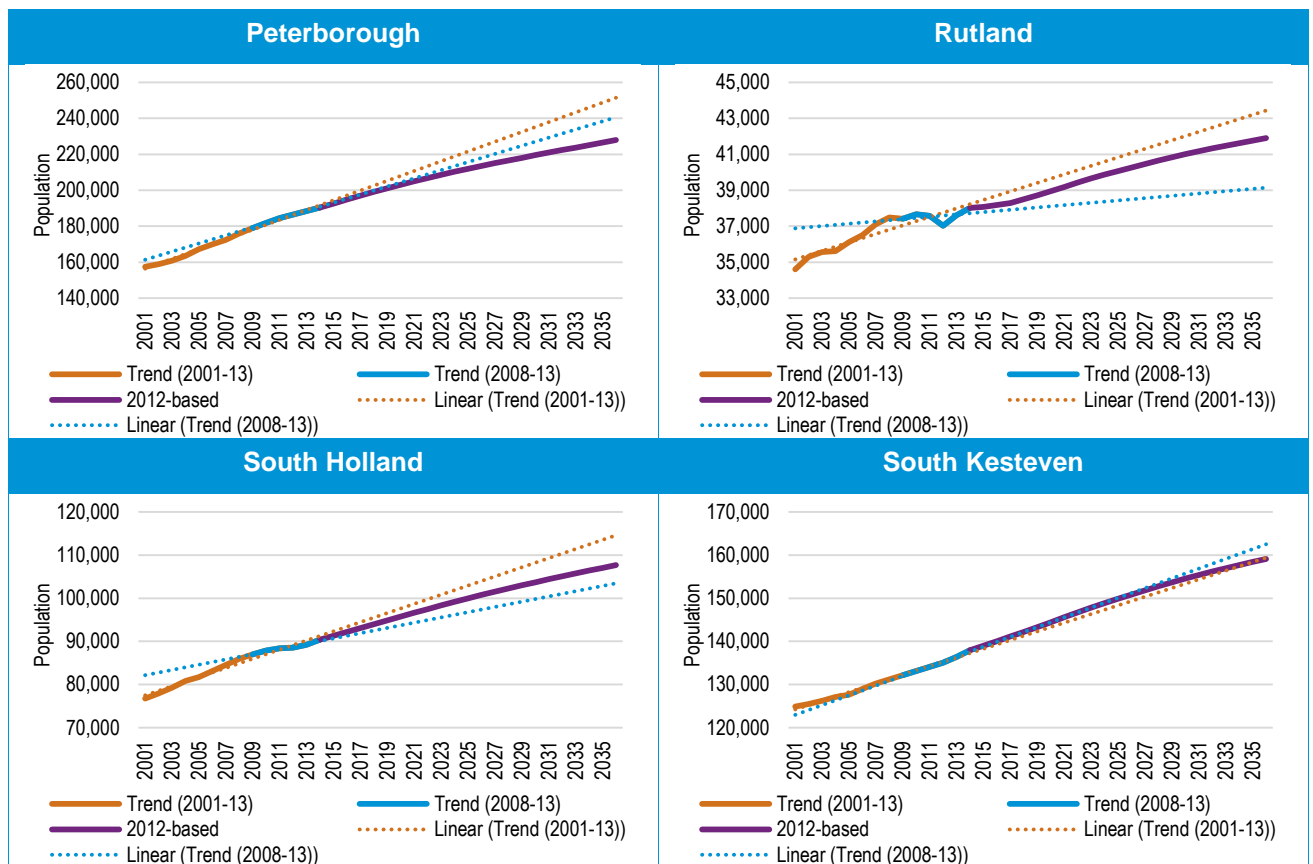
Source: ONS

- 2.28 The figures below show the same data for individual local authorities. In all areas other than Peterborough, the projected level of population growth sits somewhere in-between short- and long-term trends and on that basis looks to be reasonable.
- 2.29 In Peterborough, the projected level of population growth is slightly below past trends – this looks in part to be due to the SNPP projecting a slightly lower level of international migration than has been seen over the past few years. This is consistent with the SNPP being constrained to the national population projection (ONS 2012-based) which uses a time series back to 1994 to study international migration. Areas where international migration is a significant component of population change typically show the patterns suggested in Peterborough.
- 2.30 Additionally, the SNPP expects there to be an increased rate of net internal out-migration over time (in relation to Peterborough). This is consistent with patterns expected in other areas with relatively young population structures, and is related to age/sex specific migration patterns and how these will change as the population develops over time. Given that younger age groups tend to be more migrant, an increase in the number of young people in Peterborough is expected to result in an increase in out-migration. On the other hand, areas which see high levels of migration to Peterborough do not see the same levels of growth of younger people when compared to national trends. This means that in-migration to Peterborough is expected to increase at a relatively modest rate. The net difference is an increase in out-migration over time. On this point it is noteworthy that both Rutland and South Kesteven are expected to see net migration rise as we move through the

projection period – this again is related to the age structure and how this is expected to change over time.

2.31 Therefore the finding of below trend population growth in Peterborough in the future is not an unreasonable finding. At the HMA level, we would conclude that the SNPP is a reasonable projection to take forward into household growth modelling. For individual local authorities there are some differences between the future projection and past trends (particularly in Peterborough), although overall it is not considered that these undermine the validity of the SNPP.

Figure 7: Past and Projected Population Growth – by Local Authority



Source: ONS

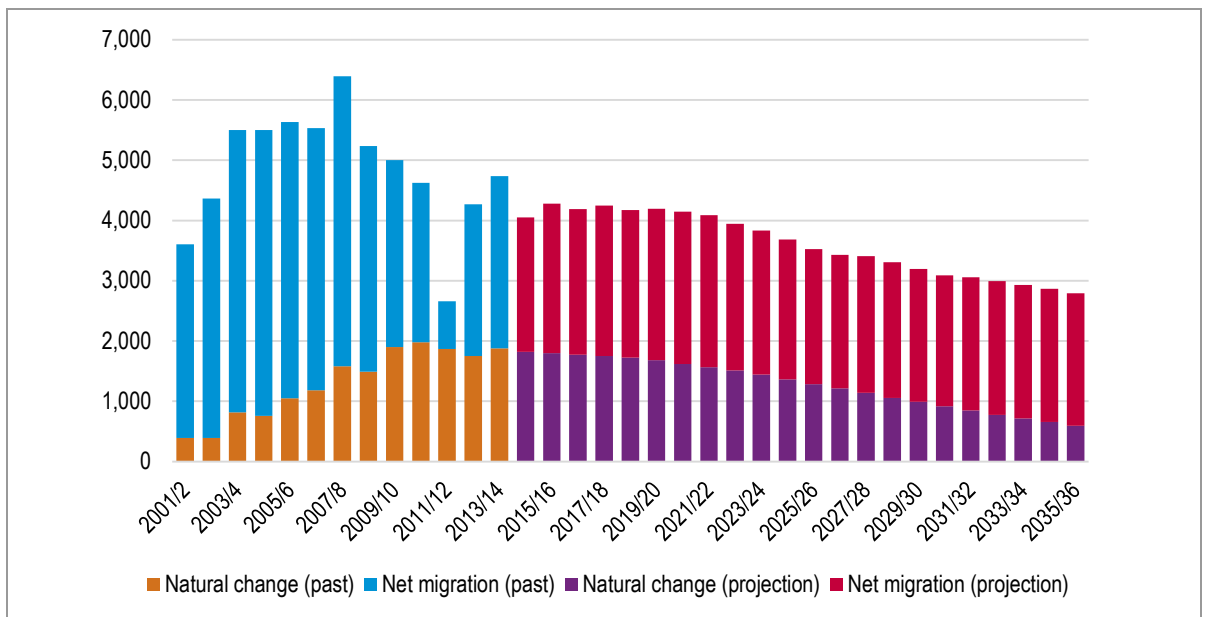
Components of Population Change

2.32 The figure below brings together data about migration (both past trends and the future projection) along with information about natural change. This shows that natural change is expected to decrease over time from about 1,800 more births than deaths per annum at the start of the projection down to around 600 by 2036.

2.33 Expected levels of migration show little variation over time (although as noted above, there are changes in different local authority areas). For the whole projection period the average level of net

migration is a little over 2,300 people per annum. The projected migration level is consistent with that seen over the past five years (2,400 per annum) but below the figure seen in long-term trends (3,500 per annum on average from 2001 to 2014).

Figure 8: Components of Population Change, mid-2001 to mid-2036 – Peterborough HMA



Source: ONS

Interrogating the 2012-based SNPP

2.34 As noted above, the SNPP looks to be a sound projection with regard to population growth in the HMA. However, earlier analysis in this report did highlight a small level of ‘unattributable population change’ (UPC) within ONS population data for the 2001-11 period. Additionally, it should be noted that the SNPP are 2012-based; with publication of new population data for 2013 and 2014 it is now possible to see if there have been any notable shifts in short-term migration patterns and hence use the more recent data to establish if the next SNPP (a 2014-based version expected to be published in Spring 2016) will differ substantially from that in the 2012-based version. Additionally, it is possible to use the ONS data to consider what level of population growth might be expected if longer-term migration trends (taken conventionally to be the past 10-years) were to occur during the projection period.

2.35 The analysis below therefore considers four potential sensitivities to the figures. These can be described as:

- Implications of 2013 and 2014 mid-year population data
- Implications of Unattributable Population Change
- 10-year migration trends (constant)
- 10-year migration trends (variable)

Implications of 2013 and 2014 mid-year population data

- 2.36 In seeking to understand how population projections might change as a result of more recent ONS data, it is important to understand how the projections work. The SNPP is not a simple roll forward of past migration numbers but also takes account of the age structure and how this will change over time – this has an impact on estimated future migration (which can go up as well as down). Additionally, international migration is linked back to the ONS national projections which use a longer-term time series for analysis (dating back to 1994). It also needs to be noted that when looking at past trends at a local level, ONS conventionally uses data from the past five years for internal/domestic migration and a period of six years when considering international migration trends.
- 2.37 The table below therefore shows average levels of migration in the periods which fed into the 2012-based SNPP and also that are expected to feed into the 2014-based SNPP. The analysis considers the difference between these periods to determine if the next set of SNPP are likely to show a higher or lower level of population growth. The analysis looks at internal and international migration separately.
- 2.38 The data shows in Peterborough, Rutland and South Holland that there has been a decrease in migration (both internal and international) with South Kesteven seeing an increase in internal migration but a decrease in relation to international migrants. Across the whole HMA, the data shows a notable reduction in net migration; a decrease of 86 internal migration and 549 for international migration when comparing the trend periods feeding into the 2012-based SNPP with the period that will feed into the next (2014-based) SNPP.

Table 9: Past Trends in Internal and International Migration – data feeding into Subnational Population Projections

	Peterborough		Rutland		South Holland		South Kesteven	
	Internal net migration	Inter-national net migration	Internal net migration	Inter-national net migration	Internal net migration	Inter-national net migration	Internal net migration	Inter-national net migration
2006/7	-	2,846	-	45	-	909	-	471
2007/8	-982	2,757	385	40	736	928	513	435
2008/9	-980	2,220	199	63	318	956	475	489
2009/10	-1,348	2,279	209	12	287	781	501	382
2010/11	-704	1,740	115	25	171	476	712	112
2011/12	-1,002	1,115	-147	-91	-185	327	793	-19
2012/13	-1,357	1,709	207	-96	177	657	1,120	99
2013/14	-1,642	1,843	33	40	534	678	1,163	210
2012-SNPP	-1,003	2,160	152	16	265	730	599	312
2014-SNPP	-1,211	1,818	83	-8	197	646	858	212
Difference	-207	-342	-69	-24	-69	-84	259	-100

Source: ONS

2.39 To provide a sensitivity analysis to the SNPP based on the latest trend data, the levels of migration underpinning the 2012-based SNPP have been adjusted to reflect the difference between figures for the different periods shown in the tables above. For example, in Peterborough, the modelling assumes a level of internal migration that is 207 people lower for each year of the projection post-2014.

Implications of Unattributable Population Change

2.40 As noted earlier there is only a modest level of Unattributable Population Change (UPC) in the ONS data for 2001-11 in the Peterborough HMA area. In this instance UPC is negative, this suggests that the components of change feeding into the SNPP may over-estimate migration and population growth.

2.41 Whilst this is a useful scenario to consider (it is one suggested in the Planning Advisory Service (PAS) guidance) we do not consider it, on its own, to be a robust alternative to the SNPP. The main reasons for this are that it is unclear if UPC is related to migration and more importantly, due to changes in the methods used by ONS to measure migration it is most probable that any errors are focussed on earlier periods (notably 2001-6) and therefore a UPC adjustment for more recent data would not be appropriate. Any impact on the SNPP projections could well be very minor.

2.42 It is also noteworthy that the 2012-based SNPP, when taken as a whole (for the HMA) shows a level of population growth which is consistent with short-term past trends, suggesting that UPC is not having a significant impact on the projections moving forward.

- 2.43 There is however a case for looking at the impact of UPC; this is particularly at a local authority level where the analysis suggests a positive level of UPC in Peterborough and negative figures in other areas.
- 2.44 In terms of the modelling, an adjustment is made to the overall migration assumptions for each year from 2014. As an example, in Peterborough, this means assuming a level of net migration which is 215 people per annum higher than suggested in the SNPP. Adjustments for other areas are more modest but in a downward direction.

10-year migration trends

- 2.45 Two projections have been developed linked to long-term (10-year) migration trends. However, knowing what levels of migration were in the past does not directly tell us what might happen in the future. This is because population projections are 'dynamic' and levels of migration can vary year-on-year as the population age structure changes (for example, if an area sees much of its growth in age bands where out-migration is typically high, then we might expect out-migration to increase at a faster rate than in-migration (and hence see a reduction in overall net migration)). The two projections therefore take a 'simple' approach and simply model the levels of migration seen over the past decade with a second projection linking to the relationship between past and projected migration in the 2012-based SNPP but including changes to migration patterns depending on the extent to which 10-year trends vary from the period feeding into the SNPP (which is the 5/6 years up to 2012). Brief descriptions are provided below:
- 10-year migration trends (constant) – based on the average level of net migration to each local authority over the past 10 years (2004-14). Analysed separately for internal and international migration and held constant over the period from 2014 onwards (note that data is fixed to 2014 by reference to mid-year population estimate data)
 - 10-year migration trends (variable) – again based on migration trends over the past 10 years (2004-14). The difference in this projection is that migration varies over time in line with changes expected in the SNPP. Essentially the projection looks at the difference between migration over the past 10 years and the level that fed into the SNPP and models this difference for each year of the projection.

Outputs from Different Demographic Projections

- 2.46 The table below shows the estimated level of population growth in the SNPP and the alternative projections developed (which in effect provide a sensitivity analysis to it). Both of the alternative scenarios show a lower level of population growth; the difference is not significant when comparing the 2012-based SNPP with a UPC adjusted projection (population growth of 20.4% compared with 20.7%) but is notably lower when considering recent migration trends (16.8% population growth). When comparing outputs with those linked to 10-year migration trends the population growth is

shown to be somewhat higher (particularly when looking at constant migration which takes no account of age structure changes).

Table 10: Projected Population Growth (2011-2036) – SNPP and Alternative Scenarios

	Population 2011	Population 2036	Change in population	% change
2012-based SNPP	444,553	536,586	92,033	20.7%
2014 updated	444,553	519,152	74,599	16.8%
UPC adjustment	444,553	535,081	90,528	20.4%
10-year migration (constant)	444,553	566,105	121,552	27.3%
10-year migration (variable)	444,553	541,135	96,582	21.7%

Source: Demographic projections

2.47 The same data can be provided for each of the four local authorities (in the tables below). The data shows in all areas other than South Kesteven that the most recent migration data would suggest a lower population growth figure (than the SNPP); whilst a UPC adjustment is lower in all areas other than Peterborough. The 10-year (constant) migration trends shows higher population growth in all areas apart from Rutland; with the variable version of this projection showing higher population growth than the SNPP in all areas apart from Peterborough.

Table 11: Projected Population Growth (2011-2036) – Alternative Scenarios (Peterborough)

	Population 2011	Population 2036	Change in population	% change
2012-based SNPP	184,457	227,890	43,433	23.5%
2014 updated	184,457	212,722	28,265	15.3%
UPC adjustment	184,457	233,747	49,290	26.7%
10-year migration (constant)	184,457	251,633	67,176	36.4%
10-year migration (variable)	184,457	224,555	40,098	21.7%

Source: Demographic projections

Table 12: Projected Population Growth (2011-2036) – Alternative Scenarios (Rutland)

	Population 2011	Population 2036	Change in population	% change
2012-based SNPP	37,581	41,901	4,320	11.5%
2014 updated	37,581	39,485	1,904	5.1%
UPC adjustment	37,581	39,701	2,120	5.6%
10-year migration (constant)	37,581	40,184	2,603	6.9%
10-year migration (variable)	37,581	43,405	5,824	15.5%

Source: Demographic projections

Table 13: Projected Population Growth (2011-2036) – Alternative Scenarios (South Holland)

	Population 2011	Population 2036	Change in population	% change
2012-based SNPP	88,390	107,675	19,285	21.8%
2014 updated	88,390	103,749	15,359	17.4%
UPC adjustment	88,390	105,495	17,105	19.4%
10-year migration (constant)	88,390	113,923	25,533	28.9%
10-year migration (variable)	88,390	111,290	22,900	25.9%

Source: Demographic projections

Table 14: Projected Population Growth (2011-2036) – Alternative Scenarios (South Kesteven)

	Population 2011	Population 2036	Change in population	% change
2012-based SNPP	134,125	159,120	24,995	18.6%
2014 updated	134,125	163,196	29,071	21.7%
UPC adjustment	134,125	156,138	22,013	16.4%
10-year migration (constant)	134,125	160,365	26,240	19.6%
10-year migration (variable)	134,125	161,886	27,761	20.7%

Source: Demographic projections

- 2.48 Whilst the analysis above provides a useful sensitivity test to the SNPP, it is not considered that any of the alternatives should be thought of as preferable to the 2012-based SNPP. With regard to updated migration information, whilst the data shows how figures have changed it is not possible to say with full confidence how this will be translated into the next SNPP (2014-based). The SNPP is not just based on overall migration levels and also takes account of the age structure of migration and how this changes over time. Additionally, the SNPP is constrained to national population projections and therefore assumptions about international migration at a national level can influence the assumptions at a local area level. Recent international migration has been higher than projected in the 2012-based SNPP.
- 2.49 With the UPC adjustment, across the HMA this component of population change is fairly modest and therefore does not appear to be strongly impacting on the future projections, with levels of population growth being broadly in-line with recent trends. Additionally, we would note that issues about UPC could now be quite historic (i.e. in the early part of the 2001-11 decade) and so would not be expected to significantly impact on forward projections.
- 2.50 The projections linked to long-term migration trends are also not thought to be a reasonable alternative to the SNPP. In the case of the 10-year migration (constant) projection it is clear that the analysis does not take account of the impact of a changing population structure (as the SNPP does) and is therefore unreliable. The variable projection looks to be more reasonable at both HMA and

district level although it would be difficult to conclude that it is in any way preferable to the official (ONS) projections.

- 2.51 Overall, it is considered that the 2012-based SNPP remains a sound demographic projection for the testing of population growth (and ultimately housing need) and it is noteworthy that the various sensitivity scenarios do broadly confirm the levels of population growth shown by the SNPP (when considered together and across the whole HMA).
- 2.52 For completeness, the table below shows the outputs (in terms of annual dwelling need) from the SNPP and each of the sensitivity scenarios developed. As can be seen, there are some notable variations at an HMA level and for individual local authorities; however, when considered together the sensitivity projections tend to support the SNPP as being a reasonable projection. An average of the sensitivities has been provided in the table below for reference purposes – it is not considered that any of the alternative projections are more robust than the SNPP.

Table 15: Projected housing need (per annum) under a range of different scenarios and 2012-based headship rates

	Peter- borough	Rutland	South Holland	South Kesteven	Peter- borough HMA
2012-based SNPP	913	140	426	583	2,063
2014 updated	665	103	360	640	1,769
UPC adjustment	1,004	108	392	535	2,039
10-year migration (constant)	1,311	118	532	609	2,571
10-year migration (variable)	871	161	483	624	2,139
Average of sensitivities	963	123	442	602	2,129

Projected Age Structure Changes

- 2.53 With growth in the population will also come age structure changes. The table below summarises the findings for key (15-year) age groups under the 2012-based SNPP (as updated to take account of 2013/14 mid-year population data).
- 2.54 The data shows that the largest growth will be of people aged 60 and over; it is estimated that there will be 170,700 people aged 60 and over in 2036 – this is an increase of 63,800 from 2011, representing growth of 60%. The population aged 75 and over is projected to increase by an even greater proportion, 104%, linked to improving life expectancy. Looking at the other end of the age spectrum the data shows that there are projected to be around 14% more people aged under 15, along with more modest increases in the population aged between 15 and 59.

Table 16: Population change 2011 to 2036 by fifteen year age bands (2012-based SNPP (as updated)) – Peterborough HMA

Age group	Population 2011	Population 2036	Change in population	% change
Under 15	79,426	90,904	11,478	14.5%
15-29	81,380	86,201	4,821	5.9%
30-44	88,735	93,403	4,668	5.3%
45-59	88,062	95,353	7,291	8.3%
60-74	69,663	94,807	25,144	36.1%
75+	37,287	75,918	38,631	103.6%
Total	444,553	536,586	92,033	20.7%

2.55 The same analysis has been carried out for the individual local authorities and a range of comparator areas (in the table below). The data identifies that projected population profile change in the HMA is in-line with that expected nationally and regionally – albeit that due to the higher level of population growth overall, the data tends to show higher age specific changes. For individual local authorities the data shows an ageing of the population in all areas; Peterborough (and to a lesser extent South Holland) however also see significant increases in the younger population – such a trend is not apparent in Rutland or South Kesteven.

Table 17: Population change 2011 to 2036 by fifteen year age bands (2012-based SNPP (as updated))

	Under 15	15-29	30-44	45-59	60-74	75 and over	Total
Peterborough	18.7%	10.3%	10.3%	21.3%	47.5%	86.8%	23.5%
Rutland	7.1%	-19.0%	-8.2%	-5.0%	23.8%	120.8%	11.5%
South Holland	14.5%	11.5%	8.1%	7.3%	26.8%	89.9%	21.8%
South Kesteven	9.5%	2.1%	-1.0%	-2.8%	35.7%	126.7%	18.6%
Peterborough HMA	14.5%	5.9%	5.3%	8.3%	36.1%	103.6%	20.7%
East	14.1%	9.2%	3.2%	9.5%	35.2%	96.4%	20.3%
East Midlands	8.9%	6.9%	-1.6%	-1.9%	30.2%	99.4%	14.8%
England	10.5%	7.0%	2.6%	5.7%	32.0%	89.3%	16.5%

Source: Demographic Projections

Household Growth

2.56 Having studied the population size and the age/sex profile of the population, the next step in the process is to convert this information into estimates of the number of households in the area. To do this the concept of headship rates is used. Headship rates can be described in their most simple terms as the number of people who are counted as heads of households (or in this case the more widely used Household Reference Person (HRP)).

- 2.57 With the publication of new 2012-based CLG household projections a new set of headship rates is now available. These rates are considered to be more positive than the previous set (2011-based) and typically suggest higher rates of household growth for a given population.
- 2.58 The table below shows expected household growth in the 2012-based projections from 2011 to 2036 for Peterborough HMA and a range of other areas.
- 2.59 The figures for the Peterborough HMA authorities do not exactly match the CLG projections as published as we have included population data for 2013 and 2014. All other areas show the data as published. The data suggests an increase in households of 49,600 over the 25-year period – this is a 27% increase; the same as projected in the Eastern region and higher than expected across the East Midlands and also higher than the national average.

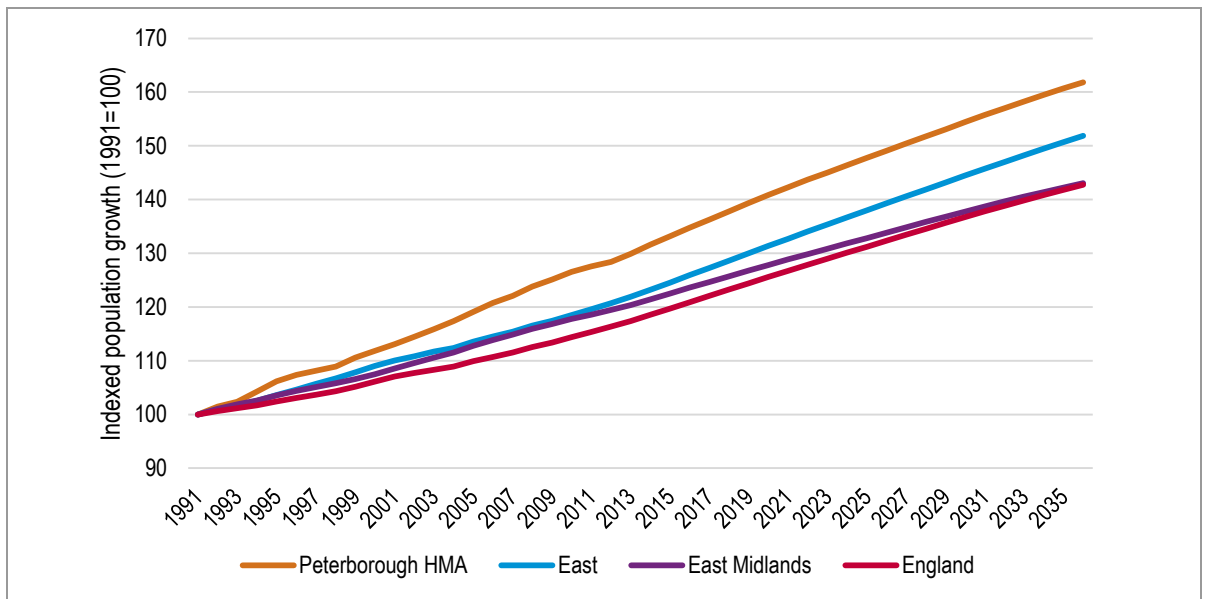
Table 18: Projected Household Growth (2011-2036)

	Households 2011	Households 2036	Change in households	% change
Peterborough	74,357	96,356	21,999	29.6%
Rutland	15,132	18,399	3,267	21.6%
South Holland	37,324	47,590	10,266	27.5%
South Kesteven	57,530	71,561	14,031	24.4%
Peterborough HMA	184,342	233,906	49,563	26.9%
East	2,429,902	3,085,856	655,954	27.0%
East Midlands	1,897,445	2,289,584	392,139	20.7%
England	22,103,878	27,363,402	5,259,524	23.8%

Source: CLG and demographic projections

- 2.60 Figure 9 overleaf shows household growth back to 1991 and projected forward to 2036. The analysis shows that growth in Peterborough HMA has generally been significantly stronger than seen across other areas.

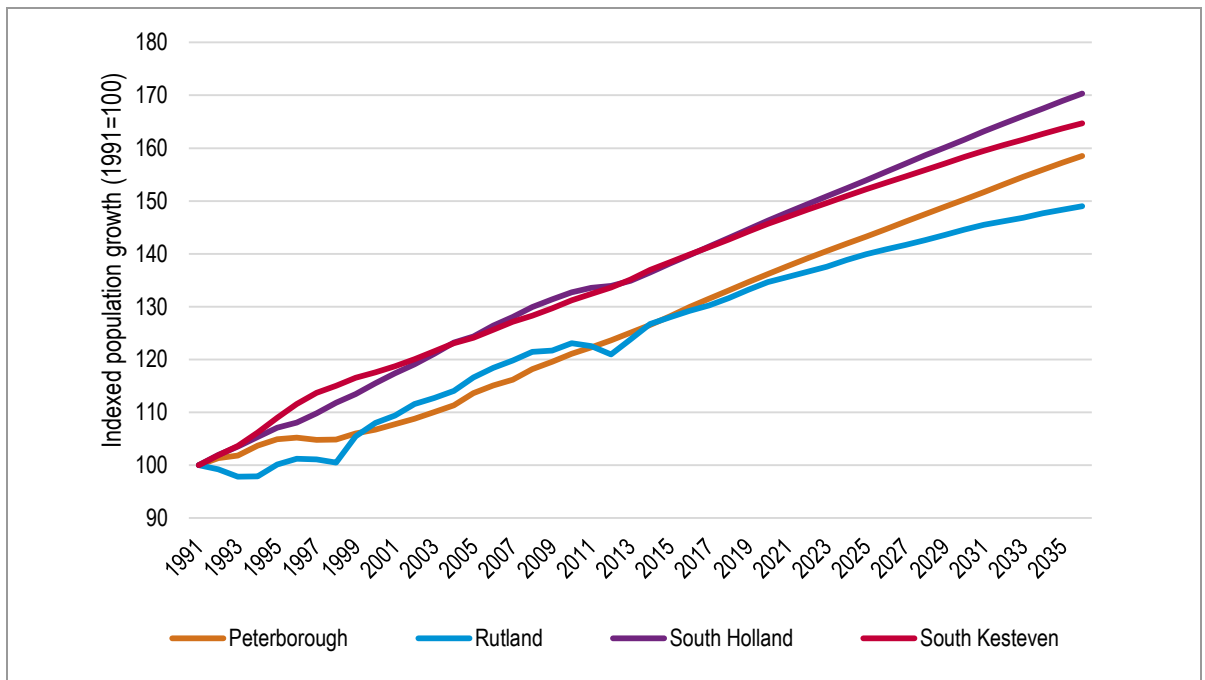
Figure 9: Indexed household growth (1991-2036)



Source: CLG and demographic projections

2.61 The figure below shows the same information for individual local authority areas. The data shows that all areas are expected to see growth which is broadly in-line with long-term past trends (arguably with a slight uplift in Peterborough and more modest growth in Rutland and South Kesteven). All areas are expected to see notable levels of household growth. The rate of household growth is influenced by the level of population growth, but also age structure changes within the population.

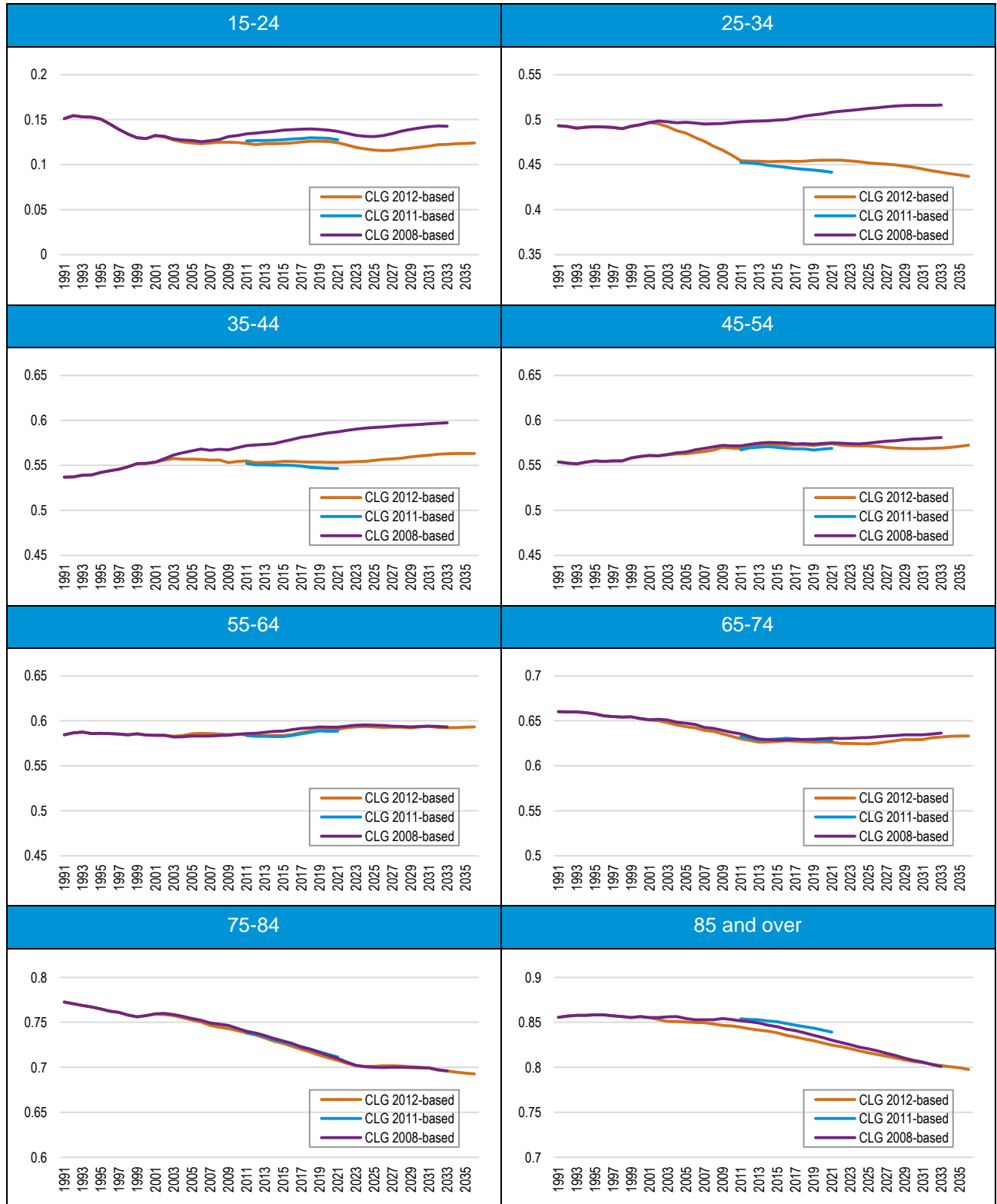
Figure 10: Indexed Household Growth (1991-2036) – by Local Authority



Source: CLG and demographic projections

- 2.62 The figures described above all use information from the 2012-based CLG household projections to convert population into households and it is useful to understand how the different CLG projections impact on assumptions for different age groups (i.e. to compare the 2012-based projections with those released as 2008- and 2011-based versions).
- 2.63 The figure below shows the headship rates used in each of the projections. Overall the 2012-based projections look fairly sound with levels and rates of change being not dissimilar to those in the earlier (pre-recession) 2008-based projections.
- 2.64 The main age group of concern is people aged 25-34 where the latest projections show quite a movement away from historic figures (e.g. levels in the 1991-2001 period). Particularly in the 2001-11 period, the 2012-based projections do appear to be indicating some degree of suppressed household formation with household formation for this age group falling. Whilst the downward trend is moderated moving forward post-2012, it still leaves the rate below historical figures (e.g. for 2001, when the rate started to decrease).
- 2.65 Looking at some other age groups, the data shows a small difference between rates in the 2012- and 2008-based data for 15-24 and 35-44 age groups – however, in both cases, by 2036 the rates are expected to be around the levels seen back in 2001. Therefore, the 25-34 age group remains the only one where further consideration of household formation rates is required – this is discussed in more detail later in the report.

Figure 11: Projected household formation rates by age of head of household –Peterborough HMA



Source: Derived from CLG data

2.66 The table below brings together outputs in terms of household growth and housing need using the 2012-based headship rates and the 2012-based SNPP (as updated). To convert households into dwellings the data includes an uplift to take account of vacant homes. Analysis of 2011 Census data about unoccupied household spaces provides the following vacancy rate figures which have been used in analysis:

- Peterborough – 3.8%;
- Rutland – 7.1%;
- South Holland – 3.8%; and
- South Kesteven – 3.9%¹.

2.67 It is assumed that such a level of vacant homes will allow for movement within the housing stock and includes an allowance for second homes.

2.68 The analysis shows an overall housing need for 2,063 dwellings per annum across the HMA. Following the approach in the PPG, this would be considered a starting point for assessing housing need. It takes account of the most recent population and household projections as well as more up-to-date information about population growth.

2.69 For individual authorities, this projection shows a need for between 140 dwellings per annum in Rutland to 913 in Peterborough.

Table 19: Projected household growth 2011-36 – 2012-based SNPP and 2012-based headship rates

	Households 2011	Households 2036	Change in households	Per annum	Dwellings (per annum)
Peterborough	74,357	96,356	21,999	880	913
Rutland	15,132	18,399	3,267	131	140
South Holland	37,324	47,590	10,266	411	426
South Kesteven	57,530	71,561	14,031	561	583
Peterborough HMA	184,342	233,906	49,563	1,983	2,063

Trend Based Demographic Projections: Implications

2.70 The 2012-based subnational population projections (SNPP) look to be a sound demographic projection. Future population growth sits in-line with short-term trends, although at a level that is below long-term trends. Future levels of migration are also in-line with short-term past trends, an important finding given that official projections (by ONS) focus on data from the last 5-6 years.

¹ These rates describe the relationship between dwellings and occupied household spaces (Rate = dwellings / occupied spaces – 1). This differs from a typical vacancy rate which is calculated as a proportion of the total dwelling stock.

- 2.71 Alternative (sensitivity) projections using more recent migration trends and a UPC adjustment show population growth which is below the SNPP. This would suggest that the SNPP is not likely to under-estimate future population growth (and hence will not underestimate housing need).
- 2.72 The 2012-based CLG household projections also look to be reasonably sound when considering age specific household formation rates. The only age group where there is some concern is people aged 25-34 where there does appear to be some degree of suppression in the past although significant continued suppression is not being projected in the future.
- 2.73 The 2012-based population and household projections suggest a need for about 2,063 dwellings per annum to be provided across the HM. This takes account of 2013 and 2014 midyear population data.

3 ECONOMIC-LED HOUSING NEEDS

3.1 As well as looking at demographic trends when considering what the housing requirement should be CLG advice suggests considering economic (job growth) forecasts. In particular the PPG states that:

'Plan makers should make an assessment of the likely change in job numbers based on past trends and/or economic forecasts as appropriate and also having regard to the growth of the working age population'

3.2 And that:

'Where the supply of working age population that is economically active (labour force supply) is less than the projected job growth, this could result in unsustainable commuting patterns (depending on public transport accessibility or other sustainable options such as walking or cycling) and could reduce the resilience of local businesses. In such circumstances, plan makers will need to consider how the location of new housing or infrastructure development could help address these problems'

Expected Employment Growth

3.3 To be consistent with the earlier SHMA for the HMA, the two economic forecasts considered in the 2014 SHMA have been tested. The first is a baseline Experian forecast (September 2013) and the second uses the same forecast but with an uplift in forecast employment growth of 20%. This report has not considered any new econometric forecasts or evidence. The Experian forecasts run to 2031. As with the 2014 SHMA GL Hearn has extrapolated growth to 2036.

3.4 The tables below show the estimated number of jobs and the forecast job growth in the 2011-36 period. The data shows particularly strong job growth is expected in Peterborough, with figures for Rutland being more moderate.

Table 20: Forecast Employment Growth, Baseline Scenario (2011-36)

	Jobs (2011)	Jobs (2036)	Change (2011-36)	% change
Peterborough	110,969	132,992	22,024	19.8%
Rutland	17,361	19,315	1,954	11.3%
South Holland	37,394	43,311	5,917	15.8%
South Kesteven	59,106	68,700	9,594	16.2%
Peterborough HMA	224,830	264,318	39,488	17.6%

Source: Experian

Table 21: Forecast Employment Growth, Aspirational Scenario (2011-36)

	Jobs (2011)	Jobs (2036)	Change (2011-36)	% change
Peterborough	110,969	137,397	26,428	23.8%
Rutland	17,361	19,705	2,345	13.5%
South Holland	37,394	44,494	7,100	19.0%
South Kesteven	59,106	70,618	11,512	19.5%
Peterborough HMA	224,830	272,215	47,386	21.1%

Source: Experian/ GL Hearn

3.5 To relate growth in jobs and housing need is not a simple process. It is necessary to take account of and make assumptions regarding:

- The relationship between jobs and people, recognising that some people have more than one job (double jobbing);
- Changes to employment rates (e.g. as a result of reducing unemployment or people working longer); and
- Commuting patterns, which reflect relationships between where people live and work.

3.6 It is important that this report, as an evidence-based document, does not stray into seeking to determine policy, and thus a set of policy-off assumptions based on current dynamics and evidence are made regarding these issues.

3.7 In respect of the level of employment growth, the Baseline Scenario would be regarded as a “policy off” scenario. The Aspirational Scenario is considered “policy on”.

Commuting Patterns

3.8 The table below shows summary data about commuting to and from the HMA and individual local authorities from the 2011 Census. The data shows that the HMA generally sees a small level of net in-commuting (around 1% more people work in the area than live in the area (and are working)). There are however significant differences by area, with South Kesteven in particular seeing a notable level of out-commuting and Peterborough a substantial level of in-commuting.

Table 22: Commuting patterns in Peterborough HMA (2011)

	Peter-borough	Rutland	South Holland	South Kesteven
Live and work in LA	55,300	7,378	21,813	30,494
Home workers	7,250	3,076	5,066	8,118
No fixed work-place	6,476	1,225	3,336	4,841
In-commute	32,606	6,794	8,962	14,205
Out-commute	19,388	6,516	11,586	23,518
Total working in LA	101,632	18,473	39,177	57,658
Total living in LA (and working)	88,414	18,195	41,801	66,971
Commuting ratio	0.87	0.98	1.07	1.16

Source: 2011 Census

3.9 In translating the commuting pattern data into growth in the labour-force it is assumed that the commuting ratio remains at the same level as shown by the 2011 Census. This essentially means that there would be expected to be a lower increase in working residents for a given number of jobs in the HMA although for some local authorities the opposite will be true (South Holland and South Kesteven). The commuting ratios are applied on a local authority basis.

Double Jobbing

3.10 As well as commuting patterns we can also consider that a number of people may have more than one job (double jobbing). This can be calculated as the number of people working in each District divided by the number of jobs. Data from the Annual Population Survey (available on the NOMIS website) suggests that around 3.8% of workers have a second job (data averaged from data for the 2004-14 period to recognise relatively high error margins associated with data for individual years). This gives a double jobbing ratio of 0.962 (i.e. the number of jobs can be discounted by 3.8% to estimate the required change in the workforce). Again data has been used on an individual local authority basis with the double jobbing percentages for each area being:

- Peterborough – 3.5%;
- Rutland – 5.6%;
- South Holland – 3.5%; and
- South Kesteven – 3.8%

3.11 To work out the change in the resident workforce required to match the forecast number of jobs we can multiply the commuting ratio by the amount of double jobbing and in turn multiply this by the number of jobs – this is shown in the table below. Overall, the Experian forecast expects an increase of 39,500 jobs across Peterborough HMA. If commuting patterns and levels of double jobbing remain the same then this would require a slightly lower level of growth in the resident workforce (of about 37,100 people).

Table 23: Relating Employment Growth and Change in Resident Workforce, Baseline Scenario (2011-36)

	Change in jobs	Adjustment factor	Change in resident workforce
Peterborough	22,024	0.84	18,494
Rutland	1,954	0.93	1,817
South Holland	5,917	1.03	6,091
South Kesteven	9,594	1.12	10,715
Peterborough HMA	39,488		37,117

Source: Experian NOMIS and 2011 Census

Table 24: Relating Employment Growth and Change in Resident Workforce, Aspirational Scenario (2011-36)

	Change in jobs	Adjustment factor	Change in resident workforce
Peterborough	26,428	0.84	22,192
Rutland	2,345	0.93	2,181
South Holland	7,100	1.03	7,309
South Kesteven	11,512	1.12	12,858
Peterborough HMA	47,386		44,540

Source: Experian, NOMIS and 2011 Census

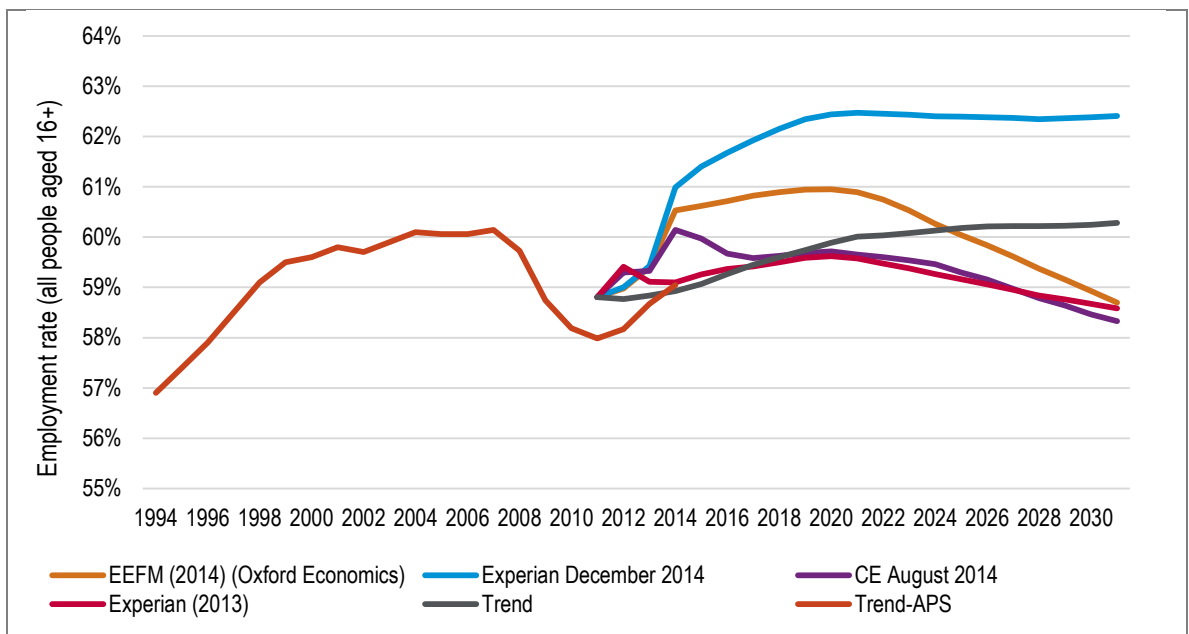
Changes to Employment Rates

- 3.12 As well as studying commuting levels and double jobbing the analysis needs to consider how economic participation and employment rates will change in the future. Over the past 15 years we have seen notable increases in the proportion of people who are economically active (particularly for females and people aged over 50). In the future we may see some further continuation of these trends – particularly in relation to people working longer (partly linked to pensionable ages) and have modelled for there to be some increase in employment rates as we move through to 2036.
- 3.13 Estimating how employment rates might change in the future is complex, and subject to a potential error margin. There is no set method and there are no up-to-date forecasts from Central Government (the last set of data from ONS took a (pre-recession) 2006 base and can no longer be relied upon). It is necessary to take a view on how employment rates might change.
- 3.14 To consider how rates might change in the future we have looked at a range of national economic forecasts and also past age/sex specific trends in economic activity rates. Past trend analysis looks at economic activity rates as it is not possible to obtain trend data from the Census for employment rates - this is due to the different way working students are recorded in each of the 2001- and 2011 Census. We have sought to consider what implicit assumptions these models make regarding future changes to employment rates.
- 3.15 To look at how rates are expected to change we have looked at the incremental change in jobs over time and overlaid this on the national population projections (2012-based). From this it is possible to work out how employment rates would need to change for both the number of jobs and the growth in population to be achieved.
- 3.16 The figure below shows how the various sources of information are implicitly expecting rates to change in the future (data runs to 2031 which is the limit of the forecast in many cases). In line with general convention, the employment rate has been plotted as the number of people in employment as a proportion of the total population aged 16 and over. A past trend in the employment rate has

also been provided, based on data from the Annual Population Survey and the Labour Force Survey. The forward projection data has all been controlled to a consistent 2011 start point based on rates shown in the 2011 Census. For clarity the lines on the chart are:

- EEFM (2014) (Oxford Economics) – data from the East of England Forecasting Model
- Experian December 2014 – data from a December 2014 Experian forecast
- CE August 2014 – Cambridge Econometrics
- Experian (2013) – an earlier Experian forecast (from 2013)
- Trend – the implied employment rate if age/sex trends in the 2001 to 2011 period are continued
- Trend-APS – past trend data from the Annual Population Survey and Labour Force Survey

Figure 12: Past trends and projected employment rates – England – range of different scenarios



Source: Derived from a range of economic forecasts, Census data, national population projections and APS/LFS data

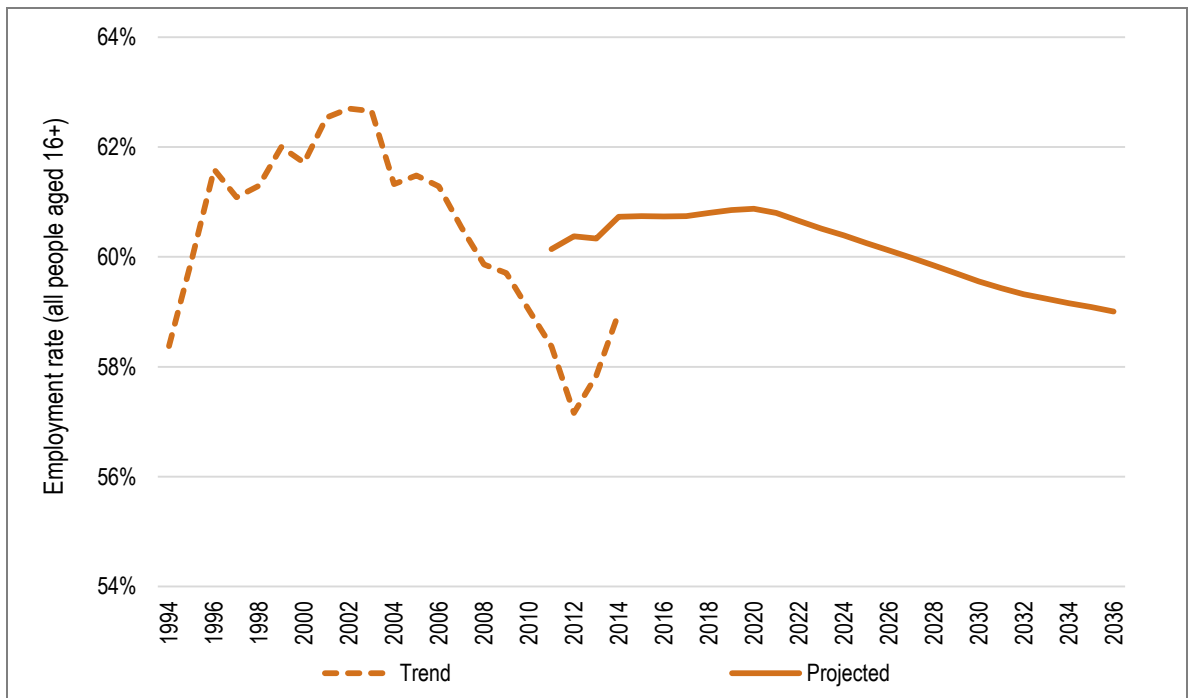
3.17 The data shows some variation between the different forecasts. Over the whole of the 2011 to 2031 period, the EEFM, CE and Experian (2013) forecasts suggest that the rate will remain roughly constant (albeit increasing in the short-term and decreasing over the longer-term). The three forecasts also show different views in the short-term with the EEFM and CE forecasts in particular suggesting a sharp increase in the rate to about 2014. The more recent (2014) Experian forecast suggests a much higher employment rate moving forward, this is driven by a significant increase to 2014, followed by a modest increase to about 2020, and a levelling off thereafter. The forecast linked to past trends shows a modest increase in the rate throughout the period.

3.18 It is difficult to say which of the forecasts is the most reliable; the Experian (2014) is the most up-to-date and could arguably therefore take precedent, however, it cannot be ignored that three of the

forecasts suggest a similar pattern (when taken for the whole period 2011-31). The past trend analysis has the advantage of being based on actual trend data and therefore should also be given some credence, the problem with taking the trend data however is that it does not model any short-term changes (which are generally suggested by the other forecasts) and which appear to be related to short-term changes in jobs as the Country continues to move away from recession (such changes in the rate are likely to be linked to a latent labour-force moving back into the market (i.e. reducing unemployment) and not linked to changes in the population).

- 3.19 Looking at the data, it is our view that combining all of the sources analysed is probably the most appropriate way of determining a realistic set of assumptions to take forward into the demographic modelling. Some moderation has however been applied on an age specific basis – in particular the trend of reducing employment rates of people aged 16-24 has not been continued in the modelling, whilst the rates of growth of females (aged 25-64) has been dampened down slightly to reflect the view that these rates are not likely to continue on their short-term trends for a further 25-years into the future.
- 3.20 In using these assumptions we are able to develop rates for Peterborough HMA and individual local authorities and the figure below shows how the overall employment rate is projected to change in the future along with past trend data from the Annual Population Survey and earlier data from the Labour Force Survey. The data shows some increase in the rate until about 2021 and then a gradual decline. The past trend data is variable on a year-by year basis but overall is not inconsistent with the future projection.
- 3.21 The data in the figure below is all based on modelling linked to the 2012-based SNPP, and it should be noted that slightly different levels would be shown if data from alternative population projections were used.

Figure 13: Projected Employment Rates – Peterborough HMA



Source: Derived from a range of economic forecasts, Census data, subnational population projections and APS/LFS data

- 3.22 The table below shows the age/sex specific rates assumed in the analysis. As noted above these have been based on consideration of a range of different forecasting and also take account of the 2011 Census and trends over the period since 2001. It should be stressed that these figures reflect what we would consider to be a reasonable set of assumptions although there would be a case for alternatives (both in an upwards and downwards direction and for particular age/sex groups).
- 3.23 Due to a standard approach being taken the data does occasionally show some counter-intuitive outcomes. In the case of the Peterborough HMA the only age/sex group that is of concern is females aged 25-34 – as can be seen from the table, the modelling assumes that the employment rate of this group will actually be slightly above the rate for males aged 25-34 by 2036. In reality we would probably not expect female employment rates to be higher than males for any age group (other than possibly those age 16-24). This finding in relation to Rutland comes about due to the relatively high employment rate of females aged 25-34 in 2011 and the relatively low rate for males. We have not made any specific adjustment to the data for Rutland so as to maintain the integrity of the modelling at an HMA level. However, it would be reasonable that some adjustment in both an upward or downward direction could be made, and this would not change the overall position in terms of employment rate changes (e.g. given the low male employment rate of people aged 25-34 a higher increase would be reasonable and this could be offset by a reduction in the growth in the rate of 25-34 aged females).

Table 25: Employment Rates by Age and Sex – Peterborough HMA

	Sex	Year	Aged 16 to 24	Aged 25 to 34	Aged 35 to 49	Aged 50 to 64	Aged 65 and over
Peterborough	Male	2011	57.6%	86.9%	86.1%	73.8%	11.4%
		2036	57.6%	87.3%	87.7%	82.2%	19.2%
	Female	2011	54.6%	70.7%	74.2%	59.6%	6.5%
		2036	54.6%	76.9%	80.0%	73.7%	12.2%
Rutland	Male	2011	50.7%	83.3%	90.9%	79.4%	19.0%
		2036	50.7%	83.7%	92.6%	87.8%	22.5%
	Female	2011	51.9%	78.7%	83.4%	65.5%	9.2%
		2036	51.9%	84.8%	89.2%	79.6%	12.5%
South Holland	Male	2011	62.9%	89.2%	88.9%	75.0%	12.8%
		2036	62.9%	89.6%	90.6%	83.4%	18.9%
	Female	2011	60.1%	76.9%	79.0%	58.4%	6.4%
		2036	60.1%	83.0%	84.8%	72.5%	11.3%
South Kesteven	Male	2011	60.0%	89.8%	91.1%	77.6%	14.9%
		2036	60.0%	90.2%	92.8%	86.0%	20.3%
	Female	2011	61.9%	78.8%	82.2%	62.8%	8.3%
		2036	61.9%	85.0%	88.0%	76.9%	12.8%

3.24 To put these figures in context we have below shown how economic activity rates change in a range of areas from 2001 to 2011. This uses Census data and is based on economic activity rather than employment due to difficulties in getting comparative data on employment from the two Censuses. The data shows that all areas show broadly similar patterns, with there typically being some decline in rates for younger people (particularly males), increases for females aged 25 and over, and increases in age groups 50+ (for both sexes).

3.25 This provides some support for the suggested age sex changes used in modelling. In looking at this data it should be noted that the upper age band is 65-74 rather than 65+, this is again due to it not being possible to get completely consistent data from the Census for the 65+ age group.

Table 26: Changes to Economic Activity Rates (2001-11)

Peterborough HMA						
Age group	Males			Females		
	2001	2011	Change	2001	2011	Change
16-24	76.0%	71.7%	-4.4%	67.6%	67.3%	-0.3%
25-34	92.6%	93.6%	1.0%	74.1%	79.0%	4.9%
35-49	92.4%	93.0%	0.6%	78.4%	82.4%	4.1%
50-64	78.4%	79.5%	1.1%	56.0%	63.1%	7.2%
65-74	12.1%	21.0%	8.9%	6.0%	12.5%	6.5%
East						
Age group	Males			Females		
	2001	2011	Change	2001	2011	Change
16-24	73.7%	69.0%	-4.7%	67.4%	65.6%	-1.8%
25-34	93.0%	92.6%	-0.4%	73.7%	79.0%	5.3%
35-49	92.9%	93.2%	0.3%	77.0%	81.6%	4.6%
50-64	78.1%	80.4%	2.3%	57.3%	64.6%	7.3%
65-74	13.2%	22.6%	9.4%	6.9%	14.1%	7.2%
East Midlands						
Age group	Males			Females		
	2001	2011	Change	2001	2011	Change
16-24	68.3%	64.1%	-4.2%	62.4%	61.3%	-1.1%
25-34	91.5%	91.0%	-0.5%	74.3%	79.4%	5.1%
35-49	90.8%	91.6%	0.7%	77.9%	82.7%	4.8%
50-64	73.7%	77.0%	3.4%	54.3%	62.3%	8.0%
65-74	10.2%	18.5%	8.2%	5.3%	11.3%	6.0%
England						
Age group	Males			Females		
	2001	2011	Change	2001	2011	Change
16-24	68.3%	64.3%	-4.1%	62.1%	61.2%	-0.9%
25-34	91.0%	91.2%	0.2%	73.7%	78.9%	5.2%
35-49	90.2%	91.1%	0.9%	75.8%	80.8%	5.0%
50-64	72.8%	76.9%	4.1%	54.3%	62.9%	8.7%
65-74	11.6%	20.3%	8.7%	6.3%	13.0%	6.6%

Source: Census 2001 and 2011

- 3.26 To estimate what level of housing provision might be required to meet the economic forecasts, adjustments are made to levels of migration within the demographic model such that the growth in the resident workforce equals the change required to match the number of jobs (as shown in previous tables).
- 3.27 The outputs from the job-based projections are as follows and show that for the resident workforce to increase in line with the forecast number of jobs would require around 1,884 homes per annum to be delivered – this increases to 2,098 if a 20% uplift to the jobs is modelled. The baseline figure is

lower than that derived through demographic modelling (the main scenario showing a need for 2,063 dwellings per annum) with the uplifted figure being very slightly higher than the demographics.

- 3.28 The baseline economic based projections do not therefore provide any justification for increasing the housing numbers to support employment growth at an HMA level. However case law has established that conclusions on OAN need to be identified at a local authority as well as HMA level², and that on a policy-off basis it is not appropriate to make assumptions on changes in commuting dynamics³ albeit that it may be possible to address these issues on a policy-on basis through local plan preparation and the duty to cooperate process.
- 3.29 The baseline economic-led projections show a higher level of housing need than the demographic-led projections in Rutland and South Kesteven. In Rutland the economic-led projections shown in the table below show housing need for 163 dwellings per annum, compared to 140 dwellings per annum in the demographic-led projections. In South Kesteven, the economic-led projections show a need for 626 dwellings per annum (dpa) compared to 583 dpa in the demographic-led projections. This reflects in particular an expected reduction in the working-age population in these areas in the trend-based demographic projections. Higher in-migration is in effect needed to support workforce growth.
- 3.30 The outputs are again based on household formation rates linked to the 2012-based CLG household projections.

Table 27: Housing Need to support Baseline Economic Forecasts (2011-36)

	Households 2011	Households 2036	Change in households	Per annum	Dwellings (per annum)
Peterborough	74,357	92,752	18,395	736	764
Rutland	15,132	18,943	3,811	152	163
South Holland	37,324	45,279	7,956	318	330
South Kesteven	57,530	72,605	15,075	603	626
Peterborough HMA	184,342	229,579	45,236	1,809	1,884

Source: Experian, NOMIS, 2011 Census and demographic modelling

² Satnam Millenium Ltd vs. Warrington MBC

³ Oadby & Wigston DC vs. SSCLG

Table 28: Housing Need to Support Aspirational Economic Scenario (2011-36)

	Households 2011	Households 2036	Change in households	Per annum	Dwellings (per annum)
Peterborough	74,357	95,339	20,983	839	871
Rutland	15,132	19,175	4,043	162	173
South Holland	37,324	46,141	8,817	353	366
South Kesteven	57,530	74,087	16,557	662	688
Peterborough HMA	184,342	234,742	50,400	2,016	2,098

Source: Experian, NOMIS, 2011 Census and demographic modelling

Job-led Projections: Implications

- 3.31 The Experian Forecasts indicate that employment in the HMA can be expected to increase by 39,500 jobs over the 2011-36 period. This represents employment growth of 17.6% across the HMA. The SHMA additionally considered a higher growth scenario (with 20% stronger employment growth) but this can be regarded as a policy-on scenario.
- 3.32 The analysis herein indicates that at the HMA level the forecast employment growth would require housing provision of 1,884 homes per annum. This level of housing need is below that derived from the demographic-led projections at the HMA level. However, the evidence suggests a need to adjust housing provision upwards in Rutland and South Kesteven to support employment growth. This has an impact on the 'policy off' assessment of OAN for these areas. It could be possible to address this through the local-plan preparation process by agreeing a different distribution of housing provision to meet this need elsewhere across the HMA. However this would constitute a 'policy on' approach.

4 AFFORDABLE HOUSING NEED

- 4.1 In this section we discuss levels of affordable housing need in Peterborough HMA and the four local authorities. Affordable housing is defined in the NPPF as *‘social rented, affordable rented and intermediate housing, provided to eligible households whose needs are not met by the market’*.
- 4.2 The PPG sets out a model for assessing affordable housing need. This is based on estimating “the number of households and projected households who lack their own housing or live in unsuitable accommodation and who cannot afford to meet their housing needs in the market.” The model in effect considers the number of households who will require financial support in meeting their housing need. It includes both concealed and homeless households; as well as existing households who require an alternative form of accommodation (such as larger homes or those in a different tenure) but who in moving home, would release a property for another household to occupy. In the context of considering overall housing provision, the latter will not result in a need for additional housing overall.
- 4.3 The approach set out in the PPG for assessing affordable housing need is essentially identical to that set out in 2007 SHMA Guidance, and with the earlier guidance providing more detail about specific stages of the modelling, reference is also made in this section to the 2007 Strategic Housing Market Assessments Guidance.
- 4.4 The analysis is based on secondary data sources. It draws on a number of sources of information including 2011 Census data, demographic projections, house prices/rents and income information.
- 4.5 The affordable housing needs model is based largely on housing market conditions (and particularly the relationship of housing costs and incomes) at a particular point in time – the time of the assessment – as well as the existing supply of affordable housing which can be used to meet housing need. The need shown is thus a reflection of current market conditions, but also past investment decisions and policies (such as past funding available for affordable housing, and losses as a result of right-to-buy policies).
- 4.6 The base date for the assessment is 2014 (e.g. data about housing costs and incomes is for 2014). However, it is recognised that the analysis should align with other research and hence estimates of affordable housing need are provided in this section over the period to 2036 (to be consistent and allow comparison with the demographic modelling undertaken within this report).

Key Definitions

- 4.7 We begin by setting out key definitions relating to affordable housing need, affordability and affordable housing.

Current Affordable Housing Need

- 4.8 Current affordable housing need is defined as the number of households who lack their own housing or who live in unsuitable housing and who cannot afford to meet their housing needs in the market. Such households are eligible for affordable housing.

Newly-Arising Need

- 4.9 Newly-arising (or future) need is a measure of the number of households who are expected to have an affordable housing need at some point in the future. In this assessment we have used trend data from Continuous Recording (CoRe) along with demographic projections about the number of new households forming (along with affordability) to estimate future needs.

Supply of Affordable Housing

- 4.10 An estimate of the likely future supply of affordable housing is also made (drawing on secondary data sources about past lettings). The future supply of affordable housing is subtracted from the newly-arising need to make an assessment of the net future need for affordable housing.

Affordability

- 4.11 Affordability is assessed by comparing household incomes, based on income data modelled using a number of sources including CACI, ASHE, the English Housing Survey (EHS) and ONS data, against the cost of suitable market housing (to either buy or rent). Separate tests are applied for home ownership and private renting and are summarised below:
- a. *Assessing whether a household can afford home ownership: A household is considered able to afford to buy a home if it costs 3.5 times the gross household income – CLG guidance suggests using different measures for households with multiple incomes (2.9×) and those with a single income (3.5×), however (partly due to data availability) we have only used a 3.5 times multiplier for analysis. This ensures that affordable housing need figures are not over-estimated – in practical terms it makes little difference to the analysis due to the inclusion of a rental test (below) which tends to require lower incomes for households to be able to afford access to market housing;*
 - b. *Assessing whether a household can afford market renting: A household is considered able to afford market rented housing in cases where the rent payable would constitute no more than 30% of gross income. The choice of an appropriate threshold is an important aspect of the analysis, CLG guidance (of 2007) suggested that 25% of income is a reasonable start point but also notes that a different figure could be used. Analysis of current letting practice suggests that letting agents typically work on a multiple of 40% (although this can vary by area). Government policy (through Housing Benefit payment thresholds) would also suggest a figure of 40%+ (depending on household characteristics). This assessment uses 30% .*
- 4.12 It should be recognised that a key challenge in assessing affordable housing need using secondary sources is the lack of information available regarding households' existing savings. This is a key factor in affecting the ability of young households to purchase market housing. In many cases households who do not have sufficient savings to purchase have sufficient income to rent housing

privately without support, and thus the impact of deposit issues on the overall assessment of affordable housing need is limited.

Affordable Housing

4.13 The NPPF provides the definition of affordable housing (as used in this report). The following is taken from Annex 2 of NPPF.

“Affordable housing includes social rented, affordable rented and intermediate housing, provided to specified eligible households whose needs are not met by the market. Affordable housing should:

- Meet the needs of eligible households including availability at a cost low enough for them to afford, determined with regard to local incomes and local house prices;*
- Include provision for the home to remain at an affordable price for future eligible households or, if these restrictions are lifted, for the subsidy to be recycled for alternative affordable housing provision.”*

4.14 Within the definition of affordable housing there is also the distinction between social rented affordable rented, and intermediate housing. Social rented housing is defined as:

“Rented housing owned and managed by local authorities and registered social landlords, for which guideline target rents are determined through the national rent regime. It may also include rented housing owned or managed by other persons and provided under equivalent rental arrangements to the above, as agreed with the local authority or with the Homes and Communities Agency as a condition of grant.”

4.15 Affordable rented housing is defined as:

“Rented housing let by registered providers of social housing to households who are eligible for social rented housing. Affordable Rent is not subject to the national rent regime but is subject to other rent controls that require a rent of no more than 80 per cent of the local market rent.”

4.16 The definition of intermediate housing is shown below:

“Intermediate affordable housing is Housing at prices and rents above those of social rent, but below market price or rents. These can include shared equity products (e.g. HomeBuy), other low cost homes for sale and intermediate rent but does not include affordable rented housing.”

4.17 As part of our analysis in this report we have therefore studied the extent to which both social rented, intermediate housing and affordable rented housing can meet affordable housing need in Peterborough HMA.

Local Prices & Rents

4.18 An important part of the SHMA is to establish the entry-level costs of housing to buy and rent. This data is then used in the assessment of the need for affordable housing. The affordable housing needs assessment compares prices and rents with the incomes of households to establish what

proportion of households can meet their needs in the market, and what proportion require support and are thus defined as having an ‘affordable housing need.’

4.19 In this section we establish the entry-level costs of housing to both buy and rent across the study area. Our approach has been to analyse Land Registry and Valuation Office Agency (VOA) data to establish lower quartile prices and rents. For the purposes of analysis (and to be consistent with the PPG) we have taken lower quartile prices and rents to reflect the entry-level point into the market.

4.20 The table below shows estimated lower quartile property prices by dwelling type throughout 2014. The data shows that entry-level costs to buy are estimated to start from about £70,000 for a flat in South Holland and rising to £250,000 for a detached home in Rutland. The overall ‘average’ lower quartile price varies between £117,500 in Peterborough up to £160,000 in Rutland.

Table 29: Lower Quartile Sales Prices by Type (2014)

	Flat	Terraced	Semi-detached	Detached	All dwellings
Peterborough	£76,900	£103,000	£125,000	£176,000	£117,500
Rutland	£101,000	£137,000	£157,500	£250,000	£160,000
South Holland	£70,000	£100,000	£108,000	£148,000	£120,000
South Kesteven	£75,000	£99,500	£120,000	£180,000	£130,000

Source: Land Registry (2014)

4.21 A similar analysis has been carried out for private rents using Valuation Office Agency (VOA) data – this covers a 12-month period to March 2015. For the rental data information about dwelling sizes is provided (rather than types); the analysis shows an average lower quartile cost (across all dwelling sizes) varying from £475 in South Kesteven up to £550 in Rutland.

Table 30: Lower Quartile Private Rents by Size (Year to March 2015) – Per Month

	Room only	Studio	1 bedroom	2 bedrooms	3 bedrooms	4+ bedrooms	All dwellings
Peterborough	£299	£350	£410	£515	£575	£725	£490
Rutland	-	-	£415	£525	£595	£883	£550
South Holland	£303	£275	£375	£495	£550	£675	£477
South Kesteven	£303	£303	£335	£465	£550	£750	£475

Source: Valuation Office Agency

Cost of Affordable Housing

4.22 Traditionally the main type of affordable housing available in an area is social rented housing and the cost of social rented accommodation by dwelling size can be obtained from Continuous Recording (CoRe) – a national information source on social rented lettings. The table below illustrates the rental cost of lettings of social rented properties by size in 2013/14. As can be seen the costs are below those for private rented housing indicating a gap between the social rented and

market sectors. This gap increases for larger properties. The figures in the table include service charges.

Table 31: Monthly Lower Quartile Social Rent Levels

	1 bedroom	2 bedrooms	3+ bedrooms	Lower quartile (all sizes)
Peterborough	£300	£353	£370	£328
Rutland	£358	£393	£417	£391
South Holland	£273	£308	£335	£319
South Kesteven	£288	£312	£330	£317

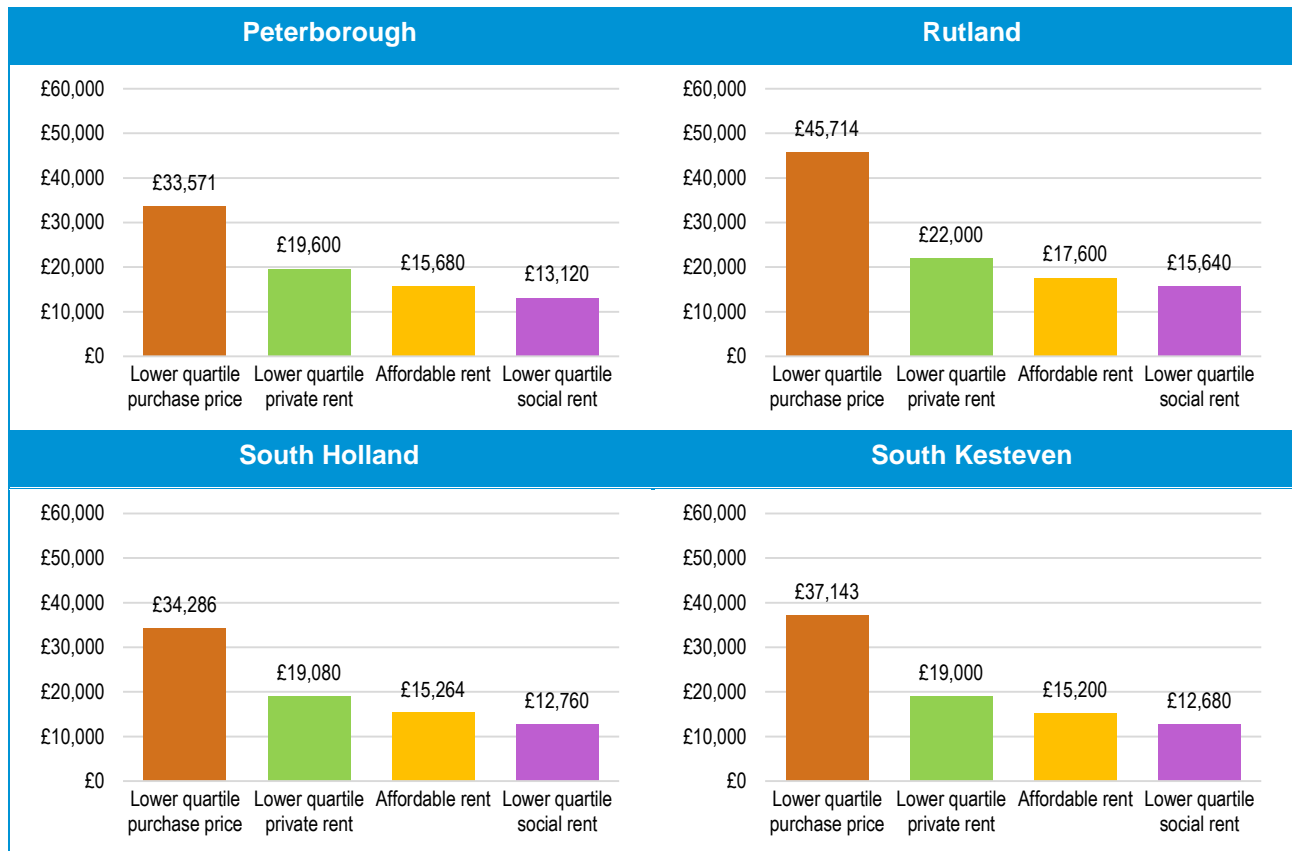
Source: CoRe (2014)

- 4.23 Changes in affordable housing provision has seen the introduction of affordable rented housing. Affordable rented housing is defined in the NPPF as being *'let by local authorities or private registered providers of social housing to households who are eligible for social rented housing. Affordable Rent is subject to rent controls that require a rent of no more than 80% of the local market rent (including service charges, where applicable)'*. Funding for affordable housing provision through the National Affordable Housing Programme is currently targeted at delivering affordable rented homes.
- 4.24 Affordable Rented housing can therefore be considered to be similar to social rented housing but at a potentially higher rent. The 80% (maximum) rent is to be based on the open market rental value of the individual property and so it is not possible to say what this will exactly mean in terms of cost (for example the rent for a two-bedroom flat is likely to be significantly different to a two-bedroom detached bungalow). In addition, market rents for new-build homes are likely to be higher than within the existing stock and may well be in excess of 80% of lower quartile rents. However, for the purposes of analysis, we have assumed that the 80% figure can be applied to the lower quartile private rented cost data derived from VOA information.

Gaps in the Housing Market

- 4.25 The figure below estimates how current prices and rents in the four local authorities might equate to income levels required to afford such housing. The figures are based on the figures derived in the analysis above and include four different tenures (buying, private rent, affordable rent and social rent) and are taken as the lower quartile price/rent across the whole stock of housing available (i.e. including all property sizes). For illustrative purposes the calculations are based on 3.5 times household income for house purchase and 30% of income to be spent on housing for rented properties. The figures for house purchase are based on a 100% mortgage for the purposes of comparing the different types of housing.

Figure 14: Indicative Income required to Purchase/Rent without Additional Subsidy



Source: Land Registry, VOA and CoRe

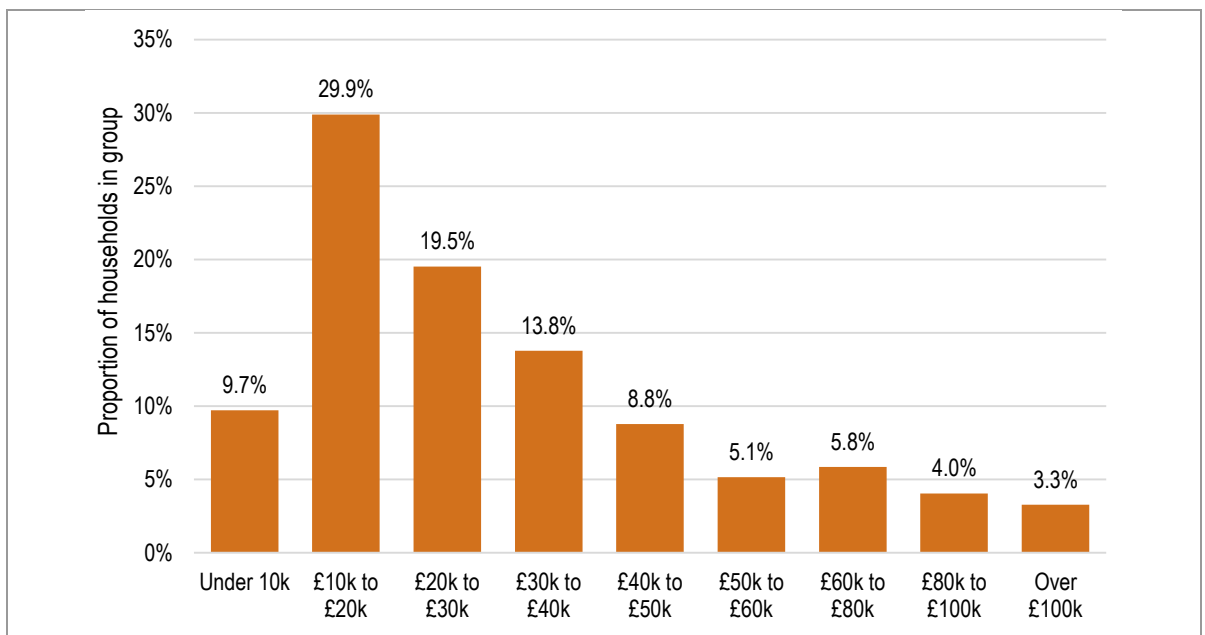
Income levels and affordability

4.26 Following on from our assessment of local prices and rents it is important to understand local income levels as these (along with the price/rent data) will determine levels of affordability and also provide an indication of the potential for intermediate housing to meet needs. Data about total household income has been modelled on the basis of a number of different sources of information to provide both an overall average income and the likely distribution of incomes in each area. The key sources of data include:

- CACI from *Wealth of the Nation 2012* – to provide an overall national average income figure for benchmarking
- English Housing Survey (EHS) – to provide information about the distribution of incomes (taking account of variation by tenure in particular)
- Annual Survey of Hours and Earnings (ASHE) – to assist in looking at how incomes have changed from 2012 to 2014 (a 1.4% increase was identified from this source for both the East of England and East Midlands regions)
- ONS modelled income estimates – to assist in providing more localised income estimates (i.e. for each of the local authority areas)

4.27 Drawing all of this data together we have therefore been able to model an income distribution for the authorities in the HMA in 2014. The data shows that around two-fifths (40%) of households have an income below £20,000 with a further third in the range of £20,000 to £40,000. The overall average (median) income of all households in Peterborough HMA is estimated to be around £24,900 with a mean income of £32,900.

Figure 15: Distribution of Household Income in Peterborough HMA



Source: Derived from ASHE, EHS, CACI and ONS data

4.28 The table below shows how income levels vary for each of the four local authorities. Incomes were found to be highest in Rutland and lowest in South Holland⁴.

Table 32: Household Income Levels by Local Authority, 2014

	Mean income	Median income
Peterborough	£32,786	£24,937
Rutland	£40,699	£30,955
South Holland	£29,286	£22,274
South Kesteven	£33,194	£25,247
Peterborough HMA	£32,854	£24,882

Source: Derived from ASHE, EHS, CACI and ONS data

4.29 To assess affordability we have looked at households ability to afford either home ownership or private rented housing (whichever is the cheapest), without financial support. The distribution of household incomes is then used to estimate the likely proportion of households who are unable to

⁴ The figures in Table 32 are slightly lower than those cited in the 2014 SHMA. This is due to an updated calculation methodology.

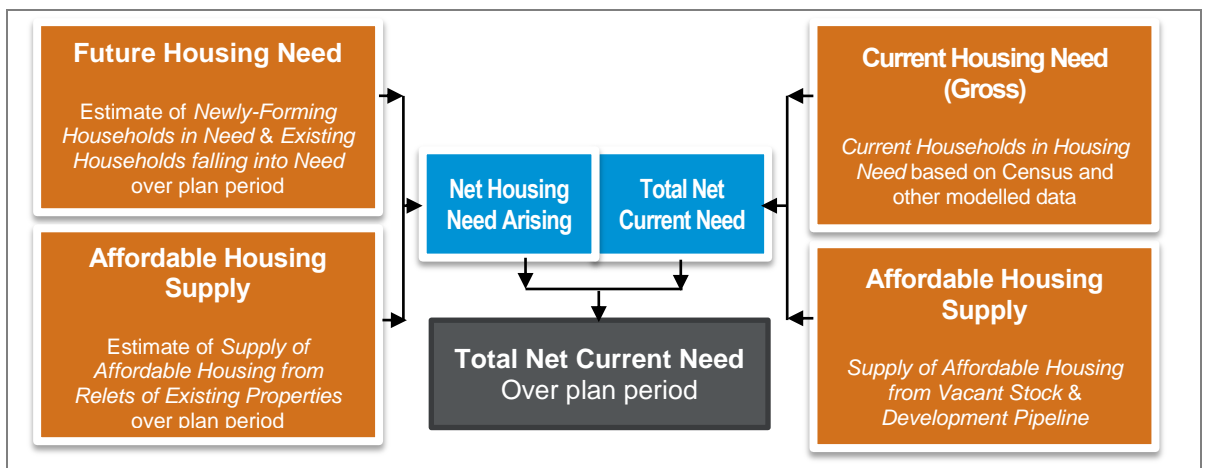
afford to meet their needs in the private sector without support, on the basis of existing incomes. This analysis brings together the data on household incomes with the estimated incomes required to access private sector housing.

- 4.30 Different affordability tests are applied to different parts of the analysis depending on the group being studied (e.g. recognising that newly forming households are likely on average to have lower incomes than existing households). Assumptions about income levels are discussed where relevant in the analysis that follows.

Affordable Housing Needs Assessment

- 4.31 Affordable housing need has been assessed using the Basic Needs Assessment Model, in accordance with the CLG Practice Guidance. This model is summarised in the chart below.

Figure 16: Overview of Basic Needs Assessment Model



- 4.32 The figures presented in this report for affordable housing needs have been based on secondary data sources including analysis of 2011 Census data. The modelling undertaken provides an assessment of affordable housing need for a 25-year period (which is then annualised). Each of the stages of the affordable housing needs model calculation are discussed in more detail below.

Methodological Issues

- 4.33 Given the availability of data using secondary data sources, there are a number of assumptions that need to be made to ensure that the analysis is as robust as possible. Key assumptions include considering the number of households who have a need due to issues such as insecure tenancies or housing costs – such households form part of the affordable need as set out in Guidance (see paragraph 023 of the PPG for example) but are not readily captured from secondary data sources. Assumptions also need to be made about the likely income levels of different groups of the population (such as newly forming households), recognising that such households' incomes may differ from those in the general population.

- 4.34 To overcome the limitations of a secondary-data-only assessment, additional data has been taken from a range of survey-based affordable needs assessments carried out by GL Hearn and Justin Gardner Consulting over the past five years or so. These surveys (which cover a range of areas and time periods) allow the assessment to consider issues such as needs which are not picked up in published sources and different income levels for different household groups. This data is then applied to actual data for Peterborough HMA (e.g. from the Census) as appropriate. It is the case that outputs from surveys in other areas show remarkably similar outputs to each other for a range of core variables (for example the income levels of newly forming households when compared with existing households) and are therefore likely to be fairly reflective of the situation locally in Peterborough HMA. Where possible, data has also been drawn from national surveys (notably the English Housing Survey).
- 4.35 It should also be stressed that the secondary data approach is consistent with the PPG. Specifically, the PPG states that:

'Plan makers should avoid expending significant resources on primary research (information that is collected through surveys, focus groups or interviews etc. and analysed to produce a new set of findings) as this will in many cases be a disproportionate way of establishing an evidence base. They should instead look to rely predominantly on secondary data (e.g. Census, national surveys) to inform their assessment which are identified within the guidance'.

- 4.36 The PPG also suggests that the housing register can be used to estimate levels of affordable housing need. Experience working across the country is that housing registers can be highly variable in the way allocation policies and pointing systems work. This means that in many areas it is difficult to have confidence that the register is able to define an underlying need. Many housing registers include households who might not have a need whilst there will be households in need who do not register (possibly due to being aware that they have little chance of being housed). For these reasons, the method linked to a range of secondary data sources is preferred.

Current Affordable Housing Need

- 4.37 In line with PPG, the current need for affordable housing has been based on considering the likely number of households with one or more housing problem. A list is initially set out in paragraph 023 of the PPG and provides the following.

What types of households are considered in affordable housing need?

The types of households to be considered in housing need are:

- homeless households or insecure tenure (e.g. housing that is too expensive compared to disposable income);
- households where there is a mismatch between the housing needed and the actual dwelling (e.g. overcrowded households);
- households containing people with social or physical impairment or other specific needs living in unsuitable dwellings (e.g. accessed via steps) which cannot be made suitable in-situ
- households that lack basic facilities (e.g. a bathroom or kitchen) and those subject to major disrepair or that are unfit for habitation;
- households containing people with particular social needs (e.g. escaping harassment) which cannot be resolved except through a move.

Source: PPG [ID 2a-023-20140306]

4.38 This list of potential households in need is then expanded on in paragraph 24 of the PPG which provides a list of the categories to consider when assessing current need. This assessment seeks to follow this list by drawing on a number of different data sources. The table below sets out the data used in each part of the assessment.

Table 33: Main Sources for assessing the Current Unmet Need for Affordable Housing

	Source	Notes
Homeless households	CLG Live Table 784	Total where a duty is owed but no accommodation has been secured
Those in priority need who are currently housed in temporary accommodation	CLG Live Table 784	Total in temporary accommodation (as of 31 March 2015)
Households in overcrowded housing	Census table LC4108EW	Analysis undertaken by tenure
Concealed households	Census table LC1110EW	Number of concealed families (all ages and family types)
Exiting affordable housing tenants in need	Modelled data linking to past survey analysis	Will include households with many of the issues in the first box above (e.g. insecure tenure)
Households from other tenures in need	Modelled data linking to past survey analysis	

Source: PPG [ID 2a-024-20140306]

4.39 The table below therefore shows the initial estimate of the number of households who potentially have a current housing need. These figures are before any consideration of affordability has been

made and has been termed 'the number of households in unsuitable housing'. Overall, the analysis suggests that there are currently some 13,085 households living in unsuitable housing (or without housing) in the Peterborough Sub-Region HMA – this is 7.1% of the estimated total number of households living in the HMA in 2011.

Table 34: Initial Estimate of Households Living in Unsuitable Housing

Category of 'need'	Households
Homeless households	72
Those in priority need who are currently housed in temporary accommodation	126
Households in overcrowded housing	5,980
Concealed households	2,365
Exiting affordable housing tenants in need	620
Households from other tenures in need	3,922
Total	13,085

Source: CLG Live Tables (June 2015), Census (2011) and data modelling

4.40 In taking this estimate (13,085) forward, the data modelling estimates housing unsuitability by tenure. From the overall number in unsuitable housing, households living in affordable housing are excluded (as these households would release a dwelling on moving and so no net need for affordable housing will arise). The analysis also excludes 90% of owner-occupiers under the assumption (which is supported by analysis of survey data) that the vast majority will be able to afford housing once savings and equity are taken into account. A final adjustment is to slightly reduce the unsuitability figures in the private rented sector to take account of student-only households – such households could technically be overcrowded / living in unsuitable housing but would be unlikely to be considered as being in affordable housing need. Once these households are removed from the analysis, the remainder are taken forward for affordability testing.

4.41 The table below shows that as of 2011 it is estimated that there were 7,713 households living in unsuitable housing (excluding current social tenants and the majority (90%) of owner-occupiers) – this represents 4.2% of all households in the HMA in 2011.

Table 35: Unsuitable Housing by Tenure and Numbers to take forward into Affordability Modelling

	In unsuitable housing	Number to take forward for affordability testing
Owner-occupied	3,501	350
Social rented	2,210	0
Private rented	4,811	4,800
No housing (homeless/concealed)	2,563	2,563
Total	13,085	7,713

Source: CLG Live Tables (June 2015), Census (2011) and data modelling

- 4.42 Having established the figure of 7,713, it needs to be considered that a number of these households might be able to afford market housing without the need for subsidy, because they could afford a suitable market housing solution. In applying an affordability test, the income data has been used with the distribution adjusted to reflect a lower average income amongst households living in unsuitable housing – for the purposes of the modelling an income distribution that reduces the level of income to 69% of the figure for all households has been used to identify the proportion of households whose needs could not be met within the market (for households currently living in housing). A lower figure (of 42%) has been used to apply an affordability test for the concealed/homeless households who do not currently occupy housing. These two percentage figures have been based on a consideration of typical income levels of households who are in unsuitable housing (and excluding social tenants and the majority of owners) along with typical income levels of households accessing social rented housing (for those without accommodation). These figures are considered to be best estimates, and likely to approximately reflect the differing income levels of different groups with a current housing problem.
- 4.43 Overall, around two-thirds of households with a current need are estimated to be likely to have insufficient income to afford market housing and so the estimate of the total current need is reduced to 4,961 households. The table below shows how current need is estimated to vary across local authority areas.

Table 36: Estimated Current Need

Area	In unsuitable housing (taken forward for affordability test)	% Unable to Afford	Revised Gross Need (including Affordability)
Peterborough	4,364	64.6%	2,818
Rutland	333	56.1%	187
South Holland	1,469	68.1%	1,000
South Kesteven	1,547	61.9%	957
Peterborough HMA	7,713	64.3%	4,961

Source: CLG Live Tables (June 2015), Census (2011), data modelling and affordability analysis

Current Affordable Housing Supply

- 4.44 The PPG sets out that the current affordable housing supply should be subtracted from the gross current need identified. This includes any surplus stock which can be brought back into use; and the committed supply of affordable housing at the point of the assessment. Any current affordable housing stock to be taken out of management should be subtracted from these numbers.
- 4.45 There are currently 1,809 affordable homes in the development pipeline, based on sites with planning consent. These can be subtracted from the current gross affordable housing need.

Table 37: Pipeline Affordable Housing Supply (April 2015 – March 2020)

Area	Development pipeline
Peterborough	699
Rutland	131
South Holland	243
South Kesteven	736
Peterborough HMA	1,809

Newly-Arising Need

4.46 To estimate newly-arising (projected future) need we have looked at two key groups of households based on the CLGs SHMA Guidance. These are:

- Newly forming households; and
- Existing households falling into need.

Newly-Forming Households

4.47 The number of (gross) newly-forming households has been estimated through the demographic modelling with an affordability test also being applied. This has been undertaken by considering the changes in households in specific 5-year age bands relative to numbers in the age band below 5 years previously to provide an estimate of gross household formation. This differs from numbers presented in the demographic projections which are for net household growth.

4.48 The numbers of newly-forming households are limited to households forming who are aged under 45 – this is consistent with CLG Guidance (from 2007) which notes after age 45 that headship (household formation) rates ‘plateau’. There may be a small number of household formed beyond age 45 (e.g. due to relationship breakdown) although the number is expected to be fairly small when compared with formation of younger households and few are expected to be in affordable housing need.

4.49 The estimates of gross new household formation have been based on outputs from our core demographic projection. In looking at the likely affordability of newly-forming households we have drawn on data from previous surveys. This establishes that the average income of newly-forming households is around 84% of the figure for all households. This figure is remarkably consistent across areas (and is also consistent with analysis of English Housing Survey data at a national level).

4.50 We have therefore adjusted the household income distribution in each local authority to reflect the lower average income for newly-forming households. The adjustments have been made by changing the distribution of income by bands such that average income level is 84% of the all

household average. In doing this we are able to calculate the proportion of households unable to afford market housing without any form of subsidy (such as LHA/HB). Our assessment suggests that overall around 47% of newly-forming households will be unable to afford market housing and that a total of 1,683 new households will have a need on average in each year to 2036.

Table 38: Estimated Level of Affordable Housing Need from Newly Forming Households (per annum)

Area	Number of new households	% unable to afford	Total in need
Peterborough	1,711	46.7%	798
Rutland	209	41.9%	87
South Holland	685	51.1%	350
South Kesteven	1,005	44.5%	448
Peterborough HMA	3,610	46.6%	1,683

Source: Projection Modelling/Income analysis

Existing Households falling into Affordable Housing Need

- 4.51 The second element of newly arising need is existing households falling into need. To assess this we have used information from CoRe. We have looked at households who have been housed over the past two years (2012-14) – this group will represent the flow of households onto the Housing Register over this period. From this we have discounted any newly forming households (e.g. those currently living with family) as well as households who have transferred from another social rented property. An affordability test has also been applied, although relatively few households are estimated to have sufficient income to afford market housing.
- 4.52 This method for assessing existing households falling into need is consistent with the 2007 SHMA guide which says on page 46 that *‘Partnerships should estimate the number of existing households falling into need each year by looking at recent trends. This should include households who have entered the housing register and been housed within the year as well as households housed outside of the register (such as priority homeless households applicants)’*.
- 4.53 Following the analysis through suggests a need arising from 1,168 existing households each year – this is about 0.6% of all households living in the HMA (in 2011).

Table 39: Estimated level of Housing Need from Existing Households (per annum)

Area	Number of Existing Households falling into Need	% of Need
Peterborough	679	58.1%
Rutland	58	4.9%
South Holland	133	11.4%
South Kesteven	298	25.5%
Peterborough HMA	1,168	100.0%

Source: CoRe/affordability analysis

Future Supply of Affordable Housing

- 4.54 The future supply of affordable housing is the flow of affordable housing arising from the existing stock that is available to meet future need. It is split between the annual supply of social/affordable rent relets and the annual supply of relets/sales within the intermediate sector.
- 4.55 The Practice Guidance suggests that the estimate of likely future relets from the social rented stock should be based on past trend data which can be taken as a prediction for the future. We have used information from the Continuous Recording system (CoRe) to establish past patterns of social housing turnover. Our figures include general needs and supported lettings but exclude lettings of new properties plus an estimate of the number of transfers from other social rented homes. These exclusions are made to ensure that the figures presented reflect relets from the existing stock. Additionally an estimate of the number of 'temporary' supported lettings have been removed from the figures (the proportion shown in CoRe as being lettings in direct access hostels or foyer schemes (of which there were relatively few in the study area)).
- 4.56 On the basis of past trend data it has been estimated that 1,730 units of social/affordable rented housing are likely to become available each year moving forward.

Table 40: Analysis of past social/affordable rented housing supply (per annum – past 2 years (2012-14))

	Total lettings	% as non-newbuild	Lettings in existing stock	% non-transfers	Sub-total	% non-temporary housing	Total lettings to new tenants
Peterborough	1,844	90.6%	1,671	71.1%	1,188	78.2%	929
Rutland	169	91.4%	155	71.2%	110	100.0%	110
South Holland	414	90.2%	374	61.2%	229	100.0%	229
South Kesteven	806	93.8%	756	65.3%	493	93.8%	463
Peterborough HMA	3,232	91.4%	2,955	68.3%	2,019	85.7%	1,730

Source: CoRe

4.57 The supply figure is for social/affordable rented housing only and whilst the stock of intermediate housing in the HMA is not significant compared to the social/affordable rented stock it is likely that some housing does become available each year (e.g. resales of shared ownership). For the purposes of this assessment we have again utilised CoRe data about the number of sales of homes that were not newbuild. From this it is estimated that around 44 additional properties might become available per annum. The total supply of affordable housing is therefore estimated to be 1,774 per annum.

Table 41: Supply of Affordable Housing from Relets

Area	Social/affordable rented relets	Intermediate housing 'relets'	Total supply (per annum)
Peterborough	929	24	952
Rutland	110	3	113
South Holland	229	4	233
South Kesteven	463	14	477
Peterborough HMA	1,730	44	1,774

Source: CoRe

Net Affordable Housing Need

4.58 The table overleaf shows our overall calculation of annual affordable housing need using the approach suggested in the PPG.

4.59 The analysis suggests a net need from 1,220 households across the HMA who require support in meeting their housing needs. These households are eligible for affordable housing. Figures for individual authorities are as follows:

- Peterborough: 620 households per annum
- Rutland: 35 households per annum
- South Holland: 284 households per annum
- South Kesteven: 279 households per annum

4.60 These figures represent the Objectively Assessed Need (OAN) for Affordable Housing.

4.61 The 2014 SHMA set out a recommended mix of accommodation size and tenure types. The updated analysis undertaken for this update report suggests that the recommended mix in the 2014 SHMA is still applicable.

Table 42: Estimated level of Affordable Housing Need (2014-36)

		Peterborough	Rutland	South Holland	South Kesteven	HMA
A	Current Gross Affordable Need	2,818	187	1,000	957	4,961
B	Committed Supply of Affordable Housing	699	131	243	736	1,809
C	Total Net Current Affordable Need	2,119	56	757	221	3,152
D	Total Net Need per Annum to 2036(C / 22)	96	3	34	10	143
E	Annual Need from Newly-Forming Households	798	87	350	448	1,683
F	Annual Need from Existing Households Falling into Need	679	58	133	298	1,168
G	Total Annual Gross Newly-Arising Need (E + F)	1,477	145	483	746	2,851
H	Annual Supply from Relets of Social & Affordable Rented Homes	929	110	229	463	1,730
I	Annual Supply from Relets of Intermediate Housing	24	3	4	14	44
J	Total Future Annual Supply from Re-Lets (H + I)	953	113	233	477	1,774
K	Annual Net Need for Affordable Housing (D + G - J)	620	35	284	279	1,220

Meeting Affordable Housing Need

4.62 The analysis above indicates a notable need for affordable housing in the HMA. In developing local plans, a potential policy issue is the extent to which the plan makes provision for meeting the full affordable housing need, in accordance with Paragraph 47 in the NPPF. The PPG sets out that:

“The total affordable housing need should then be considered in the context of its likely delivery as a proportion of mixed market and affordable housing developments, given the probable percentage of affordable housing to be delivered by market housing led developments. An increase in the total housing figures included in the local plan should be considered where it could help deliver the required number of affordable homes.”

4.63 Using a baseline demographic need (for all tenures) linked to the 2012-based SNPP and household projections (a need for 2,063 dwellings per annum) the analysis is suggesting that some 55% of the need is for affordable housing (based on a 30% affordability threshold). Figures for individual authorities are shown in the table below.

Table 43: Relating Affordable Housing Need and Demographic Projections

	Peterborough	Rutland	South Holland	South Kesteven	HMA
Affordable Need per Annum	591	31	252	268	1,143
Projected Demographic Household Growth	913	140	426	583	2063
Affordable Need as % Demographic Growth	65%	22%	59%	46%	55%

4.64 A direct comparison of these figures should however be treated with care. This point is clearly made in the Planning Advisory Service (PAS) Technical Advice Note on *Objectively Assessed Need and Housing Targets* – June 2014, where it is stated (in para 2.12) that:

‘affordable housing need is a different kind of number from total need (the OAN), so the two numbers are not directly comparable’.

4.65 In considering this issue, we assess further below the degree to which households in need are already living in housing, and whilst they may require a different type/ tenure of property, do not result in a net need for additional housing overall. This influences our conclusions on overall OAN.

4.66 It is for each Council to consider how it can meet the identified affordable housing need through the plan-making process. GL Hearn considers that there are a number of relevant issues which warrant consideration in doing so.

4.67 There are various mechanisms which can contribute to affordable housing delivery, including:

- Affordable housing delivery on market-led housing developments via Section 106 Agreements;
- Delivery of affordable housing on sites owned / controlled by Registered Providers;

- Delivery on sites owned by councils or other public sector bodies;
- Rural Exception Site developments; and
- Bringing empty homes back into use.

4.68 These will contribute to growth in the stock of affordable housing. However the net changes in stock will also be influenced by losses, including as a result of right-to-buy / acquire sales.

4.69 We also consider below the current role played by the Private Rented Sector in meeting need, recognising the limited scope of the Basic Needs Assessment Model and reflecting how the housing market overall (looking across tenures) operates in reality at the moment. It is a matter for policy what role this sector might play in the future.

Households already living in Housing

4.70 The first issue to consider is to note that a proportion of those included in the model will already be living in housing (albeit housing that is not suitable for them for some reason (such as size or cost)). If these households were to move to an affordable home then their current dwelling would become available for another household and there would be no net need for an additional dwelling.

4.71 This point was picked up in the PAS Technical Advice Note. In Section 7 of this note (para 7.3) it recognises that:

'As defined in the PPG, affordable need also includes housing for existing households – including those that are currently in unsuitable housing and those who will 'fall into need' in the plan period (i.e. their housing will become unsuitable for them). For the most part the needs of these households are not for net new dwellings, except for those who are currently homeless or 'concealed'. If they move into suitable housing they will free an equivalent number of existing dwellings, to be occupied by people for whom they are more suitable. If the affordable needs of existing households are included in the OAN, the resulting figure will be too large'.

4.72 Looking on this basis at the need for affordable housing we can see that the net need for affordable homes in the HMA is minus 75 per annum (1,698-1,774) – i.e. a surplus. This figure is calculated by summing the need arising from newly forming households plus the current need from households which are not currently housed and will therefore not vacate a property (this is a very small component of the current need, equal to 15 dwellings per annum). We then minus the current supply of affordable housing from this figure.

The role of the Private Rented Sector (PRS)

4.72 As well as considering the types of household in need it is important to examine the extent to which the PRS (through the Local Housing Allowance (LHA) system) is meeting the needs of households in the District. Whilst the role of the PRS is not specifically mentioned in the NPPF or PPG it has been recognised through previous SHMA guidance. The 2007 SHMA Guidance set out that:

“some households in need may choose to live in the private rented sector (possibly with the use of housing benefit) or housing that would be classified as unsuitable, even though they are eligible for affordable housing”. [p49].

- 4.73 The same page continues by posing a ‘research question’ of ‘how is the private rented sector used to accommodate housing need?’
- 4.74 CLG does recognise the role played by the Private Rented Sector. Whilst the 2007 Guidance has now been replaced by the PPG, there is no evidence that there has been any change in approach to this topic. There is a benefit system available (Local Housing Allowance) for those unable to access the market; and the previous Government legislated through the Localism Act 2011 to allow local authorities to discharge their homelessness duties through finding suitable accommodation in this sector. However the PRS does not necessarily provide security of tenure, and the quality of properties in the sector can be less well controlled.
- 4.75 There is a policy choice to be made regarding how affordable need is met, and the balance of need to be met within the private rented sector as against delivery of new affordable housing (and potentially higher overall housing numbers).
- 4.76 Data from the Department of Work and Pensions (DWP) has been used to look at the number of LHA supported private rented homes. As of February 2015 it is estimated that there were 10,616 benefit claimants in the Private Rented Sector. This figure has increased by about 13% over the past five years or so (although Rutland has seen a small reduction). Given changes to how Local Housing Allowance is calculated, there can however be no guarantee that the PRS will be able to support a further increase in households with LHA.
- 4.77 The analysis is based on the current situation. What this information does not show is how many lettings are made each year to tenants claiming benefit as this will depend on the turnover of stock. From English Housing Survey it is estimated that the proportion of households within the Private Rented Sector who are “new lettings” each year (i.e. stripping out the effect of households moving from one private rented property to another) is around 13%. Applying this to the number of LHA claimants in the Private Rented Sector gives an estimate of 1,380 private sector lettings per annum to new LHA claimants in the HMA. This figure is derived from claimants rather than households and it is likely that there are a number of multiple LHA claimant households (i.e. in the HMO sector and shared accommodation). The table below summarises key data.

Table 44: LHA Claimants in the Private Rented Sector

	Claimants (Feb 2010)	Claimants (Feb 2015)	Change 2010-2015	% change from 2010	Estimated lettings (per annum)
Peterborough	4,960	5,844	884	17.8%	760
Rutland	391	371	-20	-5.1%	48
South Holland	1,556	1,840	284	18.3%	239
South Kesteven	2,493	2,561	68	2.7%	333
Peterborough HMA	9,400	10,616	1,216	12.9%	1,380

Source: DWP

- 4.77 Based on current dynamics, the annual supply of homes available to households who have a current need for support in meeting their housing need is of 1,774 affordable housing properties and an estimated 1,380 private rented properties. The PRS thus contributes about two-fifths of available supply to such households. If the PRS properties were counted as current available supply, the net need for affordable housing shown would be much reduced.
- 4.78 The PRS clearly makes a significant contribution to meeting the needs of households requiring financial support. However, national planning policy does not specifically seek to meet the needs identified through the Basic Needs Assessment Model through the Private Rented Sector. There are wider factors which need to be considered in relying on this as a source of supply; including that there is no guarantee that landlords will re-let properties to households on LHA. In particular future growth in households living within the PRS and claiming LHA cannot be guaranteed.
- 4.79 What the PPG sets out is that consideration needs to be given to increasing overall housing delivery where it might contribute to delivering the identified need for affordable housing. This is to some extent a “policy choice.”

The link between Affordable Need and the OAN

- 4.80 The analysis above has shown that a notable proportion of the affordable need is expected to arise from households who are already living in accommodation (existing households). Furthermore, the private rented sector is currently playing an important role in meeting affordable need.
- 4.81 When taking these two points together the analysis would suggest that the affordable need does not provide clear evidence of a need to increase overall housing provision in the HMA (over and above the need shown by demographic modelling). In simple terms, if it was assumed that the PRS would continue to provide a supply of properties to households in ‘affordable housing need’ (supported by LHA) in line with current dynamics, there would be a broad balance between the supply and need for homes from those requiring support. This assumes no growth in the role played by the PRS over time (in absolute or proportional terms). New affordable housing delivery would reduce reliance on the Private Rented Sector.

- 4.82 However the evidence provides some basis for considering higher housing provision overall, in order to enhance affordable housing delivery and reduce reliance on the PRS. There may in effect be a case to consider the affordable housing need alongside the evidence of market signals and potentially consider a modest uplift to help improve new household formation and reduce levels of concealed households.
- 4.83 It should be recognised that a range of policy measures can be adopted to enhance affordable housing provision. Delivery through mixed tenure developments (with Section 106 agreements) is one such measure. Others include direct delivery by registered providers, use of public sector land and development by the Councils themselves.

Affordable Housing Need: Implications

- 4.84 An assessment of affordable housing need has been undertaken which is compliant with the PPG to identify whether there is a shortfall or surplus of affordable housing in Peterborough HMA. This has estimated current housing need of 4,961 households, excluding existing social housing tenants where they would release a home for another household in need. This falls to 3,152 once the committed supply of affordable housing is considered. The affordable housing needs model then looked at the balance between needs arising and the supply of affordable housing. Each year an estimated 2,851 households are expected to fall into affordable housing need and 1,774 properties are expected to come up for relet.
- 4.85 Overall, in the period to 2036 a net 1,220 households per annum are expected to require support in meeting their housing needs. This is the OAN for affordable housing. There is thus a requirement for new affordable housing in the study area and the Councils are justified in seeking to secure additional affordable housing.
- 4.86 However, the link between the affordable housing need and the overall need for housing (or the objectively assessed need) is complex. Many of the households in need are already living in accommodation (existing households). Looking across tenures, the Private Rented Sector plays a role in meeting the shortfall of affordable housing.
- 4.87 The evidence in this sector however provides support for making adjustments to the modelling of overall housing need to improve affordability, and meet housing needs from concealed and homeless households. This can be quantified through cross-referencing with the demographic analysis and is considered further in the concluding section.

5 HOUSING MARKET DYNAMICS AND MARKET SIGNALS

5.1 This section provides an updated analysis of the housing market dynamics assessed in the 2014 SHMA. This section considers changes to the housing market dynamics since the previous SHMA was published. For some of the housing market signals, most notably those derived from Census data, there has been no new data released since the 2014 SHMA and therefore have not been included here.

Conclusions of the 2014 SHMA

5.2 The 2014 SHMA set out that effective demand for market housing for sale has fallen significantly since 2008, influenced by the wider macro-economic climate and issues associated with access to mortgage finance. This was borne out in sales trends, and had influenced the new-build sector as well as other segments of the market.

5.3 It pointed to above average growth in house prices in Rutland, a premium on prices relative to other parts of the HMA, and stronger affordability pressures. On this basis it concluded that an adjustment to housing provision in Rutland, relative to the demographic projections, would be appropriate.

5.4 The market signals did not, in contrast, point towards a particular need to boost housing supply relative to demographic projections in other parts of the HMA. In these areas there is some evidence of a supply-demand imbalance between 2000-4 but no broad evidence of imbalance. It showed some increase in overcrowding, in Peterborough and South Holland in particular between 2001-11, but with the evidence suggesting that in part this reflects different household structures within migrant communities.

5.5 We move on next to consider how market signals have changed over the last year and a half.

Average House Prices

5.6 As of Q3 2014 the median house price in the Peterborough HMA was £165,000. This is well below the East of England figure of £220,000 and the England and Wales figure of £200,000. The authority in the HMA with the highest median house price is Rutland at £235,000 – the only HMA authority above the regional or national levels. South Kesteven has a median house price of £174,500; South Holland of £152,000, and Peterborough of £150,500.

5.7 The Q3 2014 figures are higher for all areas than the Q3 2012 figures reported in the 2014 SHMA. The table below shows the increase in median house prices over this period. Increases range from 7.0% (£10,000) in South Holland to 14.6% (£30,000) in Rutland, with Peterborough and South

Kesteven seeing growth between this range at 9.1% (£12,500) and 11.5% (£18,000) respectively. Nationally there has been an increase of 7.5% over this period.

5.8 This growth in median house prices is in contrast to the change reported in the 2014 SHMA between 2007 and 2012 where 3 of the 4 HMA authorities saw an overall decrease in values, with only Rutland seeing an increase – of 1%. This is in line with national trends which have seen house prices begin to increase more strongly since early-2013.

5.9 Looking at both absolute and relative changes in prices, Rutland and South Kesteven have both seen an increase in house prices in absolute and proportional terms which is above national trends.

Table 45: Change in House Prices by Authority, 2012-2014

	Q3 2012	Q3 2013	Q3 2014	Change Since 2012	
Peterborough	£138,000	£ 140,000	£ 150,500	£ 12,500	9.1%
Rutland	£205,000	£ 225,000	£ 235,000	£ 30,000	14.6%
South Holland	£142,000	£ 137,000	£ 152,000	£ 10,000	7.0%
South Kesteven	£156,500	£ 164,000	£ 174,500	£ 18,000	11.5%
England & Wales	£186,000	£ 190,000	£ 200,000	£ 14,000	7.5%

Source: Land Registry Price Paid Data

Rental Values

5.10 The 2014 SHMA considered rental data up to March 2013. Since then median rental values have remained fairly steady across all of the HMA authorities as well as nationally. The highest median rents remain in Rutland at £625pcm while the median is £550pcm in the other authorities.

Table 46: Median Rental Values, March 2013 – March 2015

	Mar-13	Sep-13	Mar-14	Sep-14	Mar-15
Peterborough	£ 550	£ 550	£ 550	£ 550	£ 550
Rutland	£ 600	£ 625	£ 625	£ 625	£ 625
South Holland	£ 525	£ 530	£ 550	£ 550	£ 550
South Kesteven	£ 550	£ 560	£ 550	£ 550	£ 550
East of England	£ 600	£ 600	£ 625	£ 625	£ 650
England	£ 585	£ 595	£ 595	£ 595	£ 600

Source: ONS Private Rental Market Data

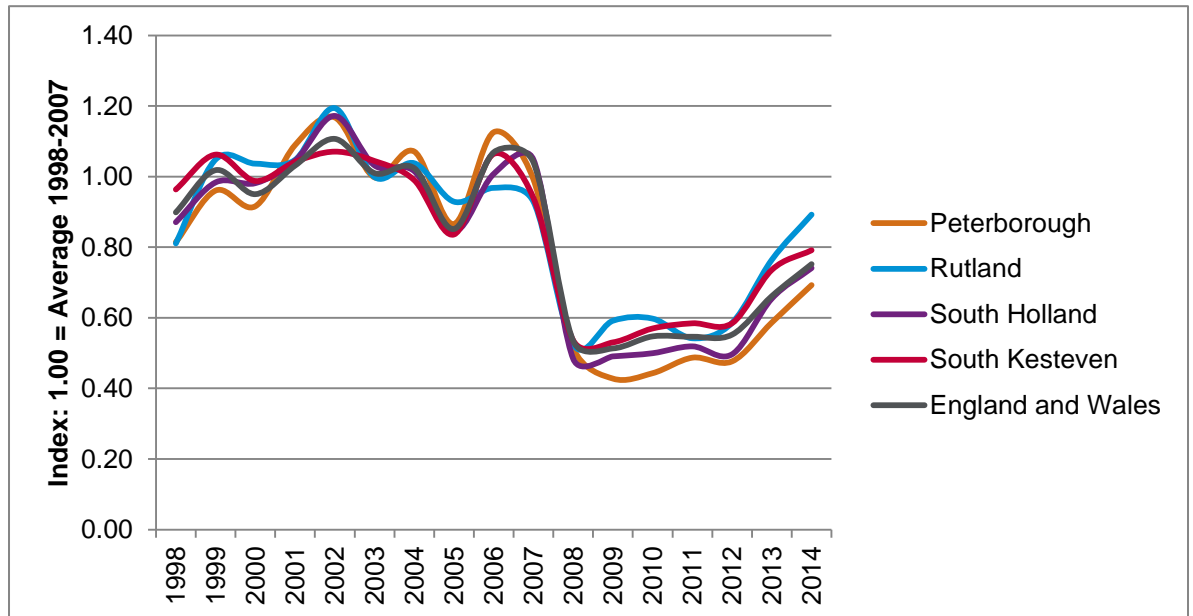
Sales Volumes

5.11 The 2014 SHMA showed sales volumes over the 1998 to 2012 period. This showed a considerable fall in sales numbers since the 2007 recession. From 2008 to 2012 sales volumes steadied but showed little sign of improvement.

5.12 The figure below extends the data to 2014 and shows that 2013 and 2014 have seen considerable growth in sales figures as the national economic climate has continued to improve. However the 2014 figures still remain well below the pre-recession trend at between 70-90% of the pre-recession

decade (1998-2007) average. Rutland and South Kesteven have seen stronger recovery in sales volumes in comparative terms; with weaker performance evident in Peterborough.

Figure 17: Indexed Sales Volume, 1998-2014



Source: HM Land Registry House Price Index/ GL Hearn

Affordability of Market Housing

5.13 The 2014 SHMA considered affordability from 1998 to 2012. Nationally, over this period the affordability ratio of house prices to earnings increased rapidly. This increase was seen in all of the HMA authorities. The table below provides more up to date data for 2013. It shows that the lower quartile affordability has reduced in all areas indicating an improvement in affordability at the lower end of the market. The median affordability ratio has also decreased in all authorities with the exception of South Holland.

Table 47: Affordability Ratio, 2012 v 2013

	Lower Quartile Affordability Ratio			Median Affordability Ratio		
	2012	2013	Change	2012	2013	Change
Peterborough	5.57	5.56	-0.01	5.27	5.25	-0.02
Rutland	9.38	9.27	-0.12	9.41	9.02	-0.38
South Holland	6.61	6.52	-0.09	6.26	6.58	0.32
South Kesteven	7.24	6.87	-0.37	7.26	6.30	-0.96
England	6.58	6.45	-0.13	6.86	6.72	-0.14

Source: CLG

Implications of Market Signals

- 5.14 As identified in the 2014 SHMA there has been a fundamental shift in housing market conditions nationally since 2007, particularly in relation to confidence and credit availability. Following the credit crunch housing market conditions steadied and remained relatively stable over the next few years but sales market activity remained low. House prices have remained fairly constant during this period.
- 5.15 Since early 2013 key market indicators show that there has been an evident improvement in housing market conditions nationally. This has continued through 2014. There has been an increase in house prices over this period, but one which is similar to inflation. In the Peterborough HMA median prices have increased by between 7% and 15% in the two years from Q3 2012 to Q3 2014. Nationally there has been a 7.5% increase over this period. This compared starkly with the previous 5 years following the recession where median prices had remained stagnant.
- 5.16 Similarly, the number of sales has increased markedly in 2013 and 2014. The previous 5 years to 2012 had seen sales volumes in the HMA of around 40-60% of pre-recession levels, and had seen little year on year improvement. 2013 and 2014 have seen a notable increase in sales volume in the HMA with sales figures in 2014 at 70-90% of the pre-recession levels.
- 5.17 Affordability has improved between 2012 and 2013 although this should be considered within the longer term context of strong and sustained house price growth over the 1990s and 2000s which saw large increases in the affordability ratios nationally as well as in the Peterborough HMA. Affordability ratios are average – relative to the national picture across much of the HMA. The exception remains Rutland, where affordability issues are more severe.
- 5.18 The updated housing market signals considered in this section show that the housing market has improved since the publication of the 2014 SHMA as confidence has returned to the market. The result is greater market activity and increases in house prices in all areas. The improved economy has also brought increased employment and wages and so the HMA has seen a slight increase in terms of affordability. In addition stock mismatch is a major issue with the stock mix not meeting needs as well as it could.
- 5.19 The evidence overall is however clearly mixed, with evidence suggesting that there has been a broad balance between supply and demand in recent years; with housing market conditions starting to improve over the period since 2013 but from a low level (not least in terms of sales volumes).

6 CONCLUSIONS

- 6.1 The principal purpose of this report is to define the Objectively Assessed Need (OAN) for housing in the Peterborough Sub-Regional HMA to take account of the release of 2012-based Household Projections by Government in February 2015 and to produce a single OAN figure for each council.
- 6.2 This report assesses the overall need for housing within the four local authority areas within the Peterborough HMA – Rutland County Council, South Holland District Council, South Kesteven District Council, and Peterborough City Council. The report considers needs over the period from 2011 to 2036.

Overview of Approach

- 6.3 The approach used to considering housing need responds to the National Planning Policy Framework (NPPF) and follows the recommended approach in the Government's Planning Practice Guidance (PPG). This assessment is considered independently of any consideration of supply-side issues, such as land availability and development constraints. In following due process, it is necessary to define what the housing need (OAN) would be in the absence of constraints.
- 6.4 The process for identifying housing need, following the PPG, starts out by looking at demographic projections. However these are likely to reflect what has happened in the past – both in terms of levels of migration and household formation rates (the key driving factors in the projections). The PPG therefore sets out a number of other factors which need to be considered in assessing whether it would be appropriate (in the absence of constraints) to increase the identified housing need – either to enhance affordable housing delivery, to support expected economic growth or in response to market signals which point to poor affordability, or a supply-demand imbalance.

Latest Official Demographic-led Projections

- 6.5 The latest Government official household projections at the time of writing of the report are the 2012-based Household Projections, published by Government in February 2015.
- 6.6 We have interrogated these household projections, and the population projections on which they were based. The 2012-based Sub-National Population Projections (SNPP) expect the population of the Peterborough HMA to grow by 92,000 persons between 2011-36 (20.7%). This is consistent with the projected rate of population growth across the East of England (20.3%), and above the rate expected nationally (16.5%) and in the East Midlands (14.8%).
- 6.7 The SNPP contain a modest level of Unattributable Population Change (UPC) for the Peterborough HMA area. An alternative sensitivity projection has been assessed using more recent migration

trends and an adjustment to account for UPC. The sensitivity projection shows population growth which is below the SNPP rate. This would suggest that the SNPP is not likely to under-estimate future population growth (and hence will not underestimate housing need). More recent population data suggests lower levels of migration; and thus the more recent data would not suggest any upside to the official population projections.

- 6.8 The latest household projections are the 2012-based Household Projections published by CLG in February 2015. These new projections make more positive assumptions on future household formation than those in the CLG 2011-based Interim Household Projections. The 2012-based Household Projections indicate an increase of 49,600 households in the Peterborough HMA over the period 2011-36. This is equivalent to 1,983 households per annum. Taking account of vacant homes within the dwelling stock, the analysis shows that this translates to an overall housing need for 2,063 dwellings per annum across the HMA. The OAN for each of the Peterborough HMA authorities is shown in the table below. This report identifies this as the appropriate 'starting point' for establishing housing need.

Table 48: Demographic Projections Summary, 2011-36

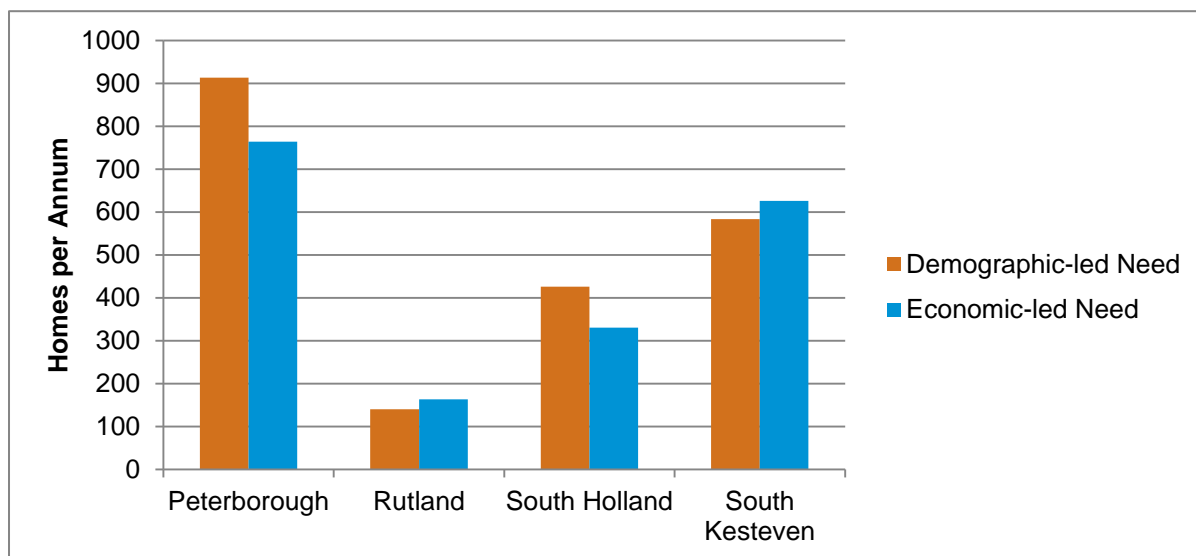
	Change in Population	Change in Households	Households Per Annum	Dwellings Per Annum
Peterborough	43,433	21,999	880	913
Rutland	4,320	3,267	131	140
South Holland	19,285	10,266	411	426
South Kesteven	24,995	14,031	561	583
Peterborough HMA	92,033	49,563	1,983	2,063

Economic Growth Potential

- 6.9 The report then considers how housing need might be influenced by employment growth. To be consistent with the earlier SHMA for the HMA, two economic forecasts have been tested. The first is a baseline Experian forecast (September 2013) and the second uses the same forecast but with an uplift in job growth of 20%. The latter can be considered a 'policy on' forecast, and is not thus appropriate for considering OAN (on a policy-off basis).
- 6.10 The baseline Experian forecast indicates that employment in the HMA can be expected to increase by 39,500 jobs over the 2011-36 period. New economic forecasts have not been considered in this report.
- 6.11 The baseline forecast indicates that if modelled with the current commuting ratio held constant, this would require provision of 1,884 homes per annum across the HMA. This level of housing need is

below that derived from the demographic-led projections at the HMA level. The table below compares the demographic and economic-led projections for individual local authorities.

Figure 18: Comparing Demographic- and Economic-led Assessments of Housing Need, 2011-36



- 6.12 On a policy-off basis, it would be appropriate to make adjustments to the OAN in Rutland and South Kesteven to support economic growth. The analysis suggests (see paras 3.26 – 3.32 for full detail) that an additional 23 dwellings are needed per annum in Rutland; and 43 per annum in South Kesteven to support projected economic growth. It may be possible to address this through agreeing a revised distribution of housing provision for policy purposes through the Duty to Cooperate.

Affordability Issues

- 6.13 The report considers the need for affordable housing using the Basic Needs Assessment Model. It shows a need from 1,220 households per annum who require support in meeting their housing needs. These figures represent the Objectively Assessed Need for affordable housing.

Table 49: Annual Need for Affordable Housing

	Peterborough	Rutland	South Holland	South Kesteven	HMA
Annual Net Need for Affordable Housing	620	35	284	279	1,220

- 6.14 The identified affordable need constitutes a notional 68% of the housing need arising from the demographic-led projections in Peterborough; 67% in South Holland; 48% in South Kesteven and 25% in Rutland. It provides clear evidence of need to underpin policies seeking new affordable housing.

- 6.15 It is for the Councils to consider, through the local-plan preparation process, how to meet the affordable housing need. This report has identified a range of considerations, including a number of sources of supply of affordable housing – including in bringing empty homes back into use, use of public sector land, and direct development by Registered Providers. However there are also challenges, including the potential for losses through right-to-buy/ acquire sales.
- 6.16 Government policy does allow Councils to promote a range of housing options for households requiring support, including accommodation in the Private Rented Sector where appropriate. Whilst the latter does not constitute affordable housing, in reality it currently plays an important role in meeting housing needs. It is for the Councils to consider what role this sector should play in the future.
- 6.17 The affordable need figures include needs arising from both existing households, who would release a home for another household if they move, as well as from concealed households and those who are homeless. The latter groups would result in a net additional need for housing overall.
- 6.18 An updated analysis of market signals is included. This shows that the housing market has improved since the publication of the 2014 SHMA as confidence has returned to the market. The result is greater market activity and increases in house prices in all areas. The improved economy has also brought increased employment and wages and so the HMA has seen a slight increase in terms of affordability.
- 6.19 The evidence overall is however clearly mixed, with evidence suggesting that there has been a broad balance between supply and demand in recent years; with housing market conditions starting to improve over the period since 2013 but from a low level (not least in terms of sales volumes). Evidence however continues to suggest that market housing in Rutland is less affordable than in other parts of the HMA, with in particular a lower quartile house price to income ratio of 9.3. This is the only area in which this ratio is significantly above the national average.

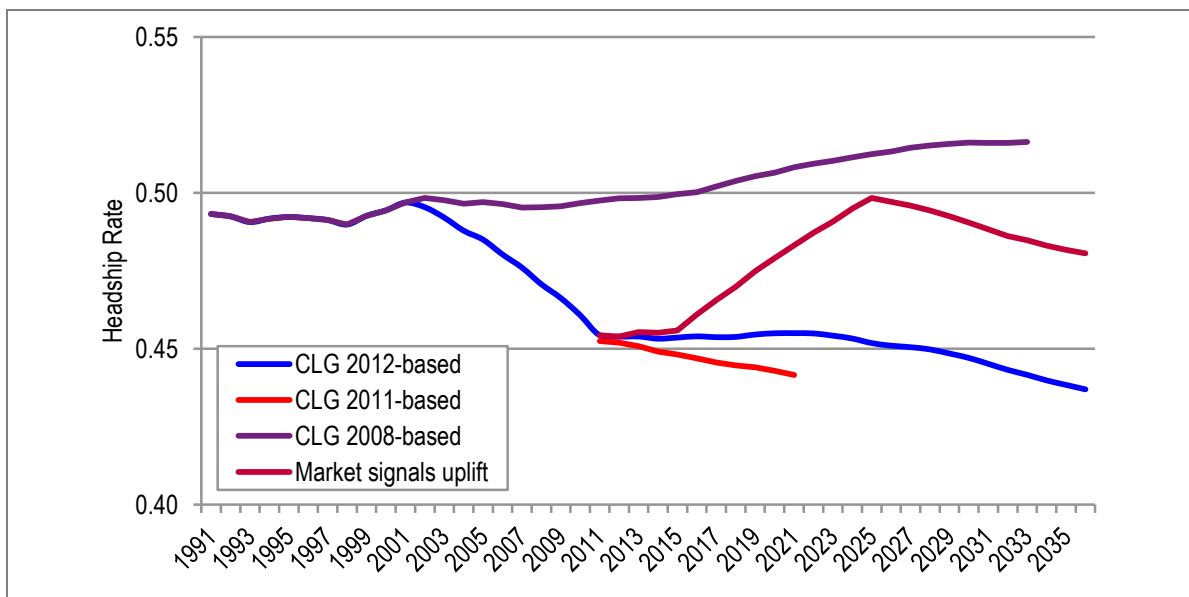
Adjustments to Improve Affordability

- 6.20 Given in particular the high affordable housing need, and recent case law, we consider that there is a basis for include provision for some adjustment to the overall assessed housing need to support improvements to affordability (including higher delivery of affordable housing).
- 6.21 To consider what scale of adjustment might be appropriate, we have sought to use the demographic analysis to assess the degree to which household formation levels have been constrained for younger age groups, and what scale of adjustment to housing provision would be necessary for these to improve. The premise here is that an improvement in affordability and

affordable housing supply would support enhanced household formation amongst younger households.

- 6.22 The projections have used data from the 2012-based CLG household projections. National research undertaken for the RTPI by Neil McDonald and Peter Williams at Cambridge University indicates that a particular effect of the decline in affordability between 2001 and 2011 and the economic recession has been young adults living within a parental home for longer or living in shared accommodation rather than separate accommodation. The impact of this, their research shows, has been most significant for the 25-34 age group.
- 6.23 A detailed interrogation of demographic dynamics in the Peterborough Sub-Region HMA indicates that in demographic terms, the deterioration in affordability of market housing and the economic recession over the 2001-11 decade is likely to have influenced – at least in part – a decline in household formation rates in younger people, particularly amongst those aged between 25 and 34.
- 6.24 When we consider age-specific data it is notable that those aged 25-34 have lower headship rates than has been seen historically (e.g. in 2001, the point at which the rate started to decline) – rates have dropped considerably from 2001 to 2011. We have therefore run a sensitivity analysis which considers and seeks to quantify the implication of returning the household formation rates of the 25-34 age group back to 2001 levels by 2025 (from 2015). In other words, this assumes that headship rates will improve between 2015 and 2025 and then track the ‘trends’ suggested in the 2012-based CLG household projections thereafter.
- 6.25 This sensitivity in effect seeks to consider a scenario in which affordability and access to housing for younger households improves, and quantifies what level of housing provision might be associated with this, all other factors being equal. If achieved, the effect would be to reduce the proportions of shared households and persons within this age group living with parents.
- 6.26 The figure below shows headship rates for people aged 25-34 under a range of different scenarios. The data clearly shows that in the 2011-based projection there was expected to be a continued decrease in formation rates, the core (2012-based CLG) projection sees an increase moving forward whilst our market signals uplift shows an improvement which takes the formation rate back towards that in the 2008-based projections. Compared with the 2012-based projections, the market signals uplift would be expected to see a stronger level of household formation from younger households.

Figure 19: Adjustments to Improve Affordability for those aged 25-34 – Peterborough HMA



Source: Derived from CLG data

6.27 The sensitivity analysis indicates that, all other things being equal, an uplift of around 106 homes per annum across the study area would support an improvement in affordability and household formation rates amongst younger households. The uplift for each authority area is shown in the table below. It is only really in Peterborough that a significant uplift is shown. This reflects its younger population structure.

Table 50: Projected Household Growth 2011-36 – With Affordability Adjustments

	Households 2011	Households 2036	Change in households	Per annum	Dwellings (per annum)	From demographic model	Potential uplift	% uplift
Peterborough	74,357	98,593	24,237	969	1,006	913	93	10%
Rutland	15,132	18,413	3,281	131	141	140	1	0%
South Holland	37,324	47,644	10,321	413	429	426	2	1%
South Kesteven	57,530	71,803	14,273	571	593	583	10	2%
Peterborough HMA	184,342	236,454	52,112	2,084	2,168	2,063	106	5%

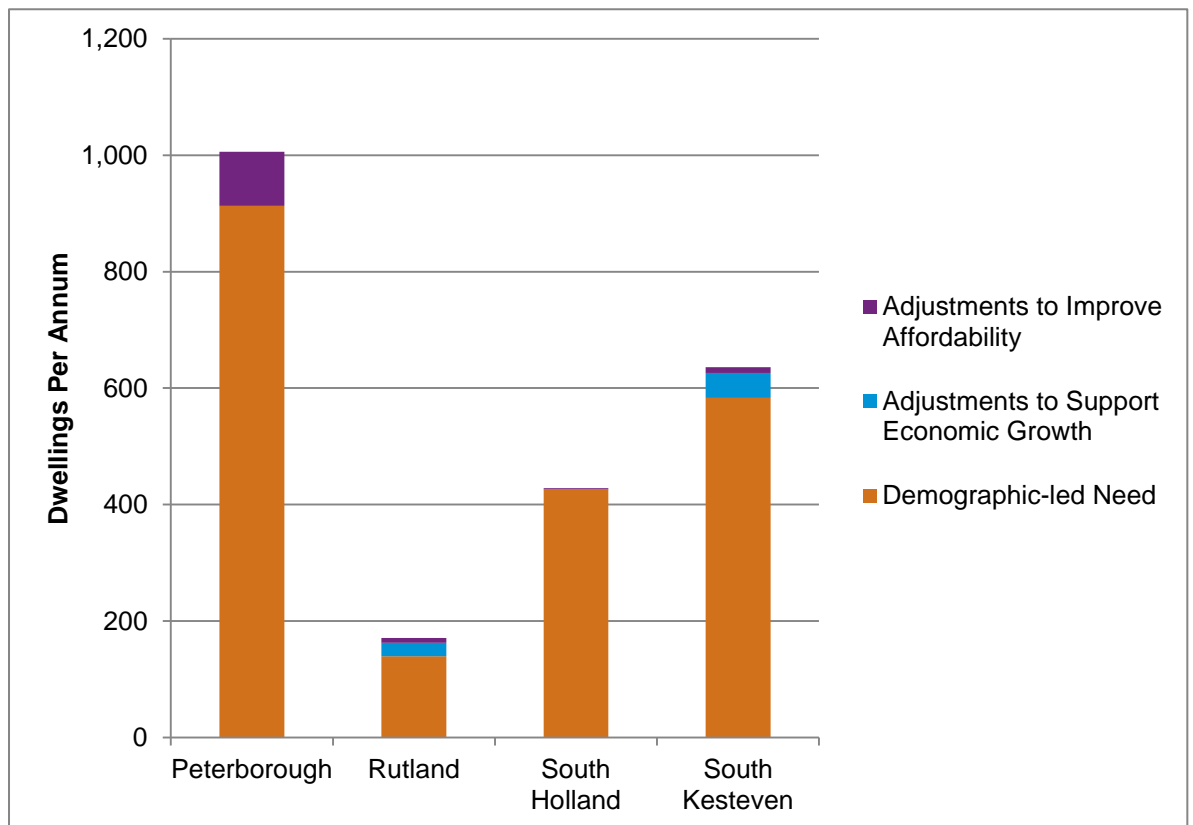
Source: GL Hearn and CLG (numbers may not add due to rounding)

6.28 In Rutland, whilst the demographic evidence does not point to a case for a particular uplift, we consider it would be prudent to consider an adjustment to housing provision in order to address the evident market signals and improve affordability. An increase of 5% is recommended, consistent with the HMA-level analysis shown above.

Conclusions on OAN

- 6.29 We have drawn the conclusions on OAN together in the table and chart below. The base demographic need is based on the 2012-based Household Projections (rebased to 2014 taking account of Mid-Year Population Estimates).
- 6.30 Adjustments are included to support economic growth in Rutland and South Kesteven, reflecting in particular low projected workforce growth expected in the trend-based demographic projections in these authorities.
- 6.31 Adjustments are also included to improve affordability. These address concealed and homeless households, and seek to improve household formation for younger households.

Figure 20: Composition of OAN, Districts 2011-36



6.32 We have sought to define the OAN for housing at both an HMA level and for individual local authorities. The composition of OAN is shown in the table below.

6.33 At the HMA level the total estimated workforce growth supported by the demographic-led projections is sufficient to support the economic forecasts. It may be possible to support economic growth through agreeing adjustments to the distribution of housing provision, however this is an issue for policy rather than the 'policy off' assessment of OAN. For the purposes of calculating OAN at the HMA level we have summed the OAN of the four authorities.

Table 51: Composition of OAN, 2011-36

Homes per Annum, 2011-36	Peterborough	Rutland	South Holland	South Kesteven	HMA
Demographic-led Need	913	140	426	583	2,062
Adjustments to Support Economic Growth	0	23	0	43	66
Adjustments to Improve Affordability	93	8	2	10	113
Total Need	1,006	171	428	636	2,241

6.34 GL Hearn consider that in defining the full OAN for housing in each area, the figures should be rounded to the nearest 5 dwellings. This results in an OAN figure as follows:

- Peterborough: 1,005 homes per annum;
- Rutland: 170 homes per annum;
- South Holland: 430 homes per annum;
- South Kesteven: 635 homes per annum;
- Peterborough Sub-Region HMA: 2,240 homes per annum.

Comparison to the 2014 SHMA

6.35 The Objectively Assessed Need figures identified in this report are lower than those identified in the 2014 SHMA. The 2014 SHMA was prepared before the 2012-based Population and Household Projections were issued by ONS and CLG respectively. These are the first set of official projections to take full account of the 2011 Census and what this shows regarding demographic dynamics. The 2014 SHMA was based principally on pre-Census estimates of migration, whereas this report takes account of the latest official data and is consistent with the approach which is advised in Planning Practice Guidance of using the latest official projections.

6.36 The housing need shown in this report is lower than that estimated in the 2014 SHMA Report principally due to projected migration, and as a result overall population growth, in Peterborough, South Holland, and South Kesteven being lower in the latest projections than in the previous ones. The lower OAN figures in these authorities do not however reflect a worsening housing market in

the HMA – indeed the market signals show the housing market has improved since the publication of the previous report.

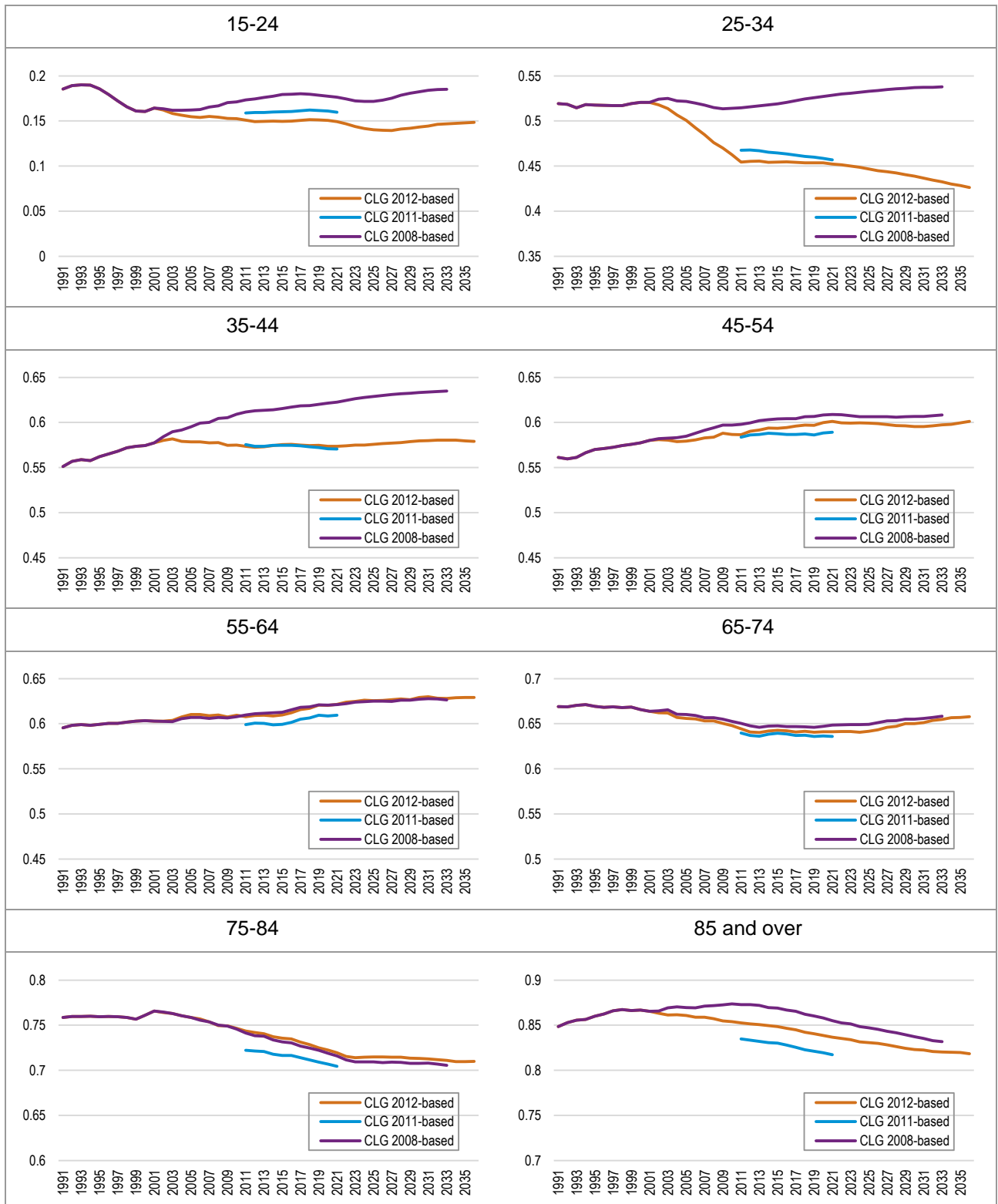
6.37 A comparison of the OAN figures for each local authority area is shown in the table below.

Table 52: Comparison of the 2014 SHMA and the 2015 Update

	2014 SHMA	2015 SHMA Update
Peterborough	1,100 – 1,200	1,005
Rutland	165 – 180	170
South Holland	560 – 600	430
South Kesteven	660 – 710	635
Peterborough HMA	2,505 – 2,690	2,240

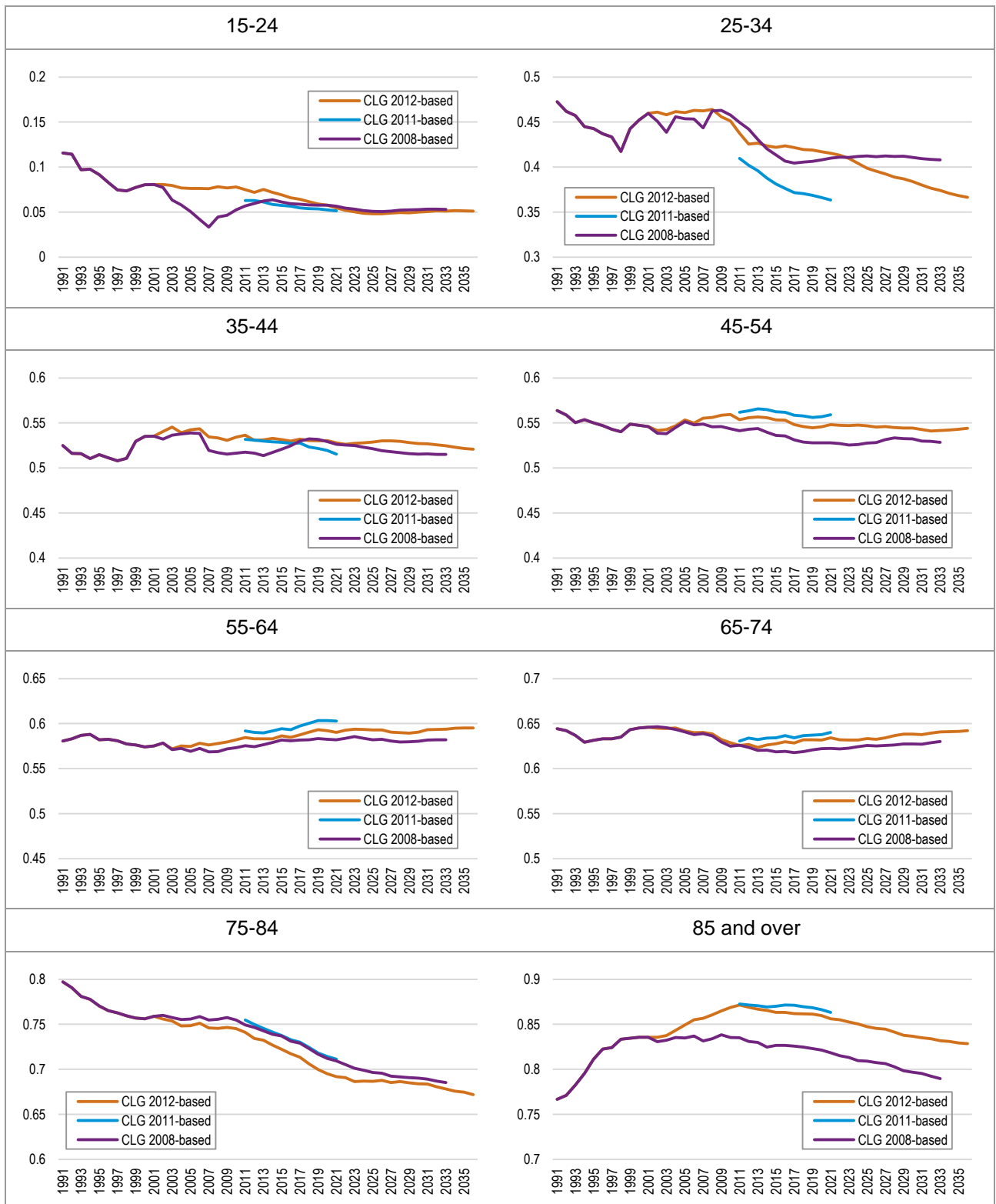
APPENDIX A: HOUSEHOLD FORMATION RATES BY AGE IN EACH LOCAL AUTHORITY

Figure 21: Projected household formation rates by age of head of household – Peterborough



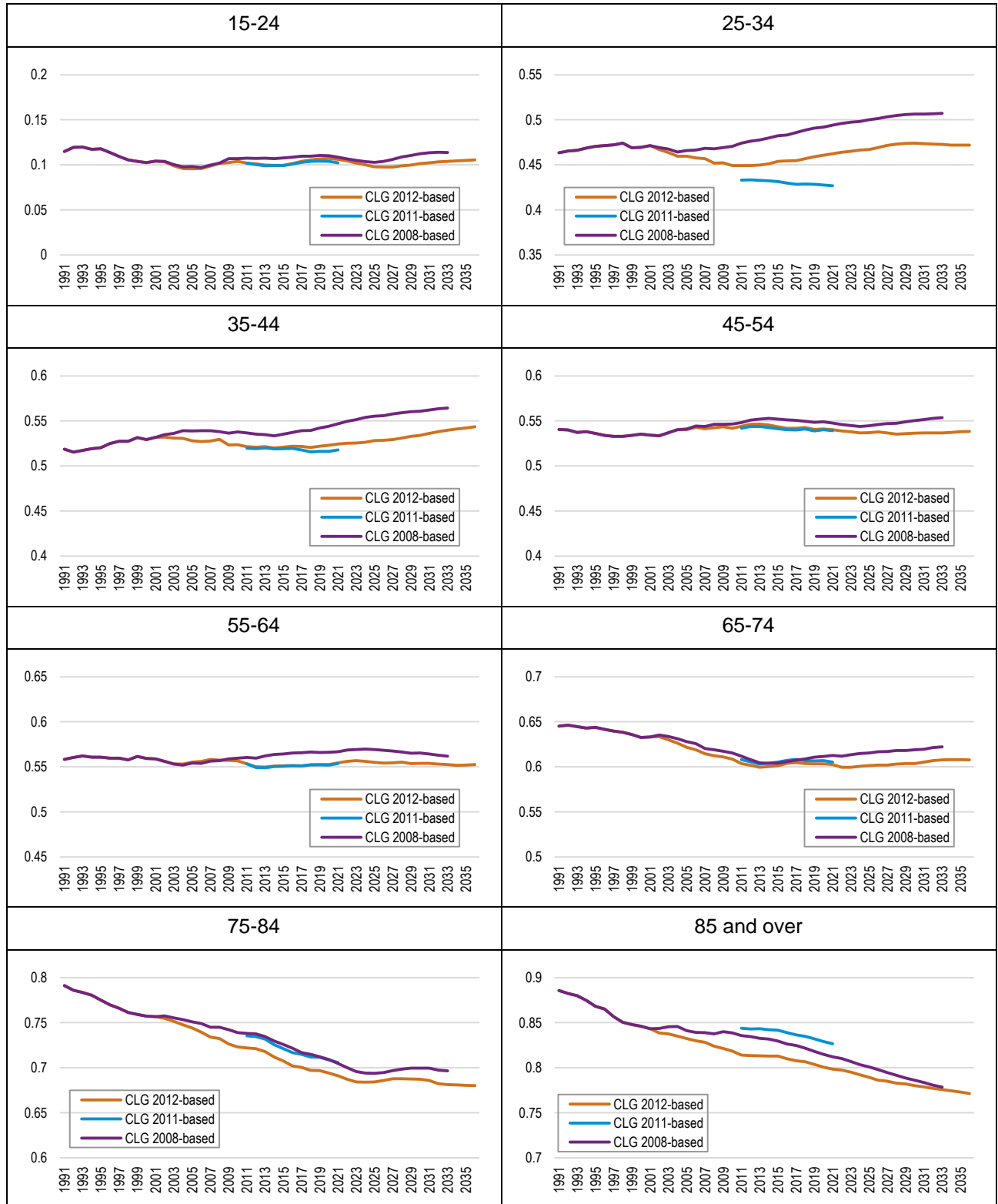
Source: Derived from CLG data

Figure 22: Projected household formation rates by age of head of household – Rutland



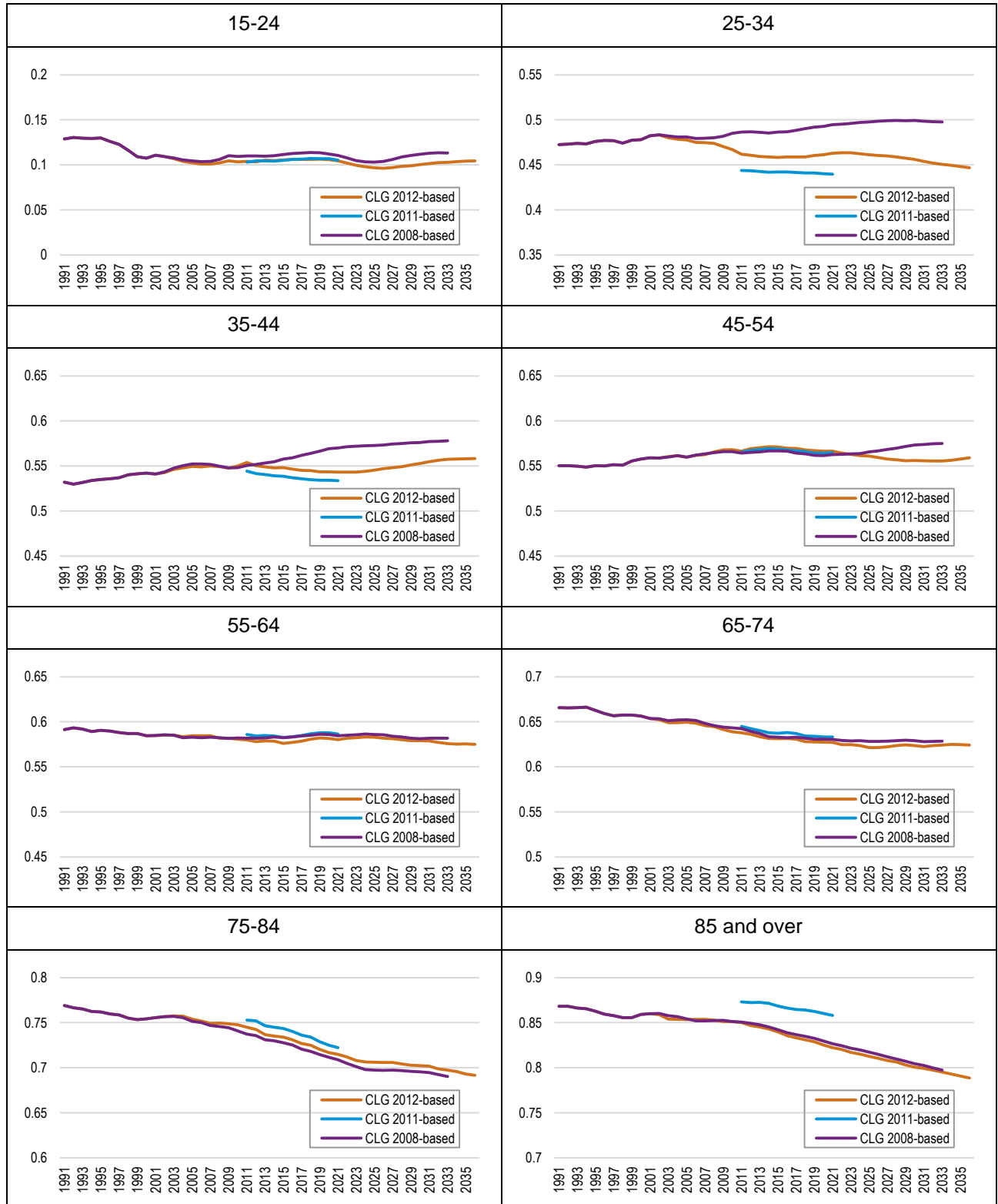
Source: Derived from CLG data

Figure 23: Projected household formation rates by age of head of household – South Holland



Source: Derived from CLG data

Figure 24: Projected household formation rates by age of head of household – South Kesteven



Source: Derived from CLG data