

Comparison between Housing Association Sector and Private Sector Rental Rates of Return across England: 1998/99 to 2006/07

Source document for the Dataspring
Report to the Housing Corporation

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Key findings

Correlation between the key variables

- In 2006/07, housing association (HA) rents, private sector rents and house prices for all local authority (LA) areas are positively and significantly correlated with one another.
- The correlation between HA rents and house prices was slightly weaker than the equivalent for private sector rents.
- The correlation between HA rents and house prices increased between 1998/99 and 2006/07, while the equivalent for the private sector rents remained fairly stable, in part because it was already very high.

HA sector and private sector rental rates of return and the differential between the two at national and regional level

- The HA rental rate of return (measured by annual rent as a percentage of the relevant LQ house price) was 2.80% for England as a whole in 2006/07, while the private sector rental rate of return was 5.07%.
- In 1998/99, rental rates were 5.86% and 9.32% for the HA and private sectors respectively. This implies a reduction of 3.06 percentage points in HA rental rates of return and 4.25 points in the private sector rental rate of return between 1998/99 and 2006/07.
- The HA rental rate of return declined throughout the observation period. The private sector rental rate of return has decreased for the same period except in 2005/06.
- The rate differential between the HA and the private sector was for 2.27 percentage points in 2006/07, comparing with 3.46 points in 1998/99. These two sectors' rental rates moved closer together by 1.19 points over the observation period. This represents a reduction of almost one third in the differential (measured against the HA rental rate of return).
- Across regions in 2006/07, the highest HA rental rate of return was in the North East (3.42%), whereas the lowest rate was in London (2.25%).
- London, on the other hand, had the highest private sector rental rate of return (5.46%) in the same year. The lowest was in the South West (4.23%).
- Generally all regions showed declining rental rates of return in both sectors over the observation period. The latest few years, however, saw some exceptions. Notably, London kept the HA rental rate inert for the recent two years while the South East and the West Midlands experienced slight increases in the sector's rental rates in 2006/07.
- In 2006/07 the rate differential between the two sectors was the largest in London (3.21 points – the HA sector and the private sector rates were 2.25% and 5.46% respectively). The smallest differential was in the East Midlands (1.50 points – 2.91% for the HA sector and 4.41% for the private sector).
- Over the observation period, the differentials narrowed in all regions. The greatest contradiction was in London (by 2.36 points: from 5.57 points in 1998/99 to 3.21

points in 2006/07). In the East Midlands the gap narrowed the least (0.30 points: from 1.80 points in 1998/99 to 1.50 points in 2006/07).

HA sector and private sector rental rates of return and rate differentials at the LA level

- In 2006/07, the median of rate differential between HA and private rental rates of return among all LA areas was 1.78 points, compared with 2.85 in 1998/99. The median declined throughout the observation period.
- The variation in these differentials across LA areas contracted over the observation period, measured either in terms of the standard deviation or the range (maximum differential minus minimum differential). In 2006/07, the standard deviation (0.59 points) and the range (4.07 points) decreased by 0.58 and 0.05 points respectively from 1998/99 but the range increased by 1.62 points compared with the previous year.
- The median of the differential between HA and private rental rates of return for all LA areas was highest in London (3.00 points) for 2006/07. This was followed by the South East (1.99) and the East (1.90).
- The lowest median was observed in Yorkshire and the Humber (1.36), followed by the East Midlands (1.48) and the West Midlands (1.61).
- Compared with 1998/99, all nine regions saw decreases in the median differentials for LA areas in their region. London saw the largest decline by 2.31 points from 5.31 in 1998/99 to 3.00. This was followed by the North West (by 1.85 from 3.67 in 1998/99 to 1.82 in 2006/07) and the South East (by 1.31 from 3.30 to 1.99).
- The smallest decrease was observed in the East Midlands (by 0.30 from 1.78 to 1.48). This was followed by the South West (by 0.82 from 2.45 to 1.63) and the West Midlands (by 0.86 from 2.47 to 1.61).
- Looking at variations across LA areas in all nine regions, there were decreases both in the standard deviations and the ranges from 1998/99 to 2006/07. HA sector and private sector rental rates thus moved closer together across LA areas overall.
- The standard deviation for rate differentials declined most in the South East (by 0.43), followed by London (by 0.37) and the North East (by 0.36). The decrease for the North West was the smallest (0.24), followed by Yorkshire and the Humber and the South West (by 0.30 in each area).

HA sector and private sector rental rates of return and the differentials by urban/rural classification

- The median of the differential in rental rates of return was 2.02 points for urban LA areas and 1.55 points for rural LA areas in 2006/07.
- Over the observation period, the urban median was always greater than the rural equivalent.
- Both urban and rural areas saw declining variation differentials over the observation period, except in 2002/03 for both groups and in 2006/07 for the rural group. The standard deviations decreased by 0.56 for the urban group and by 0.42 for the rural group between 1998/99 and 2006/07. The range declined by 2.80 and 2.11 respectively.

- This implies that HA rental rates and private sector rental rates converged somewhat regardless of the LA areas' degree of urbanisation.

HA sector and private sector rental rates of return and rate differentials in four metropolitan areas:

- In 2006/07, the rate differential for London was 3.21 percentage points, the widest gap among the four cities. It was also far above the national average of 2.27 points. The other three cities rate differentials were fairly close to one other and all of them were narrower than the national average – 1.99 for Birmingham, 1.93 for Manchester and 2.03 for Newcastle.
- Overall, London and Birmingham showed a continuing decline in differentials throughout the observation period; while Manchester and Newcastle narrowed the differentials but around 2002/03 they saw noticeable increases.
- Compared with 1998/99, the rate differentials of 2006/07 in all the four cities had narrowed more than the national reduction of 1.19 points. This implies that in all four metropolitan areas, HA rents have moved more towards the private sector's equivalents than in England overall during the observation period.

Introduction

Last year, Dataspring undertook detailed comparative analyses of rental rates of return for the HA and private rented sectors from 1998/99 to 2005/06. This paper both updates this analysis to 2006/07 and examines the pattern of change since the beginning of the observation period at national, regional and local levels.

The objective of this paper is to examine the spatial pattern of rental rates of return in the HA sector as compared to those observed in the private rented sector. This analysis helps to answer two types of question – first, it gives some measure of the relative investment benefits to HAs in terms of the absolute rental rate of return being obtained and the difference between the two sectors as well as of the relative benefits of investing in different types of area; second it provides evidence on the extent of economic subsidy obtained by social tenants across different areas.

There are three main reasons why we would have expected the relative rental rates of return to change between 1998/09 and 2006/07. Within the HA sector, rents have been subjected to restructuring in relation to incomes and house prices as set out in the Housing Green paper (DETR, 2000). Secondly, there has been very rapid house price rises over the period which can be expected to reduce rental rates of return in the private rented sector. Third, there has been considerable expansion in the private rented sector but also shifts in demand in many areas together resulting in possible structural changes in rents as well as rent differentials across the country.

The analysis builds on three Dataspring studies on rents and rental rates of returns in each of the two sectors separately and on a comparison of rents and user costs across all tenures (Udagawa and Whitehead, 2007a and 2007b; Cao and Whitehead, 2007). From these analyses, we learnt that rental rates of return (measured by the annual rent as percentage of the house price) declined in both sectors during the observation period.

This paper looks at the relativities question in far more detail. It compares the recent movement of the two sectors' rental rates of return and the rate differentials and includes four elements:

1. A brief review of the recent relationships between key variables in the rental housing markets – they consist of HA rents, private sector rents and house prices;
2. A comparison of the HA sector and the private sector rental rates of return across England and the nine regions over the period 1998/99 to 2006/07 by focusing on the two sectors' rate differential;
3. Extending the comparative analyses at the LA level;
4. A more limited comparison of four major metropolitan areas with very different market pressures.

The remaining part of this paper is, thus, structured as follows: Section 2 presents the source of data to be used and describes the latest relationships between key variables associated with rental property markets – they are HA rents, private sector rents and house prices in England and the nine regions. Section 3 compares HA rental rates of returns (measured by the annual rent as percentage of the house price) and the private sector's equivalent by focusing particularly on the two sectors' rate differentials. The comparative analyses in this section will implement at the national and the regional levels. Section 4 and Section 5 undertake the similar analyses at the LA level. The former presents the analyses for all LA areas across England and for those grouped by region, while the latter examines for LA areas categorised by urban/rural classification. Section 6 looks at four metropolitan areas: London, Birmingham, Manchester and Newcastle. Section 7 summarises some of the key points arising from the above analyses and draws some conclusions.

Section 2 Descriptions of the relationships between key variables affecting housing markets

Definition of HA and private sectors' rental rates of return¹

This section examines the pattern of HA rental rates of return from 1998/99 to 2006/07 at various geographical levels. 'Rental rate of return' in the analysis is measured by the HA and private sector annual average rent, converted from the weekly average, as a percentage of LQ house prices for each LA area across England. The data sources for the numerators and denominators are as follows:

Source and definition of HA rents

The HA rent data examined in this paper are taken from the Housing Corporation's Regulatory and Statistical Return (RSR), which identifies HA rent levels at March 31 each year. The period of analysis is from 1998/99 to 2006/07². We use weekly average rents for HAs by LA area in England. Average weekly rents are based on net rents for self-contained properties, i.e., rents of bedsits have been excluded. All rents in the data are general needs assured and secure tenancies combined. They are comprised of general needs housing including Estate Renewal Challenge Fund stock, but they exclude all supported housing and housing for older people³. LA areas where there are few cases and/or some geographical or socio-economic peculiarity have been excluded from the analyses, so as to maintain comparability with the analyses of private sector rental rates of return and rents. This applies to the City of London and the Isles of Scilly. Figures are not adjusted for inflation except where specified.

Source and definition of private sector rents

Private sector rent data examined in this paper are taken from Rent Officer Service at the former Department of Transport, Local Government and the Regions (DTLR) for 1998/99 to 2000/01, and from the Rent Service, an executive agency of the Department for Work and Pensions (DWP), for 2001/02 to 2006/07. Following the government's department restructuring, the Rent Service was launched in 1999 to replace the Rent Officer Service and record rent determinations in housing benefit (HB) cases, so the two agencies are practically identical with respect to the data they produce. One merit of using these sources lies in the fact that their records are the most comprehensive dataset for private sector rents. Another advantage is that this data may be the most applicable reference for rents in the private sector or HA rents, as the HB-case private rent data are representative of the lower half of the market which is the section of the market in which HAs compete.⁴

From this source, we use weekly average rents for all LA areas over the period of 1998/99 to 2006/07. The annual term is defined as April 1st to March 31st the following year. Weekly

¹ Although the data sources in this paper are the same as those used in Udagawa and Whitehead (2007a and 2007b), by adjusting missing values for one sector to correspond with the other, some results might not be equal to their equivalent, presented in the other works.

² The data were derived from all HAs that completed the long version of the RSR and made a valid return. In general, those HAs that own or manage more than 250 dwellings and/or bedspaces, including shared ownership dwellings complete the long version of the RSR up to 2005/06. In 2006/07, the threshold was raised to 1,000 dwellings and/or bedspaces.

³ From 2005, the definition of 'general needs' as reported in the RSR was changed. Prior to this, general needs housing included some dwellings classified as sheltered housing for older people. From 2005, the sheltered housing classification was eliminated and dwellings that met certain design criteria transferred from general needs into a new category: housing for older people. For further information, see Housing Corporation circular 03/04.

⁴ The Rent Officer needs to limit payment of HB to be no higher than the median of the range of rents (excluding high outliers) within a given locality (Rent Officers estimate the median using their knowledge of the local market). Most rents referred to the Rent Officer are not significantly above the median for the locality (both sets of data are included in the Rent Officer statistics database). Therefore, HB-case private rents provide a good representation of the lower half of the private rented market as well as being a good reference for the social housing rented market. For reference, the proportion of private renters receiving HB was 21% in 2004/05 (CLG, 2006).

average rents are based on rents for self-contained properties, i.e., rents for bedsits are excluded. The data refer to lettings of unfurnished and furnished assured short-hold tenancies, and secure tenancies.

Due to administrative boundary changes or for other reasons, there are a few missing LA areas for each year of the observation period. Again, LA areas with few private rent cases and/or some geographical or socio-economic peculiarity have been excluded from the analyses, therefore, the totals of LA areas' figures in some tables may not be the same as the equivalents published by the data source organisations. Prior to 2001/02, weekly average rents were disaggregated by tenure, i.e., rents of furnished or unfurnished properties, and thus these data have been aggregated as case-weighted averages in order to be comparable with data for each year onwards. All the figures are inflation-unadjusted unless specified.

Source and definition of house prices

There is no time-series statistical evidence on what market prices of HA housing could form a basis for estimating HA rental rates of return. As a substitute, we use lower quartile (LQ) house prices provided by the Communities and Local Government (CLG)/Land Registry⁵. The reason for choosing the LQ, rather than the median, is mainly that the rents examined in the previous section reflect the lower part of the rental market⁶. Thus, LQ house prices are more likely to be an appropriate comparator⁷. The annual term for LQ house prices in this section is defined as April 1st to March 31st the following year, and the figures are not adjusted for inflation. Once again, LA areas with some geographical or socio-economic peculiarity have been excluded from the analyses at the LA level.

Correlation of key variables at housing markets – 2006/07 and 1998/99

Tables 2.1 and 2.2 set out correlation coefficients between HA rents, private sector rents and house prices for all LA areas in 2006/07 and 1998/99 respectively. For more details of the relationship between these variables for the observation period, see Annex 1.

- In 2006/07, all four variables appeared positively correlated with one another, to a statistically significant degree.
- The correlation between HA rents and house prices was slightly weaker than the equivalent for private sector rents.
- The magnitude of the correlation between HA and private sector rents was greater than that of HA rents with house prices.
- Compared with in 1998/99, the significance of the correlation between HA rents and house prices increased, whilst the equivalent for private sector rents failed to rise which was partly as a result of being very high already, leaving little scope for additional improvements.
- The significance of the correlation between HA and private sector rents also increased.

⁵ Formerly the data were provided by the Office of the Deputy Prime Minister (ODPM)/Land Registry.

⁶ According to the DWP *Family Resource Survey* available from CLG (2006), 49% of social housing renters had gross annual incomes (householder and partner) of less than £10K in 2004/05, whereas the proportion for private housing renters was 22%.

⁷ In calculating the LQ house prices, CLG did not include sales at below market price (e.g., Right to Buy), sales below £1,000 and sales above £20m.

Table 2.1 Correlation coefficients of the four indicators across all LA areas: 2006/07

	HA rent	Private rent	House price
HA rent	1		
Private rent	0.833	1	
House price	0.793	0.867	1

Note: This excludes the City of London and the Isles of Scilly for the HA sector. The weighted average is based on the constituent LA areas' stock for the private sector.

Source: Calculation based on the RSR, the Rent Officer, the Rent Service and DCLG/Land Registry.

Table 2.2 Correlation coefficients of the four indicators across all LA areas: 1998/99

	HA rent	Private rent	House price
HA rent	1		
Private rent	0.649	1	
House price	0.604	0.899	1

Note and source: As Table 2.2.

Section 3 The HA sector rental rate of return, private sector rental rates of return, their differentials, and change at the national and regional levels: 1998/99–2006/07

Table 3.1 sets out the HA sector rate of return, private sector rate of return and their differentials from 1998/99 to 2006/07 at the national level:

- The HA rental rate of return (measured by annual rent as a percentage of the relevant LQ house price; i.e., taking no account of the costs of letting and maintaining the property) was 2.80% for England in 2006/07, whilst the private sector rental rate of return was 5.07%.
- These rental rates of return compare with 5.86% in 1998/99 for the HA sector and 9.32% for the private sector.
- The HA rental rate of return has decreased throughout the observation period. The equivalent for the private sector also had a downward trend until 2004/05 but showed a marginal recovery of 0.11 percentage points in the last year. The overall declining pattern for both sectors owed mainly to rapid increases in house prices over the period.
- The rate differential between the HA and private sectors (measured by the HA sector minus the private sector) was -2.27 points in 2006/07, compared with -3.46 points in 1998/99. This indicates that the two sectors' rates converged by 1.19 points over the observation period.

Table 3.1 HA sector and private sector rental rates of return: National (% and %-point), 1998/99 – 2006/07

	HA		Private		Differential (HA – private)	
	Rental rate	Change	Rental rate	Change	Rental rate	Change
1998/99	5.86		9.32		-3.46	
1999/00	5.47	-0.39	8.32	-1.00	-2.85	0.61
2000/01	5.14	-0.32	8.13	-0.19	-2.99	-0.13
2001/02	4.88	-0.27	7.74	-0.39	-2.86	0.12
2002/03	4.00	-0.88	7.30	-0.44	-3.30	-0.44
2003/04	3.43	-0.56	6.16	-1.14	-2.73	0.58
2004/05	2.98	-0.46	5.14	-1.02	-2.16	0.56
2005/06	2.90	-0.07	5.25	0.11	-2.35	-0.18
2006/07	2.80	-0.10	5.07	-0.18	-2.27	0.08
1998/99 – 2006/07		-3.06		-4.07		1.19

Note and Source: see Section 2. Due to rounding 0.1% or 0.01 per pound errors should be allowed.

Tables 3.2 to 3.10 set out the HA and private sector rental rates of return and their differentials from 1998/99 to 2006/07 at the regional level:

- All nine regions retained higher private sector rental rates than HA sector rental rates, for the observation period.
- At the regional level, the highest HA rental rate of return was observed in the North East (3.42%). This was followed by those in the North West (3.29%) and Yorkshire and the Humber (2.98%). The lowest rental rate was seen in London (2.25%), followed by those in the South West (2.43%), and the East and the South East (2.57% for each).

- The highest private sector rental rate of return was observed in London (5.46%) in 2006/07. This was followed by those in the North East (5.21%) and the North West (5.09%). The lowest three rental rates were held by the South West (4.23%), the East Midlands (4.41%) and the South East (4.47%).
- Generally, all regions showed a declining pattern of rental rates for both sectors through the observation period with a few exceptions. Notably, London kept the HA rental rate nearly inert for the recent three years.
- The rate differential between the two sectors was greatest in London in 2006/07 (-3.21 points – the HA and private sector rental rates were 2.25% and 5.46% respectively). This was followed by the East (-2.02 points) and the West Midlands (-1.91 points). The three smallest gaps were found in the East Midlands (-1.50 points), Yorkshire and the Humber (-1.71 points) and the North East (-1.79 points).
- Compared with 1998/99, rate differentials in 2006/07 narrowed across all regions. The gap contracted most drastically in London (2.36 points: from -5.57 points in 1998/99 to -3.21 points in 2006/07). This was followed by those of the North West (1.95 points; from -3.75 points in 1998/99 to -1.80 points in 2006/07) and the South East (1.15 points; from -3.05 points in 1998/99 to -1.90 points in 2006/07).
- By contrast, the differential narrowed least in the East Midlands (0.30 points; from -1.80 points in 1998/99 to -1.50 points in 2006/07). This was followed by Yorkshire and the Humber (0.83 points; from -2.54 points in 1998/99 to -1.71 points in 2006/07), and the East (0.90 point; from -2.88 points in 1998/99 to -2.02 points in 2006/07).

Table 3.2 HA sector and private sector rental rates of return: East (% and %-point), 1998/99 – 2006/07

	HA		Private		Differential (HA – private)	
	Rental rate	Change	Rental rate	Change	Rental rate	Change
1998/99	5.51		8.39		-2.88	
1999/00	5.09	-0.42	7.73	-0.66	-2.64	-0.24
2000/01	4.61	-0.48	6.96	-0.77	-2.35	-0.29
2001/02	4.07	-0.54	6.13	-0.83	-2.06	-0.29
2002/03	3.35	-0.72	5.65	-0.48	-2.30	0.24
2003/04	2.83	-0.52	4.97	-0.68	-2.14	-0.16
2004/05	2.62	-0.21	4.38	-0.59	-1.76	-0.38
2005/06	2.66	0.04	4.74	0.36	-2.08	0.32
2006/07	2.57	-0.09	4.59	-0.15	-2.02	-0.06
1998/99 – 2006/07		-2.94		-3.65		0.90

Note and Source: As Table 3.1.

Table 3.3 HA sector and private sector rental rates of return: East Midlands (% and %-point), 1998/99 – 2006/07

	HA		Private		Differential (HA – private)	
	Rental rate	Change	Rental rate	Change	Rental rate	Change
1998/99	6.52		8.32		-1.80	
1999/00	6.06	-0.46	7.78	-0.54	-1.72	-0.08
2000/01	5.82	-0.24	7.62	-0.16	-1.80	0.08
2001/02	5.25	-0.57	7.17	-0.45	-1.92	0.12
2002/03	4.27	-0.98	6.42	-0.75	-2.15	0.23
2003/04	3.44	-0.83	5.10	-1.32	-1.66	-0.49
2004/05	3.08	-0.36	4.42	-0.68	-1.34	-0.32
2005/06	3.01	-0.07	4.54	0.12	-1.53	0.19
2006/07	2.91	-0.10	4.41	-0.13	-1.50	-0.03
1998/99 – 2006/07		-3.61		-3.78		0.30

Note and Source: As Table 3.1.

Table 3.4 HA sector and private sector rental rates of return: London (% and %-point), 1998/99 – 2006/07

	HA		Private		Differential (HA – private)	
	Rental rate	Change	Rental rate	Change	Rental rate	Change
1998/99	4.48		10.05		-5.57	
1999/00	3.88	-0.60	8.53	-1.52	-4.65	-0.92
2000/01	3.34	-0.54	7.83	-0.70	-4.49	-0.16
2001/02	2.99	-0.35	6.72	-1.11	-3.73	-0.76
2002/03	2.55	-0.44	6.59	-0.13	-4.04	0.31
2003/04	2.35	-0.20	6.06	-0.53	-3.71	-0.33
2004/05	2.28	-0.07	5.66	-0.40	-3.38	-0.33
2005/06	2.29	0.01	5.66	0.00	-3.37	-0.01
2006/07	2.25	-0.04	5.46	-0.20	-3.21	-0.16
1998/99 – 2006/07		-2.23		-4.59		2.36

Note and Source: As Table 3.1.

Table 3.5 HA sector and private sector rental rates of return: North East (% and %-point), 1998/99 – 2006/07

	HA		Private		Differential (HA – private)	
	Rental rate	Change	Rental rate	Change	Rental rate	Change
1998/99	7.17		10.07		-2.90	
1999/00	6.91	-0.26	9.21	-0.86	-2.30	-0.60
2000/01	7.18	0.27	9.75	0.54	-2.57	0.27
2001/02	6.93	-0.25	10.25	0.50	-3.32	0.75
2002/03	6.53	-0.40	10.56	0.31	-4.03	0.71
2003/04	5.12	-1.41	7.79	-2.77	-2.67	-1.36
2004/05	4.14	-0.98	6.14	-1.65	-2.00	-0.67
2005/06	3.71	-0.43	5.52	-0.62	-1.81	-0.19
2006/07	3.42	-0.29	5.21	-0.31	-1.79	-0.02
1998/99 – 2006/07		-3.75		-4.86		1.11

Note and Source: As Table 3.1.

Table 3.6 HA sector and private sector rental rates of return: North West (% and %-point), 1998/99 – 2006/07

	HA		Private		Differential (HA – private)	
	Rental rate	Change	Rental rate	Change	Rental rate	Change
1998/99	6.56		10.31		-3.75	
1999/00	6.47	-0.09	9.65	-0.66	-3.18	-0.57
2000/01	6.57	0.10	9.70	0.05	-3.13	-0.05
2001/02	6.44	-0.13	9.78	0.08	-3.34	0.21
2002/03	5.95	-0.49	9.51	-0.27	-3.56	0.22
2003/04	4.82	-1.13	7.59	-1.92	-2.77	-0.79
2004/05	3.90	-0.92	5.84	-1.75	-1.94	-0.83
2005/06	3.53	-0.37	5.45	-0.39	-1.92	-0.02
2006/07	3.29	-0.24	5.09	-0.36	-1.80	-0.12
1998/99 – 2006/07		-3.27		-5.22		1.95

Note and Source: As Table 3.1.

Table 3.7 HA sector and private sector rental rates of return: South East (% and %-point), 1998/99 – 2006/07

	HA		Private		Differential (HA – private)	
	Rental rate	Change	Rental rate	Change	Rental rate	Change
1998/99	5.11		8.16		-3.05	
1999/00	4.65	-0.46	7.34	-0.82	-2.69	-0.36
2000/01	4.06	-0.59	6.66	-0.68	-2.60	-0.09
2001/02	3.73	-0.33	5.94	-0.72	-2.21	-0.39
2002/03	3.03	-0.70	5.40	-0.54	-2.37	0.16
2003/04	2.71	-0.32	4.86	-0.54	-2.15	-0.22
2004/05	2.59	-0.12	4.34	-0.52	-1.75	-0.40
2005/06	2.63	0.04	4.55	0.21	-1.92	0.17
2006/07	2.57	-0.06	4.47	-0.08	-1.90	-0.02
1998/99 – 2006/07		-2.54		-3.69		1.15

Note and Source: As Table 3.1.

Table 3.8 HA sector and private sector rental rates of return: South West (% and %-point), 1998/99 – 2006/07

	HA		Private		Differential (HA – private)	
	Rental rate	Change	Rental rate	Change	Rental rate	Change
1998/99	5.30		8.14		-2.84	
1999/00	4.88	-0.42	7.43	-0.71	-2.55	-0.29
2000/01	4.35	-0.53	6.77	-0.66	-2.42	-0.13
2001/02	3.87	-0.48	5.86	-0.91	-1.99	-0.43
2002/03	3.23	-0.64	5.85	-0.01	-2.62	0.63
2003/04	2.71	-0.52	4.75	-1.10	-2.04	-0.58
2004/05	2.51	-0.20	4.03	-0.72	-1.52	-0.52
2005/06	2.55	0.04	4.37	0.34	-1.82	0.30
2006/07	2.43	-0.12	4.23	-0.14	-1.80	-0.02
1998/99 – 2006/07		-2.87		-3.91		1.04

Note and Source: As Table 3.1.

Table 3.9 HA sector and private sector rental rates of return: West Midlands (% and %-point), 1998/99 – 2006/07

	HA		Private		Differential (HA – private)	
	Rental rate	Change	Rental rate	Change	Rental rate	Change
1998/99	5.95		8.88		-2.93	
1999/00	5.54	-0.41	8.40	-0.48	-2.86	-0.07
2000/01	5.19	-0.35	8.14	-0.26	-2.95	0.09
2001/02	4.83	-0.36	7.54	-0.60	-2.71	-0.24
2002/03	4.09	-0.74	6.90	-0.64	-2.81	0.10
2003/04	3.43	-0.66	5.75	-1.15	-2.32	-0.49
2004/05	3.05	-0.38	5.00	-0.75	-1.95	-0.37
2005/06	2.92	-0.13	4.90	-0.10	-1.98	0.03
2006/07	2.88	-0.04	4.79	-0.11	-1.91	-0.07
1998/99 – 2006/07		-3.07		-4.09		1.02

Note and Source: As Table 3.1.

Table 3.10 HA sector and private sector rental rates of return: Yorkshire and the Humber (% and %-point), 1998/99 – 2006/07

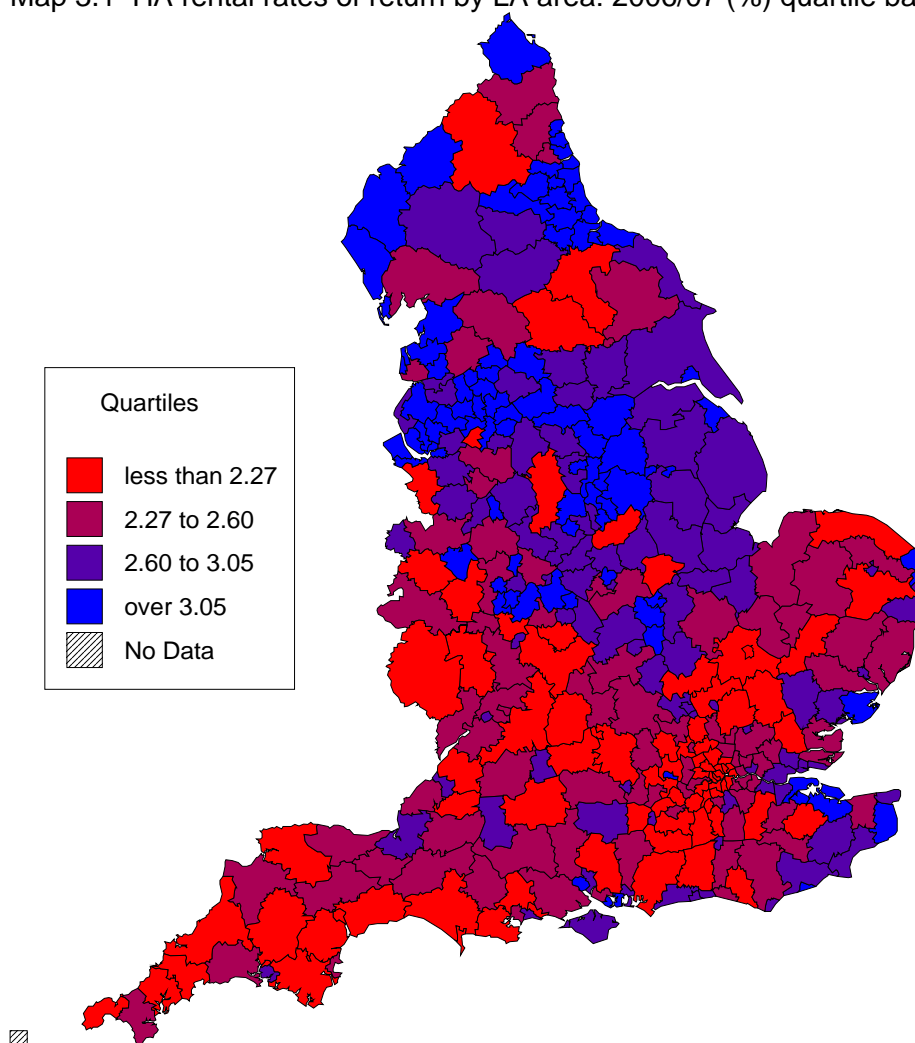
	HA		Private		Differential (HA – private)	
	Rental rate	Change	Rental rate	Change	Rental rate	Change
1998/99	6.76		9.30		-2.54	
1999/00	6.69	-0.07	8.84	-0.46	-2.15	-0.39
2000/01	6.42	-0.27	8.86	0.02	-2.44	0.29
2001/02	6.47	0.05	9.05	0.19	-2.58	0.14
2002/03	5.63	-0.84	9.82	0.77	-4.19	1.61
2003/04	4.42	-1.21	6.87	-2.95	-2.45	-1.74
2004/05	3.47	-0.95	5.16	-1.71	-1.69	-0.76
2005/06	3.27	-0.20	4.99	-0.17	-1.72	0.03
2006/07	2.98	-0.29	4.69	-0.30	-1.71	-0.01
1998/99 – 2006/07		-3.78		-4.61		0.83

Note and Source: As Table 3.1.

Maps 3.1 to 3.6 illustrate the HA and private sector rental rates of return, their differentials and changes from 1998/99 across all LA areas by grouping quartile bands for each category:

- Map 3.1 set outs HA rental rates of return in 2006/07. The majority of LA areas with low rental rates (coloured in red) are located in the southern regions, particularly in London.
- By contrast LA areas with high rental rates (coloured in blue) appeared in the north of England more frequently⁸.

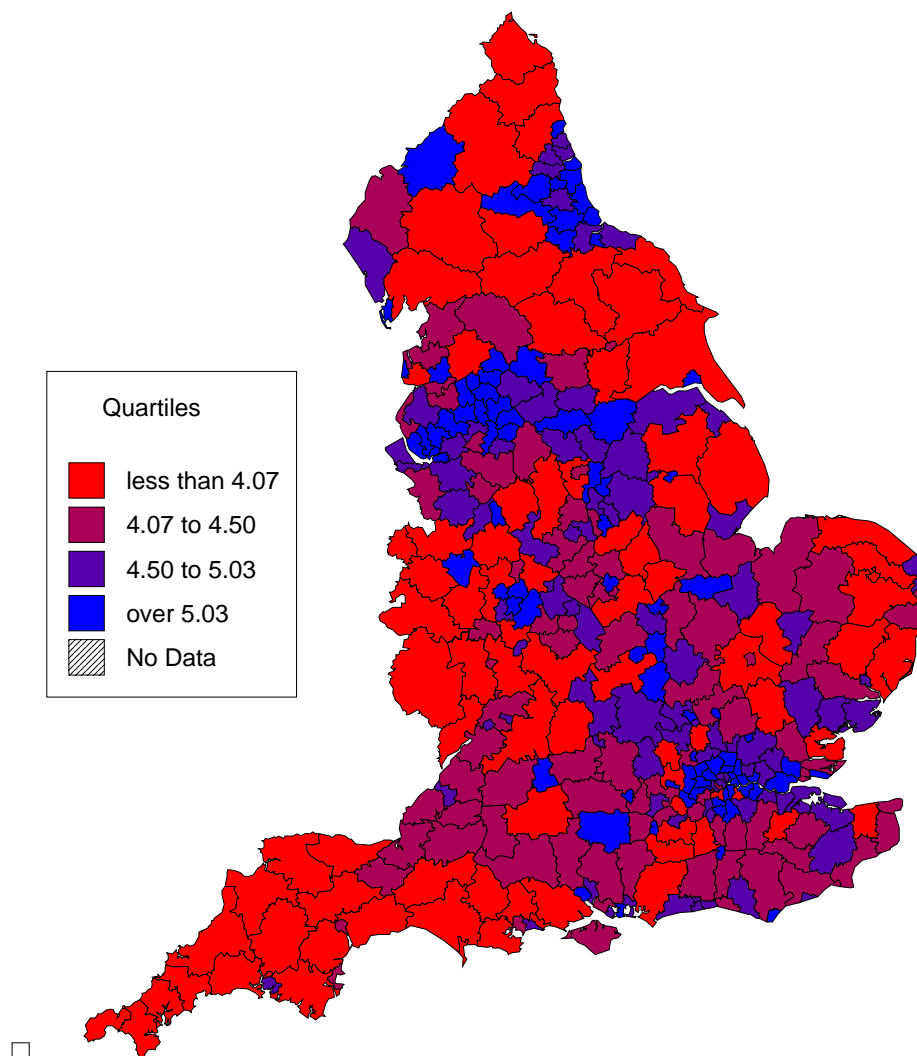
Map 3.1 HA rental rates of return by LA area: 2006/07 (%) quartile bands



⁸ The correlation coefficients of HA sector rental rates of return and the proportion of rural area population across all LA areas was -0.218 in 2006/07.

- Map 3.2 set outs private sector rental rates of return in 2006/07. LA areas with high rental rates were located in and around major cities – notably London, Manchester, Birmingham and Newcastle.
- LA areas with low rental rates were frequently observed in the rural South West, rural Midlands and the rural North East areas⁹.

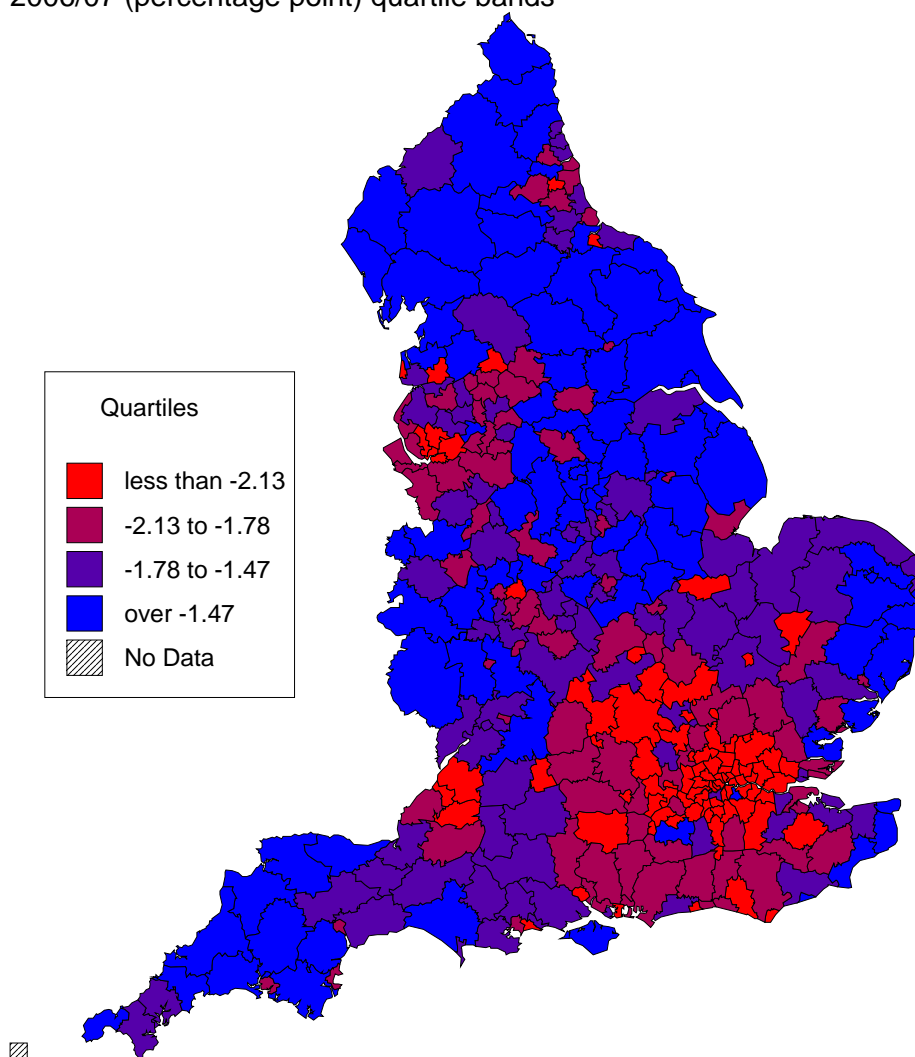
Map 3.2 Private sector rental rates of return by LA area: 2006/07 (%) quartile bands



⁹ The correlation coefficients of private sector rental rates of return and the proportion of rural area population across all LA areas were -0.593 in 2006/07.

- Map 3.3 set out the rate differentials between the HA and private sectors in 2006/07. The great majority of LA areas with large differentials were located in London and its surrounding areas. Among 88 LA areas in the largest differential quartile band, 31 were in London and 26 were in the South East. LA areas around Liverpool area also showed the large differentials.
- LA areas with small differentials were frequently observed in the rural South West, rural Midlands and the rural North East areas¹⁰.

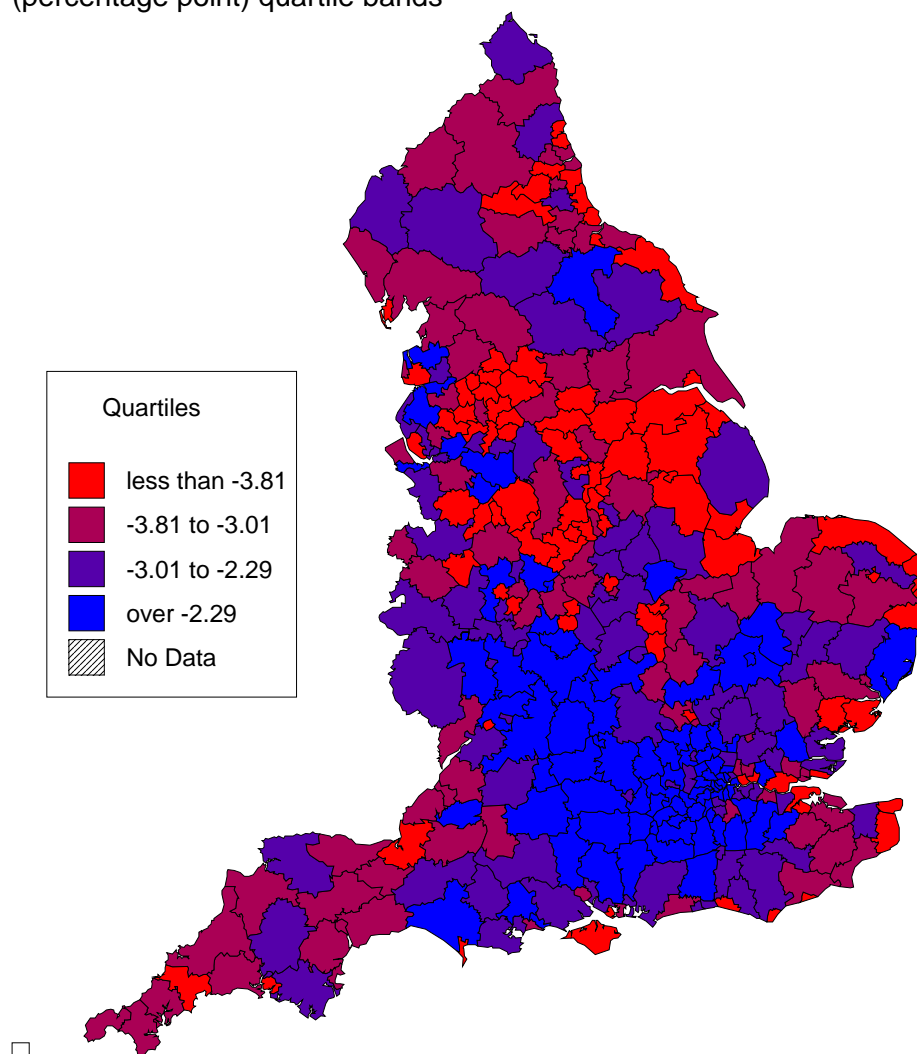
Map 3.3 Differentials of rental rates of return (the HA sector – the private sector) by LA area: 2006/07 (percentage point) quartile bands



¹⁰ The correlation coefficient of rate differentials and the proportion of rural area population across all LA areas were 0.535 in 2006/07.

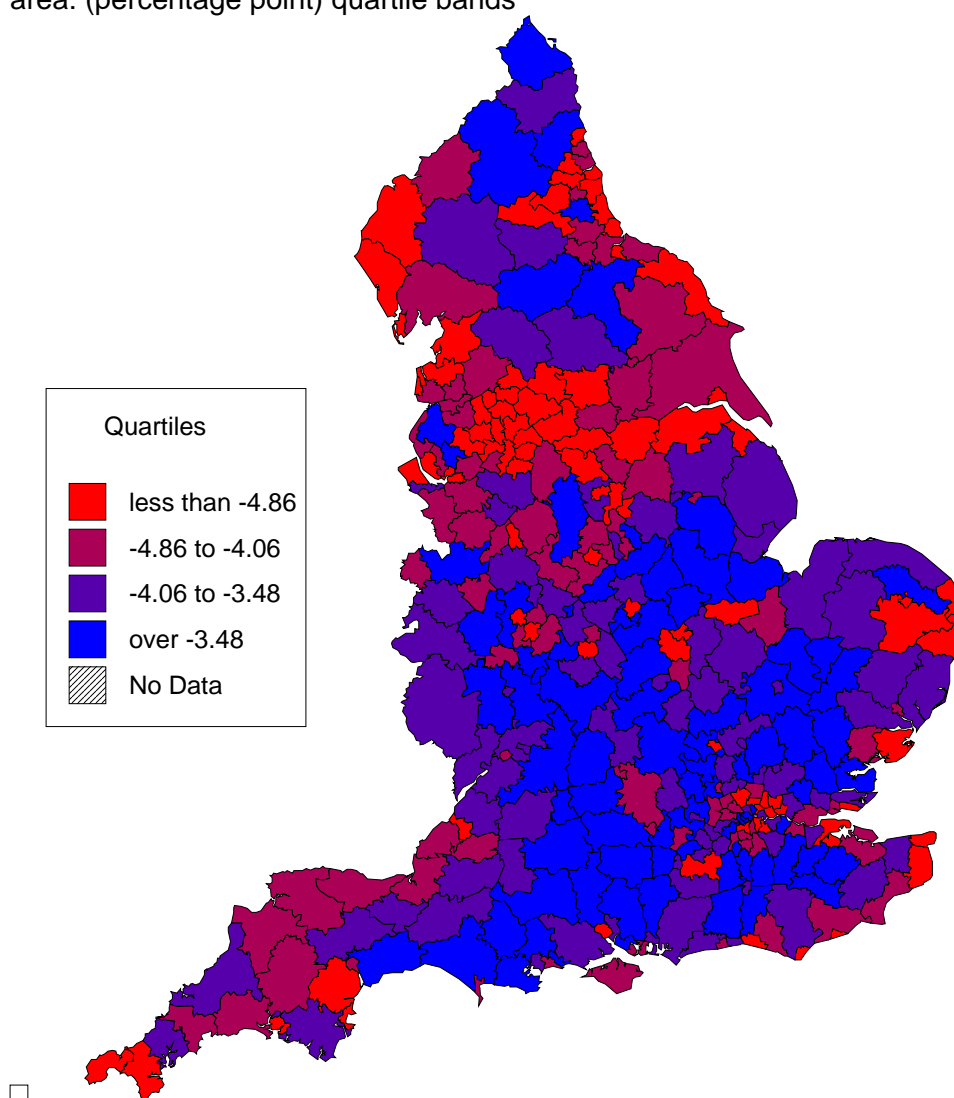
- Map 3.4 set outs changes in HA rental rates of return from 1998/99 to 2006/07. LA areas with small decreases in the rental rates of return were frequently observed in areas between London and Birmingham (although the latter city was exclusive).
- LA areas with sharp drops in rental rates were located in Yorkshire and the Humber and in the Midlands, with some exceptions.

Map 3.4 Changes in HA rental rates of returns from 1998/99 to 2006/07 by LA area: (percentage point) quartile bands



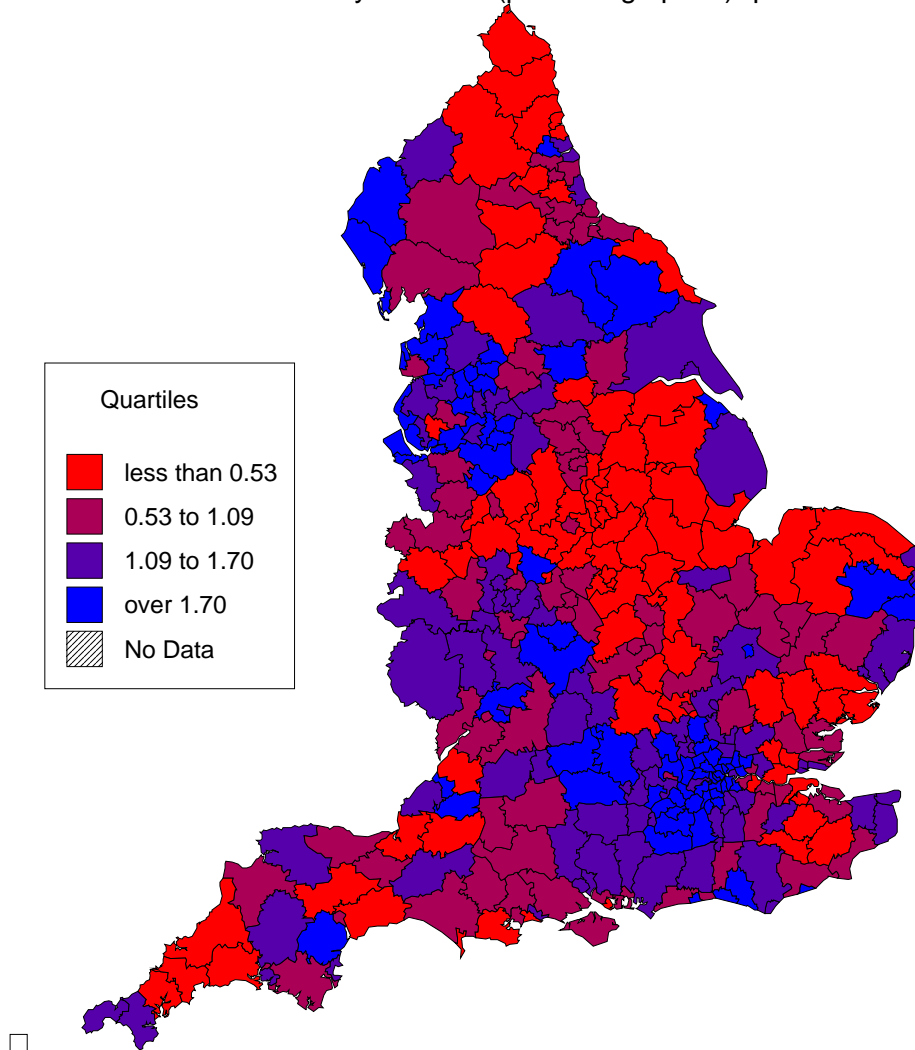
- Map 3.5 sets out changes in private sector rental rates of return from 1998/99 to 2006/07. There were several LA areas with large decreases in rental rates of return around Manchester and Newcastle as well as in Yorkshire and the Humber. North London also had some LA areas in this category.
- LA areas with small decreases were often found in the East, in the eastern part of the South West, the western part of the South East and the Midlands with the exception of Birmingham and its surrounding LA areas.

Map 3.5 Changes in private sector rental rates of returns from 1998/99 to 2006/07 by LA area: (percentage point) quartile bands



- Map 3.6 set out changes in rate differentials (the HA sector – the private sector) from 1998/99 to 2006/07. LA areas with large increases in rate differentials, (which mean rapidly narrowing differentials) were observed in and around the major cities – London, Manchester, Birmingham and Newcastle.
- By contrast, LA areas with small increases or decreases in rate differentials, which means modestly narrowing or widening differentials, were often found in rural areas of the East, the South West, the East and West Midlands and the North East.

Map 3.6 Changes in differentials of rental rates of return (the HA sector – the private sector) from 1998/99 to 2006/07 by LA area: (percentage point) quartile bands



Section 4 HA sector rental rates of return, private sector rental rates of return and the rate differentials at the LA level: 1998/99–2006/07

Table 4.1 set outs statistics of the HA and private sector rental rates of return and the rate differentials between the two sectors for LA areas across England from 1998/99 to 2006/07:

- In 2006/07, the median of the rate differentials (HA sector rates minus private sector rates) for all LA areas was -1.78 points, compared with -2.85 in 1998/99. The median declined through the observation period.
- The variation of rate differentials across LA areas contracted both in terms of its standard deviation and its range (maximum differential minus minimum differential) in 2006/07. The standard deviation (0.59 points) and the range (4.07 points) decreased by 0.58 and 0.05 points respectively from 1998/99 but the range increased by 1.62 points compared with 2005/06.
- The median of HA sector rental rates was 2.60% in 2006/07, which indicates a decline of 3.10 points from 5.70% in 1998/99.
- The standard deviation (0.63 in 2006/07) and the range (5.47 in 2006/07) decreased by 0.97 and 5.29 points respectively since 1998/99.
- The median of private sector rental rates was 4.50% in 2006/07, down by 4.04 points from 8.54% in 1998/99. The standard deviation (0.76 in 2006/07) and the range (6.46 in 2006/07) decreased by 0.82 and 4.49 points respectively, since 1998/99.
- These facts imply that rental rates of return for LA areas converged for the observation period regardless of which sector, but that the degree of convergence was stronger within the HA sector, largely because rents within the sector were more regulated than those within the private sector.

Table 4.1 Descriptions of rental rates of return for LA areas (% or %-point): England

	HA			Private			Differential (HA – private)		
	Median	Std. Dev.	Range	Median	Std. Dev.	Range	Median	Std. Dev.	Range
1998/99	5.70	1.60	10.76	8.54	1.58	10.93	-2.85	1.17	6.28
1999/00	5.27	1.66	10.88	8.02	1.56	10.89	-2.64	1.03	5.95
2000/01	4.74	1.92	12.02	7.26	1.91	14.36	-2.53	0.91	5.41
2001/02	4.24	2.02	15.35	6.35	2.29	17.72	-2.27	0.83	4.54
2002/03	3.46	2.10	20.54	6.18	2.59	26.12	-2.61	1.12	7.34
2003/04	2.94	1.57	12.93	5.19	1.87	16.42	-2.14	0.81	4.85
2004/05	2.72	1.15	12.87	4.49	1.31	13.81	-1.65	0.68	3.58
2005/06	2.71	0.80	7.68	4.71	0.89	8.36	-1.85	0.60	3.47
2006/07	2.60	0.63	5.47	4.50	0.76	6.44	-1.78	0.59	4.07
Change: 98/99 – 06/07	-3.10	-0.97	-5.29	-4.04	-0.82	-4.49	1.07	-0.58	0.05

Note and Source: See Section 2.

Tables 4.2 to 4.10 set out statistics for the HA and private sector rental rates of return and rate differentials between the two sectors for LA areas across the nine regions from 1998/99 to 2006/07:

- The median of the rate differentials for LA areas was the highest in London (-3.00 points) for 2006/07. This was followed by those of the South East (-1.99) and the East (-1.90).

- The lowest median was observed in Yorkshire and the Humber (-1.36). This was followed by those of the East Midlands (-1.48) and the West Midlands (-1.61).
- Compared with in 1998/99, all nine regions saw decreases in the medians of the rate differentials for LA areas within their boundaries. London saw the most drastic decline of 2.31 points from -5.31 in 1998/99. This was followed by the North West (by 1.85 from -3.67 in 1998/99 to -1.82 in 2006/07) and the South East (by 1.31 from -3.30 to -1.99).
- The smallest decrease was observed in the East Midlands (by 0.30 from -1.78 to -1.48). This was followed by the South West (by 0.82 from -2.45 to -1.63) and the West Midlands (by 0.86 from -2.47 to -1.61).
- Variations of rate differentials across LA areas, measured by the standard deviation, were greatest the South West (0.56) in 2006/07. London and the East followed this with a value of 0.50 for each.
- The East Midlands and the West Midlands shared the smallest standard deviation for rate differentials (0.35). The third smallest was observed in the South West (0.38).
- With respect to variations of the rate differentials measured by the range from the minimum to the maximum values, the North West had the widest range of 3.53 in 2006/07. This was followed by the South East (3.00), the East and London (2.83 for each region).
- The West Midlands the narrowest range of 1.33. This was followed by Yorkshire and the Humber (1.46) and the East Midlands (1.58).
- Compared the latest variations of the rate differentials across LA areas with those in 1998/99, all nine regions observed decreases both in the standard deviations and the ranges. With the fact that they experienced declines in the medians of the rate differentials, HA and private sector rates converged overall across LA areas for the observation period.
- The standard deviation for rate differentials dropped most drastically in the South between the two years (by 0.43). London followed this with a decline of 0.37. The decrease for the North West was the smallest (-0.24), followed by the South West and Yorkshire and the Humber (-0.30 for each).

Table 4.2 Descriptions of rental rates of return for LA areas (% or %-point): East, 1998/99 – 2006/07

	HA			Private			Differential (HA – private)		
	Median	Std. Dev.	Range	Median	Std. Dev.	Range	Median	Std. Dev.	Range
1998/99	5.33	1.17	4.38	8.07	1.10	4.28	-2.82	0.83	4.05
1999/00	4.88	1.11	4.33	7.56	1.02	4.07	-2.41	0.82	3.64
2000/01	4.30	1.04	4.15	6.77	0.96	4.04	-2.33	0.70	3.03
2001/02	3.95	0.92	3.60	5.80	0.92	4.12	-2.02	0.55	2.23
2002/03	3.21	0.66	2.77	5.62	0.70	2.86	-2.38	0.66	2.87
2003/04	2.74	0.49	2.11	4.90	0.60	2.34	-2.18	0.58	2.58
2004/05	2.53	0.37	1.46	4.36	0.56	1.9	-1.74	0.49	1.69
2005/06	2.53	0.34	1.44	4.62	0.46	1.9	-1.99	0.39	1.42
2006/07	2.51	0.32	1.33	4.46	0.61	3.58	-1.90	0.50	2.83
Change: 98/99 – 06/07	-2.82	-0.85	-3.05	-3.61	-0.49	-0.70	0.92	-0.33	-1.22

Note and Source: As Table 4.1.

Table 4.3 Descriptions of rental rates of return for LA areas (% or %-point): East Midlands, 1998/99 – 2006/07

	HA			Private			Differential (HA – private)		
	Median	Std. Dev.	Range	Median	Std. Dev.	Range	Median	Std. Dev.	Range
1998/99	6.60	1.36	5.21	8.20	1.36	5.82	-1.78	0.66	2.44
1999/00	5.92	1.32	5.66	7.68	1.25	4.99	-1.71	0.65	2.51
2000/01	5.68	1.47	5.93	7.61	1.42	5.30	-1.78	0.63	2.43
2001/02	5.15	1.60	7.00	6.92	1.64	7.51	-1.76	0.60	3.00
2002/03	4.22	1.48	7.15	6.40	1.55	7.25	-1.86	1.09	5.43
2003/04	3.45	0.90	4.25	5.03	0.83	3.49	-1.56	0.45	1.86
2004/05	2.96	0.65	3.12	4.30	0.65	2.37	-1.28	0.40	1.98
2005/06	2.99	0.54	2.57	4.53	0.54	2.29	-1.47	0.37	1.82
2006/07	2.91	0.50	2.34	4.45	0.58	2.32	-1.48	0.35	1.58
Change: 98/99 – 06/07	-3.69	-0.86	-2.87	-3.75	-0.78	-3.50	0.30	-0.31	-0.86

Note and Source: As Table 4.1.

Table 4.4 Descriptions of rental rates of return for LA areas (% or %-point): London, 1998/99 – 2006/07

	HA			Private			Differential (HA – private)		
	Median	Std. Dev.	Range	Median	Std. Dev.	Range	Median	Std. Dev.	Range
1998/99	4.50	1.16	5.01	9.81	1.18	5.00	-5.31	0.87	3.71
1999/00	3.85	1.07	4.15	8.32	1.26	5.20	-4.53	0.84	4.16
2000/01	3.28	0.92	3.57	7.36	0.88	3.49	-4.16	0.48	1.90
2001/02	2.94	0.76	3.34	6.37	0.87	3.96	-3.42	0.40	1.82
2002/03	2.47	0.53	2.22	6.34	0.54	1.95	-3.85	0.49	1.82
2003/04	2.37	0.38	1.64	5.90	0.48	1.77	-3.52	0.45	1.99
2004/05	2.25	0.35	1.56	5.40	0.46	1.76	-3.19	0.44	2.04
2005/06	2.28	0.36	1.63	5.41	0.58	3.12	-3.20	0.59	3.40
2006/07	2.20	0.37	1.61	5.22	0.55	2.24	-3.00	0.50	2.83
Change: 98/99 – 06/07	-2.30	-0.79	-3.40	-4.59	-0.63	-2.76	2.31	-0.37	-0.88

Note and Source: As Table 4.1.

Table 4.5 Descriptions of rental rates of return for LA areas (% or %-point): North East, 1998/99 – 2006/07

	HA			Private			Differential (HA – private)		
	Median	Std. Dev.	Range	Median	Std. Dev.	Range	Median	Std. Dev.	Range
1998/99	7.00	1.38	5.55	9.77	1.79	6.96	-2.50	0.77	3.13
1999/00	7.10	1.47	5.24	9.44	1.68	6.07	-2.10	0.61	2.36
2000/01	6.90	1.73	6.33	9.21	2.12	8.06	-2.31	0.68	2.44
2001/02	6.82	1.78	6.62	9.76	2.47	9.11	-2.84	1.00	3.91
2002/03	6.41	1.96	7.14	9.84	2.37	10.36	-3.32	1.25	5.38
2003/04	4.91	1.92	7.12	7.14	2.76	10.13	-2.18	1.04	4.66
2004/05	3.83	1.29	5.20	5.63	1.79	7.60	-1.74	0.63	2.73
2005/06	3.63	0.86	3.42	5.36	1.13	4.83	-1.74	0.39	1.63
2006/07	3.36	0.64	2.28	5.00	0.89	3.12	-1.74	0.41	1.59
Change: 98/99 – 06/07	-3.64	-0.74	-3.27	-4.77	-0.90	-3.84	0.76	-0.36	-1.54

Note and Source: As Table 4.1.

Table 4.6 Descriptions of rental rates of return for LA areas (% or %-point): North West, 1998/99 – 2006/07

	HA			Private			Differential (HA – private)		
	Median	Std. Dev.	Range	Median	Std. Dev.	Range	Median	Std. Dev.	Range
1998/99	6.65	1.93	8.48	9.98	2.14	9.55	-3.67	0.80	3.58
1999/00	6.57	1.91	8.26	9.70	2.11	9.21	-3.16	0.83	4.13
2000/01	6.79	2.46	9.94	9.53	2.78	13.01	-3.17	0.82	4.90
2001/02	6.52	2.74	13.33	9.59	3.24	15.66	-3.16	0.88	4.07
2002/03	5.95	3.41	18.83	9.02	4.31	24.77	-3.33	1.34	6.86
2003/04	4.68	2.48	11.77	7.35	3.04	15.17	-2.57	0.78	4.25
2004/05	3.71	2.16	12.02	5.60	2.36	13.22	-1.78	0.51	2.30
2005/06	3.39	1.27	6.74	5.26	1.39	8.14	-1.83	0.39	1.91
2006/07	3.21	0.86	4.49	4.97	1.04	5.31	-1.82	0.56	3.53
Change: 98/99 – 06/07	-3.44	-1.07	-3.99	-5.01	-1.10	-4.24	1.85	-0.24	-0.05

Note and Source: As Table 4.1.

Table 4.7 Descriptions of rental rates of return for LA areas (% or %-point): South East, 1998/99 – 2006/07

	HA			Private			Differential (HA – private)		
	Median	Std. Dev.	Range	Median	Std. Dev.	Range	Median	Std. Dev.	Range
1998/99	4.72	1.34	5.43	8.19	1.16	5.56	-3.30	0.88	4.10
1999/00	4.39	1.24	4.71	7.44	1.07	5.19	-3.05	0.79	3.67
2000/01	3.72	1.16	4.88	6.66	0.98	5.09	-2.89	0.69	2.99
2001/02	3.36	0.97	4.06	5.84	0.83	4.62	-2.31	0.53	2.53
2002/03	2.84	0.73	2.99	5.42	0.81	3.44	-2.43	0.66	2.89
2003/04	2.52	0.55	2.33	4.94	0.62	3.42	-2.28	0.57	2.85
2004/05	2.42	0.44	2.03	4.39	0.59	3.23	-1.92	0.52	2.44
2005/06	2.47	0.43	2.05	4.54	0.51	2.80	-2.12	0.44	2.20
2006/07	2.38	0.39	1.70	4.42	0.57	3.88	-1.99	0.45	3.00
Change: 98/99 – 06/07	-2.34	-0.95	-3.73	-3.77	-0.59	-1.68	1.31	-0.43	-1.10

Note and Source: As Table 4.1.

Table 4.8 Descriptions of rental rates of return for LA areas (% or %-point): South West, 1998/99 – 2006/07

	HA			Private			Differential (HA – private)		
	Median	Std. Dev.	Range	Median	Std. Dev.	Range	Median	Std. Dev.	Range
1998/99	5.55	0.85	3.96	8.01	0.88	4.14	-2.45	0.68	3.40
1999/00	5.07	0.77	3.46	7.48	0.91	4.35	-2.31	0.62	2.85
2000/01	4.27	0.73	3.44	6.61	0.79	3.81	-2.09	0.54	2.83
2001/02	3.92	0.62	2.84	5.78	0.67	3.51	-1.84	0.41	2.04
2002/03	3.15	0.46	2.26	5.62	1.04	6.58	-2.28	0.99	5.48
2003/04	2.64	0.37	1.78	4.47	0.64	2.74	-1.78	0.51	2.34
2004/05	2.38	0.28	1.23	3.79	0.55	2.50	-1.31	0.37	1.92
2005/06	2.44	0.27	1.24	4.11	0.46	1.91	-1.70	0.30	1.30
2006/07	2.39	0.24	1.00	3.97	0.51	2.77	-1.63	0.38	2.28
Change: 98/99 – 06/07	-3.16	-0.61	-2.96	-4.04	-0.37	-1.37	0.82	-0.30	-1.12

Note and Source: As Table 4.1.

Table 4.9 Descriptions of rental rates of return for LA areas (% or %-point): West Midlands, 1998/99 – 2006/07

	HA			Private			Differential (HA – private)		
	Median	Std. Dev.	Range	Median	Std. Dev.	Range	Median	Std. Dev.	Range
1998/99	5.66	1.45	6.75	7.92	1.44	5.68	-2.47	0.67	2.71
1999/00	5.31	1.42	6.88	7.97	1.49	6.48	-2.54	0.69	2.69
2000/01	4.90	1.36	6.38	7.25	1.64	7.10	-2.68	0.70	2.84
2001/02	4.60	1.37	6.56	6.45	1.74	8.01	-2.16	0.68	2.71
2002/03	3.90	1.29	6.83	6.27	1.69	8.55	-2.27	0.74	2.99
2003/04	3.28	1.00	5.33	4.95	1.33	7.04	-1.96	0.58	2.16
2004/05	2.83	0.65	3.04	4.29	0.93	4.06	-1.53	0.47	1.48
2005/06	2.78	0.56	2.50	4.43	0.82	3.33	-1.77	0.49	2.82
2006/07	2.65	0.54	2.45	4.23	0.73	3.06	-1.61	0.35	1.33
Change: 98/99 – 06/07	-3.01	-0.91	-4.30	-3.69	-0.71	-2.62	0.86	-0.32	-1.38

Note and Source: As Table 4.1.

Table 4.10 Descriptions of rental rates of return for LA areas (% or %-point): Yorkshire and the Humber, 1998/99 – 2006/07

	HA			Private			Differential (HA – private)		
	Median	Std. Dev.	Range	Median	Std. Dev.	Range	Median	Std. Dev.	Range
1998/99	7.16	1.43	5.81	9.14	1.35	5.31	-2.44	0.69	2.54
1999/00	6.95	1.39	5.31	8.76	1.30	4.60	-2.06	0.61	2.36
2000/01	6.66	1.69	6.38	8.67	1.64	5.53	-2.02	0.69	2.64
2001/02	6.19	1.94	7.26	8.39	2.06	7.22	-2.04	0.62	2.61
2002/03	5.43	1.96	6.86	8.61	2.22	7.37	-2.75	1.55	5.54
2003/04	4.37	1.54	6.10	6.62	1.78	6.47	-1.89	0.72	2.43
2004/05	3.30	1.14	5.14	4.91	1.29	5.34	-1.23	0.46	1.53
2005/06	3.17	0.84	3.71	4.83	1.07	4.02	-1.43	0.54	2.41
2006/07	2.89	0.65	2.65	4.53	0.67	2.56	-1.36	0.39	1.46
Change: 98/99 – 06/07	-4.27	-0.78	-3.16	-4.61	-0.68	-2.75	1.08	-0.30	-1.08

Note and Source: As Table 4.1.

Tables 4.11 and 4.12 set out the number and the proportion of LA areas categorised by quartile bands of the rate differentials between the HA and private sectors, and by region for 2006/07. The first quartile cohort refers to LA areas with the widest rate differentials, i.e., the private sector rental rate is higher than the HA sector rental rate for the most part. The fourth quartile cohort represents LA areas whose HA sector rental rates were closest to their private sector rental rates. Tables 4.13 and 3.14 are the equivalents for 1998/99 data:

- Looking at the proportions for the 2006/07 rate differentials, almost all LA areas in London had private sector rental rates significantly outperforming HA sector rental rates – the proportion of the first quartile cohort was 93.8%. A similar pattern (but to a lesser extent) was seen in the South East – the proportions of the first and second quartile cohorts were 38.8% and 37.3% respectively).
- By contrast, the great majority of LA areas in Yorkshire and the Humber had small rate differentials between the two sectors – the proportion of the fourth quartile cohort was 66.7%. Many LA areas in the East Midlands had also set their HA sector rental rates close to private sector rental rates – the proportions of the third and fourth quartile cohorts were 32.5% and 47.5% respectively. The South West showed a similar picture but to a lesser extent – the third and fourth quarter cohorts shared 45.5% and 27.3% respectively.
- 1998/99 presented a similar pattern for London and the South East. All LA areas in London and the great majority of LA areas in the South East belonged to the first or second quartile cohort.

- However, Yorkshire and the Humber and the North West displayed different patterns. Unlike in 2006/07, the former region contained more LA areas in the second and third quartile cohorts in 1998/99 (the proportions were 28.6% and 33.3% for each). This implies that LA areas in Yorkshire and the Humber made their HA and private sector rental rates converge more closely than LA areas in other regions for the observation period.
- The North West contained more LA areas in the first and second cohorts in 1998/99 (the proportions were 41.9% and 39.5%), but the majority of its LA areas were in the middle two cohorts in 2006/07. This means that many LA areas in this region used to have wide gaps between the two sector rental rates, but the gaps narrowed to the ordinary level for the observation period.

Table 4.11 Number of LA areas in each quartile band of rate differentials by region: 2006/07

	Wide		→	Narrow		
	1st Q	2nd Q	3rd Q	4th Q	Total	
East	16	12	12	8	48	
East Midlands	1	7	13	19	40	
London	30	0	1	1	32	
North East	2	6	7	8	23	
North West	7	16	11	9	43	
South East	26	25	10	6	67	
South West	5	7	20	12	44	
West Midlands	1	10	12	11	34	
Yorkshire and the Humber	0	5	2	14	21	
England	88	88	88	88	352	

Note and Source: As Table 4.1. The quartiles are -2.13 (25), -1.78 (50) and -1.45 (75).

Table 4.12 Proportion of LA areas in each quartile band of rate differentials by region: 2006/07

	Wide		→	Narrow		
	1st Q	2nd Q	3rd Q	4th Q	Total	
East	33.3	25.0	25.0	16.7	100.0	
East Midlands	2.5	17.5	32.5	47.5	100.0	
London	93.8	0.0	3.1	3.1	100.0	
North East	8.7	26.1	30.4	34.8	100.0	
North West	16.3	37.2	25.6	20.9	100.0	
South East	38.8	37.3	14.9	9.0	100.0	
South West	11.4	15.9	45.5	27.3	100.0	
West Midlands	2.9	29.4	35.3	32.4	100.0	
Yorkshire and the Humber	0.0	23.8	9.5	66.7	100.0	
England	25.0	25.0	25.0	25.0	100.0	

Note and Source: As Table 4.11. Over 25% is in bold.

Table 4.13 Number of LA areas in each quartile band of rate differentials by region: 1998/99

	Wide →			Narrow	
	1st Q	2nd Q	3rd Q	4th Q	Total
East	8	15	13	12	48
East Midlands	0	1	9	30	40
London	30	2	0	0	32
North East	1	7	8	7	23
North West	18	17	6	2	43
South East	26	21	14	6	67
South West	2	11	19	12	44
West Midlands	2	8	12	11	33
Yorkshire and the Humber	0	6	7	8	21
England	87	88	88	88	351

Note and Source: As Table 4.1. The quartiles are -3.79 (25), -2.85 (50) and -2.21 (75).

Table 4.14 Proportion of LA areas in each quartile band of rate differentials by region: 1998/99

	Wide →			Narrow	
	1st Q	2nd Q	3rd Q	4th Q	Total
East	16.7	31.3	27.1	25.0	100.0
East Midlands	0.0	2.5	22.5	75.0	100.0
London	93.8	6.3	0.0	0.0	100.0
North East	4.3	30.4	34.8	30.4	100.0
North West	41.9	39.5	14.0	4.7	100.0
South East	38.8	31.3	20.9	9.0	100.0
South West	4.5	25.0	43.2	27.3	100.0
West Midlands	6.1	24.2	36.4	33.3	100.0
Yorkshire and the Humber	0.0	28.6	33.3	38.1	100.0
England	24.8	25.1	25.1	25.1	100.0

Note and Source: As Table 4.13. Over 25% is in bold.

Section 5 HA sector rental rates of return, private sector rental rates of return, their differentials and change in urban and rural areas: 1998/99 – 2006/07

Tables 5.1 and 5.2 set out statistics for the HA and private sector rental rates of return and the rate differentials between the two sectors for urban and rural LA areas across England from 1998/99 to 2006/07¹¹:

- The medians of the rate differentials (HA sector rental rates minus private sector rental rates) were -2.02 percentage points for the urban LA areas and -1.55 points for the rural LA areas in 2006/07.
- Over the course of the observation period, the urban median outperformed the rural equivalent.
- In 1998/99, the medians of the rate differentials were -3.44 points for the urban group and -2.39 points for the rural group, which means decreases of 1.42 points and 0.84 points for each group for the observation period.

Table 5.1 Descriptions of rental rates of return for urban LA areas (% or %-point), 1998/99 – 2006/07

	HA			Private			Differential (HA – private)		
	Median	Std. Dev.	Range	Median	Std. Dev.	Range	Median	Std. Dev.	Range
1998/99	6.00	1.79	10.76	9.47	1.54	9.72	-3.44	1.16	6.20
1999/00	5.54	1.89	10.88	8.77	1.58	10.89	-3.12	1.01	5.79
2000/01	4.95	2.23	12.02	8.01	2.09	13.59	-3.07	0.86	5.29
2001/02	4.47	2.36	15.35	7.05	2.59	17.17	-2.81	0.79	4.41
2002/03	3.65	2.53	20.54	6.61	2.97	26.07	-3.03	1.01	7.34
2003/04	3.10	1.88	12.93	5.82	2.11	15.87	-2.61	0.80	4.82
2004/05	2.88	1.43	12.87	5.17	1.45	13.28	-2.05	0.68	3.27
2005/06	2.86	0.95	7.68	5.16	0.91	8.36	-2.10	0.63	3.40
2006/07	2.77	0.73	5.47	4.95	0.69	5.05	-2.02	0.60	3.40
Change: 98/99 – 06/07	-3.23	-1.06	-5.29	-4.52	-0.85	-4.67	1.42	-0.56	-2.80

Note and Source: As Table 3.1.

Table 5.2 Descriptions of rental rates of return for rural LA areas (% or %-point), 1998/99 – 2006/07

	HA			Private			Differential (HA – private)		
	Median	Std. Dev.	Range	Median	Std. Dev.	Range	Median	Std. Dev.	Range
1998/99	5.52	1.34	7.73	7.79	1.15	7.86	-2.39	0.86	4.61
1999/00	5.08	1.36	7.10	7.28	1.13	6.63	-2.19	0.79	4.52
2000/01	4.50	1.49	7.42	6.62	1.35	7.31	-2.08	0.71	3.79
2001/02	4.07	1.56	7.91	5.88	1.64	9.91	-1.88	0.59	3.47
2002/03	3.33	1.50	8.10	5.62	1.96	10.40	-2.22	1.13	6.62
2003/04	2.76	1.12	7.05	4.66	1.27	9.29	-1.84	0.58	3.24
2004/05	2.50	0.70	4.30	4.02	0.78	5.56	-1.32	0.43	2.08
2005/06	2.52	0.56	3.17	4.30	0.55	3.47	-1.65	0.38	2.27
2006/07	2.45	0.49	2.75	4.14	0.58	4.04	-1.55	0.42	2.50
Change: 98/99 – 06/07	-3.07	-0.85	-4.98	-3.65	-0.57	-3.82	0.84	-0.44	-2.11

Note and Source: As Table 3.1.

¹¹ Definitions of urban or rural LA areas are based on DEFRA (2006) 'Rural Definition and Local Authority Classification', available from <http://www.defra.gov.uk/rural/ruralstats/rural-definition.htm#defn>, accessed in September 2006. Note that the classification was a snap-shot as in 2005. The City of London and the Isles of Scilly were excluded.

- The variations of rate differentials were greater for the urban than for the rural group in terms of both the standard deviation and the range from the minimum value to maximum value with an exception of the standard deviations in 2002/03.
- The latest standard deviations were 0.60 for the urban group and 0.42 for the rural group. The ranges were 3.40 and 2.50 for each group.
- Both groups saw contracting variations of rate differentials for the observation period except in 2002/03 for both group and in 2006/07 for the urban group. Compared with in 1998/99, standard deviations decreased by 0.56 for the urban group and by 0.42 for the rural group in 2006/07. Ranges dropped by 2.80 and 2.11 for each group in the same year.
- With the declining medians of rate differentials for both groups, the variation decreases imply that HA and private sector rates converged overall regardless of a LA area's degree of urbanisation.
- In terms of the HA rental rates of return, the medians were 2.77% for urban and 2.45% for rural LA areas in 2005/05. Both figures decreased after 1998/99 (with an exception of the rural group in 2005/06); by 3.23 percentage points for the urban group and 3.07 points for the rural groups.
- Variations were much wider among urban LA areas than among rural ones. In 2006/07, standard deviations were 0.73 for the urban group and 0.49 for the rural group while ranges were 5.47 and 2.75 respectively. This means that rural LA areas shared a similar level of rental rates of return within the HA sector.
- Standard deviations and ranges widened until 2002/03 and contracted afterwards for both groups. Overall, standard deviations decreased by 1.06 for the urban group and by 0.85 for rural groups for the observation period. The latest ranges also dropped for the rural group (by 5.29) as well as for the urban group (by 4.98) compared with 1998/99.
- With respect to private sector rental rates of return, the medians were 4.95% for the urban LA areas and 4.14% for the rural ones. Both figures declined from 1998/99, by 4.52 points for the urban group and 3.65 points for the rural group.
- Private sector rental rates varied more widely across urban than across rural LA areas. The latest standard deviations were 0.69 for the former and 0.58 for the latter group while the latest ranges were 5.05 and 4.04 respectively.
- Peaking in 2002/03, variations contracted for both groups but the rural group saw a marginal upturn in 206/07. Compared with in 1998/99, standard deviations declined by 0.85 for the urban group and by 0.57 for the rural group. Ranges decreased for both groups (by 4.67 for urban and by 3.82 for rural) overall for the observation period.

Tables 5.3 and 5.8 set out statistics for the HA and private sector rental rates of return and the rate differentials between the two sectors for more detailed categorisation of urban and rural LA areas. There are six categories – from the most urban to the least; Major urban; Large urban; Other urban; Rural 26; Rural 50 and Rural 80.

- The latest medians of the rate differentials ascended according to the degree of urbanisation with the exception of Large urban. In 2006/07, the medians were -2.31, -1.86, -1.98, -1.72, -1.70 and -1.41 from the most urban to the least.

- Variations of the rate differentials across LA areas were widest for Major urban (the standard deviation was 0.67 and the range was 2.86) while second most urbanized group, Large urban, showed the narrowest variations (the standard deviation was 0.33 and the range was 1.46).

Table 5.3 Descriptions of rental rates of return for Major urban LA areas (% or %-point), 1998/99 – 2006/07

	HA			Private			Differential (HA – private)		
	Median	Std. Dev.	Range	Median	Std. Dev.	Range	Median	Std. Dev.	Range
1998/99	5.25	1.60	7.07	9.61	1.28	5.86	-4.07	1.09	4.69
1999/00	4.69	1.84	8.66	8.74	1.41	7.94	-3.51	0.97	4.41
2000/01	4.03	2.05	8.37	7.91	1.61	6.87	-3.35	0.73	3.14
2001/02	3.63	2.03	7.73	6.91	2.14	8.65	-3.16	0.57	2.82
2002/03	2.97	1.88	6.85	6.57	2.09	9.11	-3.40	0.88	5.12
2003/04	2.63	1.37	6.04	6.04	1.33	6.70	-3.17	0.69	3.15
2004/05	2.53	0.88	4.12	5.37	0.75	4.27	-2.45	0.68	2.71
2005/06	2.54	0.70	3.33	5.22	0.57	3.37	-2.36	0.70	3.40
2006/07	2.50	0.62	2.72	5.04	0.61	4.03	-2.31	0.67	2.86
Change: 98/99 – 06/07	-2.75	-0.98	-4.35	-4.57	-0.67	-1.83	1.76	-0.42	-1.83

Table 5.4 Descriptions of rental rates of return for Large urban LA areas (% or %-point), 1998/99 – 2006/07

	HA			Private			Differential (HA – private)		
	Median	Std. Dev.	Range	Median	Std. Dev.	Range	Median	Std. Dev.	Range
1998/99	6.21	1.33	5.99	9.17	1.34	5.31	-2.77	0.96	4.05
1999/00	5.81	1.38	6.28	8.64	1.33	6.19	-2.73	0.94	4.24
2000/01	5.25	1.69	7.44	8.25	1.74	8.15	-2.62	0.77	3.35
2001/02	4.94	1.79	7.66	7.05	2.16	9.87	-2.21	0.77	3.20
2002/03	4.15	1.83	8.28	6.55	2.32	11.16	-2.70	0.83	3.21
2003/04	3.45	1.55	7.68	5.67	1.87	10.16	-2.15	0.55	2.79
2004/05	3.03	0.98	5.10	4.78	1.12	5.75	-1.66	0.44	1.83
2005/06	3.00	0.71	3.70	5.03	0.80	3.73	-1.96	0.46	2.69
2006/07	2.91	0.58	2.71	4.81	0.59	2.73	-1.86	0.33	1.46
Change: 98/99 – 06/07	-3.30	-0.75	-3.28	-4.36	-0.75	-2.58	0.91	-0.63	-2.59

Table 5.5 Descriptions of rental rates of return for Other urban LA areas (% or %-point), 1998/99 – 2006/07

	HA			Private			Differential (HA – private)		
	Median	Std. Dev.	Range	Median	Std. Dev.	Range	Median	Std. Dev.	Range
1998/99	6.51	2.07	9.66	9.54	1.95	9.49	-3.23	0.99	4.99
1999/00	6.00	2.07	9.60	8.84	1.91	9.70	-3.00	0.93	4.44
2000/01	5.44	2.61	10.93	8.00	2.78	13.40	-2.83	0.90	5.29
2001/02	4.81	2.93	14.26	7.10	3.36	16.84	-2.35	0.80	4.41
2002/03	3.90	3.47	19.72	6.71	4.22	25.12	-2.70	1.15	7.34
2003/04	3.28	2.51	12.21	5.74	2.98	15.51	-2.37	0.91	4.82
2004/05	3.02	2.09	12.11	5.15	2.19	12.61	-1.97	0.61	2.84
2005/06	2.96	1.26	6.93	5.17	1.29	7.42	-2.09	0.54	2.51
2006/07	2.90	0.87	4.62	4.96	0.84	5.05	-1.98	0.52	2.56
Change: 98/99 – 06/07	-3.61	-1.20	-5.04	-4.58	-1.11	-4.44	1.25	-0.47	-2.43

Table 5.6 Descriptions of rental rates of return for Rural 26 LA areas (% or %-point), 1998/99 – 2006/07

	HA			Private			Differential (HA – private)		
	Median	Std. Dev.	Range	Median	Std. Dev.	Range	Median	Std. Dev.	Range
1998/99	5.70	1.52	6.58	8.21	1.04	4.10	-2.70	0.95	4.39
1999/00	5.23	1.58	7.10	7.63	1.11	5.11	-2.40	0.88	4.52
2000/01	4.71	1.69	7.10	7.10	1.32	5.70	-2.23	0.80	3.63
2001/02	4.23	1.77	7.74	6.14	1.67	8.17	-2.03	0.59	2.95
2002/03	3.45	1.64	7.80	5.76	1.91	8.92	-2.33	1.07	6.52
2003/04	2.86	1.05	4.67	4.89	1.00	4.78	-1.93	0.62	2.67
2004/05	2.64	0.69	3.27	4.34	0.59	2.90	-1.55	0.47	2.05
2005/06	2.67	0.57	2.56	4.45	0.40	1.43	-1.81	0.41	2.27
2006/07	2.59	0.53	2.57	4.29	0.50	2.72	-1.72	0.42	2.27
Change: 98/99 – 06/07	-3.11	-0.99	-4.01	-3.92	-0.54	-1.38	0.98	-0.53	-2.12

Table 5.7 Descriptions of rental rates of return for Rural 50 LA areas (% or %-point), 1998/99 – 2006/07

	HA			Private			Differential (HA – private)		
	Median	Std. Dev.	Range	Median	Std. Dev.	Range	Median	Std. Dev.	Range
1998/99	5.49	1.52	7.73	7.94	1.28	7.56	-2.67	0.74	3.12
1999/00	5.14	1.50	6.96	7.45	1.19	6.19	-2.27	0.69	2.89
2000/01	4.55	1.69	7.42	6.90	1.52	7.13	-2.33	0.59	2.65
2001/02	4.15	1.73	7.83	5.97	1.89	9.42	-2.03	0.55	2.74
2002/03	3.36	1.72	8.10	5.57	2.02	9.79	-2.17	0.64	2.50
2003/04	2.90	1.34	7.05	4.87	1.57	8.97	-1.77	0.53	2.95
2004/05	2.75	0.86	4.28	4.17	0.96	5.27	-1.37	0.38	1.46
2005/06	2.69	0.65	3.17	4.43	0.62	3.16	-1.76	0.33	1.46
2006/07	2.50	0.55	2.75	4.29	0.56	2.91	-1.70	0.34	1.79
Change: 98/99 – 06/07	-2.99	-0.97	-4.98	-3.65	-0.72	-4.65	0.97	-0.40	-1.33

Table 5.8 Descriptions of rental rates of return for Rural 80 LA areas (% or %-point), 1998/99 – 2006/07

	HA			Private			Differential (HA – private)		
	Median	Std. Dev.	Range	Median	Std. Dev.	Range	Median	Std. Dev.	Range
1998/99	5.39	1.04	5.98	7.45	1.01	5.83	-2.23	0.82	4.06
1999/00	4.93	1.05	5.88	6.93	1.01	5.64	-2.03	0.72	3.62
2000/01	4.45	1.16	6.14	6.34	1.16	6.25	-1.91	0.66	3.28
2001/02	4.05	1.24	6.42	5.69	1.37	7.45	-1.64	0.59	2.98
2002/03	3.30	1.18	5.94	5.48	1.97	10.16	-2.22	1.41	6.44
2003/04	2.73	0.98	4.83	4.47	1.18	7.22	-1.79	0.55	3.20
2004/05	2.46	0.57	3.01	3.74	0.66	3.96	-1.21	0.37	1.65
2005/06	2.46	0.46	2.43	3.97	0.49	2.45	-1.47	0.33	1.65
2006/07	2.40	0.39	2.11	3.85	0.54	3.40	-1.41	0.42	2.31
Change: 98/99 – 06/07	-2.99	-0.65	-3.87	-3.60	-0.47	-2.43	0.82	-0.40	-1.75

Tables 5.9 and 5.10 set out the number and the proportion of LA areas, categorised by quartile bands, of the rate differentials between the HA sector and the private sector and by six urban-rural categories for 2006/07. The first quartile cohort means LA areas with the widest rate differentials – that is, where the private sector rental rate is higher than the HA sector rental rate to the greatest extent. The fourth quartile cohort represents LA areas whose HA sector rental rates were closest to the private sector rental rates. Tables 5.11 and 5.12 are the equivalents for 1998/99 data:

Table 5.9 Number of LA areas in each quartile band of rate differentials by urban/rural classification: 2006/07

	Wide 1st Q	→ 2nd Q	3rd Q	Narrow 4th Q	Total
Major urban	11	16	14	4	45
Large urban	43	18	9	5	75
Other urban	22	16	9	8	55
Rural_26	7	17	14	15	53
Rural_50	3	12	24	13	52
Rural_80	2	9	18	43	72
England	88	88	88	88	352

Note and Source: As Table 4.11.

Table 5.10 Proportion of LA areas in each quartile band of rate differentials by urban/rural classification (%): 2006/07

	Wide 1st Q	→ 2nd Q	3rd Q	Narrow 4th Q	Total
Major urban	24.4	35.6	31.1	8.9	100.0
Large urban	57.3	24.0	12.0	6.7	100.0
Other urban	40.0	29.1	16.4	14.5	100.0
Rural_26	13.2	32.1	26.4	28.3	100.0
Rural_50	5.8	23.1	46.2	25.0	100.0
Rural_80	2.8	12.5	25.0	59.7	100.0
England	25.0	25.0	25.0	25.0	100.0

Note and Source: As Table 4.12.

Table 5.11 Number of LA areas in each quartile band of rate differentials by urban/rural classification: 1998/99

	Wide 1st Q	→ 2nd Q	3rd Q	Narrow 4th Q	Total
Major urban	45	24	5	1	75
Large urban	10	10	19	6	45
Other urban	17	18	10	9	54
Rural_26	7	13	15	18	53
Rural_50	4	14	15	19	52
Rural_80	4	9	24	35	72
England	87	88	88	88	351

Note and Source: As Table 4.13.

Table 5.12 Proportion of LA areas in each quartile band of rate differentials by urban/rural classification (%): 1998/99

	Wide 1st Q	→ 2nd Q	3rd Q	Narrow 4th Q	Total
Major urban	60.0	32.0	6.7	1.3	100.0
Large urban	22.2	22.2	42.2	13.3	100.0
Other urban	31.5	33.3	18.5	16.7	100.0
Rural_26	13.2	24.5	28.3	34.0	100.0
Rural_50	7.7	26.9	28.8	36.5	100.0
Rural_80	5.6	12.5	33.3	48.6	100.0
England	24.8	25.1	25.1	25.1	100.0

Note and Source: As Table 4.14.

- Looking at the proportions for 2006/07 rate differentials, the great majority of Major urban and Other LA areas fell either in the first or second quartile cohort – the aggregated proportions of the two cohorts were 81.3% and 69.1%, respectively. Large urban LA areas also had this tendency with lesser extent – the equivalent proportion was 60%. This means that LA areas in these two categories tend to keep private sector rental rates significantly outperforming HA sector rental rates.
- By contrast, the two most rural groups (Rural 80 and Rural 50) had the majority of their LA areas either in the third or fourth quartile cohort – the sums of the two cohorts' proportions were 84.7% and 71.2% respectively. This implies that the most rural LA areas are likely to have HA sector rental rates closer to the private sector equivalents than elsewhere.
- 1998/99 presented a similar pattern to that of 2006/07 with exception that Large urban had more LA areas in the third quartile cohort.

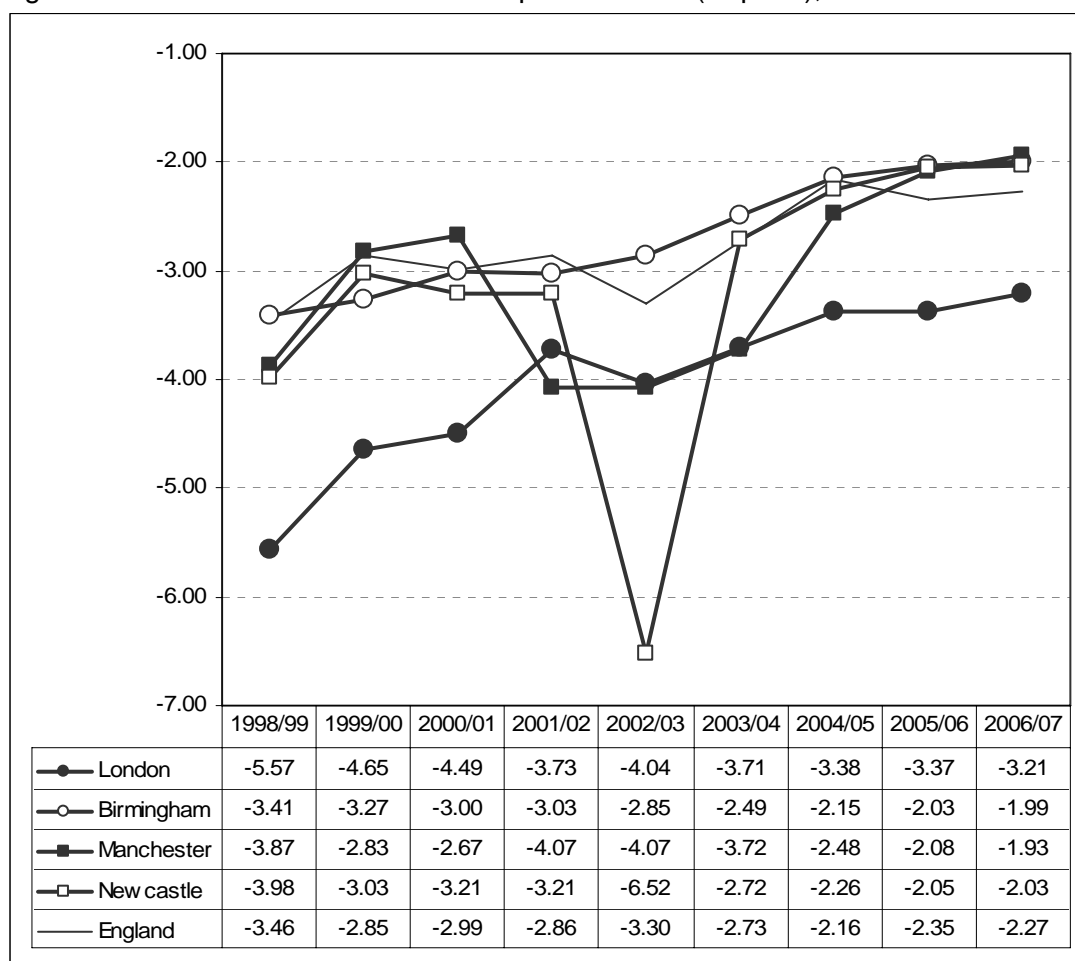
Section 6 HA sector rental rates of return, private sector rental rates of return, their differentials and change in the four metropolitan areas: 1998/99 – 2006/07

This section extends the analyses of the urban LA areas in the previous section to four metropolitan areas – London, Birmingham, Manchester and Newcastle-upon-Tyne (henceforth Newcastle) from 1998/99 to 2006/07. The main reason for this analysis is understand whether different environments in our major cities generate different outcomes in the HA sector and to identify possible knock-on effects on their surrounding vicinities. The geographical unit to be examined for those cities is the LA area, except London, where the defined area is the region.

Figure 6.1 sets out the differentials in rental rates of return (HA rental rates of return minus private sector rental rates of return) for the four metropolitan areas from 1998/99 to 2006/07. Figure 6.2 describes changes in the rate differentials over the observation period (Trend evidence for key variables in the rental sectors for the four cities is presented in Annex 2.).

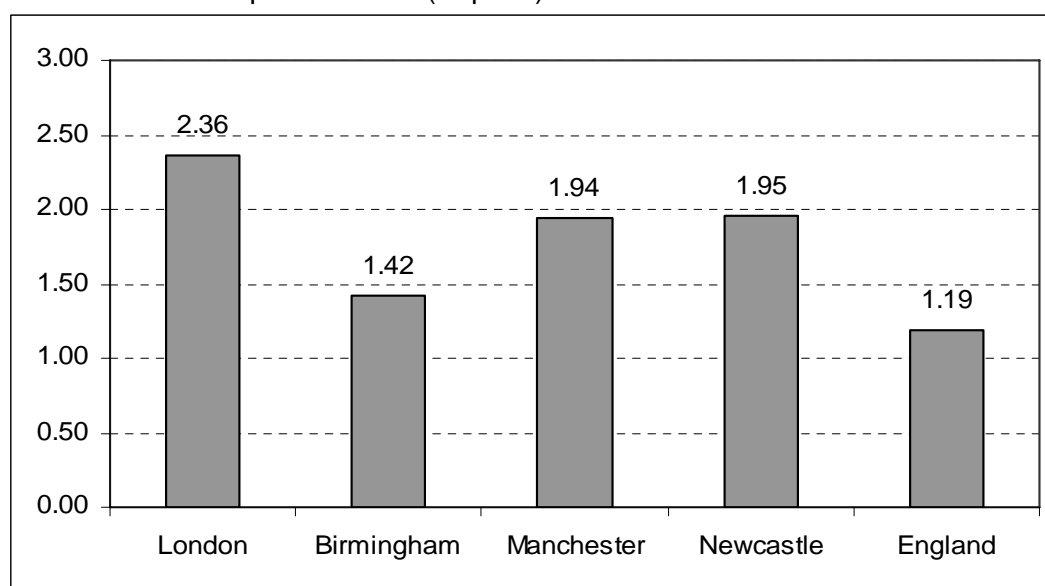
- In 2006/07, the rate differential for London was 3.21 percentage points, the widest gap among the four cities. It was also far above the national average of 2.27 points.
- The other three cities rate differentials were fairly close to one other and all of them were narrower than the national average – 1.99 for Birmingham, 1.93 for Manchester and 2.03 for Newcastle.
- Throughout the observation period, London and Birmingham showed a continuing decline in differentials. Manchester and Newcastle the differentials also narrowed differentials but saw considerable setbacks around 2002/03.
- Compared with 1998/99, in 2006/07 the rate differentials in all the four cities had narrowed more than the national reduction of 1.19 points. In London the gap declined most rapidly (by 2.36 points), followed by Newcastle (1.95 points), Manchester (1.94 points) and Birmingham (1.42 points).
- This implies that in all four metropolitan areas, HA rents have moved more towards the private sector's equivalents than in England overall during the observation period.

Figure 6.1 Rate differentials: four metropolitan areas (%-point), 1998/99 – 2006/07



Note and Source: as Table 3.1.

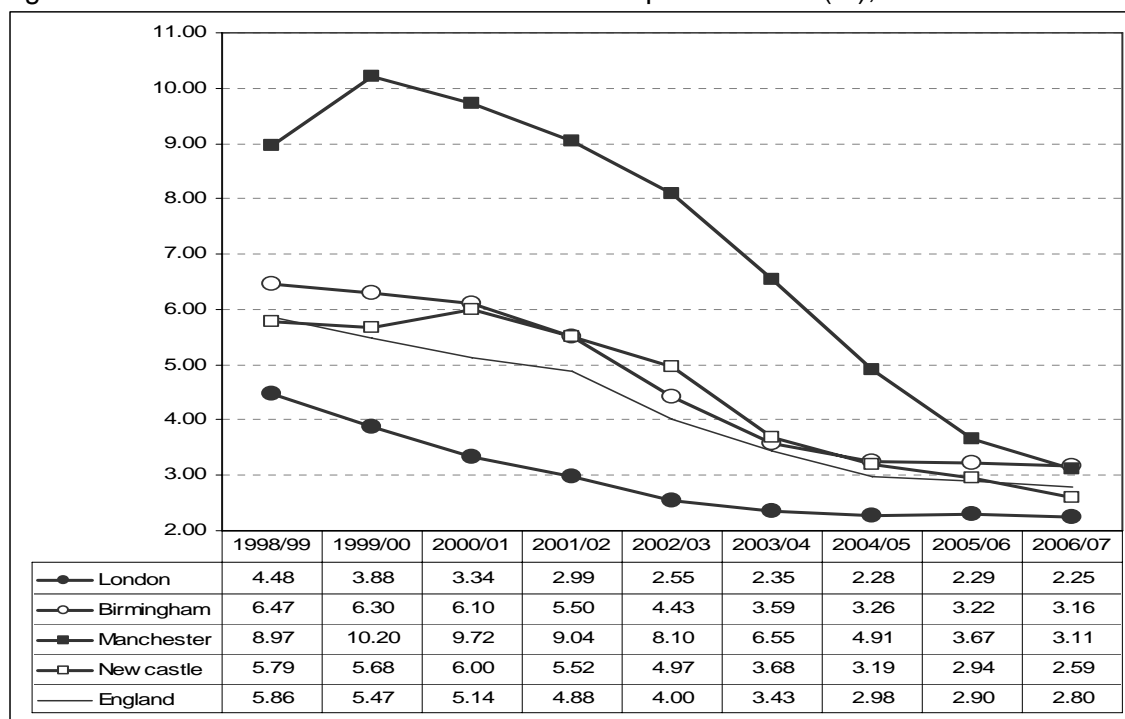
Figure 6.2 Changes in rate differentials between 1998/99 and 2006/07: four metropolitan areas (%-point)



Note and Source: As Table 3.1.

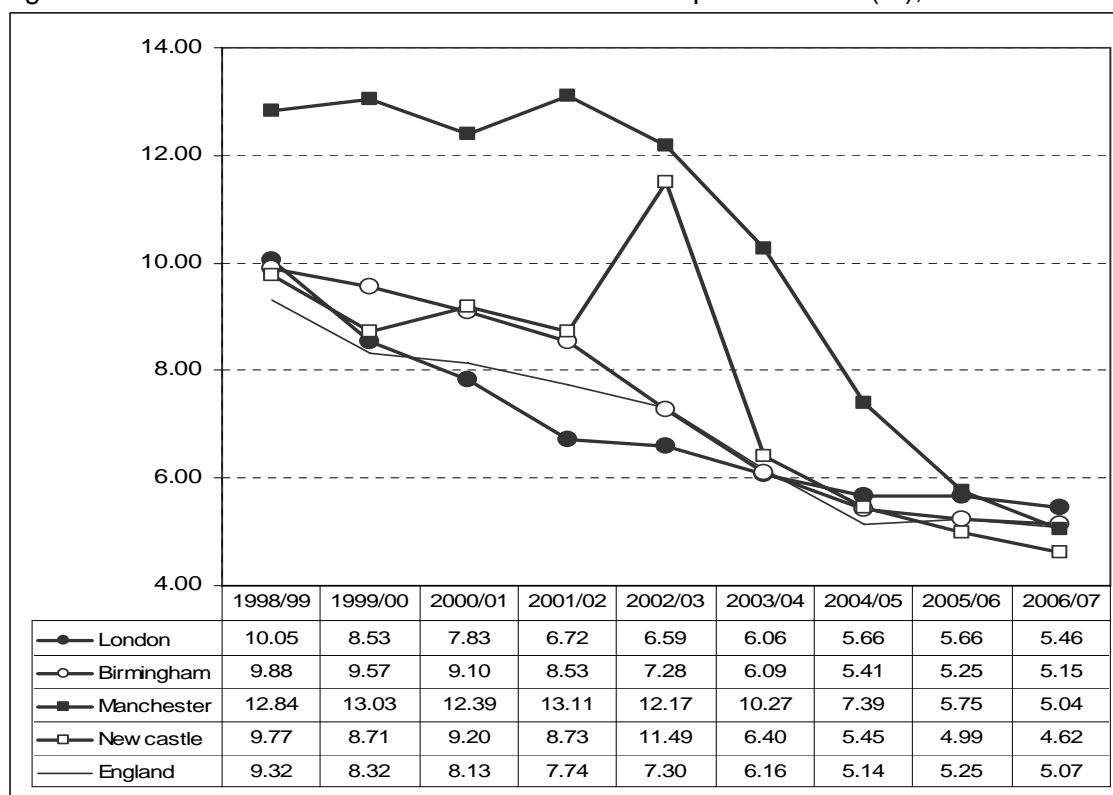
Figures 6.3 and 6.4 show the four cities' rental rates of return from 1998/99 to 2006/07 for the HA sector and the private sector respectively. Figure 6.5 describes changes in rental rates for the two sectors over the period.

Figure 6.3 HA rental rates of return for four metropolitan areas (%), 1998/99 – 2006/07



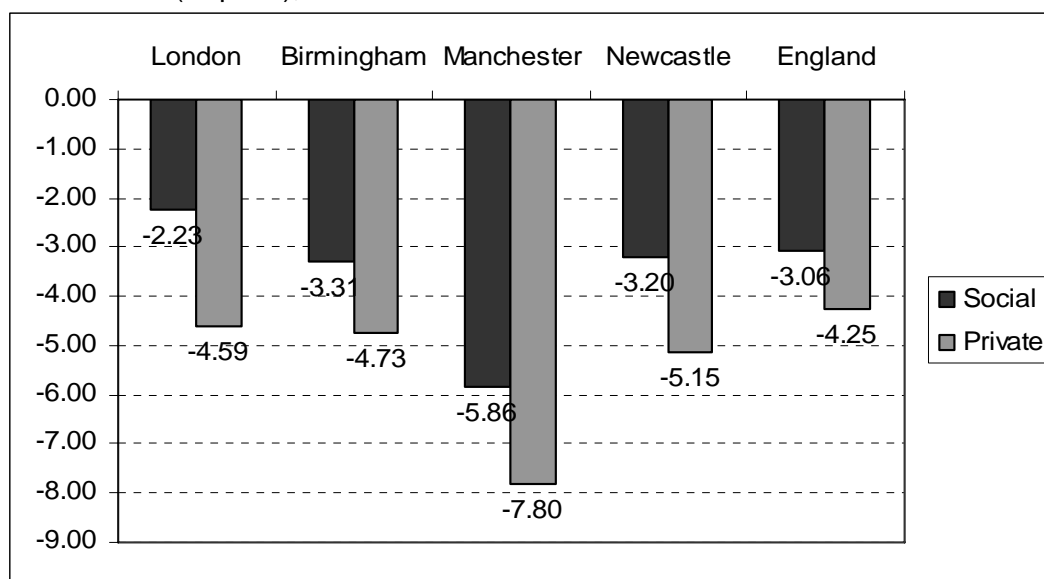
Note and Source: As Table 3.1.

Figure 6.4 Private sector rental returns for four metropolitan areas (%), 1998/99 – 2006/07



Note and Source: As Table 3.1.

Figure 6.5 Changes in rental rates of return by sector: four metropolitan areas (%-point), 1998/99 – 2006/07



Note and Source: As Table 3.1.

- In terms of the HA rental rates of return, only London (2.25%) and Newcastle (2.59%) were below the national average (2.80%) in 2006/07. Birmingham (3.16%) and Manchester (3.11%) were higher than the national level.
- HA rental rates of return in the four metropolitan areas decreased between 1998/99 in 2006/07. The rental rate reduced particularly significantly in Manchester (by 5.86 points – the equivalent decrease for England was 3.06 points). This was followed by Birmingham (3.31 points) and Newcastle (3.20 points). The decrease for London, which is 2.23 points, was lower than the national average. This suggests that in London the greater than average reduction of rate differentials was the result of a relative decline in the private sector's rental rates of return.
- With respect to private sector rental rates of return, London (5.46%) and Birmingham (5.15%) kept their rental rates higher than the national average (5.07%) in 2006/07. Rental rates in Newcastle (4.62%) and Manchester (5.04%) were below and around the national level respectively. In 1998/99, however, all the four cities had rental rates above the national average.
- Over the course of the observation period, the four cities' private rental rates of return declined steadily except for Newcastle in 2002/03. The city, however, showed an overall declining trend before and after the year, hinting that the sudden rise in 2002/03 might have been the result of data anomalies.
- In all four cities, the decline in the private rental rate of return over the observation period was greater than the national decline of 4.25 points. Manchester saw a particularly significant drop of 7.80 points. The other cities' declines were 5.15 for Newcastle, 4.73 for Birmingham, and 4.59 for London.
- Although London and Manchester recently kept their private sector rental rates of return above and around the national average respectively, the two metropolitans seem to have different fundamentals at their rental property markets. Manchester kept its rental rate higher than the national standard mainly because its house prices were lower than the national average (See Appendix 3).

- By contrast, London held house prices much higher than the national average. The initial impact of the high property values on private sector rental rates of return is downward. However, via increases in first-time buyers' owner occupation costs, London's high house price kept potential buyers remaining at rental markets. Consequently, demand for rental properties was maintained robust (in a relative term), raising the equilibrium rent level at the rental property market. This has been leading the city's private sector rental rate of return to be larger than the national level.

Section 7 Summary and Conclusions

This paper examines the relationship between rental rates of return in the HA and private rented sectors in order to understand the extent to which they move together and to provide evidence that is relevant to questions such as where investment might be most appropriate and how economic subsidy is distributed through the country.

It is to be expected that rental rates of return would be lower in the HA than in the private rented sector because one of the main objectives of social housing provision is to keep rents affordable for social tenants – and because large scale subsidy has been provided to ensure sub-market rents. We also expect that rental rates of return will have fallen in both sectors because of rapidly rising house prices – this also suggests that rental rates of return will have fallen more in pressure areas. Finally, rental rates of return in the HA sector can be expected to have fallen as compared to private sector returns because of the impact of rent regulation which have constrained rent rises to RPI plus ½ %.

The results show that HA rental rates of return, measured by annual rent as a percentage of the relevant LQ house price, are significantly lower than in the private sector at all spatial levels. In 2006/07, the national average of HA rental rates of return was 2.57% while that of the private sector was 4.59%, which provides a gap of over two percentage points.

Second, rental rates of return have indeed declined in both sectors over the observation period (1998/99 to 2006/07) – from 9.32% to 5.07% in the private rented sector and from 5.86% to 2.80% in the HA sector. Thus in absolute terms, the size of the differential has declined from 3.46 points in 1998/99 to 2.27 points in 2006/07 in England.

The trends in the two sectors' rental rate of return below the national level show considerable variation across England. For example, the rate differential was the largest in London (3.21 points) and the smallest in East Midlands (1.50 points) in 2006/07. Differentials in rental rates narrowed in all the nine regions for the observation period with a few exceptions such as the recent movements in Yorkshire and the Humber. The patterns at LA level are overall consistent with those at the regional level.

The differentials are the highest in London and other pressured areas but in absolute terms, (although not in proportional terms) have also decreased the most over the observation period. The largest reduction was thus in London (2.39 points). At the other extreme, the East Midlands in 1998/99 had rental rates of return closest to one another and the most modest reduction at 0.13 points between 1998/09 and 2006/07.

The major spatial differences between the evidence on rental rates of return and that on rents relates to the differences in rental returns between urban and rural areas. There was relatively little difference when looking at rents but when we look at rental rates of return the differentials are significantly less in rural areas as compared to urban areas. This reflects differences in incomes and house prices between urban and rural areas.

The analysis of metropolitan areas shows how different the pattern is in London as compared to the other three cities that we examined. In London, differentials between the two sectors were the highest and far above the national average, but have declined the most over the observation period. Differentials in the other three areas have also declined, although more slowly, and in all cases the differentials are well below the national average.

Overall, rental rates of return have declined very significantly over the period from 1998/99 to 2006/07 in both the HA and private sectors. The absolute differentials have also declined but in proportional terms, the differences have increased. The lower differentials in older cities and in rural areas reflect lower demand pressures than the country as a whole.

Annex 1. The relationship between HA and private sectors' rents and house prices¹²

The relationship between rents and house prices across England

To examine the impacts of HA and private sectors' rent levels on rental rates of return, we plotted the nine regions according to HA and private sectors' rents and house prices for 2006/07 (Figure A.1.1). In the figure, the X and Y axes relates to LQ house prices and weekly average rents respectively, crossing at the national average of HA rent and LQ house prices respectively. Therefore regions with higher (lower) HA rents than the national average will be situated above (below) the X axis, while those with higher (lower) house prices than the national level will be located in the right (left) side of the Y axis.

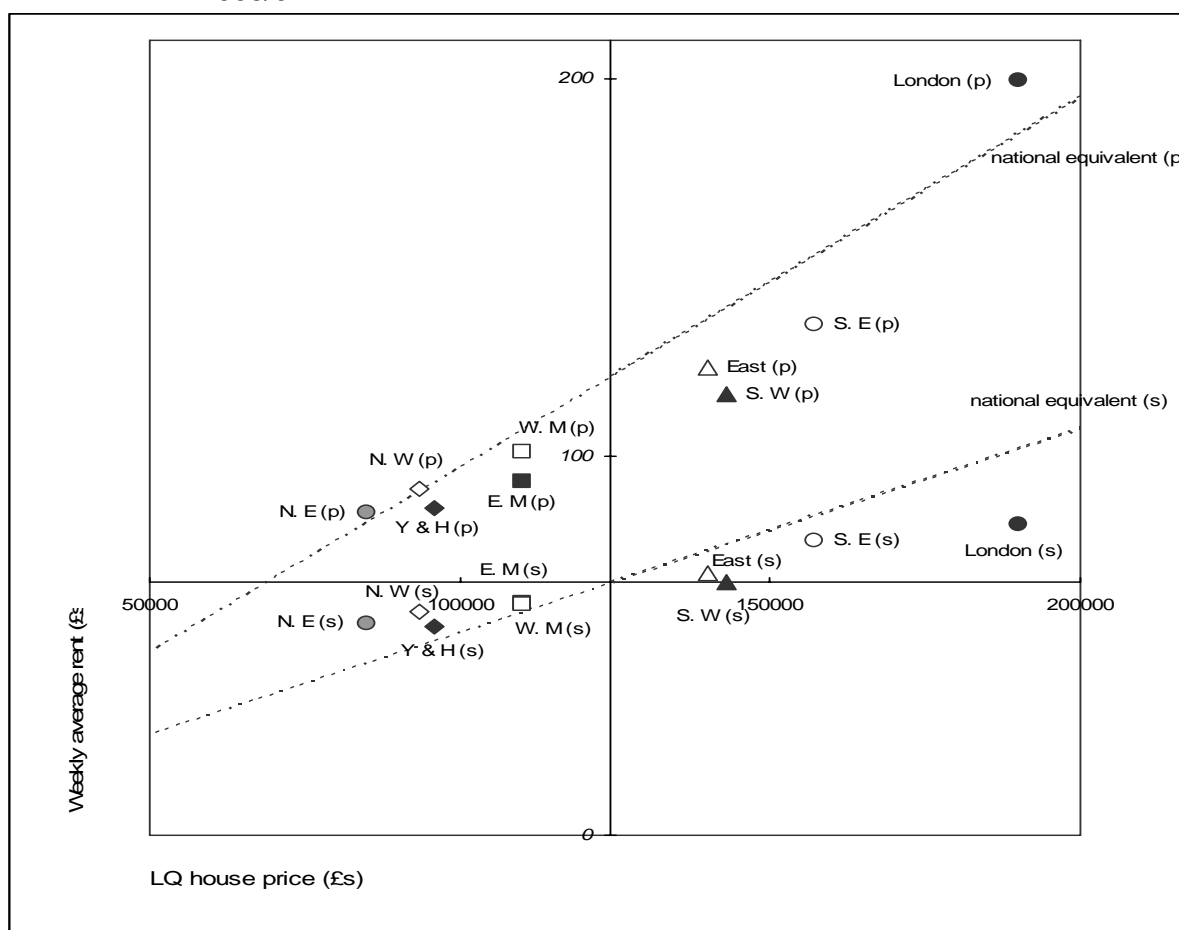
In addition, the figure plots two lines showing the HA and private sectors' rent levels necessary to sustain the national rental rate of return for corresponding house prices (the dotted lines named 'national equivalent' in the figure). A region above (below) the line has an actual rent higher (lower) than the rent, which would bring the rental rate of return to the national level in each sector for a given LQ house price.

For the HA sector, therefore, regions with higher rental rates of return than the national average (the North East, the North West, Yorkshire & the Humber, the West Midlands and the East Midlands) appear above the national equivalent line, whereas those with lower rental rates of return (London, the South West, the East and the South East) appear below the line. By the same token, for the private sector, London, the North East and the North West appear above the national equivalent line, while the remaining six regions fall below the line. The classifications of the nine regions according to 'above or below' the national average rental rates of return of the both sectors are summarised in Table A.1.1.

The vertical distance between each region to the two national equivalent lines shows the difference between the region's actual rent and the equivalised rent for each sector. For example, if London had a HA rental rate of return equivalent to the national standard, the region's rent should be at the point where the vertical line from London crosses the HA sector national equivalent line. By contrast, the region would have to decrease its private sector rent level, if the region were to have the sector's national rental rate of return. Oppositely, the East Midlands, the West Midlands and Yorkshire and the Humber would have to reduce their HA rents whilst raising their private sector rents. The North East and the North West would have to decrease both sectors' rents whereas the East, the South East and the South West would have to increase them.

¹² Although the data sources in this Annex are the same as those used in Udagawa and Whitehead (2007a and 2007b), by adjusting missing values for one sector to correspond to the other the results might not appear equal to their equivalents presented in the two works.

Figure A.1.1 Position of nine regions by HA and private sector rents, and house price, 2006/07



Notes & Sources: See Section 2.

Table A.1.1 Regions above/below the national rental rates of return for HA and private sectors, 2006/07

		Private sector	
		Above	Below
HA sector	Above	North East North West	East Midlands West Midlands Yorkshire & the Humber
	Below	London	East South East South West

Figures A.1.2 to A.1.10 show the annual changes of each region's position with respect to HA and private sectors' rents and house prices. The notation of the figures is the same as that in the previous figure, except in having the national equivalent lines of both sectors for 1998/99. The figures show that in both sectors the regions above (below) the national equivalence lines in 2006/07 were already above (below) in 1998/99, i.e., the pattern of regional classification presented in Table A.1.1 had been already formed at the beginning of the observation period.

In the HA sector, rents and house prices increased over the whole (or almost the whole) observation period across regions, and thus the position of each region shifts upwards to the right in all figures. In the private sector, all regions showed similar directional trends by and large, except that Yorkshire and the Humber displayed a unique movement around 200/02/03.

Figure A.1.2 Positions of nine regions by HA and private sector rents, and house price: East, 2006/07

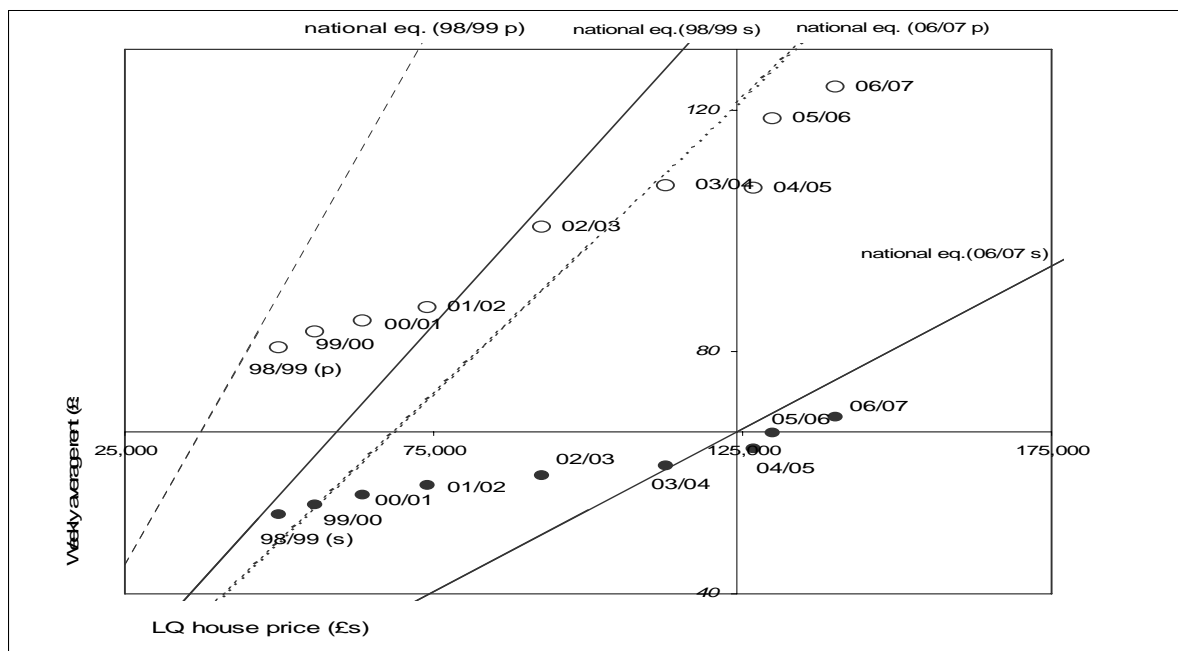


Figure A.1.3 Position of nine regions by HA and private sector rents, and house price: East Midlands, 2006/07

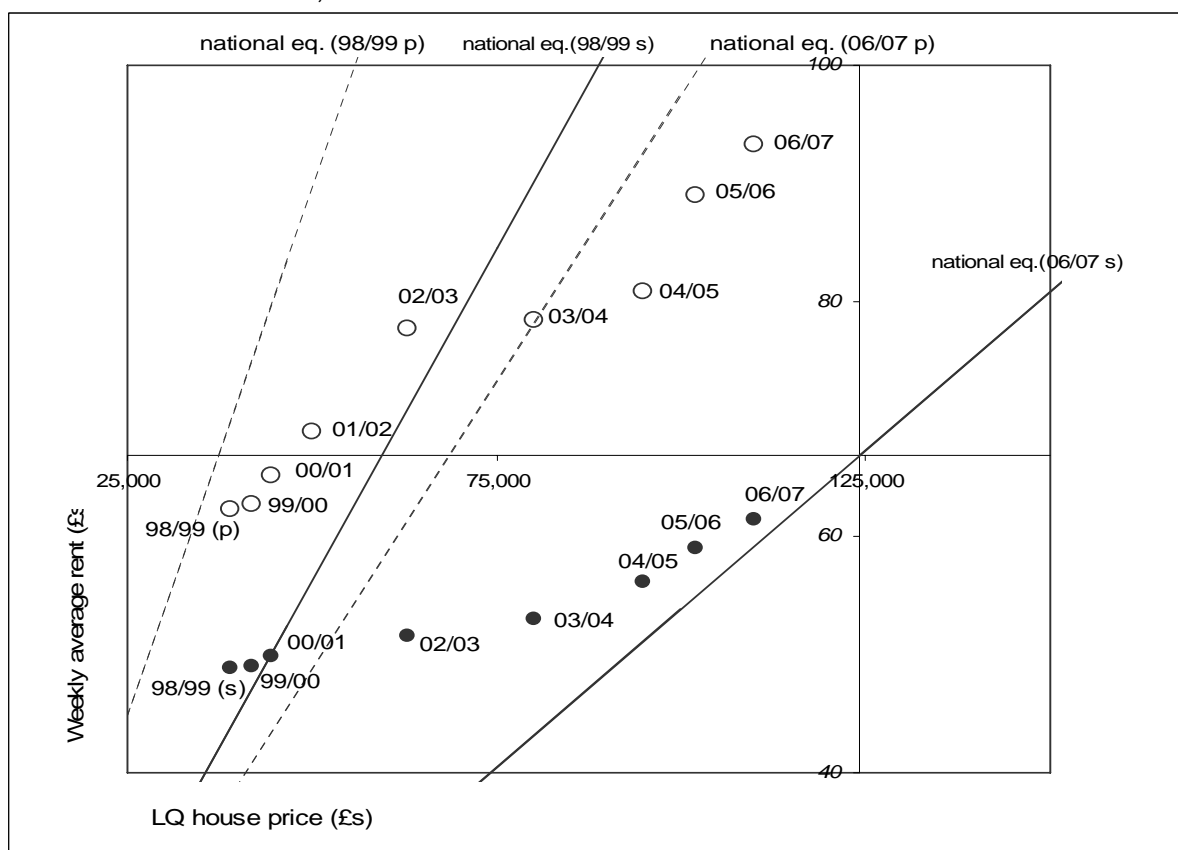


Figure A.1.4 Positions of nine regions by HA and private sector rents, and house price:
London, 2006/07

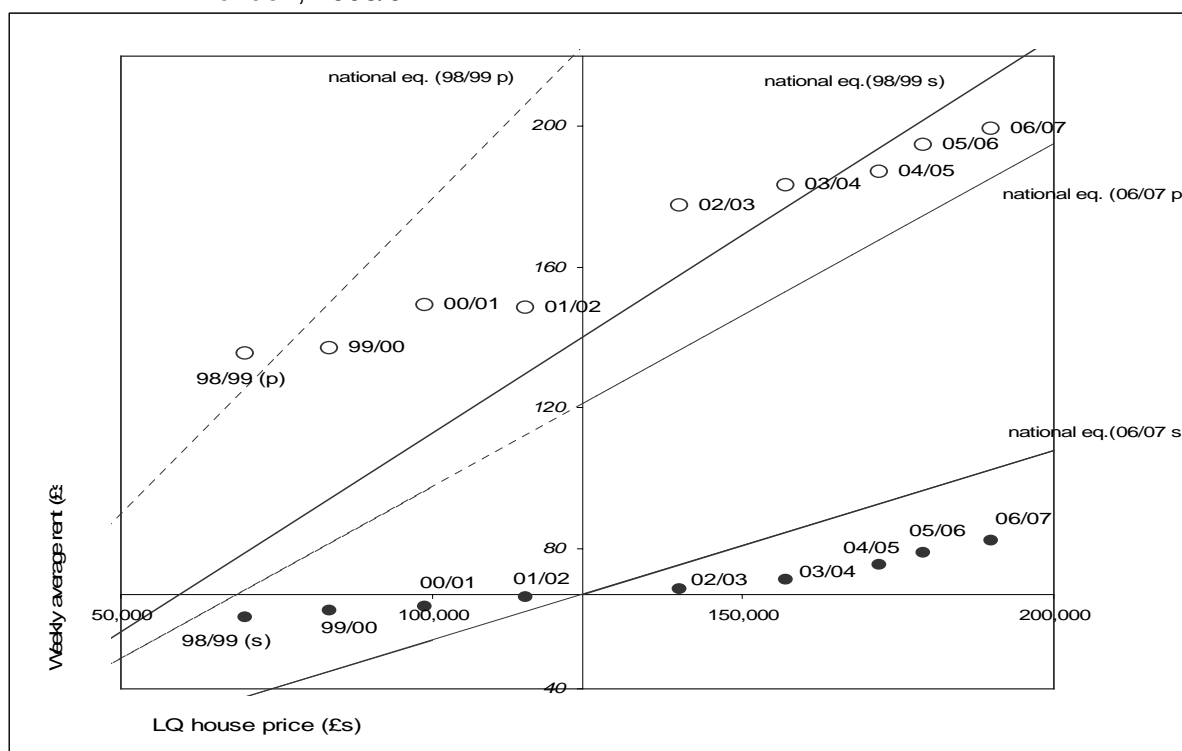


Figure A.1.5 Positions of nine regions by HA and private sector rents, and house price:
North East, 2006/07

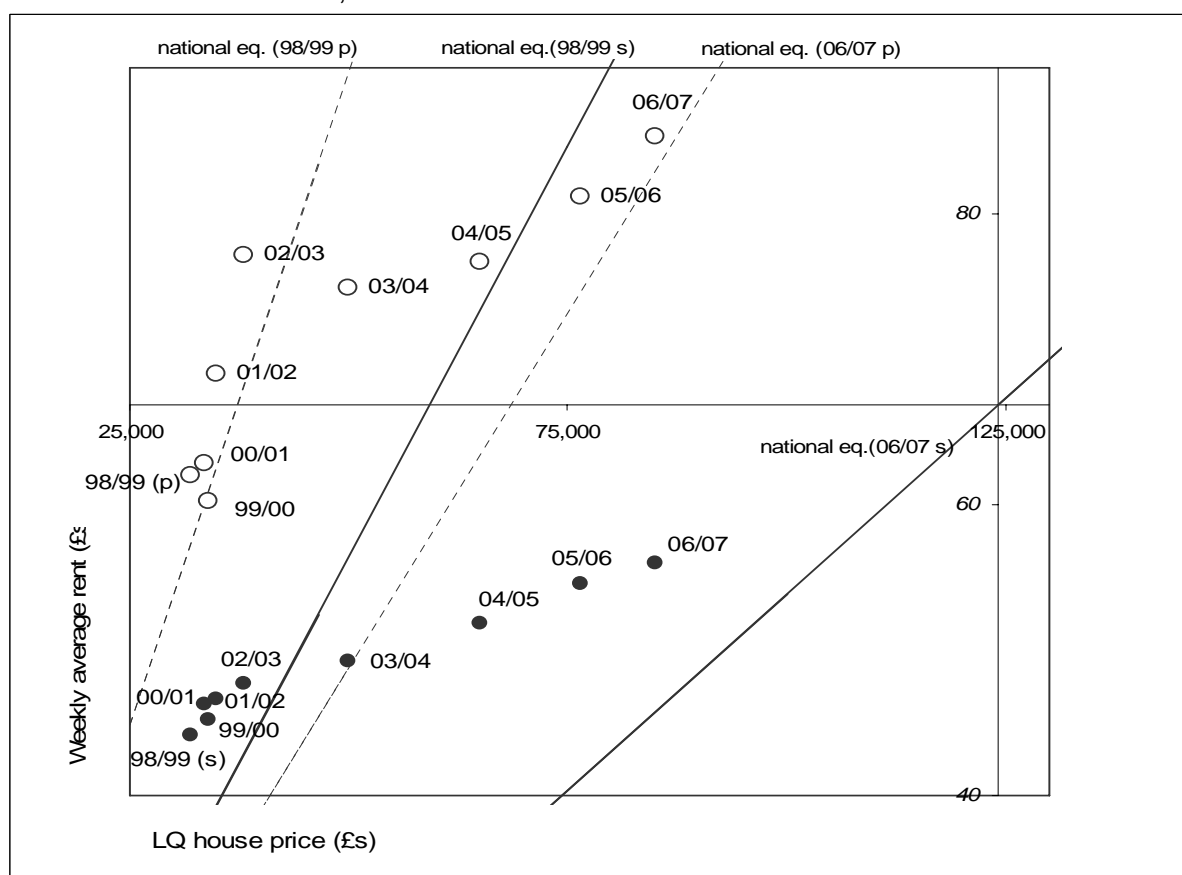


Figure A.1.6 Positions of nine regions by HA and private sector rents, and house price:
North West, 2006/07

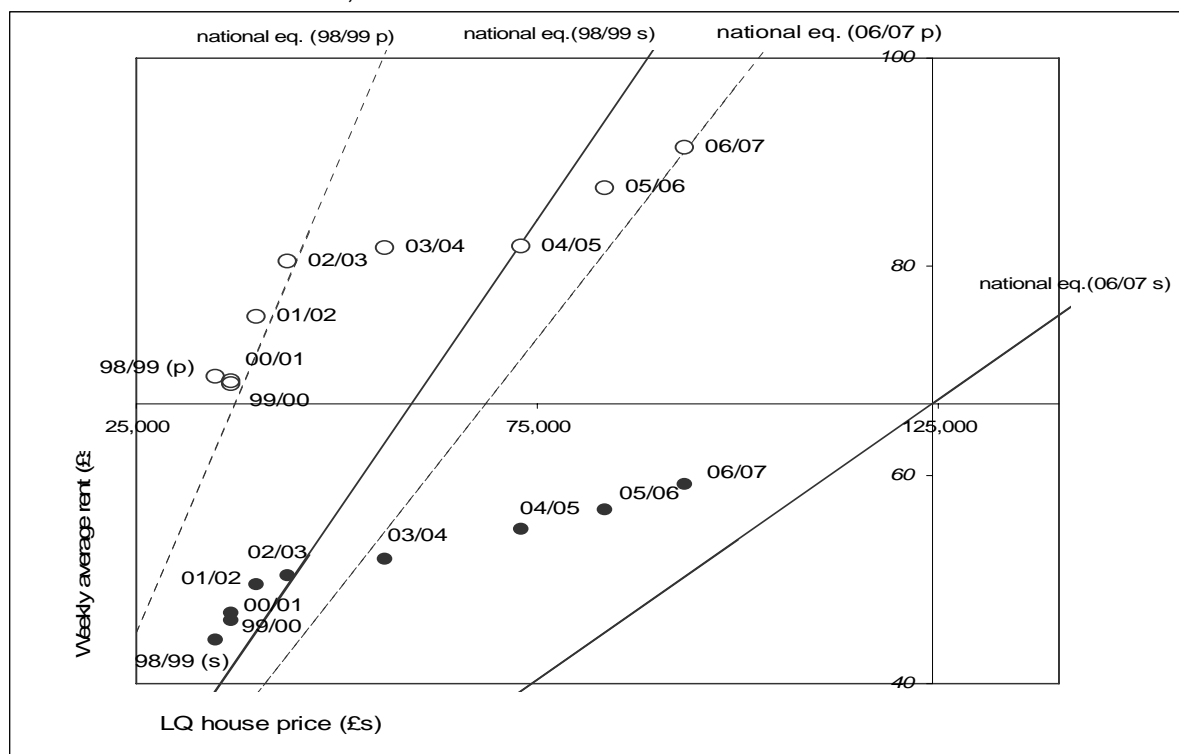


Figure A.1.7 Positions of nine regions by HA and private sector rents, and house price:
South East, 2006/07

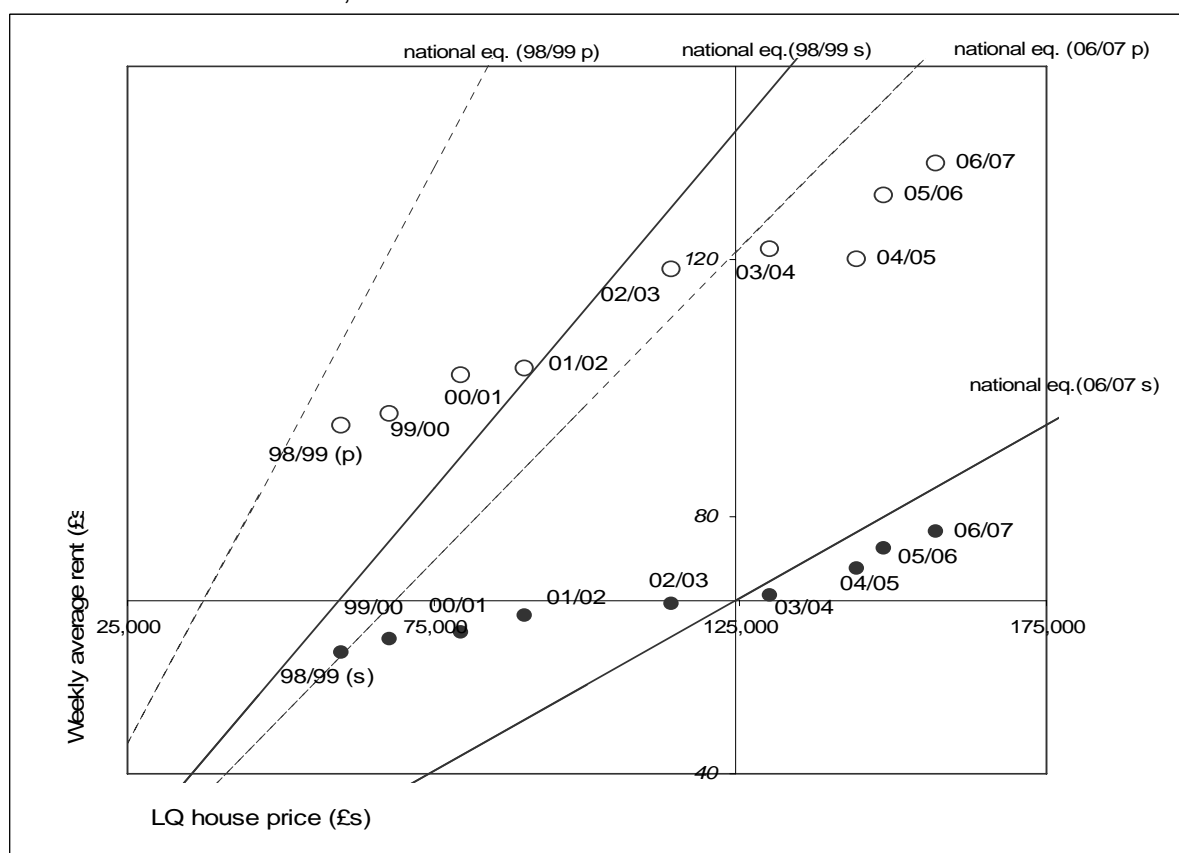


Figure A.1.8 Positions of nine regions by HA and private sector rents, and house price:
South West, 2006/07

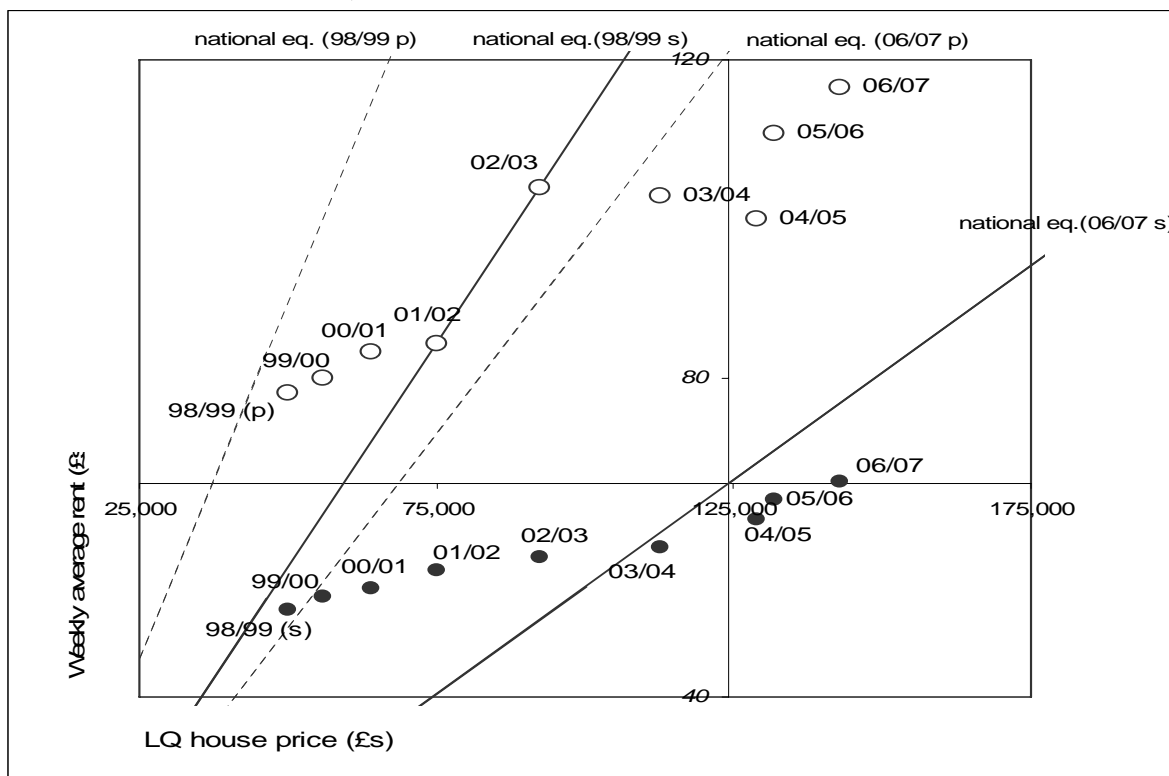


Figure A.1.9 Positions of nine regions by HA and private sector rents, and house price:
West Midlands, 2006/07

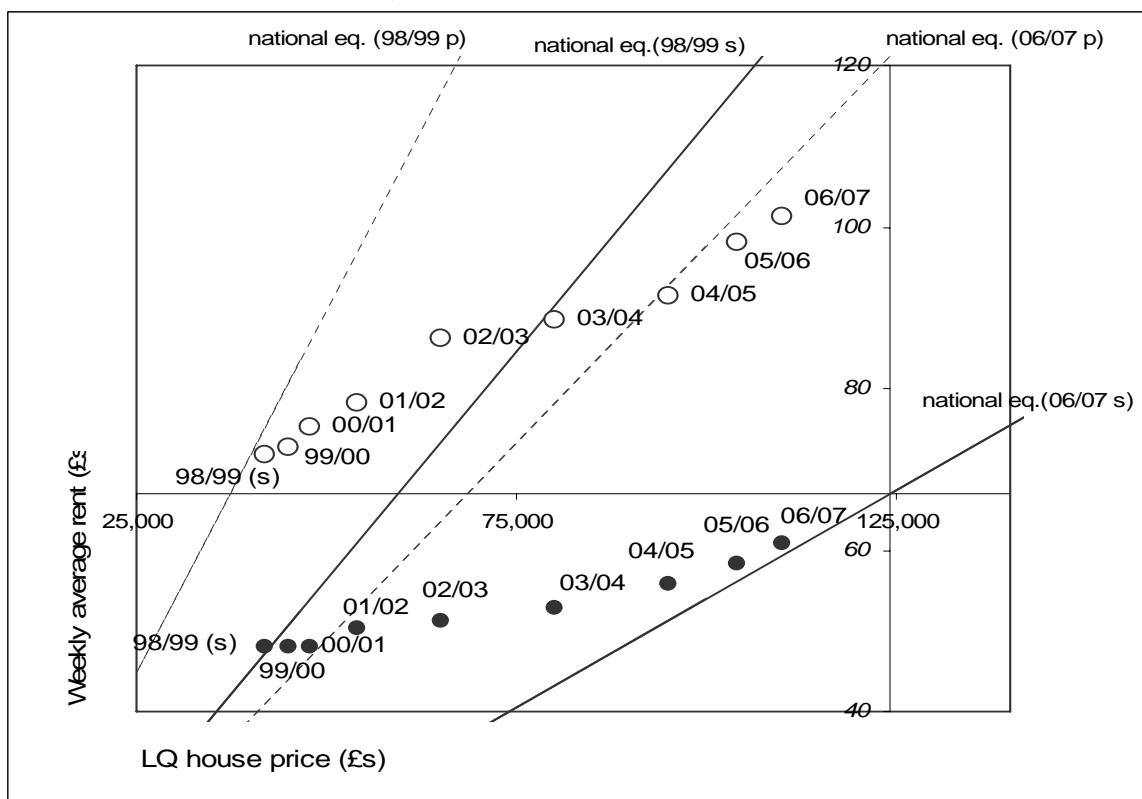
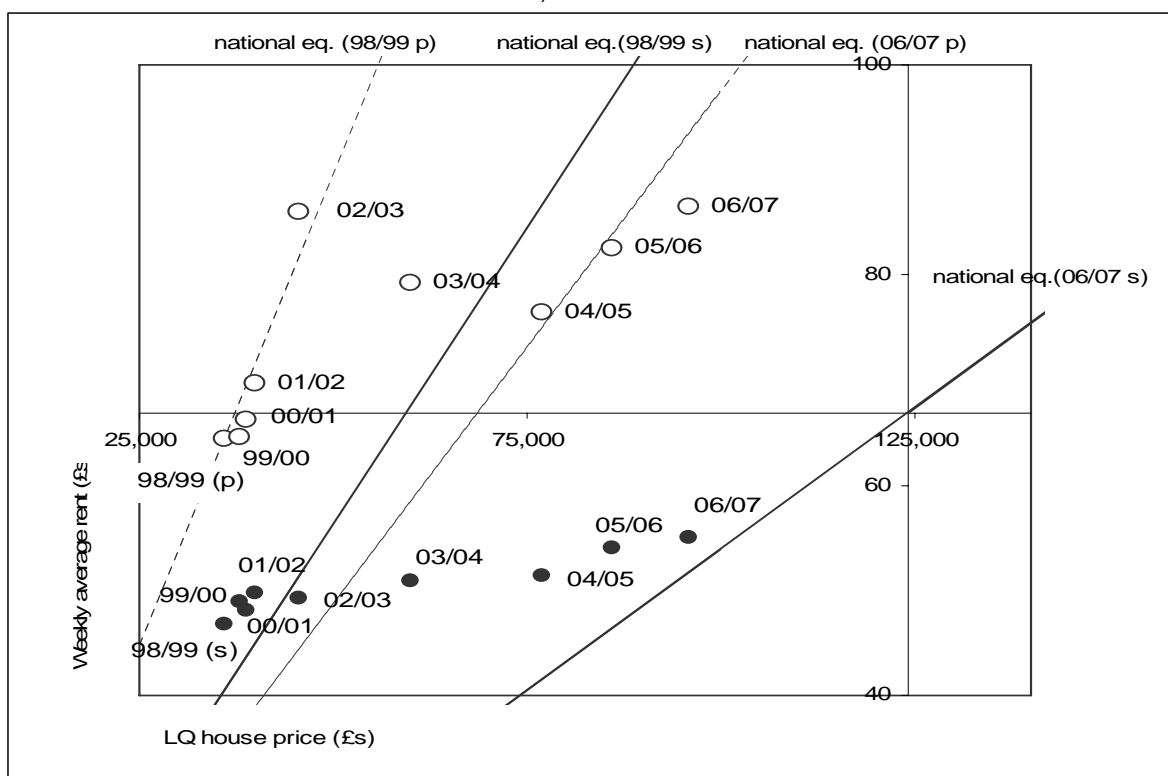


Figure A.1.10 Positions of nine regions by HA and private sector rents, and house price: Yorkshire and the Humber, 2006/07



The relationship between rents and house prices at the LA level

Figures A.1.11 and A.1.12 are scatter patterns of all LA areas relating rents to house prices in HA and private sectors respectively in 2006/07 and 1998/99 respectively. In the figures, the X axis expresses LQ house prices ('000 £s) and the Y axis represents the weekly rent level. Linear regression lines (independent and dependent variables of house price and rent respectively) are also plotted:

- The scatter pattern of all LA areas showed significantly positive relationships both of HA and private sectors' rents with house prices.
- The significance of the relationship is stronger for the private sector than for the HA sector in both years. In 2006/07, the correlation coefficient of HA rents and house prices was 0.792 while the equivalent for the private sector was 0.867¹³.
- The correlation coefficient (R) for the HA sector increased from 0.604 in 1998/99. This is associated with the introduction of target rents in April 2002, which guides HA rents to reflect rental house values.
- The R for private sector was inert from 0.899 in 1998/99, probably because the value for the private sector was already very high, leaving little scope for drastic improvement.
- The slopes of the regression lines for private sector rents are steeper than the equivalents for the HA sector for both years. This indicates that units of house value changes raised private sector rents more drastically than HA rents.

¹³ A correlation coefficient ranges from -1 to +1, and if two variables of interest have a significantly positive (or negative) relationship, the figure will be close to +1 (or -1). Values of the correlation coefficients are not directly presented but they are available from a square root of 'R sq' showed in each figure.

Figure A.1.11 House price ('000) vs. HA and Private sectors' weekly rents: 2006/07

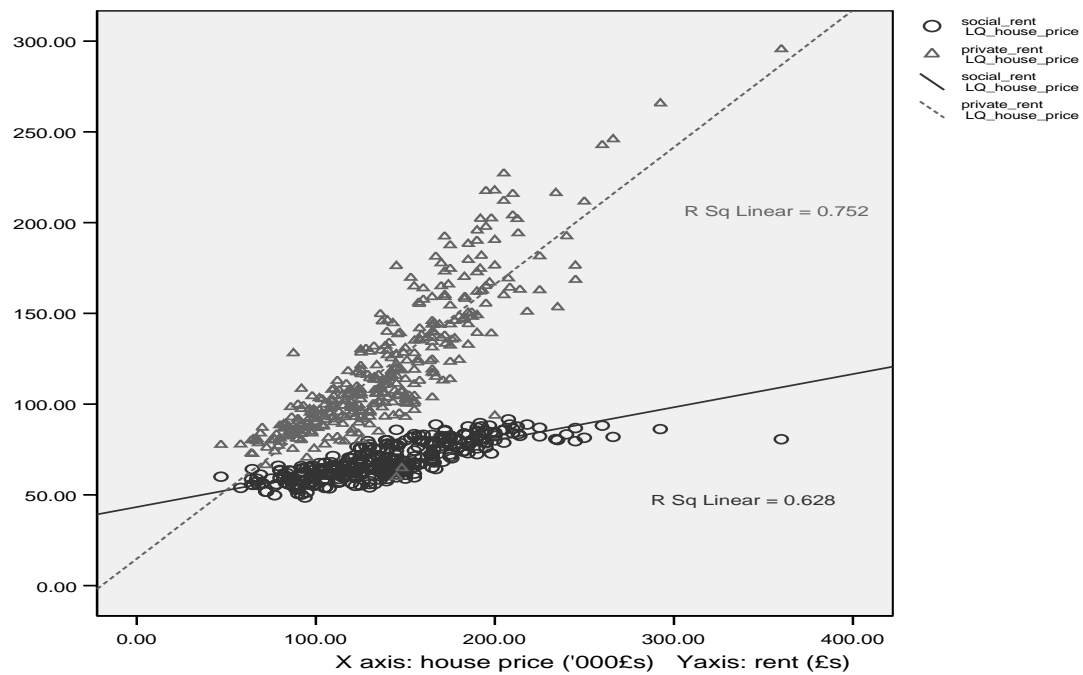
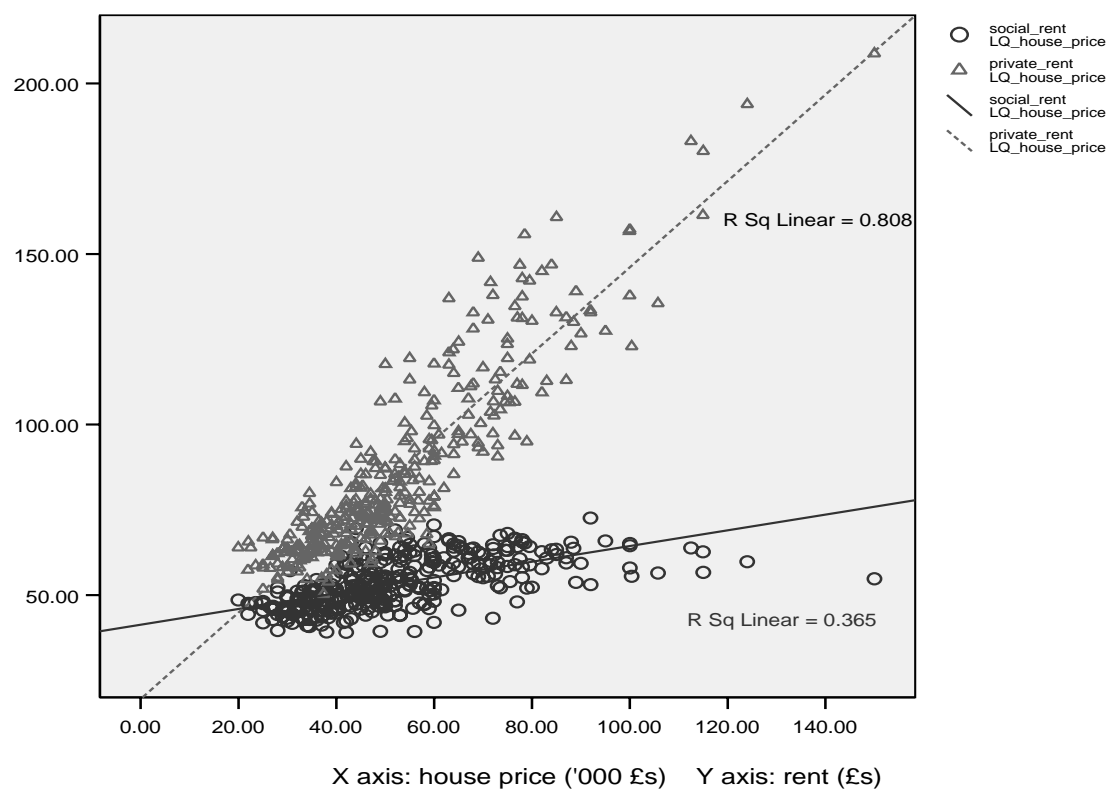


Figure A.1.12 House price ('000) vs. HA and Private sectors' weekly rents: 1998/99



Figures A.1.13 to A.1.30 set out the LA areas' scatter patterns by region for two time spans (2002/03 to 2006/07 and 1998/99 to 2001/02). The notations of the figures are the same as those in the previous two tables. The main reason for the temporal disaggregation of the observation period was the introduction of target rents for HA rents in April 2001, which aimed at bringing about a reflection of house values in HA rents:

- Regardless of regions and time spans, the slopes of the regression lines for private sector rents are steeper than their equivalents for the HA sector. This suggests that units of house value changes raised private sector rents more drastically than they did HA rents.
- In the period of 2002/03 to 2006/07, the scatter patterns of all LA areas showed significantly or reasonably positive relationships between rents and house prices both for the HA sector and the private sector in the East, the East Midlands, the North West, the South East, the West Midlands, and Yorkshire and the Humber.
- The relationships were weakly positive for the HA sector in London and the North East (R_s were 0.344 and 0.423 respectively) and for the private sector in the South West in the North East (0.396 and 0.482 for each).
- In the same period, the significance of the positive relationships between rents and house prices was stronger within the private sector than within the HA sector for seven of nine regions – the East, the East Midlands, London, the North East, the North West, the South East and the West Midlands.
- From a period of 1998/99 to 2001/02, the significance of the positive relationships between HA rents and house prices improved across all regions. London and the North East in particular, both of which showed almost no relationship between the two variables previously, related HA rents positively (but still weakly) to house prices. This implies that the introduction of the target rents in April 2004 has helped to develop these relationships.
- Although improving since the former period, relationships between rents and house prices were weak in the North East, hinting that the region is affected by other determinants for rents than house prices.

Figure A.1.13 House price ('000) vs. HA and Private sectors' weekly rents: East, 2002/03 to 2006/07

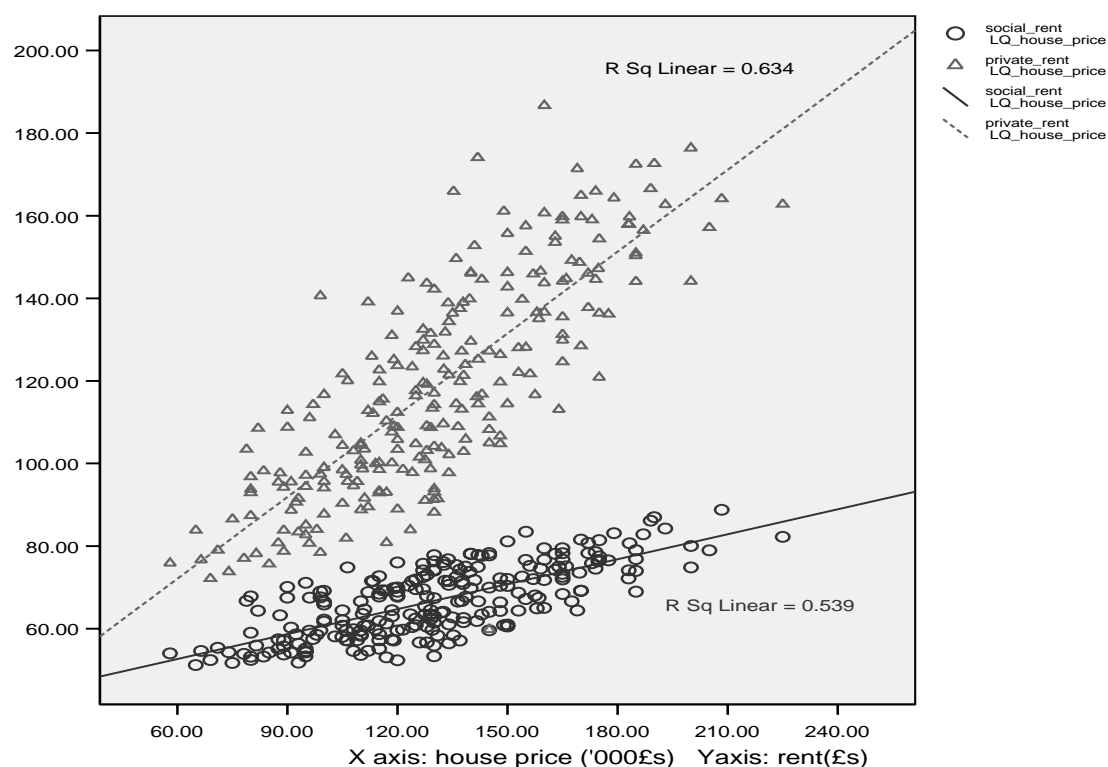


Figure A.1.14 House price ('000) vs. HA and Private sectors' weekly rents: East, 1998/99 to 2001/02

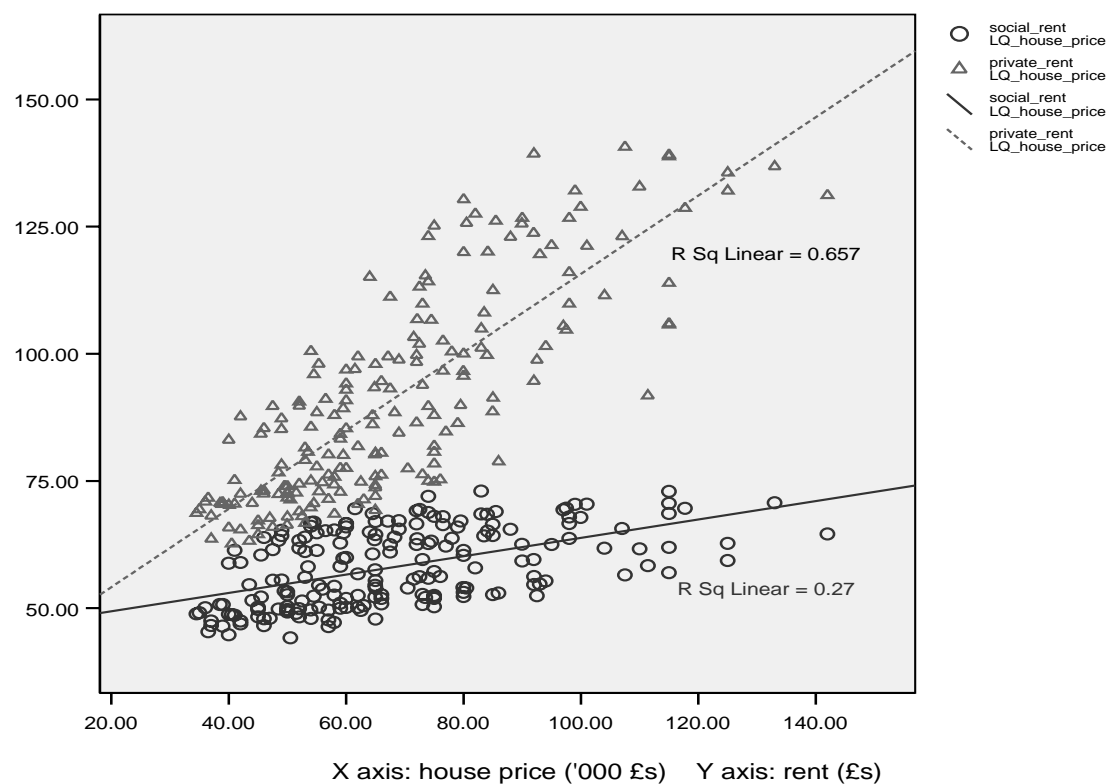


Figure A.1.15 House price ('000) vs. HA and Private sectors' weekly rents: East Midlands, 2002/03 to 2006/07

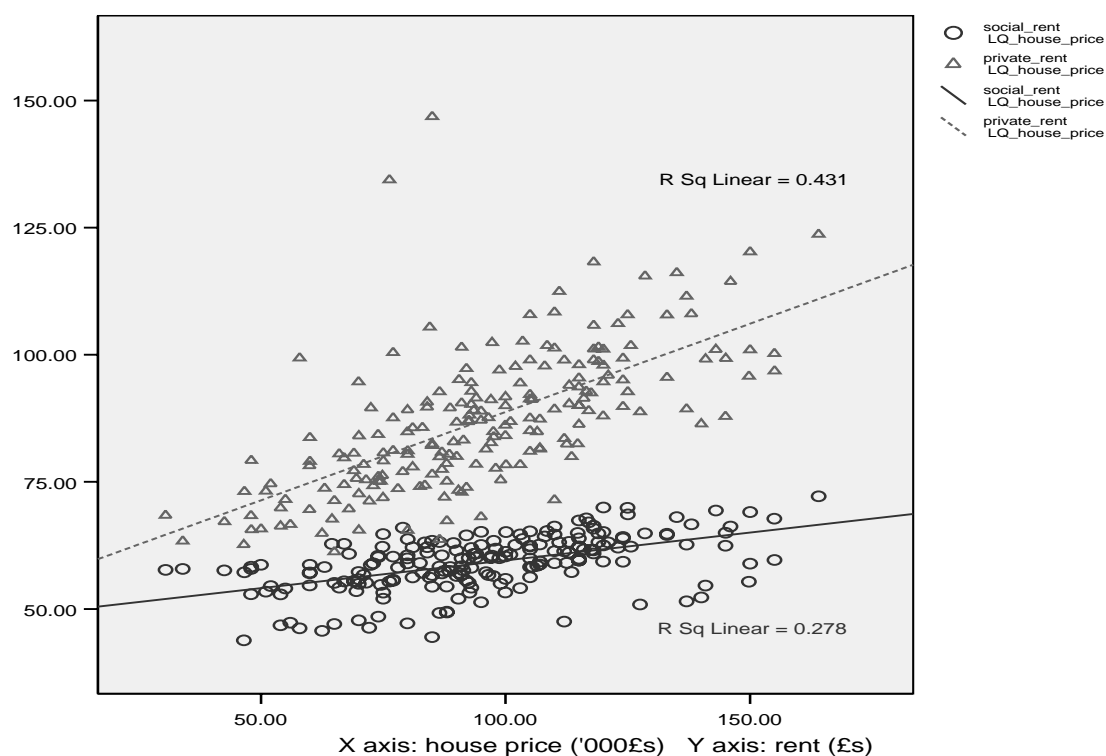


Figure A.1.16 House price ('000) vs. HA and Private sectors' weekly rents: East Midlands, 1998/99 to 2001/02

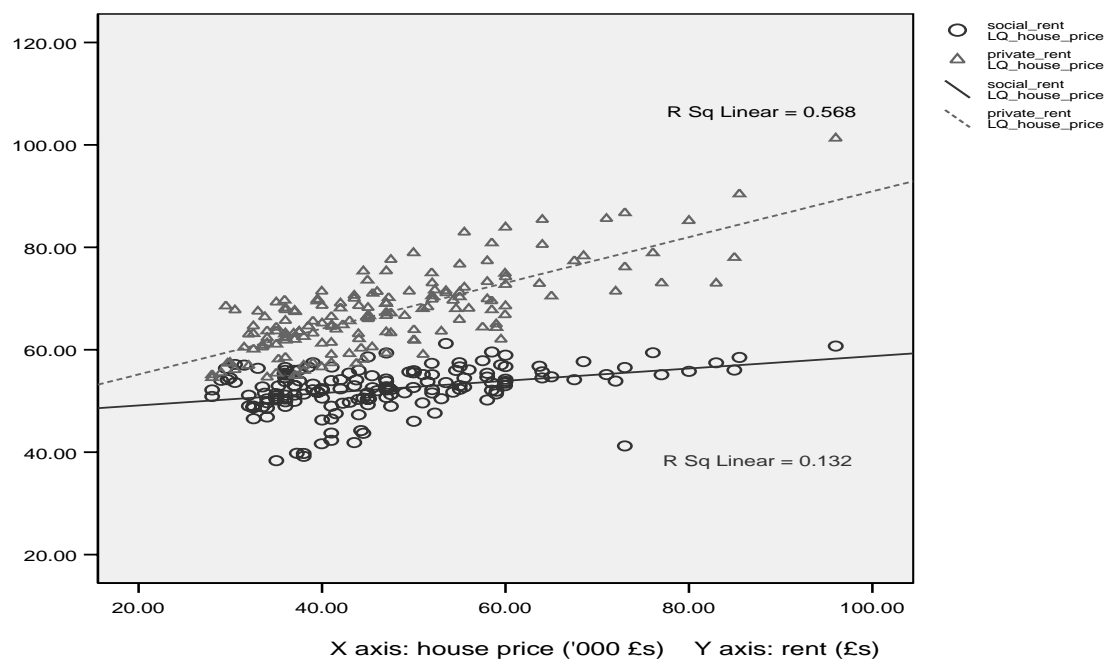


Figure A.1.17 House price ('000) vs. HA and Private sectors' weekly rents): London, 2002/03 to 2006/07

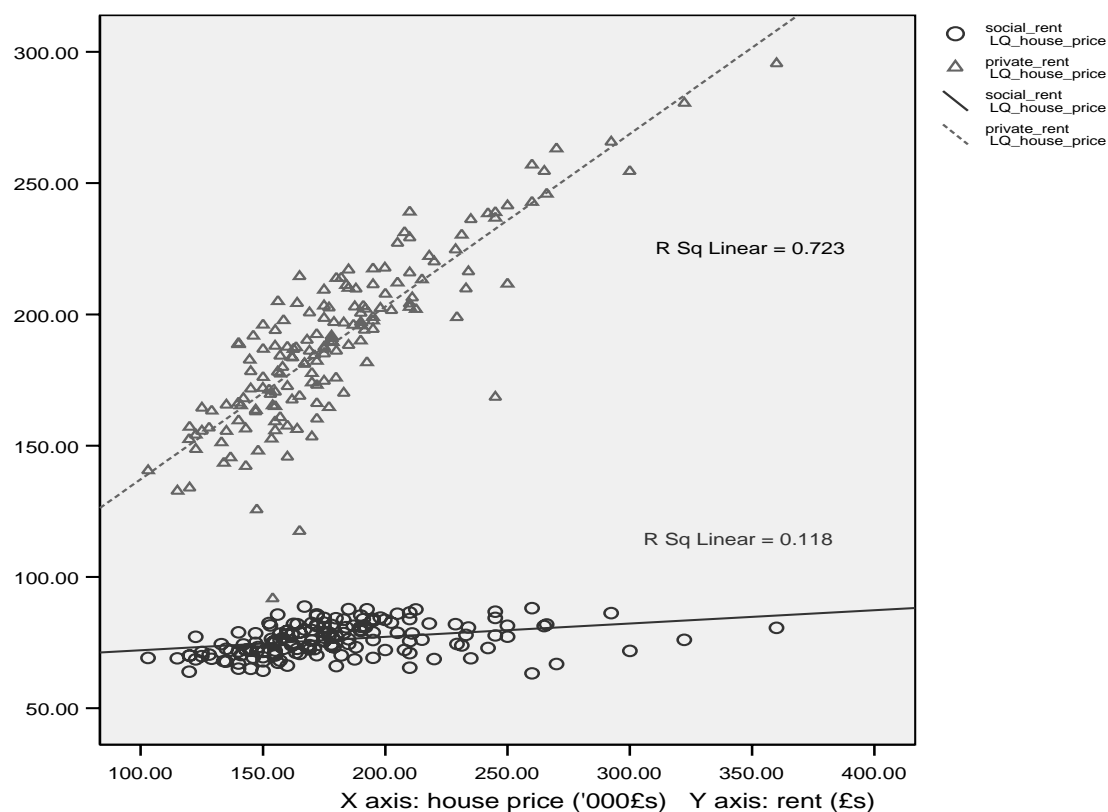


Figure A.1.18 House price ('000) vs. HA and Private sectors' weekly rents: London, 1998/99 to 2001/02

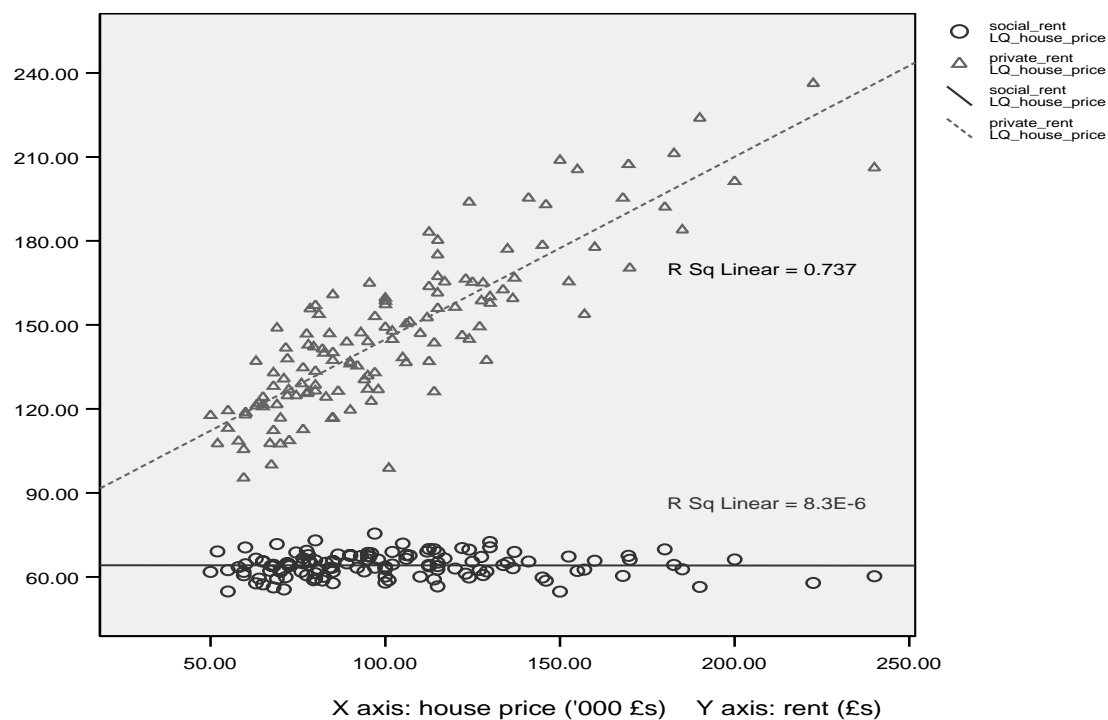


Figure A.1.19 House price ('000) vs. HA and Private sectors' weekly rent: North East, 2002/03 to 2006/07

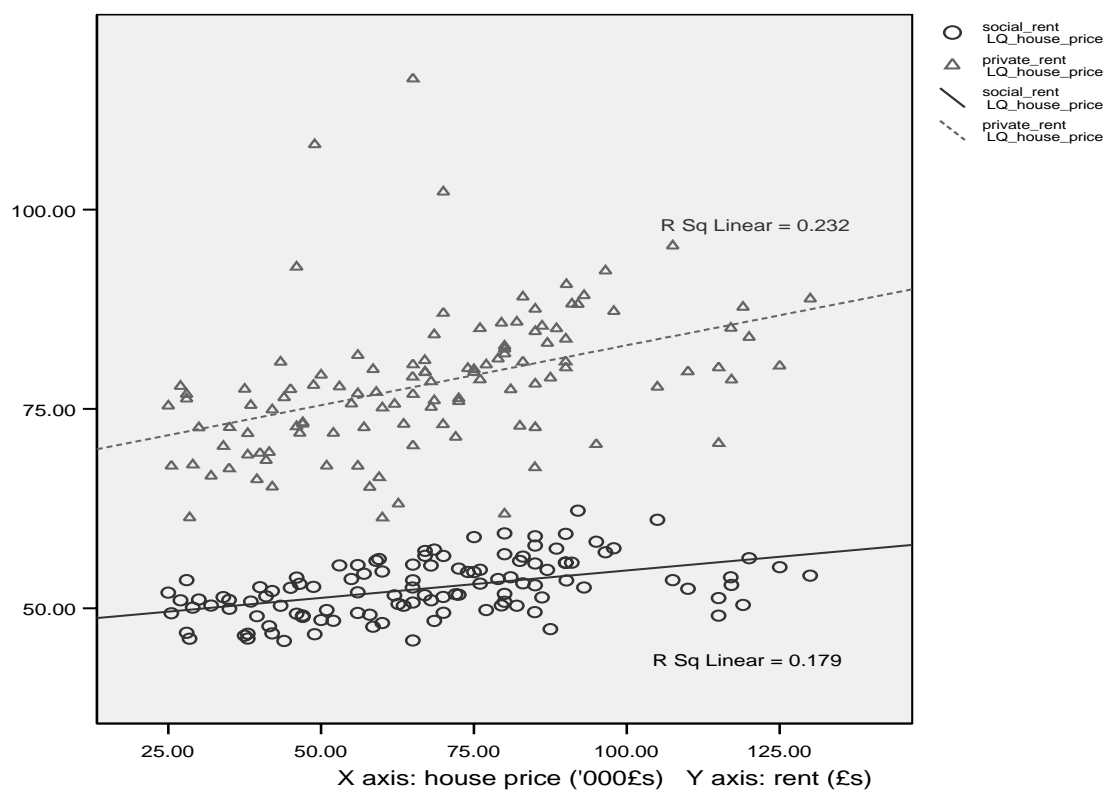


Figure A.1.20 House price ('000) vs. HA and Private sectors' weekly rents: North East, 1998/99 to 2001/02

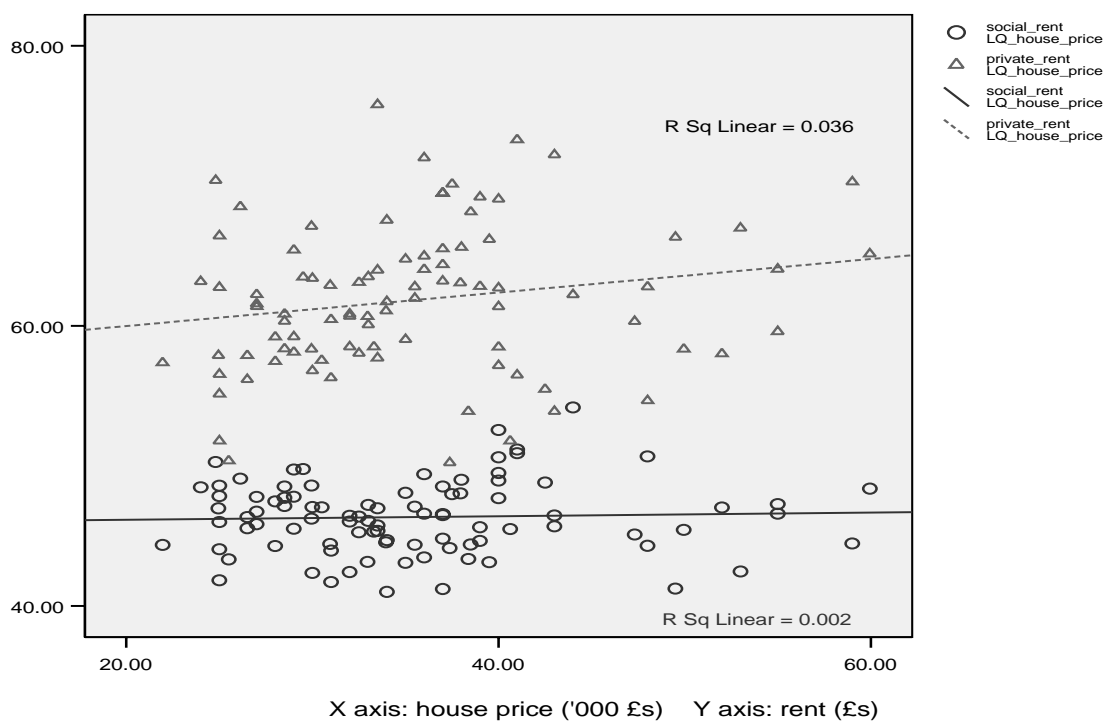


Figure A.1.21 House price ('000) vs. HA and Private sectors' weekly rents: North West, 2002/03 to 2006/07

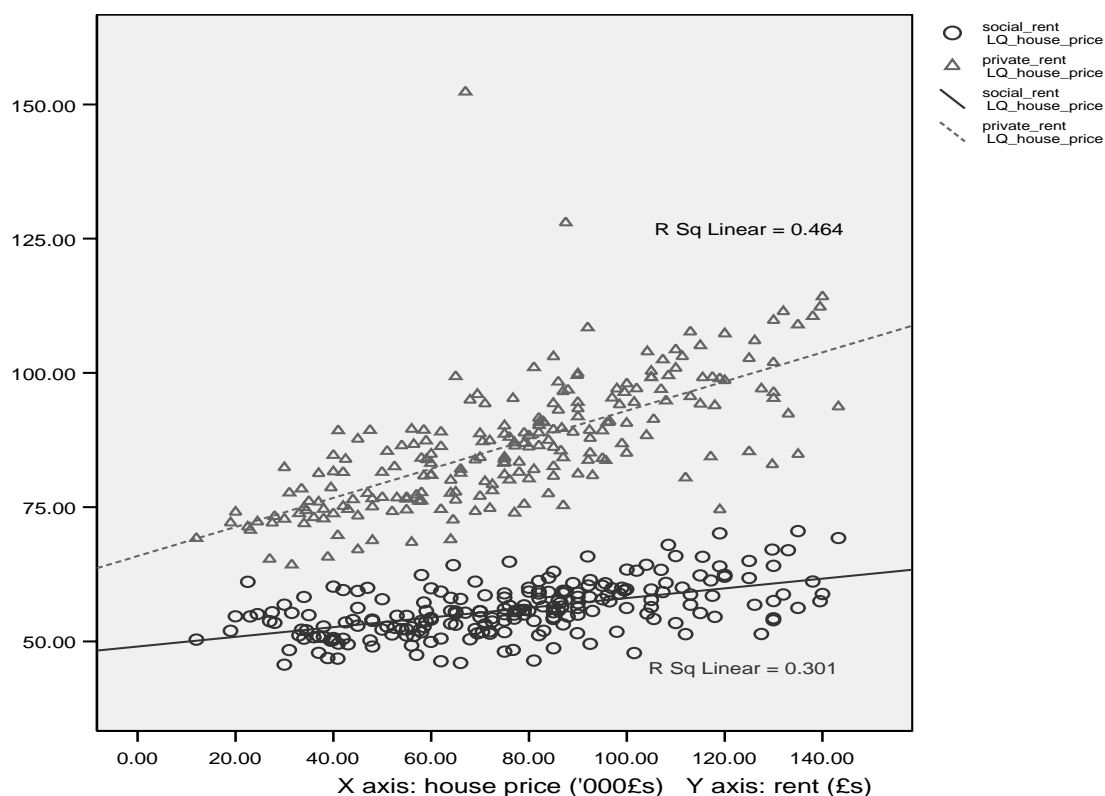


Figure A.1.22 House price ('000) vs. HA and Private sectors' weekly rents: North West, 1998/99 to 2001/02

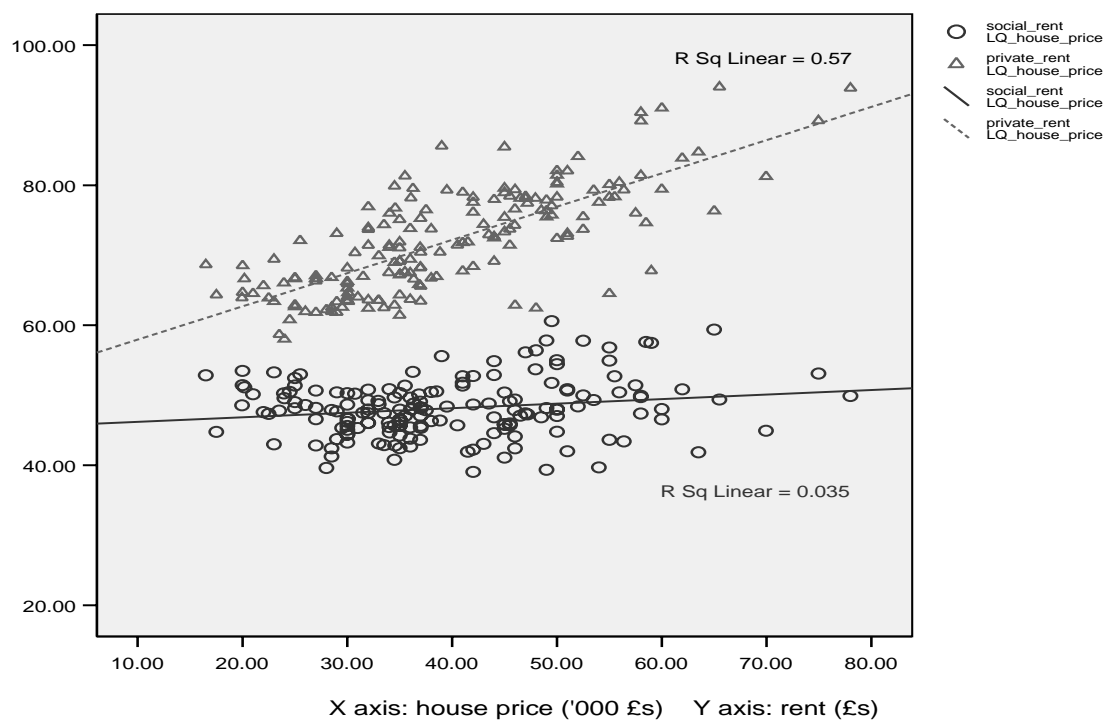


Figure A.1.23 House price ('000) vs. HA and Private sectors' weekly rents: South East, 2002/03 to 2006/07

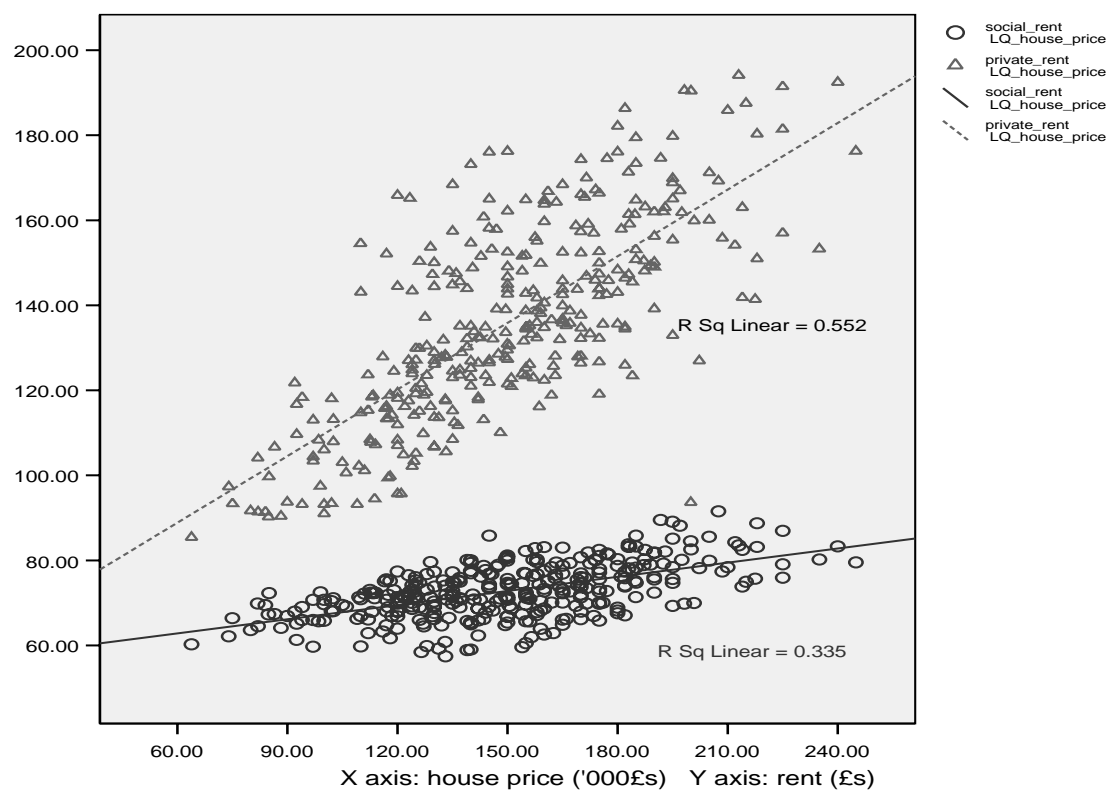


Figure A.1.24 House price ('000) vs. HA and Private sectors' weekly rents: South East, 1998/99 to 2001/02

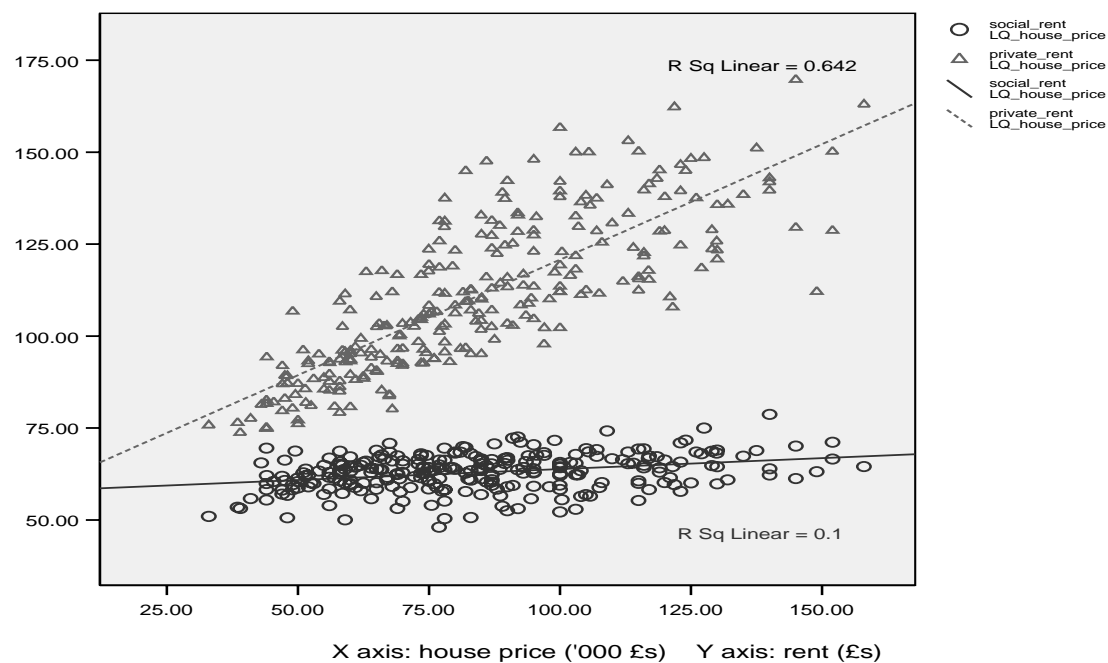


Figure A.1.25 House price ('000) vs. HA and Private sectors' weekly rents: South West, 2002/03 to 2006/07

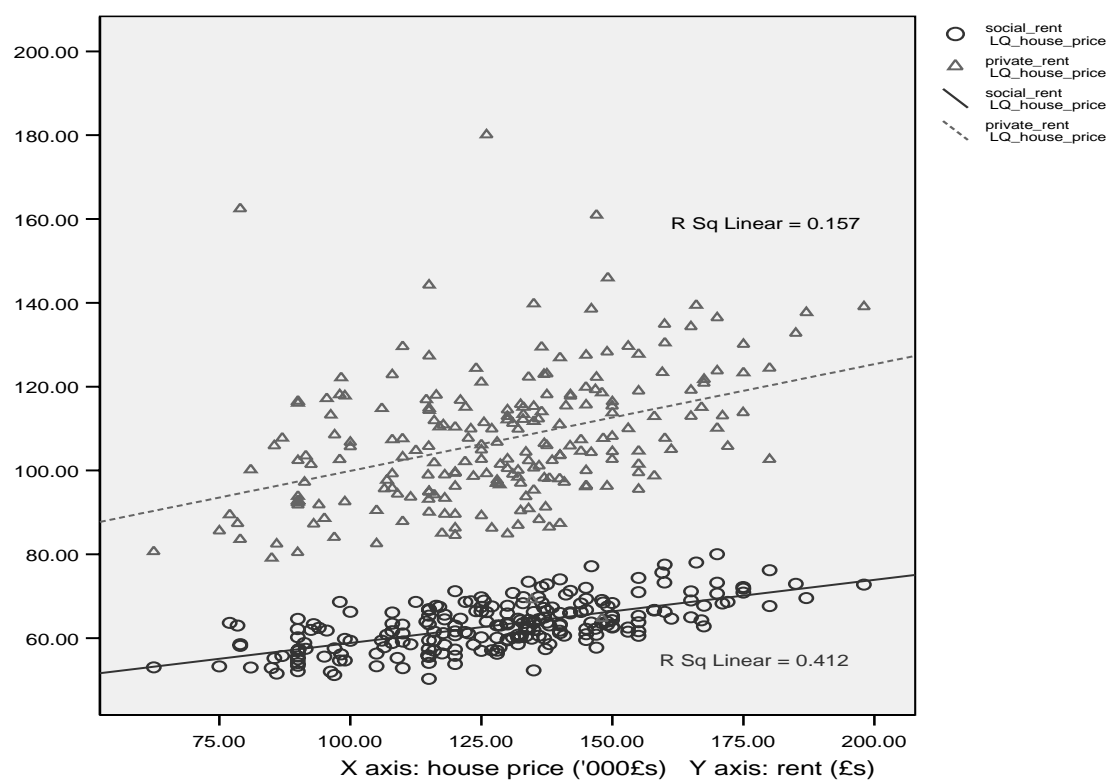


Figure A.1.26 House price ('000) vs. HA and Private sectors' weekly rents: South West, 1998/99 to 2001/02

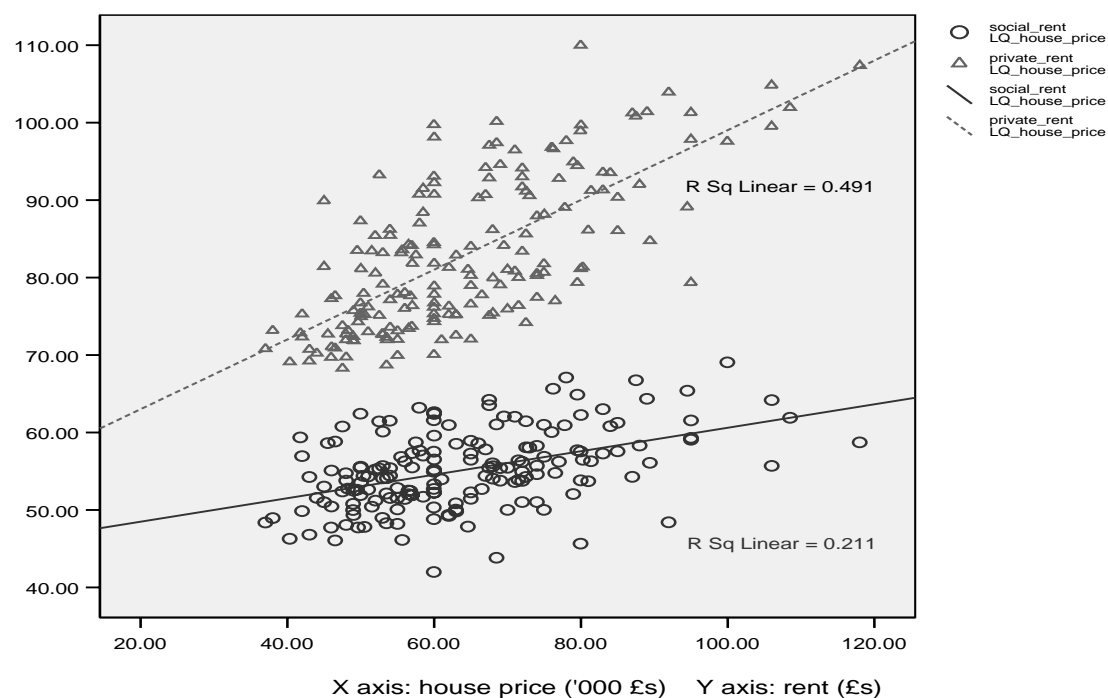


Figure A.1.27 House price ('000) vs. HA and Private sectors' weekly rents: West Midlands, 2002/03 to 2006/07

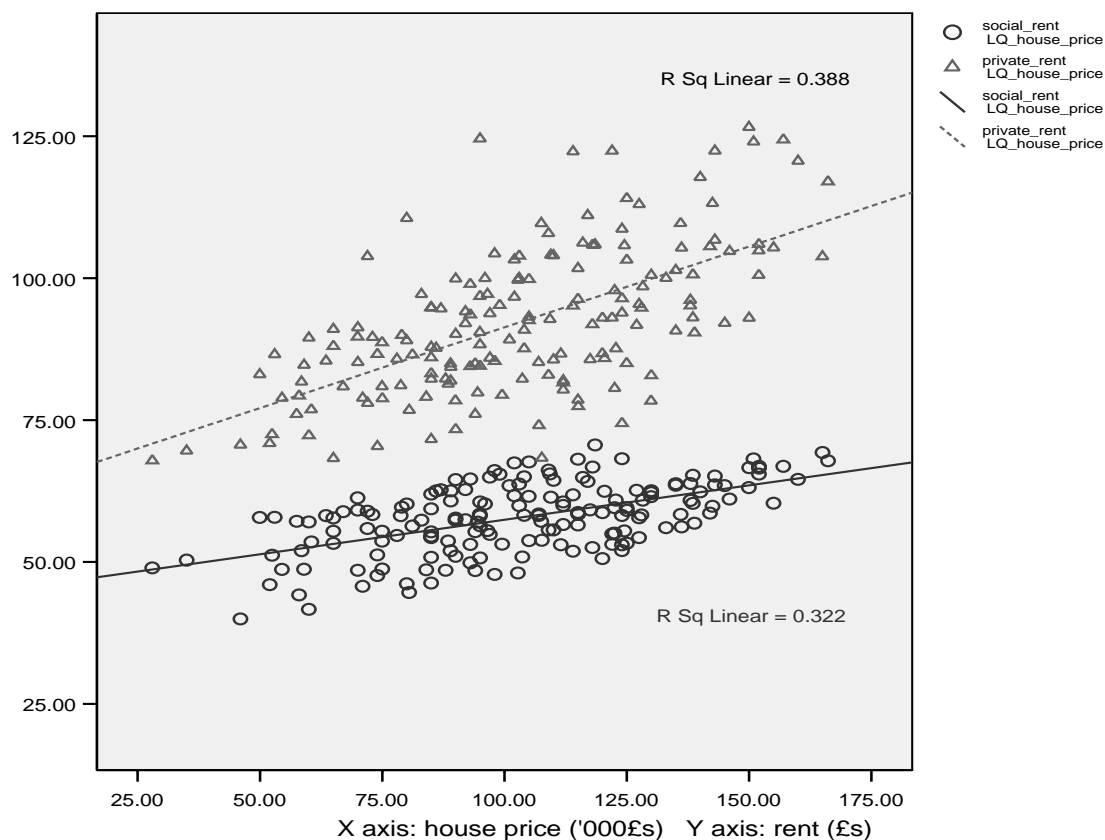


Figure A.1.28 House price ('000) vs. HA and Private sectors' weekly rents: West Midlands, 1998/99 to 2001/02

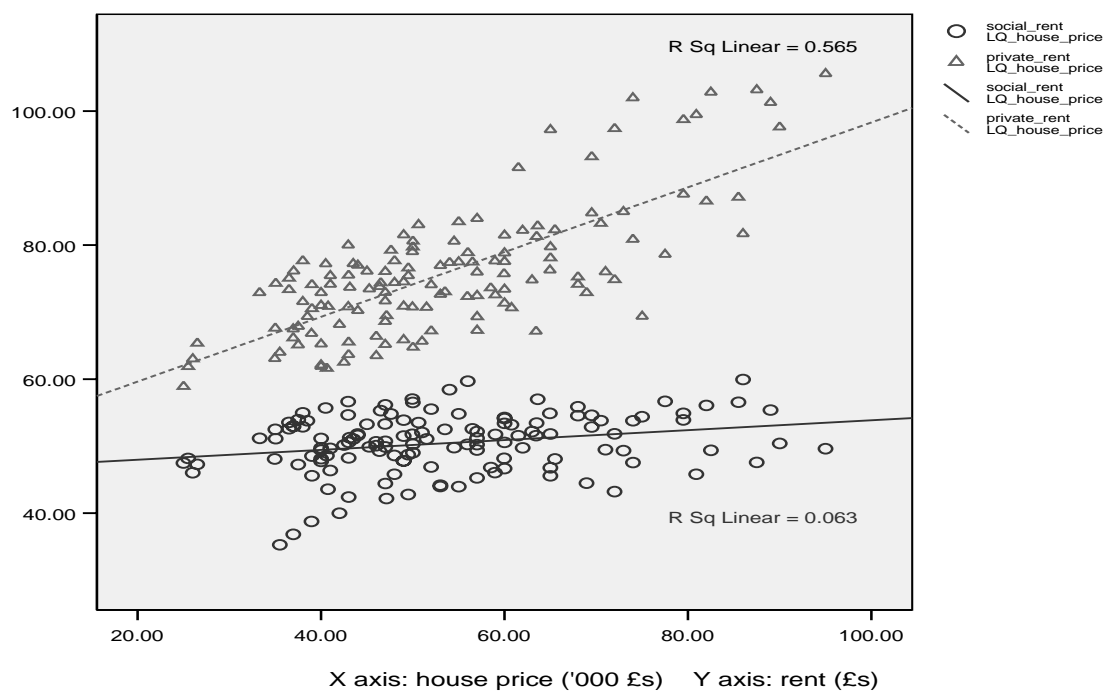


Figure A.1.29 House price ('000) vs. HA and Private sectors' weekly rents: Yorkshire and the Humber, 2002/03 to 2006/07

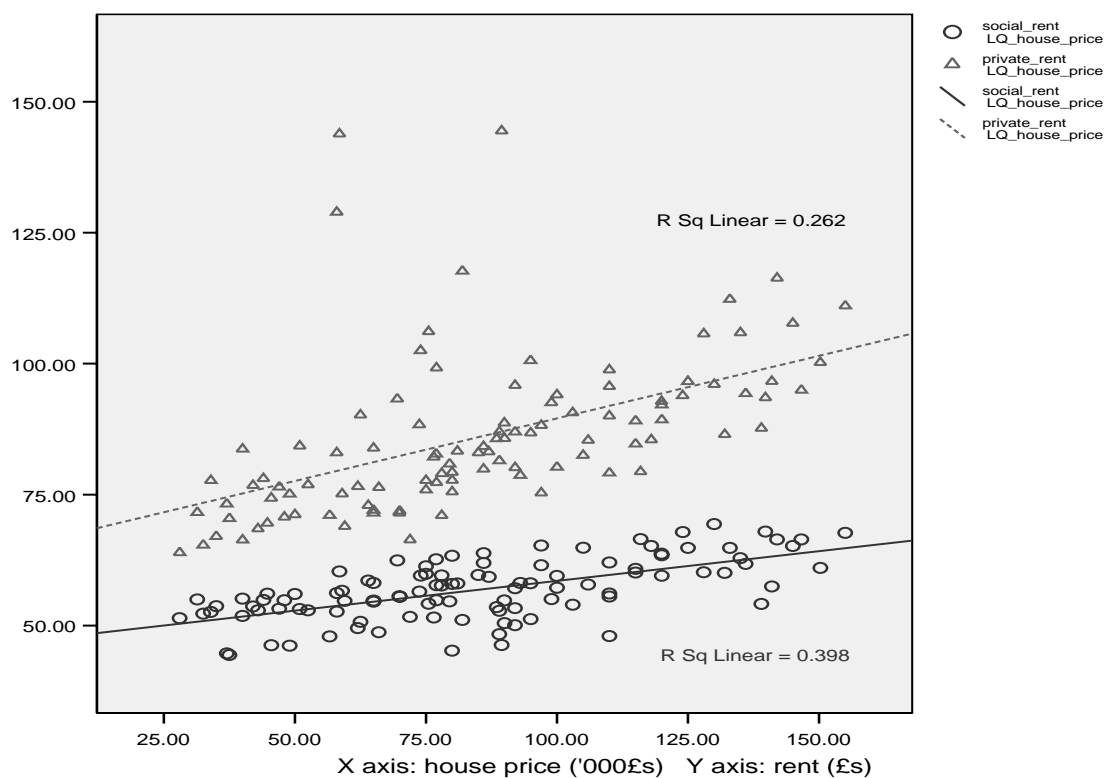
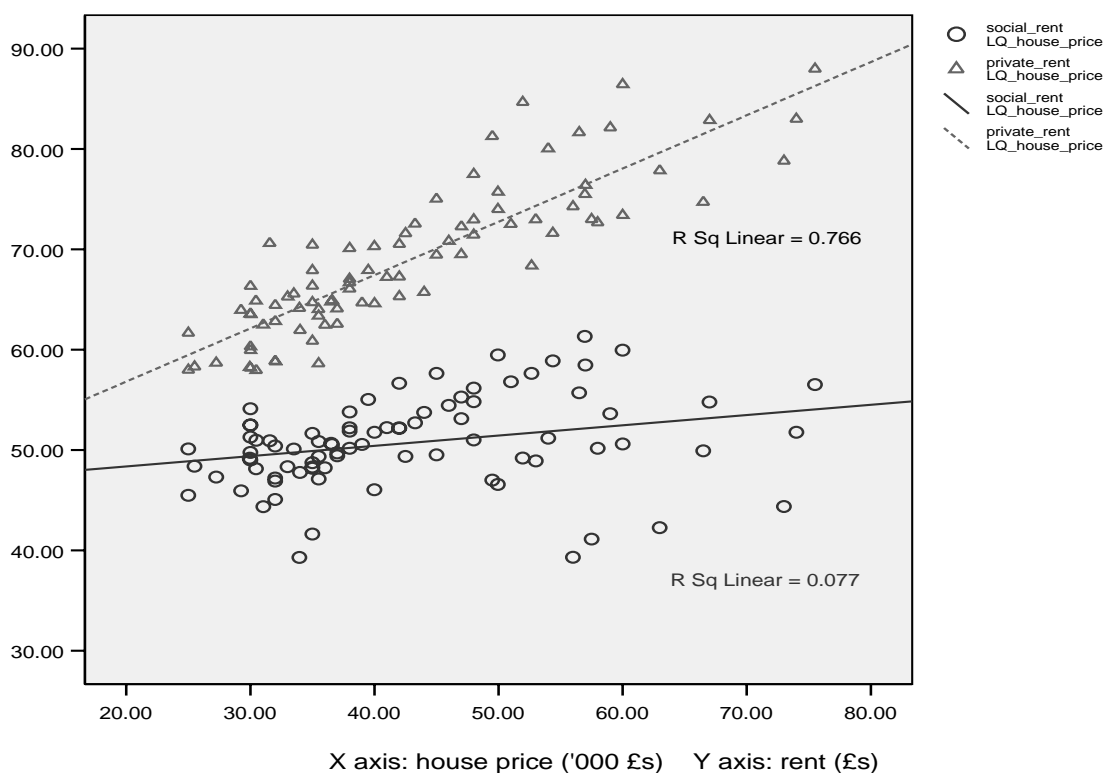


Figure A.1.30 House price ('000) vs. HA and Private sectors' weekly rents: Yorkshire and the Humber, 1998/99 to 2001/02



The relationship between HA rents and private sector rents

Table A.1.2 sets out the degree of relationship between the two sectors' rents (measured by a correlation coefficient) for all LA areas for each year of observation period:

- In 2006/07, the correlation coefficient (R) was 0.833, which means that there was a significantly positive relationship between HA and private sector rents.
- The two sectors were already positively related to one another in 1998/99 (R was 0.649), and the degree of significance has increased for the observation period except in 2002/03, which showed a marginal setback. The amplifying positive relationship between the two sectors is owed partly to the HA's rent restructuring, which aims to reflect rental house values to a greater extent than before.

Table A.1.2 Correlation coefficients between HA rents and private sector rents of LA areas across England, 1998/99 – 2006/07

1998/99	0.649
1999/00	0.674
2000/01	0.682
2001/02	0.715
2002/03	0.682
2003/04	0.780
2004/05	0.799
2005/06	0.827
2006/07	0.833

Note and Source: As Section 2.

Table A.1.3 sets out the degree of relationship between the two sectors' rents for LA areas at the regional level before and after the introduction of target rents for the HA sector:

Table A.1.3 Correlation coefficients between HA rents and private sector rents of all LA areas across regions: 1998/99 to 2001/02 and 2002/03 to 2006/07

	1998/99 to 2001/02	2002/03 to 2006/07
East	0.628	0.760
East Midlands	0.437	0.463
London	-0.147	0.142
North East	0.224	0.193
North West	0.134	0.299
South East	0.230	0.498
South West	0.442	0.517
West Midlands	0.212	0.528
Yorkshire and the Humber	0.255	0.270

Note and Source: As Section 2.

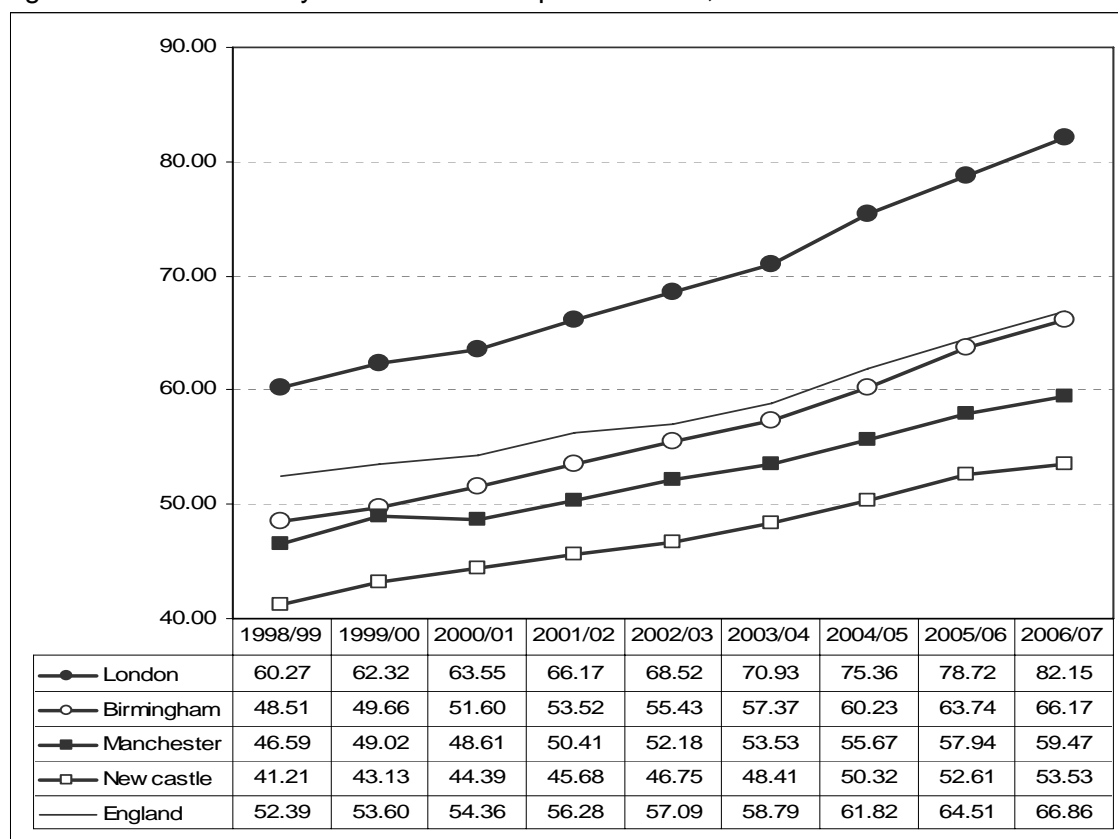
- All nine regions but the North East increased the degree of positive relationship between HA and private sector rents between the former to latter period.
- The East showed a significantly positive relationship (R was 0.760) for the period of 2002/03 to 2006/07. The West Midlands (0.528) and the South West (0.517) had reasonably positive relationships for the same period. London turned a negative relationship to a positive (although weakly) over the two periods.

- The North East showed almost no relationship between the two sectors' rents even after the introduction of the rent restructuring. However, this does not necessarily mean that the HA's regulatory framework is underdeveloped. The weakness of the relationship between house prices and rents regardless of sectors is a peculiarity of the region¹⁴. Therefore, house prices might not be functioning to associate two sectors' rents with each other. To examine this point, further research is required.

¹⁴ For the details, see Udagawa and Whitehead (2007b).

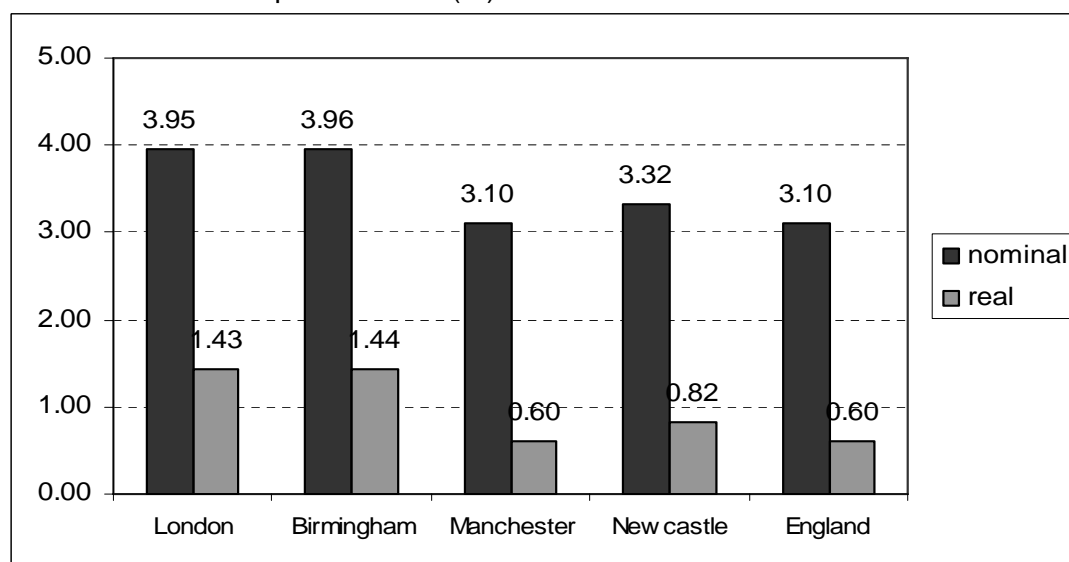
Annex 2. Key variables of the rental property markets for the four metropolitan areas: 1998/99-2006/07

Figure A.2.1 HA weekly rents: four metropolitan areas, 1998/99 – 2006/07



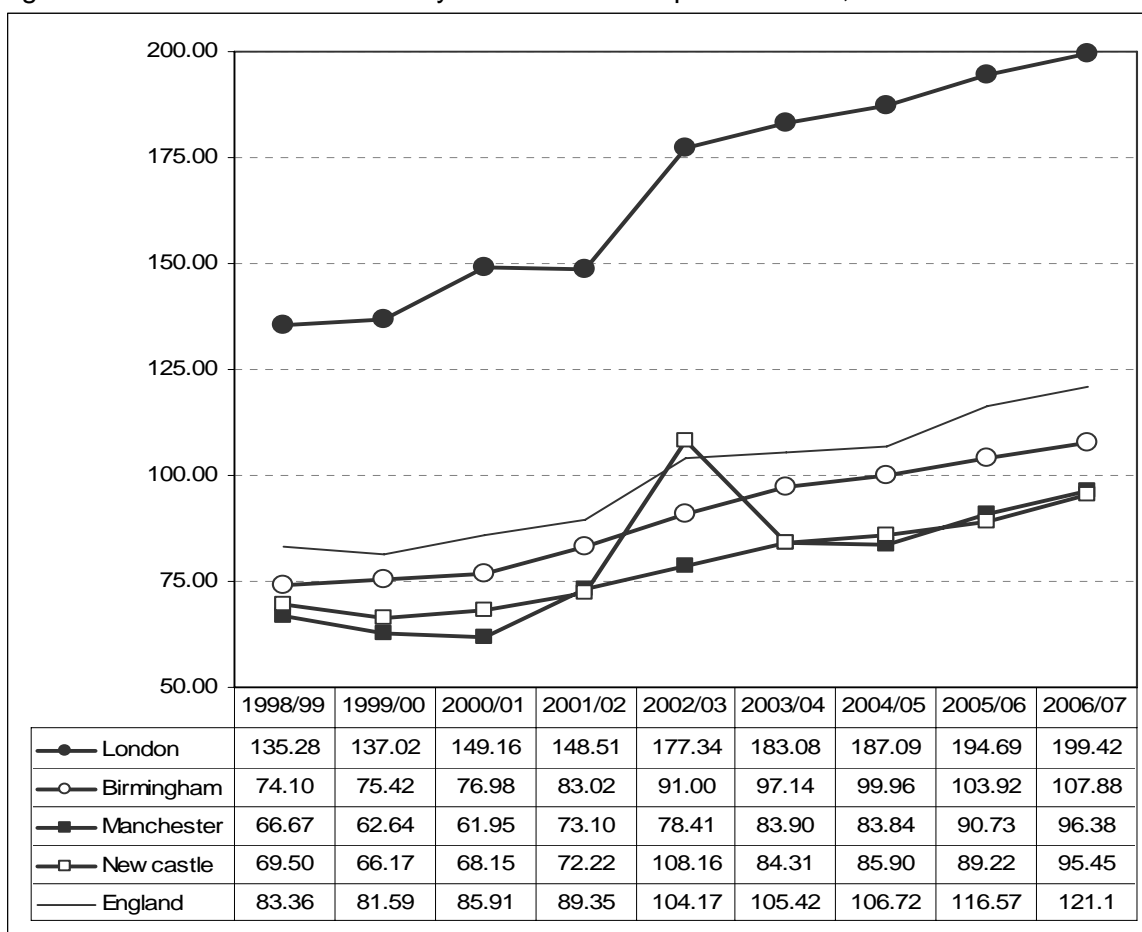
Note and Source: As Table 3.1.

Figure A.2.2 Estimated annual growth rates of HA rents from 1998/99 to 2006/07: four metropolitan areas (%)



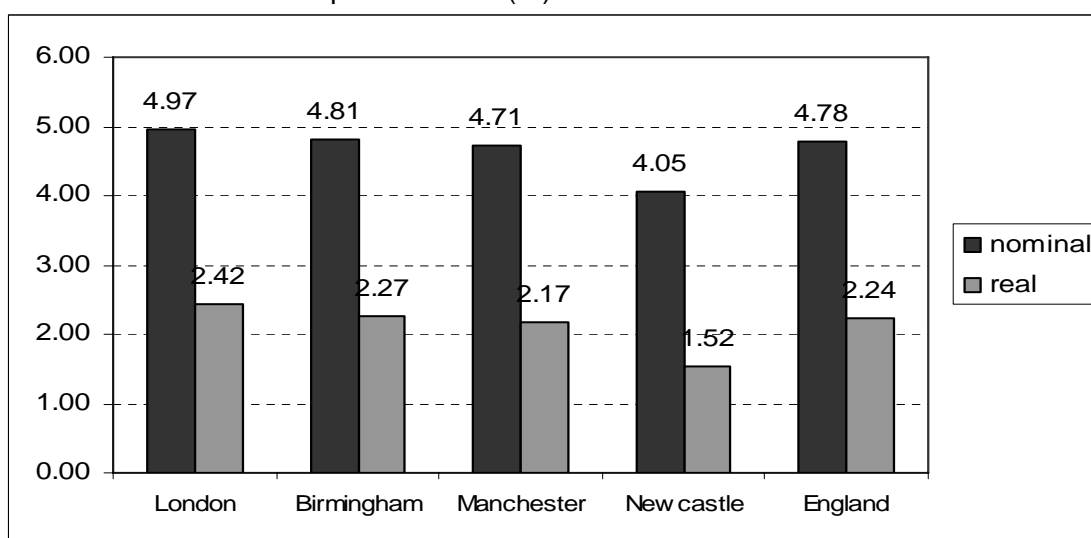
Note and Source: As Table 3.1.

Figure A.2.3 Private sector weekly rents: four metropolitan areas, 1998/99 – 2006/07



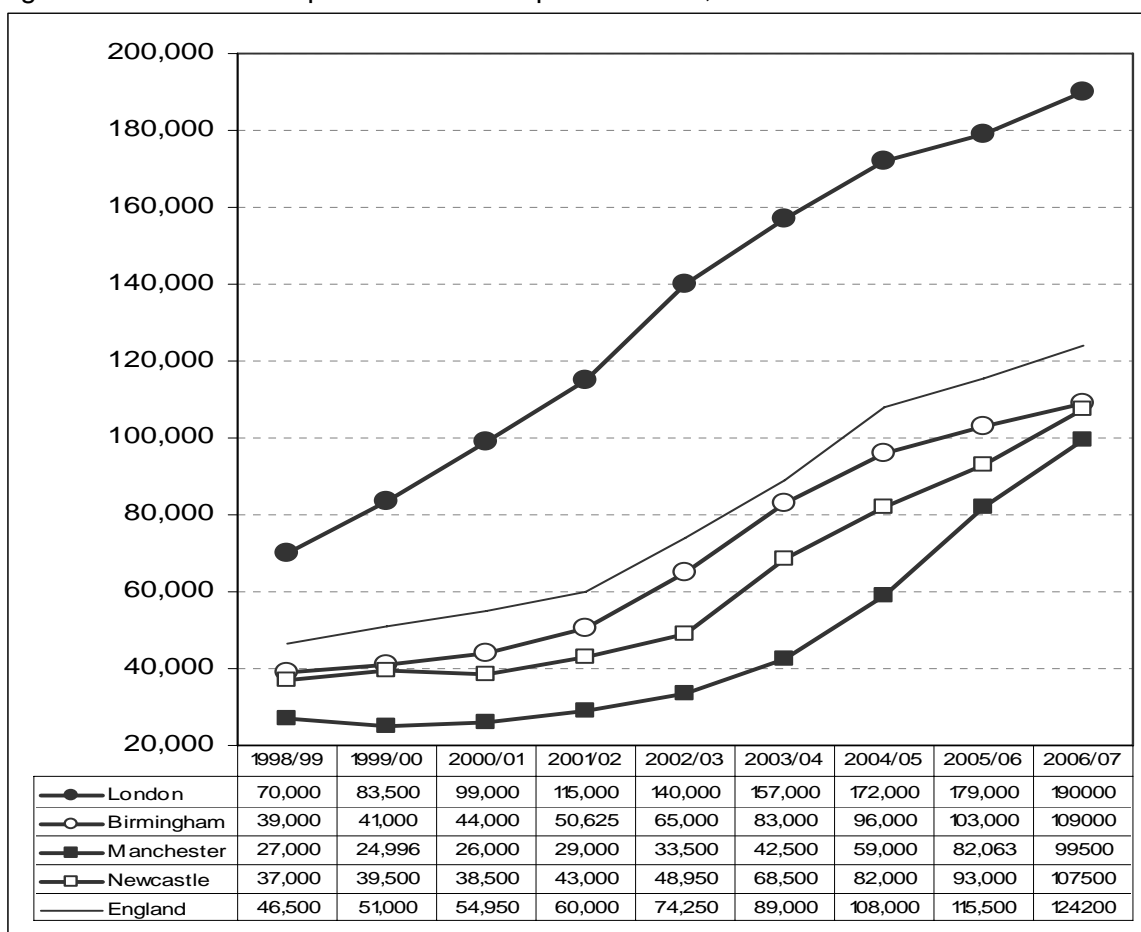
Note and Source: as Table 3.1.

Figure A.2.4 Estimated annual growth rates of private sector rents from 1998/99 to 2006/07: four metropolitan areas (%)



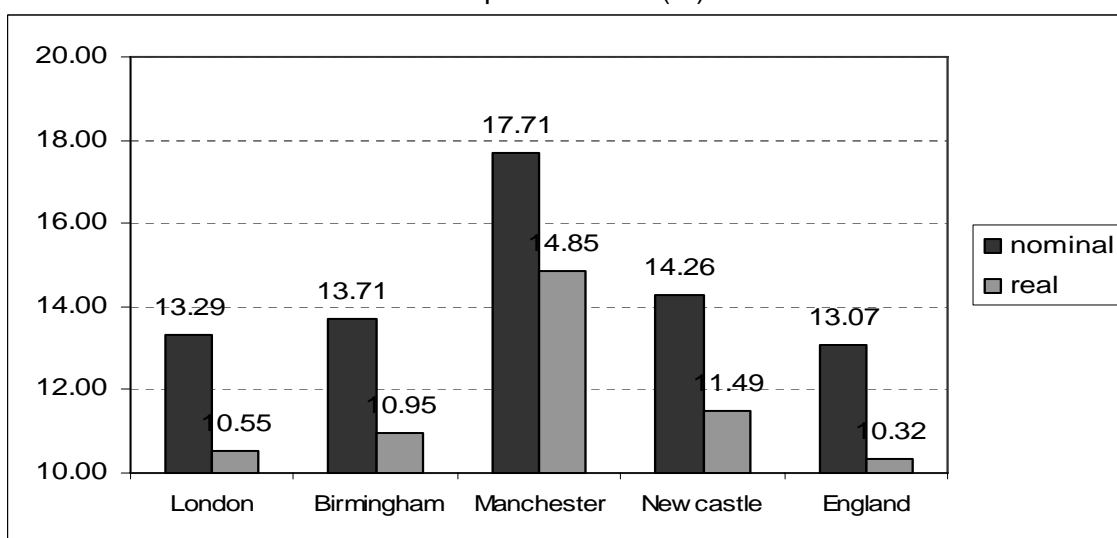
Note and Source: As Table 3.1.

Figure A.2.7 LQ house prices: four metropolitan areas, 1998/99 – 2006/07



Note and Source: As Table 3.1.

Figure A.2.8 Estimated annual growth rates of LQ house prices for the period from 1998/99 to 2006/07: four metropolitan areas (%)



Note and Source: As Table 3.1.

Annex 3. HA rental rates of return based on gross rents

This part presents HA rental rates of return calculated by using the latest gross rents and compares private sector's equivalents. HA gross rents consist of net rents and service charges eligible for housing benefits. Except this, the definition, the data source and the comparative methodology are the same as those in the main part.

Rental rates of return at the national and regional levels

Table A.3.1 set outs correlation coefficients between HA rents, private sector rents and house prices for all LA areas in 2006/07.

- All three variables appeared positively correlated with one another, to a statistically significant degree.
- The correlation between HA rents and house prices was slightly weaker than the equivalent for private sector rents.
- The magnitude of the correlation between HA and private sector rents was greater than that of HA rents with house prices.

Table A.3.1 Correlation coefficients of the three indicators across all LA areas: 2006/07

	HA rent	Private rent	House price
HA rent	1		
Private rent	0.841	1	
House price	0.780	0.867	1

Note: As Table 2.1.

Table A.3.2 sets out the HA rental rate of return, private sector's equivalent and the differential between the two variables for England in 2006/07.

- The HA rental rate of return was 2.69%, whilst the private sector rental rate of return was 5.07%.
- The rate differential between the HA and private sectors (measured by the HA sector minus the private sector) was -2.19 points.

Table A.3.2 HA and private sector rental rates of return: National (% and %-point)

	HA	Private	Differential (HA – private)
2006/07	2.88	5.07	-2.19

Note and Source: See Section 2.

Table A.3.3 shows the same statistics at the regional level.

- All nine regions retained higher private sector rental rates than social sector rates.
- The highest HA rental rate of return was observed in the North East (3.52%). This was followed by those in the North West (3.37%) and Yorkshire and the Humber (3.06%).
- The lowest rental rate was seen in London (2.36%), followed by those in the South West (2.49%), and the East (2.62%).
- The rate differential between the two sectors was greatest in London (-3.10 percentage points) with the smallest HA rental rate and the largest private sector rental rate.

- London's figure was well above the second widest gap of the East (-1.97 points). The third was shared by the South East and the West Midlands (-1.83 points for each).
- The East Midlands showed the narrowest rate differential (-1.41 points). This was followed by the North East (-1.69 points) and the North West (-1.72 points).

Table A.3.3 HA and private sector rental rates of return: regions (% and %-point), 2006/07

	HA	Private	Differential (HA – private)
East	2.62	4.59	-1.97
East Midlands	3.00	4.41	-1.41
London	2.36	5.46	-3.10
North East	3.52	5.21	-1.69
North West	3.37	5.09	-1.72
South East	2.64	4.47	-1.83
South West	2.49	4.23	-1.74
West Midlands	2.96	4.79	-1.83
Yorkshire & the Humber	3.06	4.69	-1.63

Note and Source: As Table 3.1.

Rental rates of return at the LA level

Table A.4.4 sets out the HA and private sector rates of return and the rate differentials for LA areas across England in 2006/07.

- The latest median of the rate differentials for all LA areas was -1.70 points.
- Variations of rate differentials across LA areas measured by a standard deviation and a range (maximum differential minus minimum differential) were 0.58 points and 4.02 points respectively.
- The median of the HA rental rates was 2.69%.
- The standard deviation for the HA rental rates was 0.66% and the range was 5.57 points.

Table A.3.4 Descriptions of rental rates of return for LA areas (% or %-point): England

	HA			Private			Differential (HA – private)		
	Median	Std. Dev.	Range	Median	Std. Dev.	Range	Median	Std. Dev.	Range
2006/07	2.69	0.66	5.57	4.50	0.76	6.44	-1.70	0.58	4.02

Note and Source: See Section 2.

Table A.3.5 presents the same statistics for all LA areas across the nine regions in 2006/07.

- The median of the rate differentials for constituent LA areas in a region was the largest in London (-2.91 points). This was followed by those of the South East (-1.96) and the East (-1.80).
- The smallest median was observed in Yorkshire and the Humber (-1.29). This was followed by those of the East Midlands (-1.37) and the West Midlands (-1.52).
- The variation of rate differentials across LA areas, measured by the standard deviation, was the greatest in the North West (0.56). London and the East followed this with a value of 0.49 for each.
- The East Midlands held the smallest standard deviation for rate differentials (0.33). This was followed by the West Midlands (0.34) and the South West (0.36).

- With respect to a variation of the rate differentials measured by the range from the minimum to the maximum values, the North West had the widest range of 3.50. This was followed by the South East (3.01) and the East (2.74).
- The West Midlands the narrowest range of 1.29. This was followed by Yorkshire and the Humber (1.41) and the East Midlands (1.46).

Table A.3.5 Descriptions of rental rates of return for local authorities (% or %-point): regions, 2006/07

	HA			Private			Differential (HA – private)		
	Median	Std. Dev.	Range	Median	Std. Dev.	Range	Median	Std. Dev.	Range
East	2.55	0.35	1.38	4.46	0.61	3.58	-1.80	0.49	2.74
East Midlands	3.00	0.52	2.42	4.45	0.58	2.32	-1.37	0.33	1.46
London	2.30	0.38	1.60	5.22	0.55	2.24	-2.91	0.49	2.49
North East	3.43	0.64	2.39	5.00	0.89	3.12	-1.57	0.41	1.58
North West	3.38	0.88	4.61	4.97	1.04	5.31	-1.68	0.56	3.50
South East	2.46	0.43	1.86	4.42	0.57	3.88	-1.96	0.45	3.01
South West	2.44	0.26	1.13	3.97	0.51	2.77	-1.56	0.36	2.27
West Midlands	2.72	0.58	2.59	4.23	0.73	3.06	-1.52	0.34	1.29
Yorkshire & the Humber	3.01	0.69	2.84	4.53	0.67	2.56	-1.29	0.38	1.41

Note and Source: As Table 4.1.

Tables A.4.6 and A.4.7 set out the number and the proportion of LA areas categorised by quartile bands of the rate differentials between the HA and private sectors, and by region. The first quartile cohort refers to LA areas with the widest rate differentials, i.e., the private sector rental rate is higher than the HA rental rate for the most part. The fourth quartile cohort represents LA areas whose HA rental rates were closest to their private sector rental rates.

Table A.3.6 Number of LA areas in each quartile band of rate differentials by region: 2006/07

	Wide		→	Narrow	
	1st Q	2nd Q	3rd Q	4th Q	Total
East	17	14	12	5	48
East Midlands	1	5	13	21	40
London	30	0	1	1	32
North East	2	6	7	8	23
North West	7	14	13	9	43
South East	25	24	11	7	67
South West	4	12	17	11	44
West Midlands	2	8	12	12	34
Yorkshire and the Humber	0	5	2	14	21
England	88	88	88	88	352

Note and Source: As Table 4.1. The quartiles are -2.04 (25), -1.70 (50) and -1.39 (75).

- Almost all LA areas in London had private sector rental rates significantly outperforming HA rental rates – the proportion of the first quartile cohort was 93.8%.
- A similar pattern (but to a lesser extent) was seen in the South East and the East – the aggregate proportions of the first and second quartile cohorts were 73.1% and 64.6% respectively).
- By contrast, the great majority of LA areas in Yorkshire and the Humber had small rate differentials between the two sectors – the proportion of the fourth quartile cohort was 66.7%.

- The aggregate proportions of the third and fourth quartiles appeared large in the East Midlands (85.0%), the West Midlands (70.6%) and the North East (65.2%).

Table A.3.7 Proportion of LA areas in each quartile band of rate differentials by region: 2006/07

	Wide		→	Narrow		
	1st Q	2nd Q	3rd Q	4th Q	Total	
East	35.4	29.2	25.0	10.4	100.0	
East Midlands	2.5	12.5	32.5	52.5	100.0	
London	93.8	0.0	3.1	3.1	100.0	
North East	8.7	26.1	30.4	34.8	100.0	
North West	16.3	32.6	30.2	20.9	100.0	
South East	37.3	35.8	16.4	10.4	100.0	
South West	9.1	27.3	38.6	25.0	100.0	
West Midlands	5.9	23.5	35.3	35.3	100.0	
Yorkshire and the Humber	0.0	23.8	9.5	66.7	100.0	
England	25.0	25.0	25.0	25.0	100.0	

Note and Source: As Table 4.11. Over 25% is in bold.

Tables A.3.8 sets out statistics for the estimated HA and private sector rental rates of return and the rate differentials between the two sectors for urban and rural LA areas across England in 2006/07.

- The medians of the rate differentials were -1.92 percentage points for the urban LA areas and -1.49 points for the rural LA areas.
- Variations of the rate differentials were greater for the urban than for the rural group in terms of both the standard deviation and the range from the minimum value to maximum value. The latest standard deviations were 0.60 for the urban group and 0.42 for the rural group. The ranges were 3.50 and 2.47 for each group.
- In terms of the HA rental rates of return, the medians were 2.87% for urban and 2.50% for rural LA areas.

Table A.3.8 Descriptions of estimated rental rates of return (% or %-point): urban and rural LA areas, 2006/07

	HA			Private			Differential (HA – private)		
	Median	Std. Dev.	Range	Median	Std. Dev.	Range	Median	Std. Dev.	Range
Urban	2.87	0.74	5.56	4.95	0.69	5.05	-1.92	0.60	3.50
Rural	2.50	0.51	2.87	4.14	0.58	4.04	-1.49	0.42	2.47

Note and Source: As Table 5.2.

Tables A.3.9 sets out the same statistics for more detailed categorisation of urban and rural LA areas. There are six categories from the most urban to the least; Major urban; Large urban; Other urban; Rural 26; Rural 50 and Rural 80.

- The largest median of the rate differentials (-2.21 points) was observed in the most urban group, Major urban, while the smallest (-1.37 points) was seen in the most rural group, Rural-80.
- Variations of the rate differentials across LA areas were the widest for Major urban (the standard deviation was 0.68 and the range was 2.90) while second most urbanized group, Large urban, showed the narrowest variations (the standard deviation was 0.33 and the range was 1.51).
- In terms of the HA rental rates of return, Large urban and Other urban equally showed the largest median (3.01 % for each), whereas Rural-80 held the smallest (2.45%).

- Variations were the widest in Other urban – 0.88% for the standard deviation and 4.76 points for the range. By contrast, Rural-80 showed the narrowest variations – 0.40% and 2.11 points.

Table A.3.9 Descriptions of estimated rental rates of return (% or %-point): urban and rural LA areas (six categories), 2006/07

	HA			Private			Differential (HA – private)		
	Median	Std. Dev.	Range	Median	Std. Dev.	Range	Median	Std. Dev.	Range
Major urban	2.58	0.63	2.76	5.04	0.61	4.03	-2.21	0.68	2.90
Large urban	3.01	0.60	2.88	4.81	0.59	2.73	-1.74	0.33	1.51
Other urban	3.01	0.88	4.76	4.96	0.84	5.05	-1.91	0.53	2.65
Rural-26	2.69	0.55	2.64	4.29	0.50	2.72	-1.60	0.43	2.31
Rural-50	2.55	0.58	2.87	4.29	0.56	2.91	-1.63	0.34	1.83
Rural-80	2.45	0.40	2.11	3.85	0.54	3.40	-1.37	0.43	2.30

Note and Source: As Table 5.2.

Tables A.4.10 and A.4.11 set out the number and the proportion of LA areas categorised by quartile bands, of the rate differentials between the HA sector and the private sector and by six urban-rural categories for 2006/07. The first quartile cohort means LA areas with the widest rate differentials, i.e., where the private sector rental rate is higher than the HA rental rate to the greatest extent. The fourth quartile cohort represents LA areas whose HA rental rates were closest to the private sector rental rates.

Table A.3.10 Number of LA areas in each quartile band of rate differentials by urban/rural classification: 2006/07

Classification: 2000/07					
	Wide		→	Narrow	
	1st Q	2nd Q	3rd Q	4th Q	Total
Major urban	42	16	10	7	75
Large urban	9	15	15	6	45
Other urban	22	14	9	10	55
Rural_26	8	15	16	14	53
Rural_50	5	16	19	12	52
Rural_80	2	12	19	39	72
England	88	88	88	88	352

Note and Source: As Table A.4.6.

- The great majority of Major urban and Other LA areas fell either in the first or second quartile cohort – the aggregate proportions of the two cohorts were 77.3% and 65.5% respectively. This means that LA areas in these two categories tend to keep private sector rental rates significantly outperforming HA rental rates.
- Large urban LA areas also had this tendency with lesser extent – the equivalent proportion was 53.3%.
- By contrast, the most rural group, Rural 80, had the majority of their LA areas either in the third or fourth quartile cohort – the sum of the two cohorts' proportions was 80.6%. This implies that the most rural LA areas are likely to have HA rental rates closer to the private sector equivalents than elsewhere.

Table A.3.11 Proportion of LA areas in each quartile band of rate differentials by urban/rural classification (%): 2006/07

	Wide 1st Q	→ 2nd Q	3rd Q	Narrow 4th Q	Total
Major urban	56.0	21.3	13.3	9.3	100.0
Large urban	20.0	33.3	33.3	13.3	100.0
Other urban	40.0	25.5	16.4	18.2	100.0
Rural_26	15.1	28.3	30.2	26.4	100.0
Rural_50	9.6	30.8	36.5	23.1	100.0
Rural_80	2.8	16.7	26.4	54.2	100.0
England	25.0	25.0	25.0	25.0	100.0

Note and Source: As Table 4.12.

Rental rates of return for four metropolitan areas

Table A.3.12 shows differentials in rental rates of return for the four metropolitan areas and England in 2006/07.

- The rate differential for London was -3.10 percentage points, the widest gap among the four cities. It was also far above the national average of -2.19 points.
- The other three cities rate differentials were fairly close to one other and all of them were narrower than the national average – 1.84 for Birmingham, 1.85 for Manchester and 1.73 for Newcastle.
- With respect to the HA rental rates of return, Birmingham (3.31%) and Manchester (3.19%) were above the national average (2.88%). Newcastle was at the national standard level while London (2.36%) underperformed the national average.

Table A.3.12 Rate differentials: four metropolitan areas (% and %-point), 2006/07

	HA	Private	Differential (HA – private)
London	2.36	5.46	-3.10
Birmingham	3.31	5.15	-1.84
Manchester	3.19	5.04	-1.85
Newcastle	2.88	4.62	-1.73
England	2.88	5.07	-2.19

Note and Source: As Table 3.1.

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