Office of the
Deputy Prime Minister
Creating sustainable communities

Monitoring the 2002 Code of practice for commercial leases: Interim report

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EXECUTIVE SUMMARY

THE RESEARCH

The overall aim of this research project is to monitor the operation of the 2002 Code of Practice for Commercial Leases and assess its impact on the commercial leasing market. This will inform future policy decisions about whether to continue relying on voluntary mechanisms or to introduce statutory controls.

The specific objectives of the research are to:

- evaluate changes in commercial property market conditions over the period April 2002 to April 2004;
- measure flexibility in the commercial property leasing market;
- assess the degree of choice in the commercial property leasing market focusing on alternatives to the upwards-only review;
- measure the degree of awareness of property matters among occupiers of commercial property, particularly small business tenants; and
- assess how far the Code had influenced the market over the period of review.

This Interim Report is designed to provide a provisional view of whether lease structures are becoming more flexible, the extent to which tenants are being offered a choice of alternative terms, the degree of awareness of property matters shown by small business tenants, and whether or not the 2002 Code is influencing the market. The lease structure evidence on which this Report relies ends in December 2002, only nine months after the Code first came into operation; other evidence runs to April 2003. The Final Report will expand and update the lease structure analysis so as to give a longer time trend, and therefore provide a more reliable indication of any changes to leases. Its other major aspect will be a set of questionnaire surveys of landlords, tenants, property agents, solicitors and lenders. These will extend and complete the assessment of choice, flexibility, the property awareness of small business tenants and the influence of the Code.

The main tasks undertaken for this Report are as follows.

- The measurement of trends in lease structures through analysis of data to the end of 2002 from two main sources, the Investment Property Databank (IPD) and the Valuation Office Agency (VOA), set against broad economic and property market information to identify different market states in the period since 1998, the end of the monitoring exercise of the 1995 Code of Practice.

- An examination of the process by which lease terms are agreed; this has been addressed by an interview survey of negotiators of leases across England and Wales. This survey has been used to provide a picture of the degree of choice being offered to tenants. It also supplies more detail on changing lease terms and gives an indication of the position of small business tenants and of the influence of the 2002 Code.

- An examination of lease pricing by means of reviews of current market practice and current and possible developments in theory and practice supported by a set of case studies and an analysis of the IPD data to identify any significant rental differences for individual lease terms.

FINDINGS AND CONCLUSIONS

Introduction

Two key objectives of this research are the measurement of choice and flexibility; these concepts are difficult to separate and define. This project treats flexibility as an outcome, ie whether the lease itself provides accommodation on terms that do not constrain the occupier's ability to respond to its changing business circumstances. Choice is being regarded as the process by which that outcome is achieved. The measurement of trends in individual lease terms provides a broad indication of lease flexibility; it does not in itself demonstrate that each tenant has a lease which matches their particular business needs. Evidence that tenants are being offered a choice of lease terms does not necessarily mean that the resulting lease is flexible.

Flexibility in Lease Terms

The introduction of the Code occurred in a difficult period for the commercial lettings market, especially for office and industrial property. Despite this, lease structures in 2002 do not show any significant acceleration in trends from previous years. There is a continuing fall in the average lease length of the better quality property that makes up the IPD databank. The evidence across the whole of the property market from the VOA data is that lease lengths have remained relatively stable over the same period. However, the increasing incidence of break clauses and a reduction in the time to the first break means that the average lease length to first break does show an accelerating downward trend in 2002. The continuing fall in average lease lengths in IPD compared with the lack of a falling trend in VOA data suggests that the difference between prime and secondary markets is diminishing. All markets show little change in the spread of lease lengths, although the IPD does show a shift towards shorter leases.

Some other lease terms have changed over a longer time frame but not specifically since the introduction of the new Code. Breaks have become more readily operable and repairing liabilities, while not shifting from tenant to landlord, are now more likely to be mitigated by schedules of condition in the case of second hand property.

However, there are some lease terms where there is little evidence of recent change. Assignments and sublettings are still subject to absolute conditions; in particular, automatic authorised guarantee agreements remain standard on assignment.

The evidence on rent review indicates no change. The upwards only review is virtually universal and the incidence of alternative review types is still rare. Review patterns remain the same with five-yearly reviews standard in the institutional market while 3-

yearly reviews are still more common in secondary and tertiary property on shorter leases.

Overall, therefore, these broad indicators show a varied picture on flexibility. Over the long term, reducing lease lengths, reducing periods to first break, the easier operation of breaks and schedules of condition combine to give tenants more flexible arrangements. However, movement towards greater flexibility is not occurring in assignment, subletting and rent review.

Where flexibility has increased, this has occurred despite the relatively strong economic and property market environment of the late 1990s and this suggests that the change is structural. Over the short term, any expected acceleration of the trend towards flexibility in the relatively weak market of 2002 is not immediately apparent from the lease data. However, because property markets tend to lag, a further year's data is necessary to identify whether the market downturn will affect lease structures.
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These broad indicators are not able to demonstrate whether or not individual tenants are obtaining lease terms that meet their particular business needs. This question will be addressed through the questionnaire surveys for the Final Report.

Choice

An explicit set of appropriately priced lease terms is not being offered to tenants at the commencement of negotiations; it happens very occasionally but is not usual. A major problem with this approach is pricing. Advances in lease pricing techniques have not yet fed through into practice even though some models are beginning to be applied. Therefore it is unreasonable to expect negotiations to commence in this way in the short term. In any event, "appropriate" pricing may currently be a function of a trade off of terms rather than rent as the research can find no evidence that rents are adjusted for different lease terms. In the longer term, lease-pricing advances should encourage choice and therefore flexibility.

The absence of an explicit set of appropriately priced lease terms does not mean that tenants have no choice. Tenants are aware of their ability to negotiate and appear to be being offered choice when negotiating their leases, although this often has to be sought rather than being positively offered by landlords from the outset. Whilst the explicit offer of a range of alternative lease terms is rare, it appears to be unusual for landlords to be prescriptive about the lease on offer. There are signs that many landlords seek to tailor the initial lease terms offered to the requirements of the tenant although, inevitably this will depend on the demand for the particular premises. There are strong indications that, in the commercial negotiations, landlords are now more adaptable and realistic in their overall approach to the lease terms that can be achieved. However, where choice is being negotiated across various aspects of the lease, there is some evidence that tenants prefer the cheapest option and further investigation of this question will be an important element of the Final Report. In practice, it appears that rent is seen as a price for a building and not for a lease; rents appear to be set at the same time or even before terms are agreed and are rarely renegotiated if lease terms are later changed or added.

There is no evidence that choice is being offered or sought in respect of rent review type. Where a lease is to contain a rent review, it appears to be accepted by both parties that it will be a standard upwards-only review to market rent. Landlords are not offering either the threshold review or any other alternative but there is equally no evidence that that tenants are asking for it or would be prepared to pay rent or any other payment for the relaxation of this term. Upwards only rent reviews are said not to be a major issue for tenants but further explanations for the apparent inertia on rent reviews will form an important element of next year's landlord and tenant surveys. These surveys will also expand our knowledge of whether the choice available to tenants is appropriate for their particular business requirements.

Small Business Tenants

The initial indications, based on the perceptions of agents, are that the position of small business tenants has not changed since 1998. Their apparent unwillingness to take commercial property advice, often combined with a lack of property awareness, means they are frequently ill-equipped to negotiate the best available lease. Legal advice is usually taken but it can often be difficult for solicitors to rescue a poor commercial agreement. Furthermore, the new Code is not assisting small business tenants in their negotiations because the evidence suggests that they are completely unaware of its existence.

Despite the view that small un-represented business tenants do not get the best terms, it is clear from the lease data that they occupy commercial premises in the secondary and tertiary market on different terms from the corporate occupier in the prime market. In addition, there is some evidence that, in the tertiary market, some landlords' agents, especially where they are the managing agent, seek to ensure that the lease matches the tenant's business requirements.

A questionnaire survey will specifically address issues relating to small business tenants and provide a more detailed picture for the Final Report.

The Impact of the Code of Practice

The Code has had a greater impact than its predecessor to the extent that its dissemination has been more effective. However, at this stage knowledge of the Code appears to be limited to property professionals and large landlords and tenants; awareness of the Code outside of this group seems to be very limited. Even where the Code is known about, it is felt that the Code is having very little direct impact on lease negotiations a year after its introduction.

The present Code, unlike its predecessor, contains a number of quite specific recommendations on lease terms. Some implementation of these in the first year of its operation would be an indication that the Code is influencing the market. The evidence so far is that these recommendations are not finding their way into the market place.

Chapter One - The Research Project

1.1 Introduction

This research project, which will deliver its Final Report in December 2004, is to assess the impact of the new Code of Practice for Commercial Property Leases. It is designed, along with evidence from other sources, to inform Government decisions on the need for any further regulation of the commercial leasing market. This research will, in particular evaluate changes in the commercial property market, provide evidence of the level of flexibility in commercial property leasing, measure the choice of lease terms offered to business occupiers and assess the awareness of property matters among tenants operating small businesses. This will entail a detailed investigation of leasing practices in the main commercial property sectors of office, retail and industrial set in the context of market conditions over the monitoring period. The research will monitor leasing across the whole of the property market including prime, secondary and tertiary property let to both large organisations and small and medium sized enterprises. This Interim Report gives a preliminary view of whether the market is providing more choice and flexibility.

1.2 The Code of Practice

The second edition of the Code of Practice for Commercial Leases in England and Wales was launched in April 2002. It is a very different document from its predecessor. No explicit aims and objectives are set out within the new Code, rather it comprises reasonably specific recommendations concerning both the negotiation of new business leases and the conduct of the parties during the lifetime of such leases. This research is concerned only with the impact of the Code on new leases.

The Code sets out ten recommendations in respect of new business leases. The first three encourage parties to negotiate openly and constructively, to avail themselves of professional advice and to be open about the financial costs of occupation and their respective financial standing.

The other seven recommendations relate to specific aspects of a commercial lease with varying degrees of specificity. Landlords are exhorted to offer tenants a choice of lease duration, including break clauses where appropriate, and with or without the protection of Part II of the 1954 Act. Tenants are reminded that the level of rent will depend not only on the state of the property market and the location, type, age, size, character and condition of the premises, but also on the terms on which the lease is to be granted. The Code acknowledges that where alternative lease terms are offered, different rents should be appropriately priced for each set of terms. While it recognises that rent reviews are normally based on open market rent, landlords are encouraged to offer, on a risk adjusted basis, alternatives to upwards only reviews; threshold reviews and annual indexation are specifically noted as possible options. It is recommended that tenants' repairing obligations should be appropriate to the length of term and the condition and age of the property and landlords are asked to consider appropriately priced alternatives to full repairing terms. The Code encourages landlords to ensure that the terms of insurance policies are competitive and to give tenants of an entire building the opportunity to influence the choice of insurer. Where

a building is rendered incapable of occupation by an uninsured risk, the tenant should be allowed to terminate the lease, save where the landlord rebuilds at his own cost. Assignments of the whole should normally be controlled only by a requirement for the landlord's prior consent which is not to be unreasonably withheld. Landlords are urged to require Authorised Guarantee Agreements only where the assignee is of lower financial standing than the assignor at the date of assignment. Finally, the Code recommends that landlords should not be more restrictive over alterations and changes of use than is necessary and that the tenant should not be required to reinstate unless this is reasonably required.

1.3 Research Aims and Objectives

The new Code was produced at the request of the (then) Department for Transport, Local Government and the Regions and the Government has made it clear that it wants the Code "to provide a more flexible commercial property market". In launching the Code, the (then) Regeneration Minister said that the Government wanted " a property market that offers certainty to investors, more choice to occupiers and which, particularly at the small business end, is better informed. This Code will help deliver real change" (DTLR, 2002). She also remarked that she would be "very disappointed if after all we had to resort to legislation."

This research project is designed to enable the ODPM to assess whether the Code has had the desired impact; this assessment will inform future policy decisions about whether to continue relying on voluntary mechanisms or to introduce statutory controls.

The specific objectives of the research are to:

- evaluate changes in commercial property market conditions over the period April 2002 to April 2004;
- measure flexibility in the commercial property leasing market;
- assess the degree of choice in the commercial property leasing market focusing on alternatives to the upwards-only review;
- measure the degree of awareness of property matters among occupiers of commercial property, particularly small business tenants; and
- assess how far the Code had influenced the market over the period of review.

It is not part of this research brief to evaluate findings on the dissemination and impact of the Code that are being produced by various interested parties such as those represented on the Commercial Leases Working Group who developed the Code. Such material will be submitted to and, no doubt, be considered by the Office of the Deputy Prime Minister as part of its overall assessment of how well the Code is operating

1.3.1 Definitions: Flexibility and Choice

It is clear from the objectives of the research that a key requirement of Government is that there should be greater flexibility and choice in the commercial leasing market. However, the terms "flexibility" and "choice" are widely used and rarely defined; it is notable that, in the many press and journal articles concerning the Code, their

meaning is not addressed. Flexibility and choice can be used to mean much the same thing: a landlord might legitimately describe itself as being "flexible" simply because it offers a tenant a "choice" of lease terms. Equally, the expressions can mean something very different. A tenant may be offered a "choice" of lease terms without the resulting lease necessarily being "flexible"; it can be given a "flexible" lease without being given any alternatives from which to choose; it can be offered "choice" without any of the options necessarily providing what it wants. It should also be noted that data may demonstrate that there are, for example, more short leases with more tenants' breaks without this necessarily meaning that any of the tenants of these leases are holding the lease of their choice.

Despite these definitional problems, this research, while recognising that flexibility is closely linked with tenant choice, is treating flexibility as an outcome, ie the lease that emerges from the negotiating process. It is regarding a "flexible" lease as one that provides accommodation on terms that do not constrain the occupier's ability to respond to its changing business circumstances. This definition accords with the Government's objectives as expressed by the Minister launching the Code of Practice in April 2002

Tenants may already be being given leases that match this criterion. However, a recent survey carried out by the research team prior to the present project suggested that tenants did require different lease terms to those generally available to them (Crosby, *et al*, 2003). International corporate tenants were especially frustrated with UK leases as they encounter shorter leases, with fewer tenant liabilities, in virtually every other country. More specifically this research found an unsatisfied tenant demand for more flexible leases, in particular shorter lease lengths, more break clauses, and more leeway on assignments; other lease provisions, including upwards only rent reviews, were of less concern[1]. An explanation for this is that lease length, assignment and break clauses are all key to a tenant's entry/exit strategies and a tenant who can relatively quickly bring its lease to an end is inevitably less bothered about the detail of the lease liabilities. Landlord and tenant surveys for the Final Report will address the question of whether the lease constrains tenants. For the Interim Report, measures and trends in individual lease terms are examined.

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Choice, on the other hand, is being treated as part of the lease negotiation process. The research examines the way in which leases are agreed in order to assess whether or not tenants are fully aware that lease terms are negotiable, whether or not they are being offered a choice on lease terms, whether there is appropriate pricing attached to that choice and whether or not the degree of choice is greater than in the past.

1.4 Research Methodology

The approach to this research has four main strands.

First, an analysis of lease data from two main sources, the Investment Property Databank and the Valuation Office Agency set against broad economic and property market information to identify different market states.

[1] However, retail tenants were significantly more concerned about the upwards-only review than tenants of other property types

Second, an interview survey of negotiators of leases across England and Wales.

Third, a set of questionnaire surveys of landlords, tenants, property agents, solicitors and lenders.

Fourth, a full review of lease pricing, to include an examination of current market practice, developments in theory and practice, case studies and an analysis of the IPD data.

The specific research objectives are addressed using these four research methods, as explained below.

(a) The evaluation of changes in commercial property market conditions over the period April 2002 to April 2004.

Previous research (DETR, 2000) identified weak market conditions as the primary driver of changes in lease structure during the first half of the 1990s. It also identified a range of economic indicators with a demonstrable impact on property rental values and market activity. These included the output of demand-side economic sectors, levels of employment/unemployment and business starts/failures. These indicators were set alongside property market measures such as rental value growth. This Interim Report extends this data from the end of 1998 to April 2003 to create a picture of economic and property market performance leading up to and during the first year of the operation of the 2002 Code. The Final Report will extend these indicators for a further year to April 2004.

Not all sources provide data to the end of the desired monitoring periods - April 2003 for the Interim Report and April 2004 for the Final Report. Some economic and property market data can be accessed within a month but for the property market, larger samples take longer and the major source of property market data in the UK, the Investment Property Databank, produces an annual digest to the year end around four months after the year end. Economic data such as VAT registrations/de-registrations, an indicator of business starts and failures, is also annual data which appears approximately mid-year. Accordingly, by the date of the Final Report (December 2004) it will be possible to analyse annual date up to year end 2003, ie covering the first 21 months of the operation of the Code. A reduced set of economic indicators from the smaller sample monthly and quarterly data can be used to extend general trends to April 2004. The same process has been utilised for this report to extend the market trends to April 2003.

To complete the framework within which commercial leasing operates, the research reviews the institutional and legal framework. The previous research identified a number of constraints on the operation of the market, including lending policies, accounting regimes, appraisal techniques and changes to the legal framework, which influence either landlords, tenants or both when negotiating leases. Lenders will be surveyed for their attitudes to leases for the Final Report.

(b) The measurement of flexibility in the commercial property leasing market

As already discussed, flexibility is being treated as an outcome – that is the ready availability in the market of leases that provide accommodation on terms that do not constrain the occupier's ability to respond to its changing business circumstances. Lease flexibility involves two aspects: the general availability in the market of different forms of lease, and the ability of each individual tenant to obtain a lease that meets its particular requirements. The measuring of flexibility therefore needs to identify the trends in both of these areas.

Trends in individually measurable, broad items of the lease such as length, breaks, reviews, etc, provide indicators of whether leases are changing and this information, put into the context of property market conditions, provides a basis for determining whether any trends are likely to continue. In the previous research monitoring the first Code of Practice (DETR, 2000), lease structure change and market indicators were produced for the whole of the property market cycle of late 1980s boom, early 1990s recession and later 1990s recovery. This information provides a base which has been updated from 1998 (the end date for the DETR, 2000 monitoring data) using lease structure data from both Investment Property Databank and the Valuation Office Agency.

The leasing records collected by IPD are the most comprehensive and detailed source of information on the occupancy of property owned by the major property companies and financial institutions and occupied by major tenants. They enable detailed analysis of lease term, break structure, review pattern and type and incentives and this data can be disaggregated across many different sub-markets. The research is a joint venture between the University of Reading and Investment Property Databank and this has enabled the most comprehensive data filtering exercise ever carried out on the IPD lease structure data. This has led to a number of improvements in the analysis, including using a cross sectional approach and identifying some issues with rent weighting not identified before this exercise. A total of 32,752 leases were analysed between 1997 and 2002. Chapter Three details the IPD data issues addressed during this research.

The leasing records of the Valuation Office Agency cover the whole of the property market but are collected through various means including the Form of Return filled in by occupiers. The number of individual lease terms which can be analysed is less than for the IPD and the validity of the data not verifiable except by cross-referencing individual records. A cluster approach was used for the analysis whereby a Metropolitan District or City, an Industrial Town and an Urban/Rural Town from each of the Standard Government Regions of England and Wales was chosen and every transaction in that town or district was collated. This led to a total of 50,991 leases signed between 1998 and the early part of 2003 being used in the analysis. Chapter Four details the VOA data issues addressed for this research.

However, the broad terms of leases, as recorded in the above datasets, do not tell the whole story on the leases that are generally available in the market. The key to real flexibility can lie in the detail of lease terms. For example, the real nature of an upwards only market rent review can be hidden - a threshold form of review can easily be logged simply as an upwards only review; the mere presence of a break

clause can be misleading if, in fact, the clause is drafted so as to be virtually inoperable; a lease can appear to be assignable but the conditions attached to the right to assign can make assignment very difficult. It is therefore important to extract as much information as possible on the detail of the main terms of commercial leases in order to fill out the picture obtained from the statistical data. Furthermore, it is necessary to ascertain the extent to which flexibility is constrained by factors outside the control of the actual parties to a lease. These matters are being addressed by both the interview survey and the questionnaire surveys. The results of the interview survey are available for this Interim Report and are discussed in Chapter Five. The questionnaire surveys are not to be carried out until 2004 and their findings will be contained in the Final Report.

The question of whether the business needs of individual tenants are being met by the leases which they actually hold can only be answered by primarily considering the views of tenants (although these must be balanced by those of landlords). No work on this issue has been done at this stage; it is to be addressed by the questionnaire surveys; the results of these will be ready for the Final Report.

(c) The measurement of the degree of choice in the commercial property leasing

The Government has made no secret of its particular concern over upwards only rent reviews and of its wish to see tenants being offered a choice of alternative forms of review. However, the holistic nature of leases cannot be over-emphasised. A lease is a whole package and while landlords and tenants often negotiate on a range of individual lease terms, they may end up by trading off one lease term requirement against another. The Code itself, in Recommendations Four (lease length, breaks and security of tenure), Five (different rents for alternative lease terms generally) and Seven (repairs and services) suggests that choice should be offered in areas other than the proposals on rent review covered by Recommendation Six. Choice is therefore being monitored over a range of lease terms (particularly those demonstrated by Crosby *et al* (2003) to be of particular importance to tenants) rather than just upwards only reviews. The examination of choice has therefore addressed the whole range of the negotiation process.

Overall, the monitoring of choice is more complex than the monitoring of flexibility as one relates to an outcome while the other relates to the process by which the outcome was achieved. Accordingly, unlike the broad aspects of lease flexibility, choice cannot be measured through the lease structure data. Furthermore the process – negotiation - is an infinitely variable one of which no objective, readily available, record is kept.

Choice is therefore being monitored in two ways; first by means of the interview survey, and second through the questionnaire survey of landlords, tenants and professional property advisers. The completed interview survey comprises a set of 46 research interviews and has been carried out in order to identify the elements of the negotiation process. The approach to the survey such as the destinations, sampling frame and recording and analysis are set out in Chapter Five.

There is a further aspect of choice that requires investigation. The Code recognises that tenant choice can only be offered at an appropriate price. It is clearly going to be

important when measuring the degree of choice offered to tenants to try to ascertain whether or not alternative lease terms are being appropriately priced. The research examines the approaches being adopted by valuers to the pricing of lease terms, how this is being fed into the market place, and how tenants are reacting to offers of choice. Since the monitoring of the last code took place, the industry has been debating lease structures and lease pricing in a number of seminars and at least one company has developed a lease pricing model (OPRent from Oxford Property Consultants). This model is to be used to develop a set of simple case study solutions.

Regardless of whether the industry has the models available to price lease terms and is or is not using them, differential pricing may be being delivered through the market. In order to investigate whether any differential pricing of different lease terms is identifiable an analysis of three IPD Property Analysis System segments has been undertaken for this report using regression techniques to try and identify whether there are any significant differences in the rent on account of a variety of lease terms and incentives. However, the identification of value differentials is likely to be difficult due to the heterogeneous nature of individual properties and their location; this is shown by the fact that other property market transaction analyses have failed to find any differential pricing.

A full discussion of the current state of the investigation of pricing issues is to be found in Chapter Six.

(d) The assessment of the degree of awareness of property matters among occupiers of commercial property, particularly small business tenants

A major aim set for the Code is to increase awareness of property issues, especially among small business tenants. If the new Code is to result in more efficient economic outcomes, tenants need to be aware of the stipulations of the Code, the alternative contractual terms on offer and, ideally, the business implications of differing terms. This element of the research is a direct result of the findings in DETR (2000) that small business tenants were less aware of the implications of leases, that many were un-represented in lease negotiations and that therefore the Code of Practice was not a major influence on tenants' attitudes in general and on those of the un-represented small business tenants in particular.

The approach to this issue is twofold. First some information on awareness of tenants has been found from the interview survey carried out for this Interim Report. In addition, a specific survey of small business tenants will be carried out for the Final Report in addition to the main survey of tenants which will cover a full sample of all tenants.

(e) The assessment of the Code's influence in the market over the period of review

The first Code of Practice was no more than a source of information on commercial leases. The new Code is a far more robust document, with 10 positive recommendations covering the negotiation of new leases. Assessing the extent to which these have permeated the market is necessarily a more complex exercise than was necessary in the previous research.

The research team have monitored professional press coverage of the Code and both the interview survey and the questionnaire survey work for the Final Report will provide information on the dissemination of the Code and its perceived impact. The extent to which its recommendations have filtered into lease negotiations is also an indicator of impact.

1.5 The Research Reports

The research team is required to produce two reports, the present Interim Report, and a Final Report due on 31 December 2004. The Final Report will

- Provide an updated legal and market background to April 2004.
- Provide a more detailed analysis of the prime, secondary and tertiary market in leases to the end of 2003 including length, breaks, assignment, inducements to let, review types and length, and repairs. The original aim of including data to April 2004 is likely to prove difficult; it has been found that the additional data from both VOA and IPD from the year end 2002 to the April 2003 has either proved too small a sample or unrepresentative, and a similar problem is expected for the period from the end of 2003 to April 2004. .
- Provide an analysis of the perceptions of landlords/tenants/solicitors/surveyors and lenders in order to provide a proper picture of flexibility, choice, small business tenants' awareness of the implications of leases, and the impact of the Code.

This Interim Report aims to provide a provisional view of whether the market is providing more choice and flexibility and of whether the Code is yet having an influence in the market. It should be stressed that this is only an interim report; its findings are necessarily preliminary since the work to date is limited in a number of important respects..

Only some aspects of lease flexibility have been examined. The broad trends in lease structures has been established. However, reliable lease data is only available up to the end of 2002; given that many leases will already have been in the pipeline when the Code was launched, this may therefore cover little more than six months of the genuine operation of the Code. The Final Report will be able to analyse a longer dataset adding a full year to the monitoring period of the Code. Some information on detailed lease terms, and on the presence of external influences, has been obtained from the interview survey; however, this needs to be filled out by the questionnaire surveys to be carried out next year. Finally, answering the important question of

whether tenants are getting leases that meet their business requirements will also have to await the outcome of the questionnaire surveys.

The material gathered on choice needs to be expanded. The interview survey only covers the views of professional property advisers – property agents and solicitors. The attitudes of landlords and tenants themselves have not yet been assessed; nor has their view of the influence of the Code been examined. In addition, it has not yet been possible to examine the position of un-represented business tenants from their own perspective. These gaps will be filled by the full questionnaire surveys to be carried out next year.

The Interim Report is arranged as follows:

Chapter 2 provides an overview of the economic drivers behind the property lettings market, a range of property performance indicators and the institutional background to the landlord and tenant relationship.

Chapter 3 comprises an analysis of the IPD lease structures data covering the period 1998 to the end of 2002.

Chapter 4 an analysis of the VOA lease structures data covering the period 1998 to the end of 2002.

Chapter 5 reports the results of the interview survey of property agents and solicitors carried out in April and May 2003.

Chapter 6 discusses the theory and practice of lease pricing and carries out an empirical analysis of. Rent differentials in the Investment Property Databank.

Chapter 7 reiterates the aims and objectives of the research and restates the findings of each chapter. Interim conclusions are then drawn for each of the main objectives of the research.

Chapter 2 - Market and Institutional Background

2.1 Introduction

The objective of this chapter is to identify and evaluate the market and institutional framework underpinning the operation of the commercial property leasing market in the period running up to the introduction of the Code and during the first year of its operation. It identifies a number of influences on lease structures that form the basis of research questions for both this Interim Report and the Final Report. It also provides a context for the interpretation of lease structure data collected and analysed for this report.

The previous Government review of the first Code of Practice (DETR, 2000) is used as a benchmark both in terms of time frame and content of this review. That report provides data on commercial leasing including the economic framework up to the end of 1998 and the datasets used in that research are extended to the present. A number of these datasets provide information to the year-end 2002, nine months after the introduction of the Code. Where possible they have been supplemented with other data to complete the trends to April 2003.

2.2 General Economic Background

2.2.1 Key Leading Indicators

Ball *et al* (1998) provide a detailed review of the economic context in which commercial property markets operate. They discuss a range of modelling work (for example Guissini *et al*, 1993; Gardiner and Henneberry, 1991 and Key *et al*, 1994) that includes discussion of both the demand and supply side factors which may influence the level of rents. They also discuss differences between long and short term cycles in general economic and property markets. Key *et al* (1994) found that the occupier market most closely follows the general economy than other segments of the property market (investment and development). As in other financial markets there is a constant search for indicators which lead the market as they are the main drivers of forecasting models and the property occupation and investment markets are no different to any other in this respect. Matysiak and Tsolacos (2003) identify a number of studies which have sought to isolate the key leading indicators which affect very short term rent variation over time and they list the outcomes as sector specific. In offices they cite GDP, output and employment in financial and business services, unemployment, interest rates and operating expenses as these key variables. In retail, they list consumers' expenditure, retail sales volume and GDP as the most closely related demand side variables and in industrial they list just GDP and manufacturing output. Key *et al* (1994) indicate that consumer's expenditure is the leading demand side exogenous variable for the retail sector, GDP for offices and manufacturing output and GDP for industrials. Ball *et al* (1998) suggest interest rates and office employment for the office sector.

Forecasts of property rents are normally undertaken in real terms and then the forecast of inflation is added in order to finish with the nominal level of rental value change, so inflation is also an important economic variable in this context.

Table 2.1 and Figure 2.1 set out the performance of the key indicators mentioned above as drivers of office, retail and industrial occupational markets since 1985. They illustrate that in all three sectors the first Code of Practice was introduced in an improving market and growth rates in many of the key indicators generally increased in the years of 1996, 1997 and 1998, the period of monitoring. However, the economy has weakened since then with 2002, the year of the introduction of the second code, being especially weak. In the office market, growth in the GDP of the financial and business sector peaked at 7.2% in 1998 before falling back to around 4% pa during the next three years. In 2002, it halved to below 2%. Overall GDP was 2% in 2000, 3% in 2001 and 2% in 2002. In the retail sector, retail sales volume has continued to hold up with 6% growth in 2001 and 5% in 2002. Consumers' expenditure peaked at over 5% growth in 2000 before falling back to 4.1% in 2001 and 3.7% in 2002. However, in the industrial market, manufacturing output has fallen in the last two years, by 2.5% in 2001 and by 4% in 2002. Although weak in the last part of the 1990s, it exhibited positive growth every year from 1993 to 2000.

In the first quarter of 2003, unemployment claimant count numbers increased for the first time since 1993; GDP, although positive, exhibited an annual equivalent growth rate of only 0.3%, employment in finance and business fell by an annual equivalent of 1.4%, seasonally adjusted consumers' expenditure growth was only 0.8% and retail sales volume fell by an annual equivalent rate of 0.9%. However, manufacturing output rose marginally by 0.4%. The key economic drivers for offices and retail have weakened considerably in the first quarter of 2003 and industrial drivers are also weak, although improved relative to 2001 and 2002.

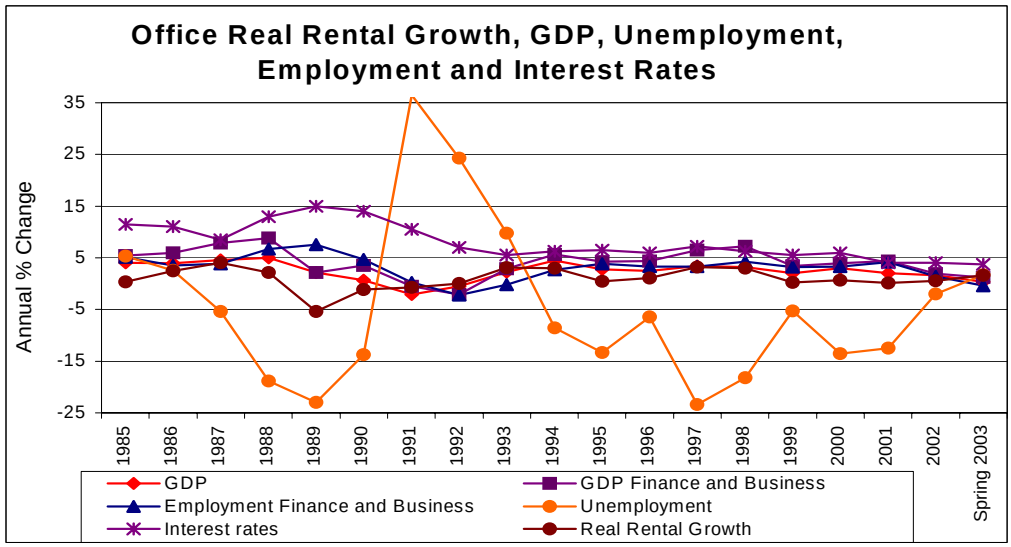
Consumer credit has continued to increase despite the slow down in the economy and Figure 2.2 illustrates that total unsecured lending and credit card lending has continued to increase from around £16 billion and £9 billion in June 1993 to over £50 billion and £32 billion respectively by June 2003. Credit card debt rose from around £22 billion to £32 billion between March 2000 and March 2003. This may have helped shield the retail sector from the economic downturn, although retail sales have not increased at the same level as consumer credit.

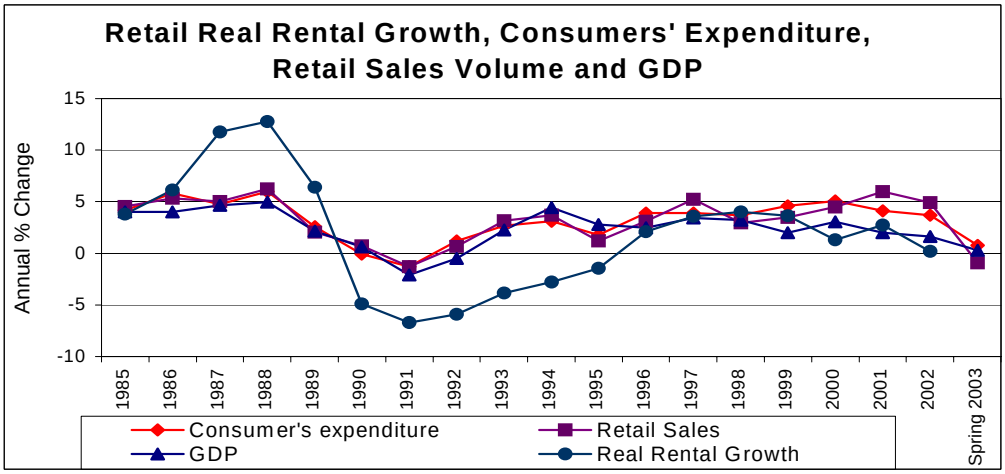
This may suggest that, during 2002, retail lettings markets should have exhibited greater strength than either office or industrial. Real rental growth during 2002 was negative for industrial properties but was 0.2% for retail. However, it was marginally higher for offices at 0.5%. Offices had exhibited very low (less than 1%) real growth in both 2000 and 2001 as well as 2002 while retail rents rose by an average 2% pa over those 2 years. One of the major research objectives is to identify whether lease structure change is tied to market change. The RICS Quarterly Commercial Market Survey (RICS, 2003) reports increases in the use of incentives and decreasing lease lengths since around the middle of 2001, especially in industrial and office markets and the lease structure data in Chapters 3, 4 can be used to identify whether this is indeed the case.

Table 2.1 : Percentage Change in Key Economic Indicators for the Occupational Property Market

	OFFICES						RETAIL				INDUSTRIAL		
	GDP	GDP Finance and Business	Employment Finance and Business	Unemployment	Interest rates (%)	Real Rental Growth	Consumers' expenditure	Retail Sales	GDP	Real Rental Growth	Manufacturing Output	GDP	Real Rental Growth
1985	4.0	5.4	5.1	5.3	11.50	0.3	4.2	4.5	4.0	3.8	2.8	4.0	-3.1
1986	4.0	5.9	3.5	2.6	11.00	2.5	5.8	5.3	4.0	6.2	1.3	4.0	0.6
1987	4.6	7.9	3.8	-5.4	8.50	4.0	4.8	5.0	4.6	11.8	4.7	4.6	8.0
1988	5.0	8.8	6.6	-18.8	13.00	2.1	6.0	6.2	5.0	12.8	7.0	5.0	15.7
1989	2.2	2.1	7.5	-22.9	15.00	-5.4	2.6	2.1	2.2	6.4	4.5	2.2	14.1
1990	0.6	3.5	4.7	-13.8	14.00	-1.2	-0.1	0.7	0.6	-4.9	-0.2	0.6	-2.5
1991	-2.1	-0.5	0.3	36.5	10.50	-0.8	-1.3	-1.3	-2.1	-6.7	-5.0	-2.1	-6.4
1992	-0.5	-2.1	-2.2	24.3	7.00	0.1	1.2	0.7	-0.5	-5.9	-0.1	-0.5	-11.5
1993	2.3	2.9	-0.2	9.8	5.50	3.1	2.7	3.1	2.3	-3.8	1.5	2.3	-10.8
1994	4.4	5.7	2.7	-8.5	6.25	3.0	3.1	3.7	4.4	-2.8	4.7	4.4	-6.0
1995	2.8	4.2	3.8	-13.3	6.50	0.5	1.8	1.2	2.8	-1.5	1.5	2.8	-4.6
1996	2.5	4.4	3.3	-6.4	6.00	1.1	3.9	3.1	2.5	2.1	0.4	2.5	-1.3
1997	3.4	6.5	3.3	-23.4	7.25	3.2	3.9	5.2	3.4	3.6	1.6	3.4	1.4
1998	3.2	7.2	4.2	-18.2	6.25	3.0	3.7	2.9	3.2	4.0	0.8	3.2	2.1
1999	2.0	3.4	3.2	-5.2	5.50	0.2	4.6	3.5	2.0	3.6	0.3	2.0	2.6
2000	3.0	3.9	3.3	-13.6	6.00	0.7	5.1	4.5	3.0	1.3	2.0	3.0	1.7
2001	2.0	4.3	4.2	-12.5	4.00	0.1	4.1	6.0	2.0	2.7	-2.4	2.0	2.4
2002	1.6	1.9	1.4	-2.0	4.00	0.5	3.7	4.9	1.6	0.2	-4.0	1.6	-1.9
Spring 2003	0.3	1.2	-0.4	-1.4	3.75		0.8	-0.9	0.3		0.4	0.3	

Sources : Office of National Statistics, Small Business Service of the Department of Trade and Industry, Investment Property Databank.





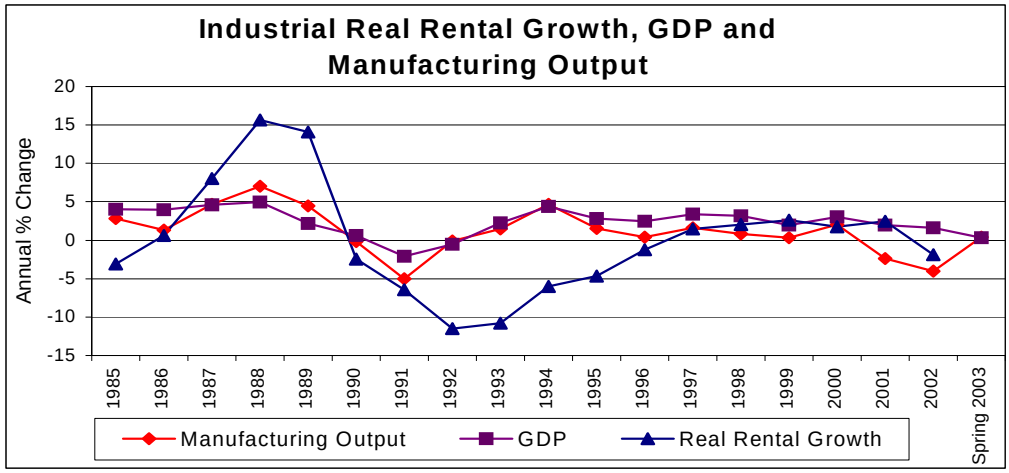


Figure 2.1 : % Change in Key Economic Indicators and Real Rental Growth Offices, Retail and Industrial 1985 to Spring 2003

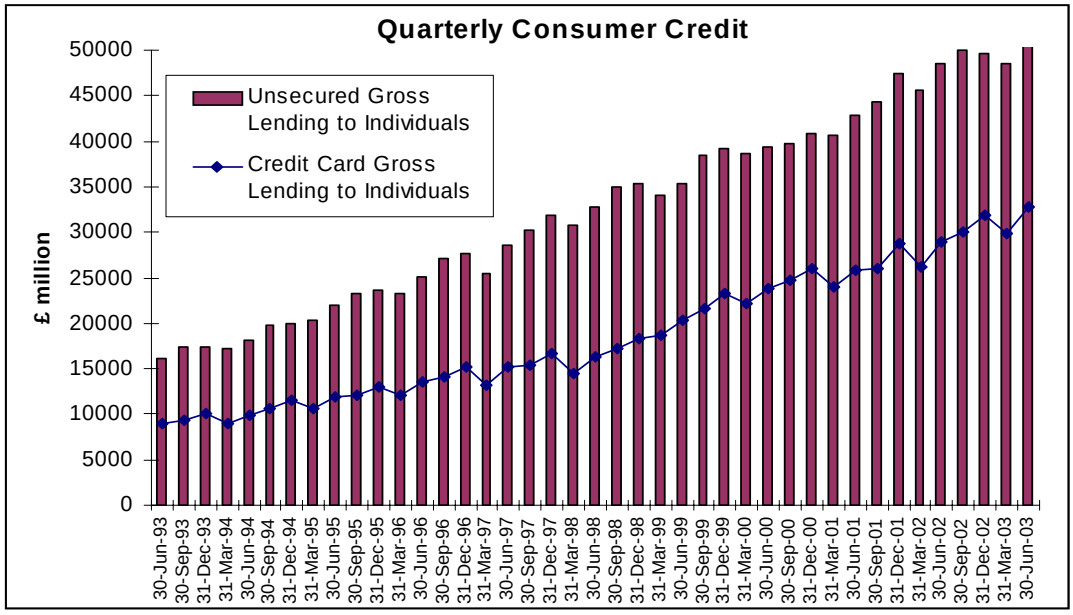


Figure 2.2 : Total Quarterly Unsecured Lending and Credit Card Debt 1993 to 2003.
Source : ONS

2.2.2 Business Start-Ups and Failures

In addition to the key economic indicators discussed above, DETR (2000) tracked the number of company bankruptcies and VAT registrations and de-registrations to add information on the strength of the lettings market for commercial property space.

Table 2.2 sets out the bankruptcy numbers from 1985 onwards and Figure 2. 3 illustrates that, having fallen during 1996 and 1997, they started to increase again during 1998 and have continued do so since then. In 1999, the total rose by 14% but in all other years it has been very gradual until 2002 when the total increased by nearly 5%.

Table 2.2 : Company and Individual Bankruptcies 1985 to 2002

	Companies	Individuals	Total
1985	14,898	6,778	21,676
1986	14,405	7,155	21,560
1987	11,439	7,427	18,866
1988	9,427	8,507	17,934
1989	10,456	9,365	19,821
1990	15,051	13,987	29,038
1991	21,827	25,460	47,287
1992	24,425	36,794	61,219
1993	20,708	36,703	57,411
1994	16,728	30,739	47,467
1995	14,536	26,319	40,855
1996	13,461	26,271	39,732
1997	12,610	24,441	37,051
1998	13,203	24,549	37,752
1999	14,280	28,806	43,086
2000	14,317	29,528	43,845
2001	14,972	29,775	44,747
2002	16,305	30,587	46,892

Source : ONS

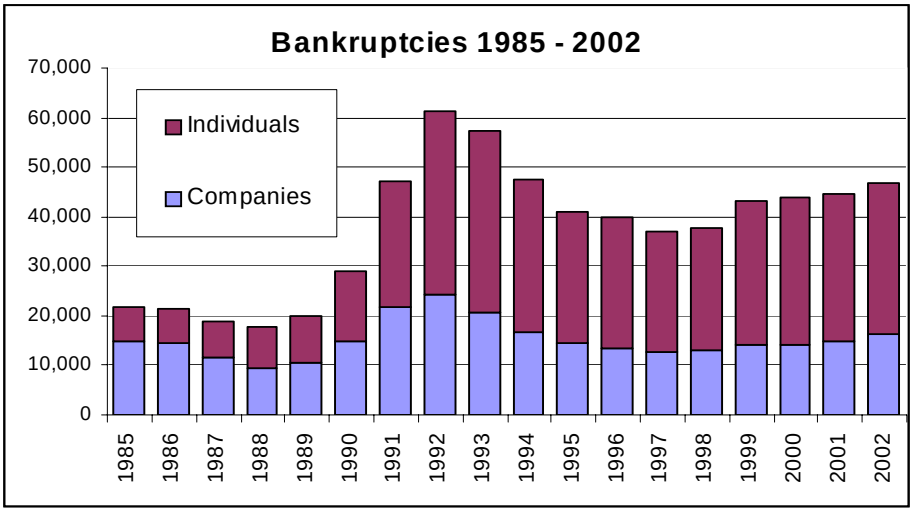


Figure 2.3 : Company and Individual Bankruptcies 1985 to 2002

Table 2.3 breaks down the insolvencies by sector and in the service sector they increased from 2,415 company bankruptcies in 1995 to 3,990 in 2002, which nearly accounts for the whole of the increase in bankruptcies between these two dates. In 2002, most sectors of the economy experienced more bankruptcies than in 2001 but the percentage increase in the service sector was 83%, compared to 4% in manufacturing and 18% in wholesaling and retailing. This is evidence to suggest that

office letting markets should be weaker than retail and industrial in the first year of the Code.

Table 2.3 : Company Insolvencies England and Wales 1995 – 2002 by Industry Sector

INDUSTRY	1995	1996	1997	1998	1999	2000	2001	2002
AGRICULTURE AND HORTICULTURE	*99*	*89*	*51*	*65*	*75*	*67*	*90*	*76*
MANUFACTURING								
Food, drink and tobacco	130	163	93	89	67	104	71	61
Chemicals	69	65	31	57	35	61	37	46
Metals and engineering	681	658	591	594	698	683	704	739
Textiles and clothing	567	568	596	526	419	423	320	304
Timber and furniture	267	249	181	149	190	187	199	179
Paper, printing and publishing	452	438	364	426	387	386	484	545
Other	681	599	613	652	780	678	717	768
TOTAL	*2,847*	*2,740*	*2,469*	*2,493*	*2,576*	*2,522*	*2,532*	*2,642*
CONSTRUCTION AND TRANSPORT								
Construction	1,844	1,610	1,419	1,325	1,529	1,474	1,509	1,840
Transport and Communication	706	682	540	504	443	526	481	652
TOTAL	*2,550*	*2,292*	*1,959*	*1,829*	*1,972*	*2,000*	*1,990*	*2,492*
WHOLESALING								
Food, drink and tobacco	205	183	158	139	187	150	125	142
Motor vehicles	83	95	41	60	38	29	24	64
Other	678	429	340	364	394	391	363	512
TOTAL	*966*	*707*	*539*	*563*	*619*	*570*	*512*	*718*
RETAILING								
Food, drink and tobacco	246	236	219	186	193	200	114	132
Motor vehicles and filling stations	195	227	132	120	142	141	172	174
Other	1,127	956	891	847	919	853	833	902
TOTAL	*1,568*	*1,419*	*1,242*	*1,153*	*1,254*	*1,194*	*1,119*	*1,208*
SERVICES								
Insurance	198	222	111	101	118	57	28	35
Other financial & business services	1,525	1,500	1,528	1,617	1,831	1,605	1,618	3,215
Hotels and Catering	692	708	609	626	562	530	538	740
TOTAL	*2,415*	*2,430*	*2,248*	*2,344*	*2,511*	*2,192*	*2,184*	*3,990*
OTHERS	*4,091*	*3,784*	*4,102*	*4,756*	*5,273*	*5,772*	*6,545*	*5,179*
TOTAL	***14,536***	***13,461***	***12,610***	***13,203***	***14,280***	***14,317***	***14,972***	***16,305***

Source : ONS

The fall in the number of companies and potential tenants could be offset by new business start-ups. One indication of this is the number of new VAT registrations, set against the number of de-registrations each year (Table 2.4). In view of the

exemption to pay VAT until the business has sufficient turnover (from April 25th 2002 this was £55,000), these do not pick up the total number of new businesses and closures but they do pick up the businesses either growing or contracting above and below the exemption turnover limit. Unfortunately the 2002 figures are not yet available and any downturn expected in 2002 is not recorded. Over the period of the monitoring of the previous code in 1996 to 1998, the net change peaked at over 30,000 new registrations over de-registrations. This has since fallen in 1999 and 2000 to around 7,000 each year but in 2001 the net change increased again with nearly 13,000 more registrations than de-registrations.

Table 2.4 : VAT Registrations and De-registrations 1994-2001

Year	Registrations	De-registrations	Net Change	Registered Business Stock at start of year
1994	168,440	188,050	-19,615	1,628,870
1995	164,270	173,145	-8,875	1,609,255
1996	168,720	164,975	3,750	1,600,380
1997	183,665	164,390	19,275	1,604,130
1998	187,520	155,900	31,625	1,623,405
1999	179,155	171,915	7,240	1,655,030
2000	183,650	176,950	6,695	1,662,270
2001	175,430	162,675	12,800	1,668,965
2002				1,681,765

Source : ONS
Note : Change in VAT rules in 1993 makes a longer time series misleading.

But the Small Business Service of the DTI estimates that at the start of 2001 there were in fact around 3.746 million businesses with nearly 2.6 million of these having no employees (sole proprietors with no employees), also implying that over 2 million business did not earn enough to be registered for VAT. These estimates indicates that the total number of businesses has not risen significantly since the end of 1995 with small reductions during 1996 and 1997 before rising slowly in 1998, 1999 and 2000. The number of businesses, employment and turnover is set out in Table 2.5.

Table 2.5 : Business Numbers, Employment and Turnover 1994 to 2001

Year	Number of Enterprises	Employment (000s)	Turnover (£m ex VAT)
Start 1994	3,581,470	20,607	1,536,026
Start 1995	3,706,080	20,279	1,687,442
Start 1996	3,724,425	20,954	1,791,543
Start 1997	3,707,695	21,073	1,797,164
Start 1998	3,657,885	21,595	1,926,987
Start 1999	3,676,940	21,746	1,943,880
Start 2000	3,722,610	22,132	2,033,728
Start 2001	3,746,340	22,622	2,112,013

Source: DTI

VAT Registered businesses can be tracked for business closure. Table 2.6 and Figure 2. 4 illustrate the survival rate of registered businesses and it appears that at present over 90% of new businesses survive the first year and this figure is increasing from around 85% for businesses started in the early to mid 1990s. However, 25% of new businesses do not survive two years and over a third do not survive three years. After 4 years only just over 50% of businesses are still in operation. This has major implications for lease structures in that nearly half of new businesses do not appear to survive more than four years. What is not clear from any of the statistics is whether it is the small businesses that fold early or whether the survival rates apply to all types and sizes of businesses.

Table 2.6 : Percentage of VAT Registered Businesses in England Surviving Between 6 Months and 4 Years By Year of Start Up - 1993 to 2000

Survival Period	1993	1994	1995	1996	1997	1998	1999	2000
6 months	93.8	93.8	94.3	94.4	95.1	95.5	95.8	96.5
12 months	85.5	85.4	87.1	87.1	88.8	89.0	89.7	91.4
18 months	77.6	77.4	79.7	80.4	82.4	82.2	83.4	
24 months	70.4	70.5	73.0	74.4	75.9	75.5	77.2	
30 months	64.4	64.4	67.2	68.7	69.9	69.4		
36 months	59.6	59.4	62.5	63.5	64.3	64.0		
42 months	55.2	54.9	58.0	58.6	59.3			
48 months	51.6	51.5	54.2	54.4	54.9			

Source : DTI

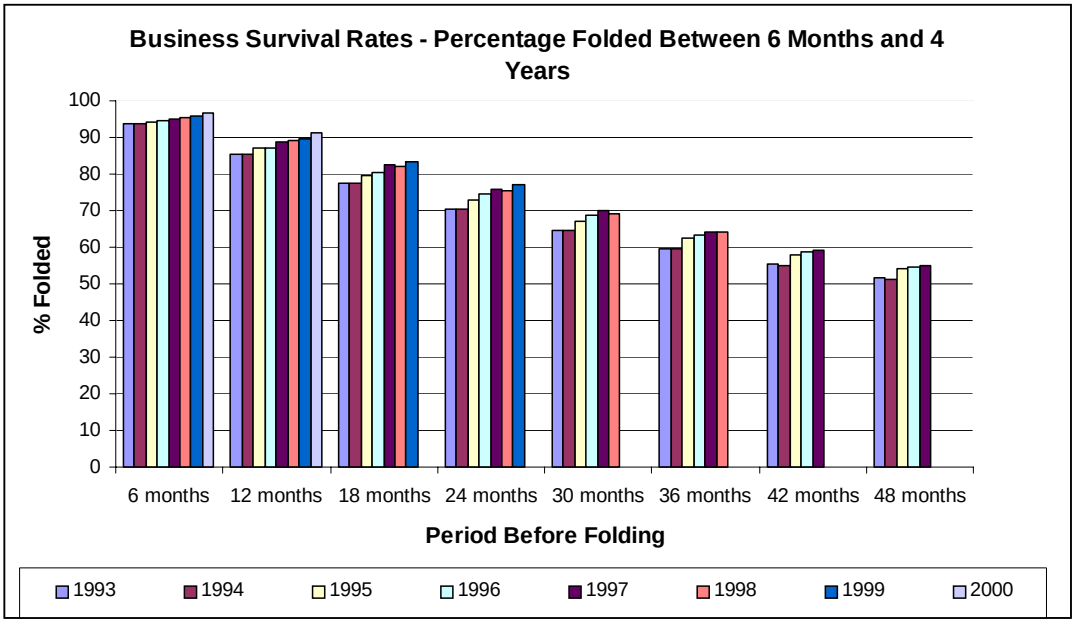


Figure 2.4 : VAT Registered Businesses in England Surviving Between 6 Months and 4 Years by Year of Start Up.

Table 2.7 widens survival rates from England to the Rest of the UK. The profile for England is similar to Wales and the rest of the UK although Northern Ireland has the highest level of survivorship in every year since 1998.

Table 2.7 : Business Survival Rates in the United Kingdom

	Registering in 1998			*Registering in 1999*		*Registering in 2000*
	1 year	*2 years*	*3 years*	*1 year*	*2 years*	*1 year*
United Kingdom	88.9	75.5	64.0	89.6	77.2	91.4
England	89.0	75.5	64.0	89.7	77.2	91.4
Wales	87.3	74.2	63.9	88.5	76.8	90.4
Scotland	88.0	74.2	62.6	87.9	75.8	91.1
Northern Ireland	89.4	79.1	70.8	91.1	82.4	93.8

Source : DTI

Barclays Bank also publish statistics on business start ups and failures. They comment that in the first quarter of 2003 107,000 new businesses started up, 12% higher than for the first quarter in 2002 and higher than in any other quarter in 2002. However, 106,000 businesses closed in the first quarter of 2003 and that trend has been sharply upwards since September 2002. Overall, according to Barclays, the number of businesses has shrunk every quarter since the beginning of 2000 until the first quarter 2003.

Their profile of closures is similar to the SBS statistics indicated above. Since 1992 an average of 9.5% of business closures occur in the first 6 months. In the 6 months to March 2003 this was 11% and this increased to 18.6% of business which failed within the first year. But it appears the period from 12 to 18 months is the worst for business closures. Between 1992 and 2003, 14.3% closed in this period. Between September 2002 and March 2003, 11.2% of closures were of businesses this age.

To summarise, in the six months to March 2003 nearly 19% of closures were of businesses less than 1 year old, another 23% were of businesses between 1 and 2 years old, a further 19% were more than 2 and less than 3 years old, 16% were between 3 and 4 years old and 14% between 4 and 5 years old.

It would appear that any business which survives 5 years has a very good chance of keeping in business as only 7% of closures in the period September 2002 to March 2003 had been running for more than 5 years. On average, between 1992 and 2003, only 9% of closures were of businesses which had been established more than 5 years.

In September 2002, Barclays analysed the survival rates of firms in the 10 years since they started in 1992. They indicate lower survival rates than for the SBS figures with only around 60% surviving 2 years and 40% surviving 4 years compared to over 70% and 50% respectively according to SBS. After 6 years around 30% survive and after 10 years only around 20% of businesses are still functioning. These survival rates raise questions concerning lease lengths and the timing of breaks.

2.3 The State of the Property Market

This review is an overview of a particularly heterogeneous market whereby different sectors and segments can behave very differently at the same time. The identification of more homogeneous segments is the subject of continuing research work in property markets and some of that work will focus on lease structures, the subject of this report. However, in all analyses, the usual segments will be discussed and these relate to property type and regional location.

At the basic level, the three main categories are retail, office and industrial. The IPD Portfolio Analysis Service breaks the market down further into 10 segments: These are:

> Retail : Standard Retail South East, Standard Retail Rest of UK, Shopping Centres (Malls), Retail Warehouses.
>
> Offices : City of London Offices, Midtown / West End London Offices, Rest of South East Offices, Rest of UK Offices.
>
> Industrials : South East Industrials, Rest of UK Industrials.

These can be further disaggregated or aggregated according into 29 different segments within the IPD Digest analysis or each principal sector can be disaggregated by standard region plus further disaggregation within inner London.

DETR (2000) found that there were significant differences between the lease structures of the different retail categories of retail warehouses, standard shops and shopping centres and between prime and secondary locations. Floorspace size and rent level were the main drivers of different lease structures in the office and industrial markets. Regional differences were small across all three main sectors.

2.3.1 Property Market Performance

The general economic state as it affects each of the three main commercial property market segments suggests that there should be a weakening lettings market during the operation of the first year of the new code. The economic state suggests that lettings markets should be strong in the period of the previous code monitoring from 1996 to 1998 and this strong performance should have continued until 2001.

The two main property market indicators of rental value and valuation yield are important indicators of the strength of occupational markets currently and in the future as yields are an indicator of investor expectations. Table 2.8 sets out the long-term performance of rental value change and valuation yields (equivalent yields) from 1985 to the end of 2002.

Table 2.8 : Rental Value Change and Valuation Yield Levels 1985 – 2002

	Estimated Rental Value Change (%)				Equivalent Yield on Portfolio (%)			
Year	All Property	Retail	Office	Industrial	All Property	Retail	Office	Industrial
1985	6.5	9.5	6.0	2.6	8.2	7.3	7.9	11.1
1986	9.9	9.9	11.7	4.3	8.3	7.3	8.3	11.6
1987	19.3	15.5	24.6	11.7	8.1	7.2	8.1	10.9
1988	22.8	19.6	25.2	22.5	7.8	7.0	7.9	10.0
1989	15.1	14.1	14.4	21.8	8.0	7.6	7.9	9.8
1990	2.8	4.4	0.5	6.8	9.7	9.3	9.5	11.7
1991	-8.5	-2.2	-14.9	-1.9	10.3	9.6	10.4	11.7
1992	-11.9	-3.3	-20.4	-8.9	10.6	9.7	11.0	12.3
1993	-7.9	-1.9	-13.7	-8.9	9.0	8.4	9.2	10.5
1994	-0.9	0.1	-1.3	-3.1	8.4	7.9	8.6	9.9
1995	0.4	1.7	-0.6	-1.4	8.6	8.1	8.7	10.4
1996	3.2	4.6	2.1	1.2	8.5	7.9	8.7	10.2
1997	7.7	7.2	9.7	5.0	8.0	7.4	8.3	9.6
1998	7.3	6.7	9.5	4.8	7.9	7.3	8.3	9.3
1999	5.8	5.4	7.0	4.4	7.5	7.0	8.1	8.8
2000	7.1	4.2	12.8	4.6	7.7	7.1	8.2	8.6
2001	3.6	3.4	4.1	3.1	7.9	7.3	8.4	8.6
2002	-0.9	3.1	-6.4	1.0	7.6	7.0	8.2	8.5
Annualised								
1980-1990	9.3	9.9	9.6	7.8				
1990-2000	0.0	2.2	-1.6	-0.6				
1997-2002	4.5	4.6	5.2	3.6				

Source : IPD

As expected, from the analysis of the general economy, rental growth continued to be strong in the years from 1998 to 2000 with All Property rental growth falling from 7.3% in 1998 to 5.8% in 1999 but increasing again to 7.1% in 2000. Offices were particularly strong in that year with 12.8% growth. However, rental growth rates slumped during 2001 to only 3.6% before going negative in 2002 with the All Property rental growth index falling by approximately 1%. The IPD record of this fall is based on data which is the product of a mixture of different bases of rental value with some providers of information giving rental values based on headline rents, some on the basis of provable rents and some on the basis of adjusted effective rents upon new letting (Crosby and Murdoch, 2001). The effect of this is to understate the actual falls in rental values and therefore, in reality, effective new letting rents have fallen by more than the 1% recorded by Investment Property Databank. The Hillier Parker (2003) Rent Index suggests a fall of 1.4% in the year April 2002 to April 2003 but this is a database of headline rents unadjusted for incentives[2]. It also underestimates the falls in rental values during the year.

[2] See Chapter 6 for the identification of inducements or incentives to let and a discussion of the pricing issues.

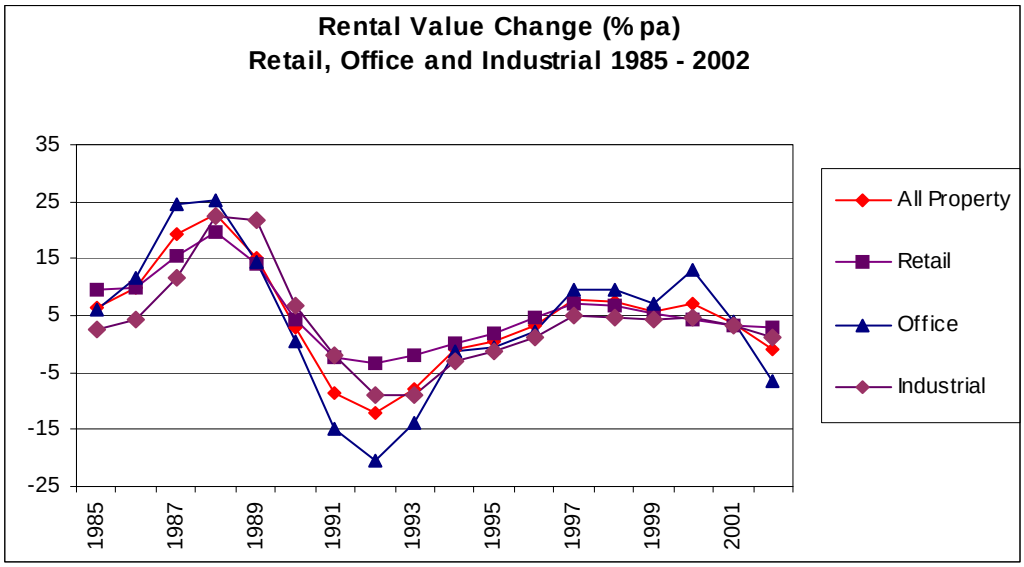


Figure 2.5 : Rental Value Change 1985 to 2002
Source : IPD

The equivalent yield levels did not rise in 2001 and 2002 as would be expected. IPD All Property Equivalent Yields have fluctuated between 7.5% and 7.9% since 1998 and therefore the lowest rental growth performance in 2001 and 2002 would normally have been expected to coincide with the highest yields. For example, in 1990 and 1991, on the back of reducing growth rates in 1990 and a fall in rental values in 1991, equivalent yields rose from 8.0 % in 1989 to 9.7% in 1990 and 10.3% in 1991[3]. Under falling rental value conditions in 2001 and 2002, although with less dramatic reductions than in the early 1990s, the yield rose from 7.7% in 2000 to 7.9% in 2001, but then fell back to 7.6% in 2002. This may have something to do with the appalling performance over the last five years of the equities market, with property out performing equities in 2002, even when rents are falling and inducements to let rising especially in the important property market segments of London and South East Offices (Chapter Three illustrates the change in the incidence of inducements in 2002 within the IPD). Over the last five years property has outperformed equities by 12.8% pa. It may also be connected to the financing of property transactions and reduced interest rates, details of which are set out later in this section. The weakness of the equity market and the free flow of funds have also helped the development of private property based pension schemes (SIPPS) (see Section 3 of this chapter) and that has helped underpin prime and secondary property investment markets even when occupier markets are weaker.

Table 2.9 sets out the comparative returns to the Property, UK Equity and Government Bond markets to illustrate the relatively good comparative performance of property during 2002. Reductions in the equivalent yields within all three segments of the commercial property market have more than offset the overall fall in rental values, giving the property market positive capital returns, which when added

[3] The lease structure of office properties let on long leases and upwards only reviews distorted the level of equivalent yields so the increases during the early 1990s are a product of this phenomenon and reduced future growth expectations significantly.

to the initial income yield of 7% mean a total return of 9.7%. This outperforms equities by 32% and is virtually identical to the Gilt market.

Table 2.9 : Property, Equities and Bonds 1985 – 2002

	Total Return (%)			Income Return (%)			Capital Return (%)		
Year	**Property**	**Equities**	**Gilts**	**Property**	**Equities**	**Gilts**	**Property**	**Equities**	**Gilts**
1985	8.3	20.2	11.0	6.4	5.0	10.6	1.8	15.2	0.4
1986	11.1	27.3	11.0	6.6	5.0	10.6	4.5	22.3	0.4
1987	25.8	8.7	16.3	6.7	4.5	10.1	19.1	4.2	6.2
1988	29.7	11.5	9.4	6.2	5.0	9.4	23.5	6.5	0
1989	15.4	35.5	5.9	5.6	5.5	9.6	9.8	30	-3.7
1990	-8.4	-9.6	5.6	5.8	4.7	10.1	-14.2	-14.3	-4.5
1991	-3.2	20.8	18.9	7.3	5.7	10.9	-10.5	15.1	8
1992	-1.7	19.8	18.4	8.3	5.0	9.7	-10.0	14.8	8.7
1993	20.0	27.5	28.8	9.1	4.2	9.5	10.8	23.3	19.3
1994	12.0	-5.9	-11.3	8.1	3.7	6.8	4.0	-9.6	-18.1
1995	3.5	23.0	19.0	7.6	4.5	8.7	-4.1	18.5	10.3
1996	10.0	15.9	7.7	8.0	4.2	7.1	2.0	11.7	0.6
1997	16.8	23.6	19.4	8.1	3.9	7.6	8.7	19.7	11.8
1998	11.7	13.7	25.0	7.4	2.8	6.4	4.4	10.9	18.6
1999	14.7	23.8	-3.5	7.3	2.6	4.9	7.4	21.2	-8.4
2000	10.5	-5.9	9.2	6.9	2.1	5.2	3.6	-8.0	4.0
2001	6.7	-13.2	1.3	6.7	2.2	5.1	0.0	-15.4	-3.8
2002	9.7	-22.3	9.8	7.0	2.7	5.0	2.6	-25.0	4.8
Annualised									
1980-1990	11.6	18.8	12.8	6.1	5.4	11.0	5.5	13.5	1.8
1990-2000	9.2	15.0	12.5	7.8	3.8	7.6	1.4	11.2	4.9
1997-2002	10.6	-2.2	7.9	7.1	2.5	5.3	3.6	-4.7	2.6

Source : IPD, Barclays Capital. Equity and gilts figures include income reinvested during the year; property figures are standing investments only, and assume continuous reinvestment of income.

Table 2.10 and Figure 2. 6 set out the returns to the individual sectors of the market as measure by the IPD. Despite the reductions in rental value in office and industrial markets, the fact that equivalent yield levels have actually reduced rather than increased, coupled with the high income returns, have allowed both the office and industrial markets to post positive total returns in 2002 with the industrial market at 3.3% and the office market at 9.7%. The retail market has performed at over 14% in 2002 with yields reducing and positive rental growth.

Table 2.10 : IPD Property Market Performance by Sector 1985 – 2002

	Total Return				Income Return				Capital Growth			
	All Property	Retail	Office	Industrial	All Property	Retail	Office	Industrial	All Property	Retail	Office	Industrial
1985	8.3	12.7	7.8	3.5	6.5	5.8	6.4	8.9	1.9	6.9	1.4	-5.4
1986	11.3	11.8	12.2	9.3	6.7	5.7	6.7	10.0	4.6	6.1	5.4	-0.8
1987	26.0	20.9	30.8	25.2	7.3	6.1	7.4	11.2	18.7	14.8	23.4	14.0
1988	29.6	24.9	31.2	39.5	6.8	5.9	6.7	11.0	22.8	19.1	24.5	28.5
1989	15.4	9.9	16.6	28.8	5.8	5.1	5.7	8.7	9.6	4.7	10.9	20.1
1990	-8.5	-8.3	-10.0	-3.5	5.4	5.2	5.1	7.1	-13.8	-13.5	-15.0	-10.6
1991	-3.1	3.2	-10.8	9.1	7.0	7.1	6.5	9.3	-10.2	-3.8	-17.3	-0.2
1992	-1.7	3.5	-7.2	1.3	7.9	7.5	7.9	9.3	-9.6	-4.0	-15.1	-7.9
1993	20.3	20.8	19.4	21.3	9.9	8.8	10.4	11.4	10.4	12.0	8.9	9.9
1994	11.9	13.0	10.7	11.8	8.0	7.3	8.3	9.3	3.9	5.7	2.4	2.5
1995	3.6	4.1	3.0	2.8	7.5	6.8	7.8	9.0	-3.9	-2.7	-4.8	-6.2
1996	10.1	11.8	7.6	10.3	8.1	7.4	8.4	10.0	2.0	4.4	-0.8	0.4
1997	16.9	18.7	14.6	16.5	8.2	7.4	8.6	10.2	8.7	11.3	6.0	6.3
1998	11.7	11.5	11.6	13.3	7.4	6.5	7.9	9.3	4.4	5.0	3.6	3.9
1999	14.7	14.1	14.4	17.7	7.3	6.5	7.8	9.3	7.4	7.5	6.5	8.4
2000	10.5	6.6	15.5	13.8	6.9	6.1	7.7	8.5	3.6	0.5	7.8	5.3
2001	6.7	5.5	7.6	8.2	6.7	6.2	7.0	7.8	0.0	-0.7	0.6	0.3
2002	9.7	14.1	3.3	10.8	7.0	6.8	7.0	8.1	2.6	7.3	-3.7	2.7
Annualised												
1980-1990	11.7	12.2	11.7	12.6	6.2	5.6	6.1	8.8	5.5	6.7	5.6	3.8
1990-2000	9.2	10.6	7.4	11.6	7.8	7.1	8.1	9.6	1.4	3.4	-0.7	2.1
1997-2002	10.6	10.3	10.4	12.7	7.1	6.4	7.5	8.6	3.6	3.9	2.9	4.1

Source : IPD

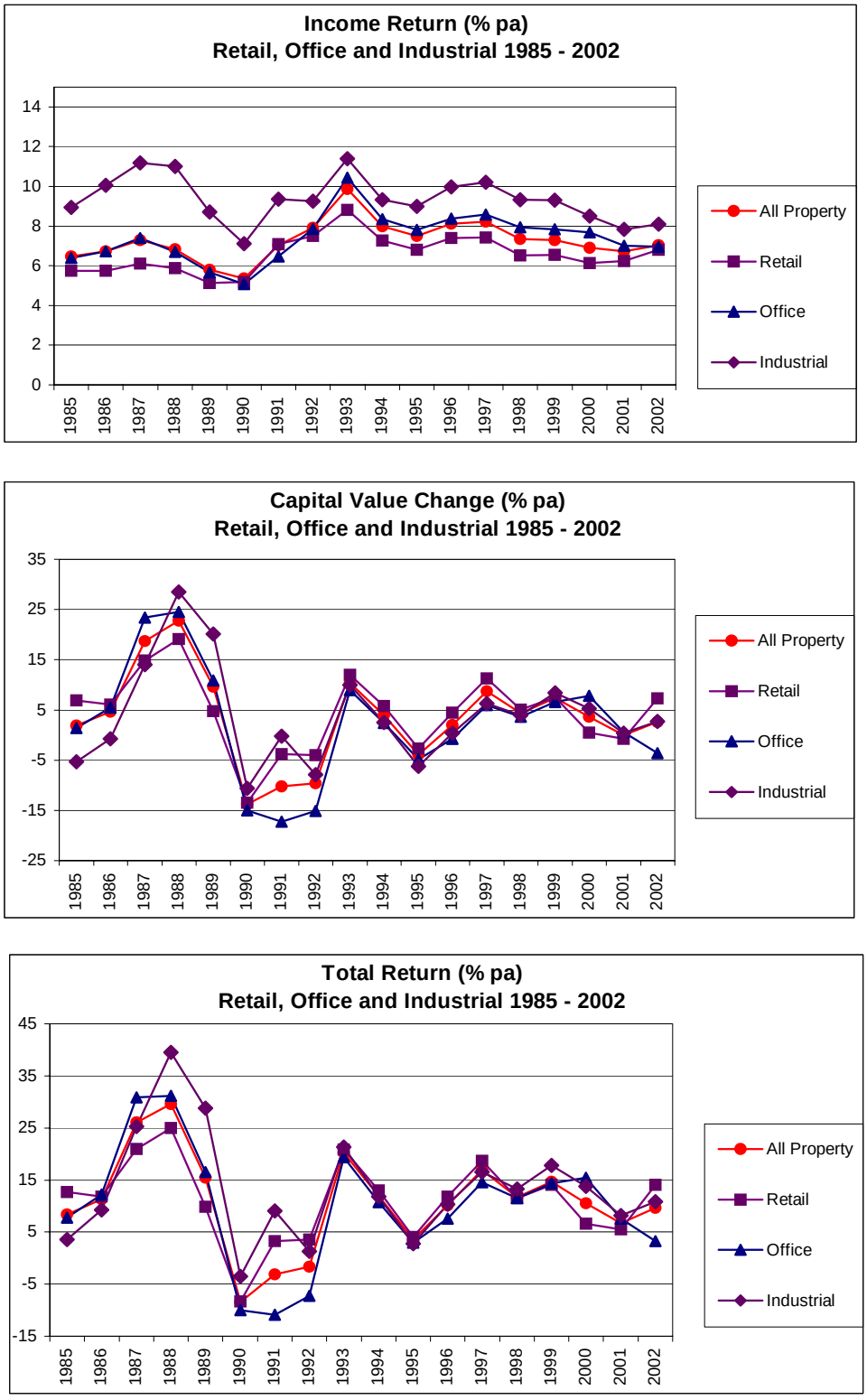


Figure 2.6 : IPD Retail, Office and Industrial Property Market Performance 1985 to 2002

Disaggregation of the three principal segments into 14 different property types and locations as set out in Table 2.11 and Figure 2. 7 below illustrate that the both total return and rental growth performance has generally grouped within the three segments with retail segments outperforming industrials which in turn have out-performed offices. Retail warehouses have shown the strongest performance in the first year of the Code of Practice period as far as rental growth is concerned at 5.3% followed by shopping centres, supermarkets and department and variety stores. Total returns have also been higher in retail but not quite in the same order. Retail warehouses, department and variety stores and supermarkets all showed returns of over 15%. The worst performing retail segment in terms of rental performance was the high street standard unit. The best performing industrial sector measured by rental growth was in London and the South, followed by distribution warehouses and finally the rest of the UK. The best performing office sector was provincial offices; with London offices the worst performing sector with rental falls of 9.6%. Total returns follow a similar pattern. Every sector total return is positive with even London offices showing 0.7% in 2002 despite the City actually achieving negative total returns of 0.7%.

Table 2.11 : Market Performance of IPD Property Sub Markets 2002

	Total Return (%)	Income Return (%)	Capital Growth (%)	Rental Value Growth (%)	Yield Impact (%)
Distribution Warehouses	11.26	8.06	3.20	0.95	2.85
Industrial - London	11.47	7.73	3.73	1.71	1.38
Industrial - Southern England	10.39	8.14	2.26	1.27	1.23
Industrial Parks	9.87	7.75	2.11	0.31	2.36
Industrial - Rest of UK	11.16	8.57	2.59	0.80	1.88
Office Parks	4.21	7.10	-2.89	-2.41	-0.16
Offices - Central London	0.70	6.34	-5.64	-9.56	1.68
Offices - Rest of London	3.72	7.36	-3.64	-7.52	2.11
Offices - Southern England	5.29	7.97	-2.68	-4.36	0.30
Offices - Rest of UK	11.72	7.99	3.73	1.61	2.35
Retail - Shopping Centres	12.42	6.62	5.80	3.12	3.74
Retail - Standard Shops	12.32	6.91	5.40	1.06	4.41
Retail Warehouses	17.44	6.81	10.63	5.28	5.73
Supermarkets	16.15	7.51	8.64	2.48	6.09
Dept / Variety Stores	18.98	7.28	11.70	1.76	8.09
Other Retail	13.36	7.23	6.13	1.55	4.06

Source : IPD

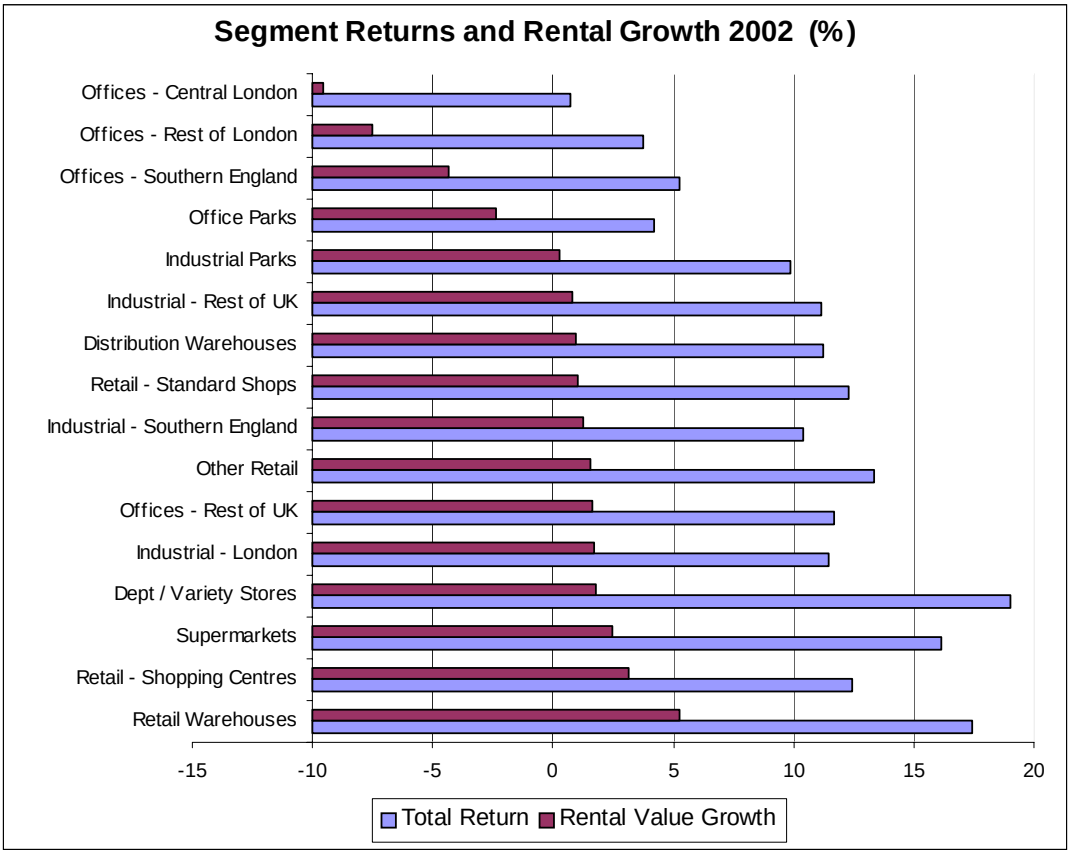


Figure 2.7 : Total Returns and Rental Growth Rates of Different Property Sub Markets in 2002

The property market in the first quarter of 2003 shows little sign of recovery. The RICS Commercial Market Survey (RICS, 2003) reported that fears surrounding the prospect, as it was then, of war on Iraq had added to the already difficult economic scenario. This survey uses the difference between the number of property professionals reporting increases or decreases in lettings, enquiries, rents, inducements, lease lengths, and suggests that more surveyors reporting falls in, for example, rent than increases is an indication that rents are falling. Respondents to the RICS survey reported that sales and lettings continued to fall and so did enquiries. Floorspace availability continued to rise and expectations were that rents would fall, most sharply in offices. The retail sector experienced some major changes having weathered the downturn in 2002 better than other sectors on the back of continued increases in retail sales and expenditure. The fall in seasonally adjusted retail sales volume has been accompanied by a fall in the number of sales and lettings and an increase in the rate of fall in the number of enquiries (although there appears to be differences around the regions). Floorspace availability increased having fallen slightly in the last quarter of 2002. The value of inducements rose.

Central London offices are picked out as a particularly difficult letting market confirming the performance figures for 2002. Jones Lang LaSalle (2003) report that take-up of space totalled 127,000 square metres in the first quarter of 2003 which was

only marginally better than the last quarter of 2002, but that this had been the lowest level since 1992. They reported that demand declined and only 8 enquiries were listed. Supply continues to increase and they project that completions will be 1 million square metres in 2003, the highest since 1991. The eight enquiries could have the choice of 36 buildings. The vacancy rate, which was well under 5% in December 2000 in all three markets of the City, West End and Docklands, has now risen to over 10% in the City and Docklands and around 7% in the West End. As a result, headline rents have declined by around 5% and inducements could include a two and a half year rent-free period on a 15-year term, indicating a much greater fall in effective rents.

2.3.2 Property Funding Flows

The flow of money to property has been increasing since 1998. Table 2.12 and Figure 2.8 illustrate the net flows of the financial institutions and the bank lending to Property Companies.

Table 2.12 : Property Funding Flows 1985 to 2002

	UK Institutions Net Property Investment (1)					Property Companies (2)			
Year	**Life Funds (£m)**	**Other Insurance (£m)**	**Pension Funds (£m)**	**Property Unit Trusts (£m)**	**Total (£m)**	**Outstanding Debt (£m)**	**Change in Debt (£m)**	**Prop % of Total Bank Lending**	**Capital Issues (£m)**
1985	803	12	590	-5	1,400	7,111	1,691	4.2	-
1986	799	32	434	-101	1,154	9,341	2,230	4.6	1,490
1987	803	29	197	-516	513	13,333	3,992	5.4	2,455
1988	1,305	94	272	99	1,770	21,198	7,965	7.0	796
1989	1,342	550	171	31	2,094	31,886	10,688	7.7	1,573
1990	1,081	217	-660	-61	577	38,996	7,110	8.6	317
1991	1,673	-8	485	35	2,185	39,674	679	8.3	1,329
1992	740	-54	977	-13	1,650	37,944	-1,730	8.1	212
1993	528	-247	155	256	692	34,249	-3,695	7.1	2,007
1994	2,708	-206	-325	400	2,577	32,181	-2,068	6.6	1,934
1995	233	32	-16	-8	241	30,732	-1,449	5.9	1,426
1996	596	-18	-735	82	-75	30,890	158	5.5	1,907
1997	1,090	98	166	517	1,871	34,269	-	4.2	2,813
1998	2,918	530	962	361	4,771	39,308	5,039	4.7	1,196
1999	2,563	-74	797	6	3,292	45,069	5,761	5.0	1,818
2000	3,673	77	1,724	73	5,547	57,234	12,165	5.5	1,595
2001	2,422	88	-49	-218	2,243	71,282	14,048	6.3	4,823
2002	379	29	513	21	942	86,432	15,150	7.0	2,540
Annualised									
1980-1990	959	120	451	-36	1,494	13,797	3,686	-	-
1990-2000	1,672	13	419	171	2,275	38,155	1,651	-	1,624
1997-2002	2,872	164	875	56	3,965	59,865	10,433	-	2,394

1. Source: ONS. Data for 2002 applies to the first three quarters only. The series excludes Investment Trusts, because they have minimal property holdings.
2. Source: Bank of England, ONS. The Amount Outstanding was at November every year until 1992, then end year from 1993. The series has a discontinuity in 1997 due to a wave of building society conversions. Capital issues by quoted property companies include preference shares and bonds.

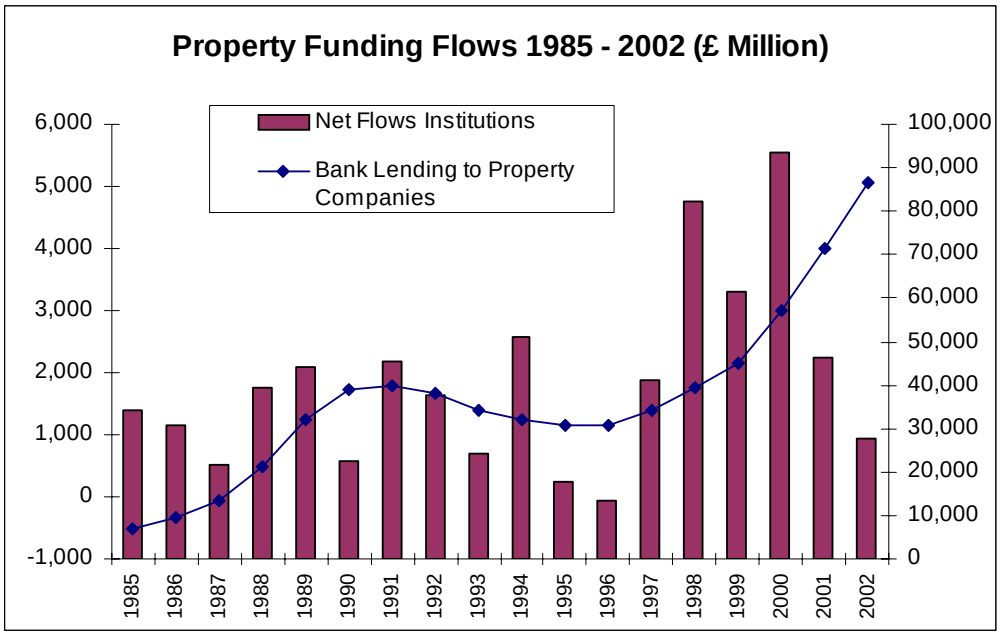


Figure 2.8 : Property Funding Flows 1985 to 2002 – Net Institutional Investment in Property and Outstanding Debt to Property Companies

The institutions appear to be taking a more cautious view of the property market than the banks and net institutional investment has reduced from a peak in 2000 of around £5.5 billion to around £2.25 billion in 2001 and to less than £1 billion in 2002. Outstanding bank lending to property companies has increased continually since 1995 from £30 billion to over £85 billion in 2002. DTL estimate that when other lenders are added to the banks the amount is over £110 billion. This is an increase of 13% over 2001 but represents a slow down as the increase was 19.7% in 2000 and 23.5% in 2001. DTL forecast a slow down to an 8.5% increase in 2003 (DTL, 2003)

DTL also report that indirect investment in property has fallen from its peak in 1999 of over £3 billion to around £1.5 billion in each of 2000, 2001 and 2002 but this form of investment appears to be riding out the weaker market conditions and shows no slowdown in the creation of new funds and the amount of funds. They suggest that incoming cross border investment has slowed marginally since 2000 when over £7 billion was invested to £6.6 billion in 2003. DTL forecast £5 billion for 2003 (DTL, 2003).

Despite the continuing increase in bank lending to commercial real estate there are a few signs of a more cautious approach. Interest rate margins increased. The number of lenders responding to the annual property lending survey (Maxted and Porter, 2003) prepared to lend at less than 100 basis points above the London Inter-Bank Lending Rate (LIBOR) reduced from 70% in 2000 to 60% in 2001 and to 48% in 2002. But loan to value ratios appear fairly static with average loan to value ratios of prime office property still around 80% and secondary offices around 75% of market value. Income cover ratios have been increased by the international lenders and UK

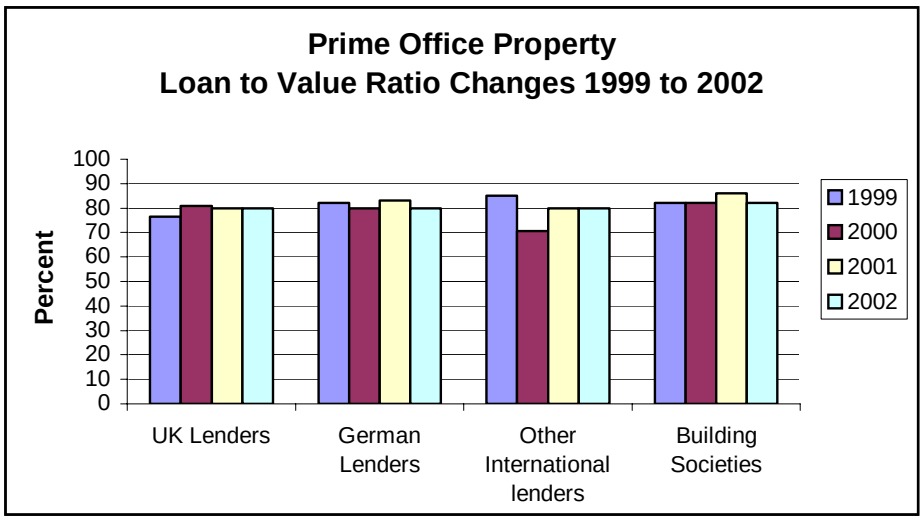
Building Societies but only up to the same ratios operated by the main UK lenders. Increases in these two aspects are more marked in the secondary office market. No trends exist for the secondary retail and industrial markets as information has only been collected on them in 2002.

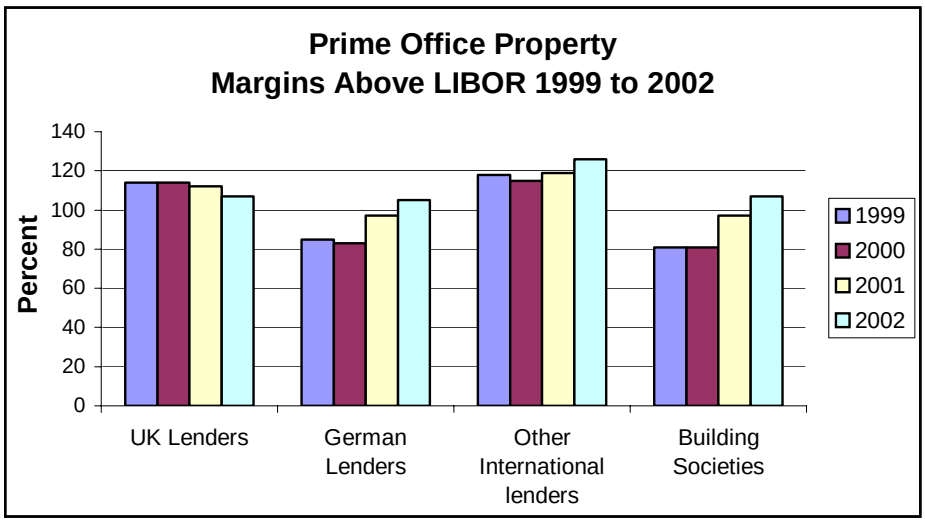
Table 2.13 and Figure 2. 9 set out and illustrate the details of the changes in loan to value ratios, interest rate margins (100 basis points = 1%) above the LIBOR and income over interest payment ratio requirements for a prime office property since the survey began in 1999. Prime assumes a rack rented high specification building let on lease to a AAA tenant with at least 10 years unexpired. Appendix One sets out the same details for prime retail and industrial and secondary offices and the details for 2002 for secondary retail and industrial.

Table 2.13 : Changes in Prime Office Property Lending Terms 1999 to 2002

		1999	2000	2001	2002
UK Lenders	***Ave Max LTV***	76.5%	81%	80%	80%
	Ave Margin Above LIBOR	114	114	112	107
	Ave Interest Cover	1.23	1.24	1.20	1.24
German Lenders	***Ave Max LTV***	82%	80%	83%	80%
	Ave Margin Above LIBOR	85	83	97	105
	Ave Interest Cover	1.20	1.17	1.20	1.23
Other International lenders	***Ave Max LTV***	85%	70.5%	80%	80%
	Ave Margin Above LIBOR	118	115	119	126
	Ave Interest Cover	1.14	1.16	1.20	1.20
Building Societies	***Ave Max LTV***	82%	82%	86%	82%
	Ave Margin Above LIBOR	81	81	97	107
	Ave Interest Cover	1.08	1.10	1.20	1.21

Source : Maxted and Porter, (2003)





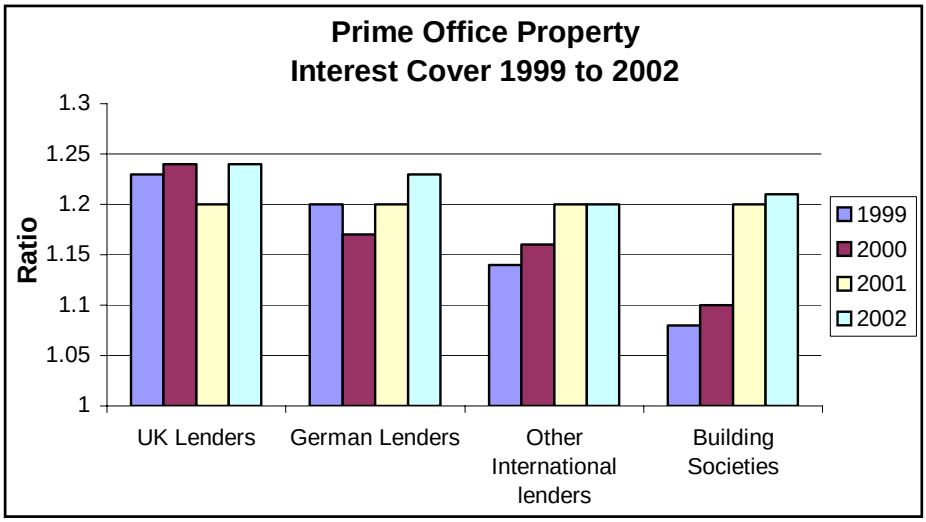


Figure 2.9 : Changes in Prime Office Property Lending Terms 1999 to 2002

Table 2.14 illustrates that the market share of UK lenders has increased slightly from 44% in 1999 to 50% in 2002 mainly at the expense of German lenders whose market share has fallen from 34% in 1999 to 18% in 2002. Other international lenders have increased their share from 11% to 19%.

Table 2.14 : Commercial Property Lending Market Share : 1999 - 2002

	1999	2000	2001	2002
UK Lenders	44%	38%	43%	50%
German Lenders	34%	28%	26%	18%
Other International Lenders	11%	20%	17%	19%
Building Societies	11%	14%	14%	13%

Source : Maxted and Porter (2003)

2.3.3 Self Invested Pension Schemes (SIPPS)

There is one other investment issue which cannot be identified from the statistics which tend to identify trends in primary rather than secondary markets. There does appear to be another funding flow to the private property market in the last few years and this takes the form of small private investors setting up small property based pension schemes, which may sometimes but not always be done formally through SIPPS (Self-Invested Personal Pensions).

The Inland Revenue describe a SIPP "as an arrangement within a personal pension scheme, in which the member has the power to direct how the contributions are invested. Members may make choices about what assets are bought, leased or sold, and decide when those assets are acquired or disposed of. The role of the scheme administrator in this situation is to control what is happening and to ensure that the requirements for tax approval continue to be met. The term 'self-invested personal pension scheme' is widely used in the pensions industry and is defined in Regulation 3 of The Investment Regulations (SI 2001/117). The name is used in the sense of 'member directed' investments rather than narrowly in the sense of investing in one's own business. However it does not include arrangements where the member merely has the right to choose the type of funds they want from a range of funds offered to any person" (Inland Revenue Personal Pension Schemes Guidance Note IR76)

In contrast to standard pension schemes, SIPPs allow individuals to become their own fund managers, investing in their own choice of commercial property as well as stocks, shares, gilts, bonds futures and options, unit trusts, insurance company managed and unit-linked funds. Given the performance of the UK equities market (for example 5 year returns average –2.2% per annum against +10.6% per annum for the property market) private funds would be expected to seek new investment outlets. SIPPs allow investors direct control of their investments, and can switch between investments within a tax-sheltered environment. They can use specialist managers if preferred. Estates Gazette (2002) suggest that, "even though many SIPP owners have a commercial property investment, these investments tend to be small offices or industrial units, reflecting the limited sums available to people who want to ensure adequate asset class diversification within their pension fund".

Estates Gazette (2002) also report that larger syndicates have started to enable investment in larger properties and independent financial advisors have started to get involved. Some of the purchases are funded by loans. Where loans are not involved, the long term nature of pension fund investment and the small scale investors operating in secondary markets may lead to different landlord criteria concerning leasing and this will be investigated in the survey work for this project.

According to Key, *et al*, (2003), private investors were net buyers with £5.9 billion of purchases and £1.9 billion of sales in 2000 to 2002. The only other category who were significant net buyers over the same period were overseas investors, with the financial institutions and the quoted property companies being marginal buyers and marginal sellers respectively. Occupiers sold £8.5 billion and only purchased £1.2 billion.

The commercial property auction market is often seen as a barometer of secondary property market and transactions in the JLL/IPD ARAS index of Auction sales shows steady increases in transactions by both value and number since 1995, with a substantial increase between 2000 and 2002 (Key, *et al*, 2003). By value transactions have risen from about £1.5 billion per annum in 2000 to nearly 2.5 billion in 2002 and by number from under 1000 to nearly 1200 per annum.

2.3.4 Floorspace, Vacancy and New Construction Orders

The supply side figures prominently in any real estate market analysis and its importance increases as regional and spatial disaggregation increases. Total floorspace figures for commercial property are not available as a continuous time series but the ODPM has recently resurrected the collection of these figures in collaboration with the Valuation Office Agency and University College London. Table 2.15 sets out the summary statistics for 2000 and 2002 and indicates that the total floorspace has increased by over 2% in that period; with offices and warehouse stock increasing by over 4% and nearly 6% respectively, while retail stock increased at just over 2%. But factory space decreased marginally by 0.6%.

Table 2.15 : Commercial Floorspace Stock 2002 and Change Since 2000

	Retail	Offices	Factories	Warehouses	Total
			Floorspace 2002 (,000s)		
North East	6,521	3,568	13,778	5,532	29,399
North West and Merseyside	14,742	10,658	36,372	23,372	85,143
Yorkshire and the Humber	11,552	7,041	29,615	16,500	64,707
East Midlands	7,751	5,007	25,263	15,021	53,042
West Midlands	10,232	7,261	35,450	18,906	71,849
East	10,404	8,116	20,071	15,140	53,731
London	16,149	27,429	12,091	15,584	71,252
South East	14,510	14,930	23,306	18,181	70,928
South West	9,684	6,879	17,787	12,520	46,870
England	101,545	90,888	213,733	140,755	546,921
Wales	5,910	3,773	18,138	7,282	35,103
England and Wales	107,455	94,661	231,871	148,037	582,025
			Percentage Change 2000 to 2002		
North East	0.99%	1.91%	-0.98%	7.19%	1.26%
North West and Merseyside	2.84%	3.90%	-2.78%	4.60%	0.94%
Yorkshire and the Humber	1.06%	4.60%	1.29%	4.44%	2.39%
East Midlands	4.18%	4.93%	-0.35%	9.05%	3.32%
West Midlands	1.77%	4.44%	-0.61%	8.70%	2.54%
East	5.23%	6.71%	-0.98%	6.46%	3.36%
London	1.18%	2.65%	-7.01%	4.77%	0.98%
South East	2.44%	5.78%	3.73%	3.73%	3.89%
South West	1.45%	4.52%	-1.58%	8.09%	2.37%
England	2.29%	4.19%	-0.77%	6.09%	2.31%
Wales	1.55%	4.25%	1.50%	3.73%	2.26%
England and Wales	2.25%	4.19%	-0.60%	5.97%	2.31%

Source : ODPM

Vacancy rates (for England only) including a time series from 1991 onwards have been collected recently, also by ODPM, and this shows that vacancy was falling all through the monitoring period of the first Code of Practice and has continued to fall through to 2001 averaging 6.6% in England in 2001. In every region of England, the vacancy rate fell from 1999-2000 to 2000-2001 with the exception of the North-East, where it remained static (Table 2.16).

Table 2.16 : Commercial Property Vacancy Rates (%) : England 1991 - 2001

	1991-92	1992-93	1993-94	1994-95	1995-96	1996-97	1997-98	1998-99	1999-00	2000-01
England	*7.9*	*10.2*	*10.6*	*10.4*	*9.2*	*8.4*	*7.6*	*7.3*	*7.1*	*6.6*
North East	10.7	10.5	9.2	8.4	6.9	6.8	6.3	7.0	7.5	7.5
North West	7.3	9.5	9.6	9.4	9.3	8.5	7.7	7.5	7.5	7.3
Yorks & Humbs	4.3	7.5	6.0	6.0	6.4	5.9	6.3	6.6	6.9	6.3
West Midlands	6.5	8.3	8.2	8.1	7.7	7.3	6.9	6.6	7.0	6.7
East	7.9	11.3	12.2	12.5	10.3	10.2	8.9	7.9	7.6	7.2
London	13.1	13.8	14.7	15.1	13.6	12.5	11.3	10.4	9.9	8.5
Inner London	16.5	18.1	17.9	17.7	15.5	14.3	13.7	12.3	10.9	9.0
Outer London	10.5	10.6	12.3	13.1	12.3	11.1	9.6	8.9	9.1	8.2
South East	8.2	10.9	11.8	12.2	10.6	8.9	7.5	7.0	6.3	5.9
South West	6.7	8.9	10.1	8.3	7.5	6.6	6.1	6.0	5.6	5.1

Source : ODPM

Due to floor-space data and vacancy rates being newly constituted or resurrected data, and therefore with short or interrupted time series, the main long run time series building data is new construction orders which are set out in Table 2.17 and Figure 2. 10. This shows that construction orders picked up in all three sectors after the property crash and, during the first Code monitoring period, increased from £6.1 billion in 1995 to £7.7 billion by 1998. However, in 1999, they fell back below £7 billion with all three sectors experiencing lower orders. In 2000 orders increased on the back of a recovery in office building although the other two sectors continued to fall. Another increase to around £8 billion in 2001 was based on increased orders in both office and retail sectors while industrial orders continued to fall. In 2002, the construction industry orders fell back again by nearly 8%, this time not only on account of a continuing downward trend in industrial markets but also because the office market turned down by 15%. Retail orders increased by 16%.

Table 2.17 : New Construction Orders (£ Million, 1995 Prices)

	Retail	Office	Industrial	Total
1985	1,249	2,169	2,291	5,708
1986	1,302	2,666	2,489	6,457
1987	1,811	3,484	2,494	7,789
1988	2,033	4,551	3,084	9,668
1989	1,938	4,897	2,933	9,767
1990	1,317	4,129	2,628	8,074
1991	1,334	2,418	2,134	5,886
1992	1,230	2,012	1,791	5,033
1993	1,538	1,771	1,948	5,257
1994	1,599	1,956	2,234	5,789
1995	1,871	2,123	2,139	6,133
1996	1,795	2,156	2,317	6,268
1997	1,843	2,384	2,982	7,210
1998	1,934	3,117	2,651	7,701
1999	1,618	3,036	2,273	6,944
2000	1,575	3,654	2,264	7,493
2001	1,833	3,935	2,184	7,953
2002	2,124	3,339	1,874	7,336

Source : IPD from DTI Statistics

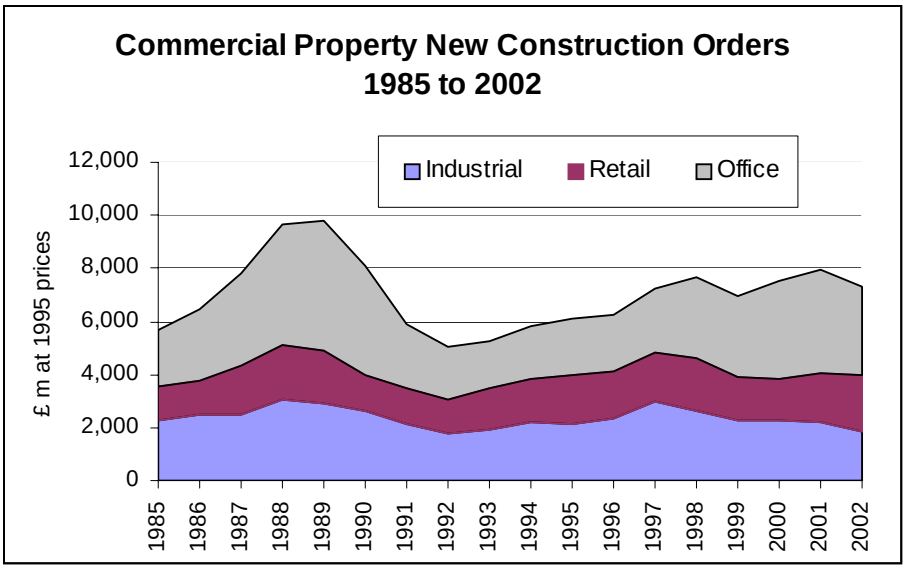


Figure 2.10 : New Construction Orders Commercial Property 1985 to 2002

Having set out the economic and property market background within which the commercial and industrial leasing market operates, the next part of this chapter examines the legal and wider institutional background to that market.

2.4. The Institutional Framework of the Commercial Leasing Process

The institutional and legal framework to the landlord and tenant relationship was discussed in DETR (2000) and the following review concentrates on the major changes that have taken place since the end of the review period of 1998. The major issues examined in that report were the legal framework and the influences on landlords and tenants including changing business practices, globalisation, performance measurement, accounting and pricing. These influences continue to impact on the relationship and are addressed in the context of the differing influences on each of the parties.

The major development since the last report is in taxation of leases and during 2003, the second year after the introduction of the code, a new lease stamp duty regime was proposed. This proposed new regime may have significant impact on landlord and tenant motivations in lease negotiations both and after implementation therefore this review pays particular attention to the proposals.

2.4.1 The Legal Framework

2.4.1.1 Legislative and Judicial Control of Commercial Leases

All leases are both interests in land and contracts. To a greater or lesser extent the law dictates both the nature and the terms of all leases and controls the way in which they can be created. This legal framework necessarily constrains the extent to which the parties to a lease are able to agree their own terms and provides an essential backcloth to commercial lease negotiations and commercial leasing structures. However, the legal environment within which commercial leases operate was, until 1996, remarkably stable and free from legal controls (see DETR, 2000).

Not surprisingly, the law has always, and still does, dictate the essential nature of a lease. Parties are not free to label their agreement for occupation as a mere contract (ie a licence); wherever the hallmarks of a lease are present (ie exclusive possession for a fixed or ascertainable period) the arrangement is a lease, irrespective of the parties' subjective intentions. Thus, wherever an occupier requires exclusive possession of business space rather than serviced accommodation, the parties have to accept any legal constraints placed on leases.

However, on the whole, the law does not directly control the terms of a commercial lease. In contrast to residential leases, there is no general or specific statutory or common law requirement that terms be fair or reasonable. However, prior to 1996, there was a statutory requirement that landlords could not unreasonably withhold consent to an assignment or subletting; this could only be avoided by an absolute prohibition on such disposals – a provision which business tenants rarely find acceptable. In all other respects, the parties were free to negotiate their own bargain.

This stable and largely non-interventionist legal framework for commercial lease terms was shaken up just as the first Commercial Leases Code of Practice was launched. On 1 January 1996 the Landlord and Tenant (Covenants) Act 1995 came into effect. This introduced two major changes, the first of which was compulsory for all leases. For leases entered into after 1995, privity of contract – the legal principle under which the original tenant remains liable on all of the lease covenants for the whole of the lease term even after a disposal of the lease by way of assignment – is abolished. (As is the practice of imposing a contract-based liability for the whole of the lease term on both assignees and guarantors.) In addition, the 1995 Act amended section 19(1) of the Landlord and Tenant Act 1927 so as to give landlords of *commercial* premises greater control over assignments, if they so wish.

Accordingly, following a lawful assignment, the tenant of a post-1995 lease is automatically released from liability under the lease. The quid pro quo is that the 1995 Act amends section 19(1) of the 1927 Act so that a landlord in the commercial sector can now draft such leases so as to pre-specify conditions and circumstances that must be satisfied before the tenant is free to assign. Where this is done, there is no requirement that these conditions and circumstances be reasonable.

However, the sting in the tale of tenant release is that the landlord is, in certain circumstances, entitled to require the assigning tenant to enter into an authorised guarantee agreement ("AGA") guaranteeing the performance of the assignee. Whilst an AGA drops away if and when the assignee further assigns, it is an important mechanism by which a former tenant can remain liable in respect of premises of which he has disposed. Where the first assignee holds the lease for the remainder of its term, an AGA effectively perpetuates the old privity rule.

2.4.1.2 Post 1998 Developments

In the period since the last Report there have been a few legal developments that could significantly affect lease structures. The old 1927 Act requirement of reasonableness, in practice, applies to some aspects of the assignment of most post-1995 leases; it also necessarily governs sublettings carved out of such leases. There has been some notable recent case law in this area. The House of Lords decision in *Gloucester City Council v Ashworth Frazer Ltd* [2002] is perceived in some quarters as significantly strengthening the landlord's abilities to refine consent to an assignment where the activities of a proposed assignee may contravene the user covenant.

Of greater importance is the Court of Appeal ruling in *Allied Dunbar v Homebase Ltd* [2001]. Here the court has refused to accept a well-used (but previously untested) device for side stepping conditions in a head lease that dictate the terms of any subletting of the whole. It is common practice for leases to limit the right to sublet (a mechanism which itself avoids the test of reasonableness imposed by s 19(1)) to lettings on the same terms – and at either the same rent or at OMRV – as the head lease. Should the tenant later wish to sublet the premises in difficult market conditions, such a provision can seriously limit the tenant's ability to offset its losses since the landlord can prevent the tenant from subletting on terms that differ from the head lease in the very situation when those terms cannot in practice be achieved.

In the period since the first Report there has been no further substantive legislation affecting new commercial leases. However, there have been procedural changes which could have a substantive impact on lease structures. As a result of the Land Registration Act 2002, all new leases are, since 13 October 2003, subject to new registration requirements. The title to new leases in excess of seven years must now be registered, as must all reversionary leases that will not take effect in possession within three months. Where an unregistered lease with more than seven years to run is assigned it, too, must be registered. The registration process requires the lease, together with any side agreements intended to bind successors in title, to be lodged at the Land Registry and thus to be available for public inspection. From October 2005 leases sent to the Land Registry prior to 13 October 2003 will be open to public view.

2.4.1.3 New Leases and Statutorily Protected Leases

Part II of the Landlord and Tenant Act 1954 confers a statutory right of renewal on occupying business tenants, save where the parties have gained prior court approval to contract out. Part II of the 1954 Act is to be amended by the Regulatory Reform (Business Tenancies)(England and Wales) Order 2003 ('RRO 2003'). While there are some, relatively minor, changes to the range of tenancies that will fall into protection, most of the amendments affect the procedure for contracting out, termination and renewal. In particular, there will no longer be any need to gain prior court approval for contacting out of the Act. At the time of writing it is expected that these changes will come into effect in June 2004.

This research project is concerned with the newly negotiated leases. Such a lease can fall into one of three categories. It can be one to which the 1954 Act does not and will not apply. This will be the case where the lease either does not satisfy the statutory criteria for protection under the Act, or it has been contracted out of the Act. Alternatively, a new lease can be one between new parties starting with a clean slate but to which the 1954 Act will apply with the result that at term date the tenant will have a statutory right of renewal. A third category is where the new lease is a product of the statutory renewal process; such leases are not the concern of this Report as the terms of renewal are not fully negotiated but are governed by statutory criteria.

The data used to determine trends in lease structures cannot easily identify the differences between new lettings and renewals and other restricted negotiations and this remains a limitation of any analysis. Data issues are fully discussed in Chapters Three and Four.

2.4.1.4 The Theoretical Impact of the Legal Framework for Business Leases

Assignment

The 1995 Act now allows a commercial lease to contain strict conditions attached to the right to assign which can include the imposition of an *automatic* (ie irrespective of the reasonableness of such a requirement) AGA on any assignment. Clearly this would make the disposal of a lease difficult and unattractive to a tenant and would limit their flexibility in the face of their changing property requirements. It could

therefore discourage them from taking leases which are to last for any longer than their perceived occupational requirements.

By 1999, although it was still early days for the new legislation, the signs were that the requirement for an *automatic* AGA was becoming a standard lease provision. The message on the stringency of other assignment conditions was mixed (DETR, 2000).

The current Code of Practice specifically recommends that restrictions on assignment should normally be limited only by a requirement to obtain the landlord's prior consent which is not to be unreasonably withheld and that AGAs should only be demanded where the assignee is of lower financial standing than the outgoing tenant.

The incidence of requirements for automatic AGAs and other assignment conditions cannot be deduced from either the IPD of VOA data. It is an issue that is to be addressed in the questionnaire surveys scheduled for next year and these should provide a reliable indicator of the current position. In the meantime, it has been covered in the interview surveys and will be further discussed in Chapter Five.

Subletting

The imposition of strict controls on subletting, as reinforced by the *Allied Dunbar* decision, can obviously seriously restrict the tenant's ability to sublet in a market where it is no longer possible to match the terms (and, where so required, the rent) achieved in the head lease. It is legitimate to question why landlords should wish to impose such restrictions on subletting when, by definition, their tenant remains liable on the terms of the head lease.

One reason is that, should the head lease fall away, the subtenant will become the direct tenant of the landlord. However, in the two situations in which this can occur without the landlord's concurrence, the landlord's position can be, or is, protected. A subletting of the whole will mean that the tenant is not in business occupation and will not, therefore, have any statutory right to renew its lease. However, the subtenant will have a right to renew its sublease directly against the head landlord (a scenario that the Court of Appeal found persuasive in the *Allied Dunbar* case itself). However, this risk can readily be avoided (and often is) by a requirement that any subletting is contracted out of the 1954 Act. The second situation in which the subtenant may become the direct tenant is where the head lease is forfeited and the subtenant applies for, and is given, relief. However, although the conditions on which relief is given are at the discretion of the court, it is well accepted that the sub tenant must virtually invariably be subjected to terms that are no less onerous than those in the head lease.

It would therefore appear that, legally speaking, a landlord is not at any serious risk by a subletting on terms different from the head lease. This suggests that the real purpose behind such restrictions on subletting is to "protect" the landlord's position at rent review. Where a subletting can only be achieved at a rent below the rent passing under the head lease, it provides clear evidence of a drop in rental value both of the property itself and, possibly, that of the landlord's neighbouring property. It is this that many landlords are seeking to avoid.

Tight restrictions on subletting can therefore be seen not only as a device that constrains flexibility in the subletting market but also as one designed to cloud market transparency. The use of such restrictions is a matter that cannot be picked up from either the IPD or VOA data and is a question to be addressed in both the interview and questionnaire surveys.

Statutory rights of renewal

The statutory right to renew under the 1954 Act cannot impact on the terms of a lease to which the Act does not, and will not in the future, apply. However, it seems likely that the biggest group of occupational business leases falling into this category are those which are positively contracted out of the Act. Both the current contracting out procedures (and those proposed under RRO 2003) effectively require the tenant to be warned that they are taking a lease that does not enjoy statutory protection. The information that the lease to be granted will not automatically be renewable may affect the bargaining position of the parties. Furthermore, the new procedure for contracting out could lead to an increase in tenancies outside of the Act (Williamson, 2003).

The fact that a lease between new parties will carry a statutory right of renewal at its contractual term date will not directly affect its terms; however, it could have an indirect effect. It means that the initial length of term is not so important to the tenant, especially where the premises are not ripe for re-development and the landlord has no interest in occupying the property (so that the prospect of successful opposition to a renewal is minimal). Furthermore, although changes to the lease covenants can be made at renewal (where these are either agreed or shown to be reasonable), there is a tendency for the courts to renew on the same terms. This can discourage landlords from agreeing flexible and diverse lease forms for leases to which the Act will apply, since these can be perpetuated by the renewal process for a potentially lengthy period (and, where the lease is assigned, for the benefit of an unknown tenant).

Where a tenant actually exercises their statutory right to a new lease, the 1954 Act directly impacts on the form of any renewed lease. Although the parties are free to negotiate the new lease terms for themselves, in the absence of agreement the court (or a third party under the PACT scheme) will settle them within the guidelines set out in sections 32 – 35 of the Act. Hence, even where the parties do not resort to the court, those sections, and the way in which they have been interpreted, necessarily feed back into the renewal negotiations. Case law indicates that, save where the parties can agree changes, the burden is on the party proposing any alteration to the lease provisions to show that it is reasonable; furthermore, the House of Lords has expressed the view that bringing lease provisions into line with current leasing practices is not, in itself, reasonable[4]. A recent example of this approach saw the court refusing to insert into a renewed lease a requirement that the tenant, on assigning, had *automatically* to enter into an AGA even though this is standard practice in new leases[5].

[4] *O'May vCity of London Real Property Co Ltd* [1983] 2 AC 726
[5] *Wallis Fashion Group Ltd v CGU Life Assurance Ltd* (2000) 81 P & CR 393

Land Registration Act 2002

The prospect of lease documentation being available for public inspection is a concern to the parties. Landlords are particularly anxious that the terms of finalised deals might impact on prospective transactions relating to other of their properties in the same building or centre. Ultimately wider lease registration will mean that more lease information will become readily available for rent reviews and lease renewals.

The Land Registry has recognised that this is an area for legitimate concern. There is a process whereby commercially sensitive material can be edited out of the publicly available document. However, this requires an application to the Land Registry and is specific to the applicant; if the reversion or the lease changes hands, a fresh application will have to be made. Since this new system has only just been put in place, it is too early to tell whether it will meet the present concerns.

The only way of ensuring confidentiality is to keep the lease length at seven years or less. Hence if confidentiality remains a serious issue, the new registration requirements could have the effect of reducing lease lengths; in particular we could easily see the commonly encountered 10-year lease being replaced by a seven year one.

2.4.2 Accounting and Taxation Issues

In DETR (2000) the prospect of lease accounting changes was highlighted as being a potential influence towards shorter leases. The changes proposed will force occupiers to identify occupational leases as finance leases and capitalise them in their accounts. At present occupational leases are not entered on the profit and loss account. This change is still a proposal and market commentary still expects this to increase the attraction of shorter leases to occupiers.

Property market commentary also expects a similar influence to result from the proposed changes in Lease Stamp Duty, which is to become operational in December 2003 in the UK. The proposed change is that all leases will be capitalised at a standard 3.5% discount rate for the term of the lease and duty charged to the occupier @ 1% of the amount by which the capitalised value exceeds £150,000. At present, the duty is purely charged on the rent (and any premium) and no account is taken of the length of the lease. The present duty is not charged on leases which are less than £5,000 pa rent and 7 years or less in length. For all other leases, the duty payable is a percentage of the (average) rent (1% for 7 years or less, 2% for leases up to 35 years, 12% for leases up to 100 years and 24% above 100 years).

The issue of the impact of tax incidence is not straightforward. A 15-year lease will have a greater tax payment than a shorter lease of say 5 years initially. But over the 15 years, the occupier on a short lease will have to renew twice and pay tax each time, no doubt on a higher rent if rental value expectations implied by the level of equivalent yields actually occur. Mehdi's (2003) work on business rates confirms other work that taxes that increase occupation costs shift in the long term to landlords.

However, the present project is concerned only with short-term impacts on lease structures. Assuming that tax shifting is a long rather than short-term phenomenon, it

seems clear that, in the short term, it is tenants who bear the cost of the tax increase. This means that the new SDLT does raise two research issues. The first is the effect of the proposed changes from the date they were announced to the date of implementation, December 2003. Some anecdotal comment is that tenants have sought to reduce the new tax liability by entering into longer leases in the period starting in the Spring of 2003 to December 1st 2003 in order to avoid the higher rates of tax upon renewal of a shorter lease.

The second relates to the period December 1st 2003 to April 1st 2004. Press comment has been suggesting that the outcome of the tax will be to increase the cost of taking longer leases and that this will lead to pressure from occupiers paying the tax to shorten leases so as to reduce the tax.

If these possibilities materialise, there could be an increase in lease length for properties in 2003, with a reversal to shorter leases in the early part of 2004. This would affect any trend to shorter leases in the 2003 data.

The VOA sample data can be used to assess the impact of the new proposals on the number of leases which will be subject to a lease stamp duty payment (analysis of IPD for this impact was not part of the original research budget). Table 2.18 sets out a matrix of different lease lengths and rents and illustrates how the threshold operates. Rents at the old threshold of £5,000 will pay no duty as the NPV of the lease cannot exceed £142,000, regardless of lease length, at 3.5% discount rate. For a rent of £7,500 lease duty only becomes payable if the term is 35 years or more. At £10,000 pa the term has to be above 21 years, at £15,000 pa above 12 years and at £20,000 pa above 8 years. Five year leases have lease duty attached for rents above £30,000 pa and at £50,000 pa duty is payable on leases above 3 years.

Of the 50,991 transactions used for the VOA lease structure analysis signed between 1998 and 2003, taken from all transactions in 3 different town types across each of the standard government regions of England and Wales, exactly 30% would have a capitalised value above the NPV £150,000 threshold and be subject to duty.

Table 2.18 : Lease Stamp Duty – NPV of Rent (Bolded = stamp duty payable @ 1% of the NPV less £,1500)

	Rent																	
Lease Length	**5000**	**7500**	**10000**	**15000**	**20000**	**30000**	**40000**	**50000**	**75000**	**100000**	**150000**	**200000**	**250000**	**500000**	**1000000**	**2500000**	**500000**	**10000000**
1	4831	7246	9662	14493	19324	28986	38647	48309	72464	96618	**144928**	**193237**	**241546**	**483092**	966184	**2415459**	**483092**	**9661836**
2	9498	14248	18997	28495	37994	56991	75988	94985	142477	**189969**	**284954**	**379939**	**474924**	**949847**	**1899694**	**4749236**	**949847**	**18996943**
3	14008	21012	28016	42025	56033	84049	112065	140082	**210123**	**280164**	**420246**	**560327**	**700409**	**1400818**	**2801637**	**7004092**	**1400818**	**28016370**
4	18365	27548	36731	55096	73462	110192	146923	**183654**	**275481**	**367308**	**550962**	**734616**	**918270**	**1836540**	**3673079**	**9182698**	**1836540**	**36730792**
5	22575	33863	45151	67726	90301	135452	**180602**	**225753**	**338629**	**451505**	**677258**	**903010**	**1128763**	**2257526**	**4515052**	**11287631**	**2257526**	**45150524**
6	26643	39964	53286	79928	106571	**159857**	**213142**	**266428**	**399641**	**532855**	**799283**	**1065711**	**1332138**	**2664277**	**5328553**	**13321383**	**2664277**	**53285530**
7	30573	45859	61145	91718	122291	**183436**	**244582**	**305727**	**458591**	**611454**	**917182**	**1222909**	**1528636**	**3057272**	**6114544**	**15286360**	**3057272**	**61145440**
8	34370	51555	68740	103109	137479	**206219**	**274958**	**343698**	**515547**	**687396**	**1031093**	**1374791**	**1718489**	**3436978**	**6873956**	**17184889**	**3436978**	**68739555**
9	38038	57058	76077	114115	**152154**	**228231**	**304307**	**380384**	**570576**	**760769**	**1141153**	**1521537**	**1901922**	**3803843**	**7607687**	**19019216**	**3803843**	**76076865**
10	41583	62375	83166	124749	**166332**	**249498**	**332664**	**415830**	**623745**	**831661**	**1247491**	**1663321**	**2079151**	**4158303**	**8316605**	**20791513**	**4158303**	**83166053**
11	45008	67512	90016	135023	**180031**	**270047**	**360062**	**450078**	**675116**	**900155**	**1350233**	**1800310**	**2250388**	**4500776**	**9001551**	**22503878**	**4500776**	**90015510**
12	48317	72475	96633	144950	**193267**	**289900**	**386533**	**483167**	**724750**	**966333**	**1449500**	**1932667**	**2415834**	**4831667**	**9663334**	**24158336**	**4831667**	**96633343**
13	51514	77271	103027	**154541**	**206055**	**309082**	**412110**	**515137**	**772705**	**1030274**	**1545411**	**2060548**	**2575685**	**5151369**	**10302738**	**25756846**	**5151369**	**103027385**
14	54603	81904	109205	**163808**	**218410**	**327616**	**436821**	**546026**	**819039**	**1092052**	**1638078**	**2184104**	**2730130**	**5460260**	**10920520**	**27301301**	**5460260**	**109205203**
15	57587	86381	115174	**172761**	**230348**	**345522**	**460696**	**575871**	**863806**	**1151741**	**1727612**	**2303482**	**2879353**	**5758705**	**11517411**	**28793527**	**5758705**	**115174109**
16	60471	90706	120941	**181412**	**241882**	**362824**	**483765**	**604706**	**907059**	**1209412**	**1814118**	**2418823**	**3023529**	**6047058**	**12094117**	**30235292**	**6047058**	**120941168**
17	63257	94885	126513	**189770**	**253026**	**379540**	**506053**	**632566**	**948849**	**1265132**	**1897698**	**2530264**	**3162830**	**6325660**	**12651321**	**31628301**	**6325660**	**126513206**
18	65948	98923	131897	**197845**	**263794**	**395690**	**527587**	**659484**	**989226**	**1318968**	**1978452**	**2637936**	**3297420**	**6594841**	**13189682**	**32974204**	**6594841**	**131896817**
19	68549	102824	137098	**205648**	**274197**	**411295**	**548393**	**685492**	**1028238**	**1370984**	**2056476**	**2741967**	**3427459**	**6854919**	**13709837**	**34274594**	**6854919**	**137098374**
20	71062	106593	142124	**213186**	**284248**	**426372**	**568496**	**710620**	**1065930**	**1421240**	**2131860**	**2842481**	**3553101**	**7106202**	**14212403**	**35531008**	**7106202**	**142124033**
21	73490	110235	146980	**220470**	**293959**	**440939**	**587919**	**734899**	**1102348**	**1469797**	**2204696**	**2939595**	**3674494**	**7348987**	**14697974**	**36744936**	**7348987**	**146979742**
22	75836	113753	**151671**	**227507**	**303342**	**455014**	**606685**	**758356**	**1137534**	**1516712**	**2275069**	**3033425**	**3791781**	**7583562**	**15167125**	**37917812**	**7583562**	**151671248**
23	78102	117153	**156204**	**234306**	**312408**	**468612**	**624816**	**781021**	**1171531**	**1562041**	**2343062**	**3124082**	**3905103**	**7810205**	**15620410**	**39051026**	**7810205**	**156204105**
24	80292	120438	**160584**	**240876**	**321167**	**481751**	**642335**	**802918**	**1204378**	**1605837**	**2408755**	**3211674**	**4014592**	**8029184**	**16058368**	**40145919**	**8029184**	**160583676**
25	82408	123611	**164815**	**247223**	**329630**	**494445**	**659261**	**824076**	**1236114**	**1648151**	**2472227**	**3296303**	**4120379**	**8240757**	**16481515**	**41203786**	**8240757**	**164815146**
30	91960	137940	**183920**	**275881**	**367841**	**551761**	**735682**	**919602**	**1379403**	**1839205**	**2758807**	**3678409**	**4598011**	**9196023**	**18392045**	**45980114**	**9196023**	**183920454**
35	100003	**150005**	**200007**	**300010**	**400013**	**600020**	**800026**	**1000033**	**1500050**	**2000066**	**3000099**	**4000132**	**5000165**	**10000331**	**20000661**	**50001653**	**10000331**	**200006611**
50	117278	**175917**	**234556**	**351834**	**469112**	**703669**	**938225**	**1172781**	**1759171**	**2345562**	**3518343**	**4691124**	**5863904**	**11727809**	**23455618**	**58639045**	**11727809**	**234556179**

2.4.3 Influences on Landlords

In DETR (2000), the major influences on landlords were overseas investment criteria, property appraisal and performance measurement issues and property funding criteria. In addition to these, developments in financing and investment have included the securitisation of different aspects of the property cash flow (the fixed current rent secured by the unexpired term of the lease and the upwards-only rent review, the possible increase in rent at rent review within the lease and the property residual value after the lease expires), the pensions debate and the ability of long leased property to give a long term stable cash flow, and the urban regeneration issue

Many of these influences revolve around the perceived security of income provided by the long-term lease and the floor to the cash flow provided by the upwards-only rent review. This security is attractive to investors from the UK and overseas and finance providers. There is no doubt that this income is bond like in nature and the pricing of that bond is based upon the quality of the contract rather than the property. Downside volatility has a floor attached subject only to the covenant strength of the tenant. The equity elements are those which are market based rather than contract based and can be either property market based (standard reviews to market rents and residual property values) or finance market based (retail price or turnover rent revisions).

The increasing awareness of the variety of bond and equity type characteristics of the property income flow, identified in the early 1990s with the emergence of significant over-renting, and enhanced by the financial innovation of the late 1990s and early 2000s, has also raised awareness of the possible benefits of shorter, more flexible leases. The rise of serviced offices, workspace, the mixing of long leases, short leases and serviced office space in individual buildings such as Marble Arch Tower and the two Land Flex buildings are all signs that some landlords are attempting to provide a non-standard product with non-standard occupation contracts. However, these contracts are more susceptible to short term economic variations and therefore cash flows will be capitalised taking into account the greater variation possible around expected outcomes. In addition, where finance is required, a less certain outlook for the funding body is going to raise the cost of the finance and Maxted and Porter (2003) report that lease structure does influence cost and availability of finance.

One area of Government policy that may be affected by changes to lease structures and changing landlord attitudes is urban regeneration. Adair, *et al* (1998) report that private finance is a central theme in urban policy and they also report that private investors have as a primary motive the expectation that they will earn higher returns from urban regeneration projects as perceived risks are higher, but also look to evaluate and manage risk no differently to investment in any other property sub-market. IPF (2000) report that lease and tenant criteria are very high in UK investors' lists of risk management factors. Therefore the impact of changing lease structures of perceived risk of cash flow will have precisely the same effect on the viability of urban regeneration as it will on investment in other markets. Higher perceived risks demand higher risk premiums and therefore higher expected returns. Both capital asset and rent pricing is therefore a fundamental issue with the hope from landlords that different lease choices should not impact on returns. This assumes different

packages are priced for risk and return and that tenants pay more for their optimum lease.

Unless occupiers pay higher rents for the more flexible contracts, they will obviously have diminished capital values/prices on account of additional risk. If occupiers are getting a more flexible contract, then they should be willing pay more annual rent for the contract. But Crosby *et al*, (2003) found that while some corporate tenants were prepared to pay more for changes in leases, most stated that they would not. While tenants expect to obtain a less onerous product at the same price, or even give the impression that they are not prepared to pay more for the required product, this remains a constraint on landlords offering that product.

If pricing is a key component in this discussion, then valuation, which is the estimate of price in the absence of a transaction, is also important. Valuation for performance measurement was one of the important constraints in the ability of landlords to accept shorter leases, break clauses and other non-standard terms identified in the DETR (2000) report. There was some evidence that valuers assumed worse case scenarios when assessing future probabilities of certain items occurring; for example, that break clauses were always operated or lease renewals did not occur, even though there was little evidence of the incidence of operated breaks or renewals or that information on the incidences was even being collected. Pricing models were traditional and there was no technical analysis being undertaken, with no proprietary models available for purchase to help the assessment of the value of individual lease terms. There is now evidence of technical support in the form of lease pricing models and that the data on the incidence of breaks and renewals is being collected within IPD and within a few individual organisations. Whether these changes can be seen to have introduced more systematic pricing of leases is developed further in Chapter Six.

2.4.4 Influences on Tenants

The main influences on tenants identified in DETR (2000) were changing business practices and international comparisons, in addition to the accounting changes already discussed above.

Although DETR (2000) identified some convergence of international leasing conventions, the UK was at one end of a spectrum concerning lease length and the use of upwards only rent reviews. This combination, although attractive to overseas investors according to annual survey work undertaken in the 1990s by Gallup/Richard Ellis, was not thought to be attractive to overseas occupiers.

Crosby, *et al*, (2003), using survey evidence from 139 corporate tenants, find that 50% of international corporate occupiers feel that the UK leasehold system is unsatisfactory and undermines their ability to operate effectively. By comparison, 30% of UK corporate tenants feel this way. The main concern is lease length with over 45% of international corporate tenants reporting it is a major problem regularly and only 10% of UK corporate tenants. The same sort of responses are given for break clauses.

Overall, 27% of tenants to the survey suggested that the UK system of leasing is unsatisfactory and ranked long lease length as the major issue. Asked which lease

clauses were a major problem regularly or occasionally, 54% suggested lease length, followed by 51% (lack of) breaks, 51% assignment and sub-letting issues, 38% repairing liabilities and then 31% review type. The upwards-only review was therefore fifth on the list of tenant issues and exit strategies are of more concern. If lease lengths are shorter and breaks more prevalent, the adverse effects of an upwards only review on tenants are reduced so these responses show a picture of the overall package as much as they do for the individual terms of the lease.

The different requirements of occupiers for different core and periphery business operations was identified in Lizieri, *et al*, (1997), often wanting shorter more flexible terms for their periphery operations. Other business practice issues discussed in DETR (2000) included changes in the organisation of production and distribution, the impact of changes in information technology and changes in how goods are purchased. Change in addition to impacting on the amount, location and configuration of space required, can also impact on the terms under which the space is occupied. For example, short-term contracts in the distribution industry or on account of outsourcing certain activities need to be matched by the ability to break the occupation of property if the contract is terminated. Gibson and Luck (2003) suggest that the major changes over the last 10 years have been the increase in e-business, e-procurement and teleworking and also suggest that these all have implications for the management of space, and lease construction is an important part of that management. However, they do not suggest what those implications might consist off and therefore the future requirements of occupiers are less easy to identify than the needs of landlords. However, it is clear from Crosby, *et al* (2003) that generally shorter lease lengths and easier entry and exit strategies are what the corporate occupiers think they require.

A further influence on certain tenants arises out of the use of the sale and leaseback as a means of raising finance.. Here the potential tenant is also the vendor of the property investment and has the dual motives of an occupational tenant and an investor attempting to maximise value on sale. In this situation, a balance has to be struck between the two objectives and an examination of lease structures in this situation may prove instructive.

For the small business tenant there is currently no evidence of what they think concerning leases. However, there is survey work of small and medium sized business tenants that does ask just one question concerning property matters and on the surface it appears to suggest that small business tenants are much less concerned with their property than with most other issues. Michaelis, *et al*, (2001) find that suitability of premises is below Taxation, Cash Flow and Finance, Sales and Marketing, Regulation, Staff, the Economic Environment and only just above New Technology in a list of primary concerns. Leases are not included in the survey. Although this is a survey of existing occupiers (and a more interesting group would be those 80% of business proprietors who have started and failed in business as exiting from the property may be a larger problem than occupying under an existing lease), it does suggest that property matters are not high on the agenda of SMEs in the UK.

The final report will address the question of tenants' views in detail.

2.4.5 The Code of Practice

The Code of Practice is itself part of the current framework of the commercial leasing process, and a potential influence on landlords and tenants during negotiations. The outcome of the dissemination and perceived impact of the Code are central parts of the data collection process for this project; however, the methods by which that dissemination and impact is achieved is not. Interested parties have been invited by Government to submit their own evidence including any on the way in which the Code is being disseminated. Nevertheless, it is informative to look more generally at property press commentaries on leasing and the Code as a barometer of both the effect of dissemination and of the impact of the Code. Furthermore, those outside of the professional bodies or property industry or occupier federations may have few other sources of information on the Code apart from the general property press.

Comments in these publications also give an idea of the views both expressed and read by the property industry. Similarly, the law press is useful as an indicator of what the lawyers are saying and reading about the Code.

2.4.5.1 The Property Press

Estates Gazette (EG) and Property Week (PW) are weekly publications widely read by property professionals. Since its launch in April 2002, the Code has been referred to in a total of 102 separate features in these publications. These features include editorial comment, short news items and longer articles. In addition there have been letters in both publications. In April 2002 the EG carried two articles summarising and discussing the new Code and its implications. PW also had two short items announcing the launch.

Since then there have been many items specifically about the Code, particularly with warnings of legislation. A quarter of all of the articles have been about specific issues such as insurance, subletting or break clauses; the Code is mentioned in relation to those issues. Many writers have expressed their views on the Code, some saying that it could encourage a change in attitudes, others being very doubtful of its ability to have an effect. Likewise the expressed opinion is divided on the flexibility of the current market.

September 2002 saw the first items that indicated a concern that the Code was having little effect and warnings that the industry needed to respond positively. October and November 2002 had the highest count of items mentioning the Code – 13 and 16 respectively. Three items in October reported the RICS writing to agents telling them to take the Code seriously and there was much discussion of the changing nature of the market/industry and the impact of the code. Since April 2003, there has been a change of emphasis with some of the attention turning to the Treasury, and also articles linking the aims of the Code with proposed Stamp Duty changes discussed above.

In addition, there have been approximately another 20 items in these two publications about the flexibility of commercial leases in the UK, which do not specifically mention the Code. A quarter of these items have focused on specific landlords such as Land Securities, Arlington and Workspace and the flexibility that they are offering

tenants. Another four of them remark that more flexibility is needed in commercial leases. Two articles report research showing a downward trend in lease lengths. Amongst the other articles are commentaries on flexibility in specific markets and the general changes to the property market with Stamp Duty and Real Estate Investment Trusts.

2.4.5.2 Solicitors' Press

There are three main weekly publications read by solicitors: Law Society's Gazette (LG), New Law Journal (NLJ) and Solicitors Journal (SJ). There have been eight items mentioning the Code since April 2002, five of these being in SJ. The first mention of the Code, in May 2002, was a commentary in SJ disapproving of the Code and saying it would have little effect. Since then there have been four articles summarising and reviewing the Code, and two that deal with specific issues and mention the Code in this context. One article reviewed the BPF/BCO model lease clauses with reference to the Code.

Given the widespread difference in the dissemination in the property press compared to the solicitors' journals, it might be expected that the research questionnaires will find that awareness of the Code is far greater amongst property professionals then lawyers. However, lawyers operating in the landlord and tenant arena are also likely to read the property press and DETR (2000) found that 80% of solicitors were aware of the existence of the first Code of Practice while only around 70% of property professionals were similarly aware.

Overall, although the dissemination of the first Code was not subject to the same press coverage analysis, there seems little doubt that the attempts to disseminate the second Code of Practice have been far superior to those attaching to its predecessor and the research team would expect to find that awareness will be generally higher than in DETR (2000). Although the major theme coming out of the articles in the property press relates to specific lease terms and the next two most discussed aspects are the "threat" of legislation and that the Code is not working, a number discuss how the market is achieving flexibility by itself and how specific landlords are delivering a more flexible product. However, a number of articles also suggest that tenants are not willing to pay for flexibility. Some of these issues are addressed in the interview survey and will be addressed in the questionnaire surveys for the final report.

2.5 Summary Of Findings

2.5.1 General Economic Background

Overall, the new Code of Practice for Commercial Leases has been introduced in a significantly different economy than the first Code of Practice. In 1996, 1997 and 1998, the first three years of operation of the first Code, there was an improving market and generally increased growth rates in many of the key economic indicators. However, the economy has weakened since then with 2002, the year of the introduction of the second Code, being especially weak.

The growth in GDP has slowed to a point where, for the first quarter of 2003, it was only just positive. Manufacturing output had exhibited positive growth every year from 1993 to 2000 but then fell in 2001 and 2002 before rising marginally in the first quarter of 2003. In this latter period the unemployment claimant count increased, the first time this had happened since 1993. Retail sales volume and consumer expenditure had continued to be strong in 2001 and 2002. However, the 2003 first quarter results showed a significant downturn as consumers' expenditure growth was low and retail sales volume fell.

Bankruptcy numbers, having fallen during 1996 and 1997, started to increase again during 1998 and have continued do so since then. There was a large increase in 1999, followed by a very gradual rise until 2002 when the total increased by nearly 5%. Insolvencies in the service sector account for nearly the whole of the increase in bankruptcies between 1995 and 2002.

Although figures from the DTI indicate that the total number of businesses rose slowly in 1998, 1999 and 2000, the reports from Barclays Bank suggest that the number of businesses has shrunk every quarter since the beginning of 2000 until the first quarter 2003.

In DETR (2000), the economic environment suggested a lettings market recovering from the property crash of the early 1990s. If no major structural change was taking place in leases and trends were totally market driven, the demand side indicators should have led to a reversal in the trend apparent in the early 1990s for leases to become shorter and more flexible. In fact DETR (2000) found that from around 1995 onwards, lease structures remained relatively static and were certainly not returning to the long, inflexible terms of the late 1980s. This was evidence that progress had been made towards the Government objectives of more flexible leasing despite the fact that lease structures had not changed significantly within the first three years of the operation of the first Code.

As indicated previously, the current review of the operation of the second Code of Practice takes place in a different environment. Although the retail indicators suggest that the market resisted any down turn until the end of 2002, the demand side drivers are significantly weaker and therefore it would be expected that tenants would be able to negotiate more flexible terms in all three main sectors of the property market purely on account of the changed market state between April 2002 and April 2003.

The fact that nearly half of new businesses do not appear to survive more than four years has major implications for lease structures. What is not clear from any of the statistics is whether it is the small businesses that fold early or the survival rates apply to all types and sizes of businesses. Nevertheless, these survival rates raise significant questions concerning the length of the premises contract and exit strategies.

2.5.2 The Property Market

The commercial property market demonstrates some very different characteristics to those found at the time the first Code was introduced. The majority of key economic indicators suggested that office and industrial letting markets should have been experiencing major weaknesses in 2002 and this is apparent in the property market indicators examined in this review. The retail sector has been shielded from the economic downturn to some extent by the continued rise in consumer credit. However, growth in the main economic indicators which drive activity and values in retail market have reduced sharply in the first quarter of 2003 and it would be expected that the relatively good performance of retail property markets will be harder to achieve in 2003.

Real headline rental growth rates are negative in the case of industrial property in 2002 and have averaged less than 1% in the office market since 1999, although the real figure could be less as effective rents may be lower. Total returns to these two sectors have held up surprisingly well due to falls in the equivalent yield when increases may have been expected, but this may be a product of the weakness of equity markets, low interest rates and the high comparative income yields available in the property market, all fuelled by availability of finance. Construction orders are falling in both these sectors and vacancy rates have risen with the London Office market showing major weaknesses with a surplus of supply over demand, falling rents and increasingly generous letting packages.

Against this market background, lending to the property sector is still buoyant with institutions and banks continuing to provide finance and funds for asset purchases but there are some small signs of a more cautious approach in 2002, with slightly higher interest rate margins in some banking sectors, a forecast of a reducing growth rate in outstanding bank lending for 2003 and a significant reduction in the amount of new institutional money to property in 2002. Equivalent yields suggest that this did not affect property capital markets in 2002 but occupational market weaknesses should eventually feed into capital markets, as would any lease structure change.

2.5.3 The Institutional Framework of the Commercial Leasing Process

2.5.3.1 Legal

The largely non-interventionist legal framework for commercial lease terms changed just as the first Code of Practice was launched, with the Landlord and Tenant (Covenants) Act 1995. This abolished privity of contract and allowing landlords to have greater control over assignments, most notably by an authorised guarantee agreement (an AGA). Such a device when made automatic on lease assignment can make the lease difficult to assign and therefore restrict flexibility. The current Code of Practice specifically recommends that AGAs should not be required unless absolutely necessary.

The issue of subletting has come in to the spotlight with the Court of Appeal ruling in *Allied Dunbar v Homebase Ltd;* the court has refused to accept a well-used (but previously untested) device for side stepping conditions in a head lease that dictate the

terms of any subletting of the whole. The imposition of strict controls on subletting can obviously seriously restrict the tenant's ability to sublet in a market where it is no longer possible to match the terms achieved in the head lease. Such restrictions on subletting can be seen as a device that constrains flexibility in the subletting market and, by the way that they attempt to hide falls in rental value, they can also be viewed as a mechanism to obscure market transparency.

As a result of the Land Registration Act 2002, all new leases are, since 13 October 2003, subject to new registration requirements. This will involve lease documentation being open to public inspection unless specifically exempted. This could have a substantive impact on lease structures as concerns over confidentiality may encourage landlords to keep the lease length at seven years or less.

Part II of the 1954 Act is to be amended by the Regulatory Reform (Business Tenancies)(England and Wales) Order 2003 ('RRO 2003'). Most of the amendments affect the procedure for contracting out, termination and renewal. It is possible that the simplified process for contracting out may lead to an increase in the number of tenancies outside of the Act. However, these changes do not come into operation until June 1st 2004 and any such effect will fall outside the period of monitoring covered by this research. .

2.5.3.2 Accounting and Taxation Issues

Changes to the way occupational leases are dealt with in company accounts are still only proposals, and it remains to be seen if, when brought into effect, the market expectation of shorter leases is fulfilled.

Similarly the result of the new lease stamp duty regime is awaited. The changes came into effect in December 2003 and require all leases to be capitalised at a standard 3.5% discount rate for the term of the lease, duty of 1% being charged to the occupier where the capitalised value exceeds the threshold of £150,000. The impact of these changes on landlord and tenant in lease negotiations may lead to shorter leases, whilst it is possible that, in order to avoid increased tax liabilities, longer leases have may be signed in the period immediately prior to the changes, thus influencing lease structures in the last year of the Code monitoring period..

2.5.3.3 Influences on Landlords

DETR (2000) identified a number of possible influences on landlords and these have yet to be fully tested in this research. Attitudes of landlords will be part of the objectives for the final report. However, the interview surveys do give some insight into the effect on lease structures and these are set out in section 7.3.6 of this chapter.

A range of possible influences has been suggested and a number of these were set out and investigated in DETR (2000). Some were concerned with the long-term security of the cash flow and included the effect on funding and appraisal of properties let on short leases compared to those on longer leases. Concerns regarding the effect of shorter and or more flexible leases on property investment asset values in urban regeneration areas in particular and, more generally, within pension funds have been raised by parts of the property industry. There is some evidence that lenders do offer

different terms on account of lease structure and that valuers discount for short unexpired terms and breaks. While it is not surprising that a more risky cash flow is discounted at a greater rate, the accurate pricing of the differential is important and there is evidence of more sophisticated pricing products in the market to assist this process. Section 7.2.7 of this chapter discusses whether any evidence of lease pricing exists.

However, there are also signs that some landlords are providing different types of products with non-standard occupation contracts. As suggested above, cash flows from these arrangements may be less predictable, this may be reflected in their capitalisation, and there can also be an effect on the cost and availability of finance. However the extent to which landlords' attitudes have changed in unclear at present and will be examined in the Final Report.

There is also concern that some tenants are not prepared to pay for better lease terms and Crosby, *et al* (2003) and the interview survey evidence support these anxieties. If tenants do expect to obtain a less onerous product at the same price, or even give the impression that they are not prepared to pay more for the required product, this will be a constraint on landlords offering that product.

2.5.3.4 Influences on Tenants

A recent survey of corporate tenants showed that there is some dissatisfaction with the UK leasehold system and a perception that it undermines their ability to operate effectively. The international corporate tenants are significantly more dissatisfied than their UK counterparts. Their main concerns are lease length and break clauses (or lack of them). In the same survey the upwards-only review was fifth on the list of tenant issues. However, shorter leases and breaks dissipate many of the onerous effects of the upwards only review so it is difficult to interpret this response precisely.

The pricing issue remains a question for tenants as well as for landlords. As summarised previously, it is clear that not all tenants are prepared to pay for better terms and the interview surveys give some insight into the pricing issue from both landlord and tenant perspectives.

Changing business practices continue to have an effect with differences in attitude to leases on core and periphery space requirements. Short-term contracts in the distribution industry, or on account of outsourcing certain activities, need to be matched by the ability to break the occupation of property if the contract is terminated. Major changes over the last 10 years have been the increase in e-business, e-procurement and teleworking but the implications of this for the lease requirements of tenants are not clear. Shorter lease lengths and easier entry and exit strategies are what the corporate occupiers think they require. However, where sale and leasebacks are occurring, different criteria may apply.

There is currently no evidence of what the small business tenants think concerning leases, although some surveys suggest that property matters are not high on the agenda of SMEs in the UK. This is hardly surprising given that these surveys are of tenants still in business answering questions about the difficulties of obtaining suitable accommodation.

The tenants' surveys are needed to add to the understanding of what influences tenants in lease negotiations.

2.5.3.5 The Code of Practice

This is part of the context of landlord and tenant negotiations. A review of the property press gives an insight into the dissemination and impact of the Code, particularly with regard to property professionals and lawyers. From this review it is clear that the current Code has been well publicised and discussed, and awareness amongst those professionals involved in lease negotiations is expected to be higher than in DETR (2000). This hypothesis will be examined in the Final Report.

Chapter Three - Analysis of Lease Structures within the Investment Property Databank

3.1 Introduction

The Investment Property Databank (IPD) holds records for 11,400 properties with a capital value of £102 billion at December 31st 2002 (IPD, 2003). These records contain individual occupational lease details as well as value, physical, tenant and location data. This enables analysis of lease structures by reference to un-weighted as well as value and floorspace-weighted criteria and also by property type, location and physical quality.

There are a number of technical issues raised by this type of analysis and Annex One of this paper sets them out, indicating the limitations of this data set in identifying changing lease structures over the recent past, a period which includes the first year of the operation of the Code of Practice for Commercial Leases. Many of these issues are equally relevant to other analyses of property markets, not just lease structures

The two main issues relate to the coverage of the IPD and to bias in the longitudinal time series data. Regarding coverage, the data relates to only the better quality property stock which is in the ownership of the financial institutions and the major property companies and is often occupied by the major corporate tenants. In previous analyses, these owners and tenants were found to occupy on longer leases and different terms to other commercial property owned by smaller scale landlords and occupied by small and medium sized enterprises, often in less valuable locations (DETR, 2000). For this reason analysis of IPD is not indicative of the whole market, just the segment of the market relating to the larger property owning institutions and companies. Further analysis of the Valuation Office Data is therefore necessary to obtain a wider view of the market. However, the IPD data collection is well managed with verification procedures in place on data supplied by expert landlords and the data is individual and relatively comprehensive.

The question of bias has been raised in a number of studies and is very fully discussed in Appendix One and DETR (2000). The time series data for previous studies has been collated longitudinally and the data recorded is for leases current in the latest dataset used (i.e. still unexpired at the end of the analysis period). For example, at the end of the year 2000, all leases in the dataset are scrutinised. To ascertain average lease length for the years 1995 to 2000, leases with a start date of 1995, 1996, etc, are separately extracted and the average lease length calculated. However, leases started in 1995 but for a period of less than 5 years, have expired by 2000 and are therefore excluded. This would make it appear that average lease lengths for the earlier period were longer than in fact they were and exaggerate any downward trend. In order to deal with this problem, some previous analyses (BPF, 2002) have excluded very short leases from their analysis but in the current study a cross sectional approach has been adopted. Lease lengths and other data have been collated and analysed separately for each year; for example, the historical archive dataset for the year 2000 has been used to identify lease data within leases signed in that year only and the relevant archive dataset has been used for each of the years from 1997 to 2002.

Using cross sectional data does introduce a different data issue which must be addressed. Most past lease structure analyses rely on two major measures which are; first, the reporting of any analyses by number of leases and second, by the value/size of rent/floorspace in those leases. As floorspace data cannot always be matched to individual leases within properties, the main indicator of the size and value of lettings has been taken as the rent passing under the contract, termed rent weighting. IPD only record the rent passing under the contract at the year end so if the lease is subject to a rent-free period or a rent reduction and this arrangement is still in place at the end of the year, it is recorded at the nil or reduced rent. In the case of a rent-free period, the lease term is zero weighted and is therefore excluded from the analysis. A cross-sectional analysis only uses leases signed in the year of the databank so there are more likely to be properties with existing rent frees still operating. If longer leases are more likely to attract longer rent frees, then longer leases are ignored in these rent-weighted figures.

To counter this anomaly, market rental value estimates have also been utilised to produce weighted by value analyses known as estimated rental value (ERV) weighting. Although these are valuation based figures and previous research (Crosby and Murdoch, 2001) has indicated that there are inconsistencies with the basis of these valuations, they provide a more realistic view of the value weighted trends in lease length and other terms.

Annex One includes more detailed discussion of these and other technical issues addressed in collating and analysing IPD lease data.

The analysis has been undertaken from 1997 to the end of 2002 as 1997 is the first date from which a cross-sectional analysis can take place. DETR (2000) reported lease structures up to 1998 and therefore an overlap with the previous work has been established, enabling trends over the last 12 years to be established, although the 1990 to 1996 analysis does have the longitudinal biases indicated previously.

The IPD can be segmented in a number of ways; spatially, by property type, by ownership, by physical characteristics and by different lease structures. For the interim report, the major analysis has been carried out by reference to the three main commercial property sectors; retail, office and industrial. In addition, where appropriate, the three main property types have been analysed by reference to the ten standard IPD Performance Analysis Service (PAS) segments which are as follows:

Retail
Standard shops – South East
Standard Shops – Rest of UK
Shopping Centres
Retail Warehouses

Office
Offices – London City
Offices – London West End
Offices - Rest of South East
Offices - Rest of UK

Industrial
Industrials - South East
Industrials - Rest of UK

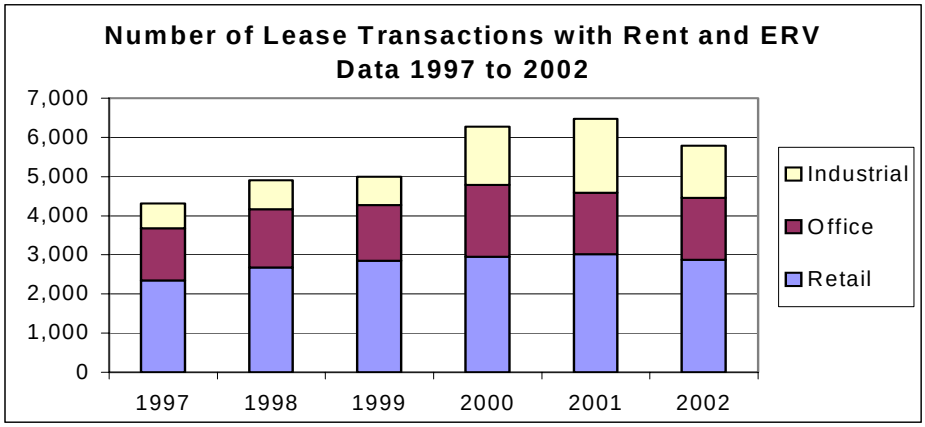
Further disaggregation including quality and age splits are available to the research team but the number of leases in each segment reduces so trends can be more easily distorted by a few individual transactions below these levels. Even at PAS segment levels some interesting deviations from the trends caused by particular sets of transactions can be isolated.

Table 3.1 sets out the number of lease transactions on which this analysis is based. These transactions are of both new lettings and lease renewals. IPD is not yet able to distinguish between these two types of transaction. Even though they have included a new field in their data collection form, most data providers are not yet responding to this field. IPD have tracked some of their transactions but tenant name changes and other factors make this a difficult exercise. There is a subset of transactions which are known to be either renewals or new lettings but they are not a similar sample to the other transactions where the type of transaction is not known, so a comparison is not possible. This element has been flagged by the research team as warranting further investigation in time for the Final Report. It is hoped to be able to create a more representative sample of new lettings on which reliable analysis can be undertaken for that report.

Table 3.1 : Number of transactions each year 1997 to 2002

	Number of new leases					
Principal Commercial Sectors	**1997**	**1998**	**1999**	**2000**	**2001**	**2002**
Retail	2,353	2,673	2,843	2,952	3,017	2,868
Office	1,322	1,493	1,425	1,827	1,569	1,588
Industrial	636	739	732	1,494	1,891	1,330
PAS Segments						
Standard Retails - South East	431	548	549	656	525	529
Standard Retails - Rest of UK	304	288	346	311	347	347
Shopping Centres	1,363	1,597	1,699	1,657	1,858	1,670
Retail Warehouses	255	240	249	328	287	322
Offices - City	222	265	213	316	296	304
Offices - West End	368	428	396	491	495	530
Offices - Rest of South East	430	474	509	627	482	421
Offices - Rest of UK	302	326	307	393	296	333
Industrials - South East	382	447	424	592	630	677
Industrials - Rest of UK	254	292	308	902	1,261	653
All Segments (excl other)	**4311**	**4905**	**5000**	**6273**	**6477**	**5786**

The total number of transactions rose from 1997 until 2001 until reducing in 2002 in line with the downturn in the market during the last year. The office market appeared to peak in the previous year of 2000 compared to the other two sectors although this is mainly in offices outside London. The number of office transactions in London has remained fairly stable since 2000 although the amount of floorspace let recorded in the 2002 databank is up 50% on the year 2000. However, floorspace related data must be used carefully as it covers only about two-thirds of the total number of lettings within IPD (see Figure 3.1). The most volatile market was in Industrials outside of the South-East where transactions rose from around 300 in 1998 and 1999 to over 900 in 2000 and 1250 in 2001 before falling back to 650 in 2002.



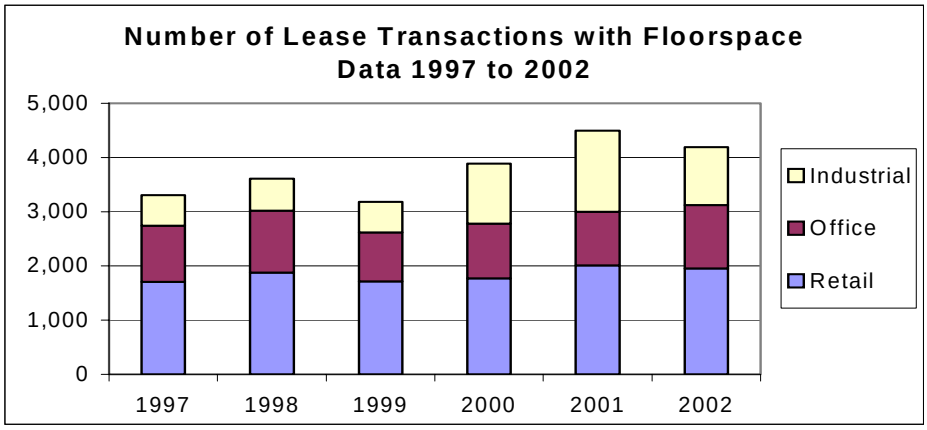


Figure 3.1 : Numbers of Lease Transactions in the IPD 1997 - 2002

3.2. Average Lease Term

Average lease lengths ignoring break clauses have continued to decline across all three main sectors between 1997 and 2002. Table 3.2 and Figure 3.2 illustrate that the average un-weighted all property lease length fell from nearly 10 years in 1997 to just over 8 years in 2002.

Table 3.2 : Average Lease Lengths – Main Sectors 1997 to 2002

	1997	1998	1999	2000	2001	2002
Unweighted						
Retail	10.5	9.6	9.9	9.4	9.6	9.2
Office	8.0	7.6	7.2	8.3	7.7	7.6
Industrial	9.8	8.9	8.4	7.5	7.8	6.9
All Sectors (excl other)	9.6	8.9	8.9	8.6	8.6	8.2
Rent Weighted						
Retail	16.9	15.4	15.7	14.5	13.8	14.1
Office	14.8	12.7	12.5	13.4	12.5	11.0
Industrial	16.7	13.9	14.1	13.8	12.8	11.7
All Sectors (excl other)	16.2	14.2	14.4	13.9	13.1	12.6
Floorspace Weighted						
Retail	17.7	17.1	15.7	15.5	14.4	16.1
Office	13.0	12.3	13.7	13.0	14.3	14.4
Industrial	16.5	13.2	13.1	12.9	12.7	10.8
All Sectors (excl other)	16.0	14.2	14.1	13.5	13.7	13.4
ERV Weighted						
Retail	17.1	15.3	15.5	14.7	14.0	14.4
Office	15.8	14.5	13.8	14.4	13.1	13.7
Industrial	16.7	14.2	14.0	13.9	12.7	12.0
All Sectors (excl other)	16.4	14.8	14.6	14.4	13.5	13.8

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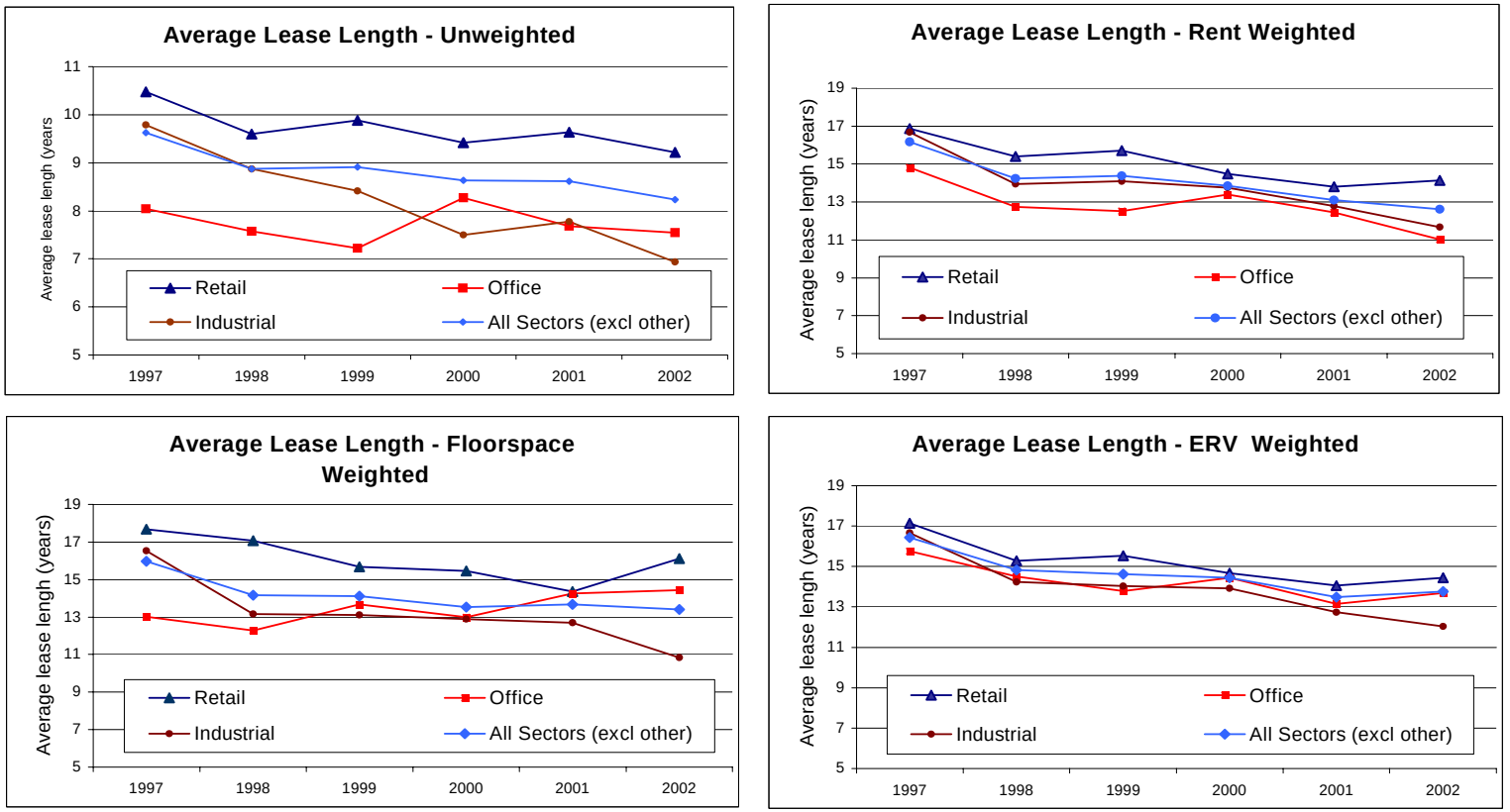


Figure 3.2 : Average Lease Lengths

The biggest fall is in the industrial sector which appears now to have lower lease lengths than the office sector. Throughout the period, retail leases were the longest. Weighted figures also show falls in most years with the ERV weighted average lease lengths all above 15 years in 1997 and all below 15 years by 2002. There are some conflicting stories from the data concerning 2002. Rent weighted offices move down while ERV weighted office lease lengths move up. As already discussed, rent weighted figures ignore properties where any rent free periods are still in operation so this suggests there are some larger lettings on longer leases with rent free periods.

In fact, there were a number of larger London lettings on long rent-free periods, but also on longer than average leases, and these have created this increase. If the West End of London is excluded from the figures the ERV weighted averages actually falls in 2002 by 1.3 yrs rather than increasing by 0.6 years.

The market analysis indicated a weaker lettings market in 2002 than in previous years especially in Central London. Even though this is also the year that the Code of Practice was introduced, there has not been an escalating downward movement in lease lengths. However, the long-term trend is downwards and the improved lettings market in the latter half of the 1990s did not lead to an increase in lease lengths.

Table 3.3 and Figure 3.3 illustrate the same average lease lengths but take into account break clauses. The lease term is taken as the term to the first break where a break or breaks exist in the lease. Between 1997 and 2002, the All Property un-weighted average lease length has fallen from below 9 years to over 7 years and all three of the weighted lease length averages have fallen from around 15 years to around 12 years.

Table 3.3 : Average Lease Lengths to First Break – Main Sectors 1997 to 2002

	1997	1998	1999	2000	2001	2002
Unweighted						
Retail	9.9	9.1	9.3	9.0	9.2	8.5
Office	6.8	6.7	6.1	7.4	7.0	6.2
Industrial	8.2	7.9	7.3	6.4	6.8	6.0
All Sectors (excl other)	8.7	8.2	8.1	7.9	8.0	7.3
Rent Weighted						
Retail	16.2	14.9	15.4	14.1	13.5	13.0
Office	12.7	11.3	10.7	12.5	11.4	8.8
Industrial	15.0	12.7	12.6	12.9	11.5	10.0
All Sectors (excl other)	14.8	13.3	13.3	13.1	12.3	11.0
Floorspace Weighted						
Retail	17.2	16.4	15.2	15.0	14.0	15.3
Office	10.7	10.9	11.2	12.0	13.7	12.5
Industrial	14.7	11.8	11.7	12.1	11.9	8.7
All Sectors (excl other)	14.4	13.0	12.8	12.8	13.1	11.7
ERV Weighted						
Retail	16.4	14.8	15.2	14.3	13.7	13.3
Office	13.9	12.9	12.0	13.4	12.0	11.6
Industrial	14.9	12.9	12.7	13.1	11.5	10.4
All Sectors (excl other)	15.0	13.8	13.6	13.7	12.7	12.2

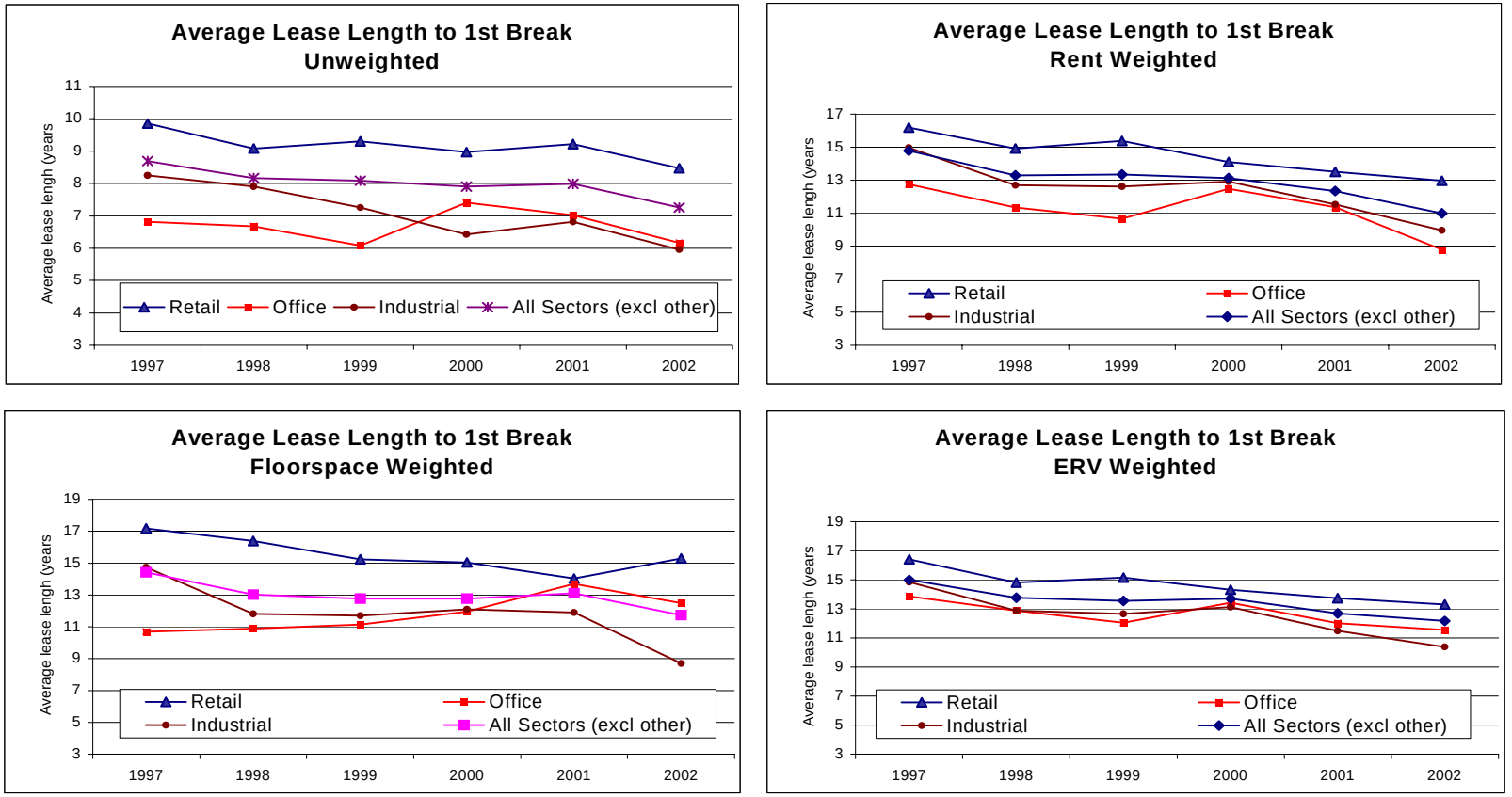


Figure 3.3 : Average Lease Length to 1st Break

Figure 3.4 illustrates that the effect of breaks has been to reduce average lease lengths by around 1 to 2 years. This gap reduced during the late 1990s but has increased again in 2002 suggesting that break clauses are more frequent and/or the first break is sooner in leases commenced in 2002 than in previous years. The largest influence of breaks on lease length is in the office and industrial sectors rather than retail.

Analysis of break clauses undertaken in Section 3.5 does indicate that in 2002, the incidence of breaks increased significantly, especially in office and retail markets but not in industrial markets, and that the time to first break also reduced significantly in higher value properties across all three sectors, especially in the office and industrial markets. In office and retail markets the increasing gap between average lease lengths including and excluding the impact of breaks is a function of both increasing incidence and reducing time to first break; in industrial markets it is a function of reducing time to first break in higher value properties only

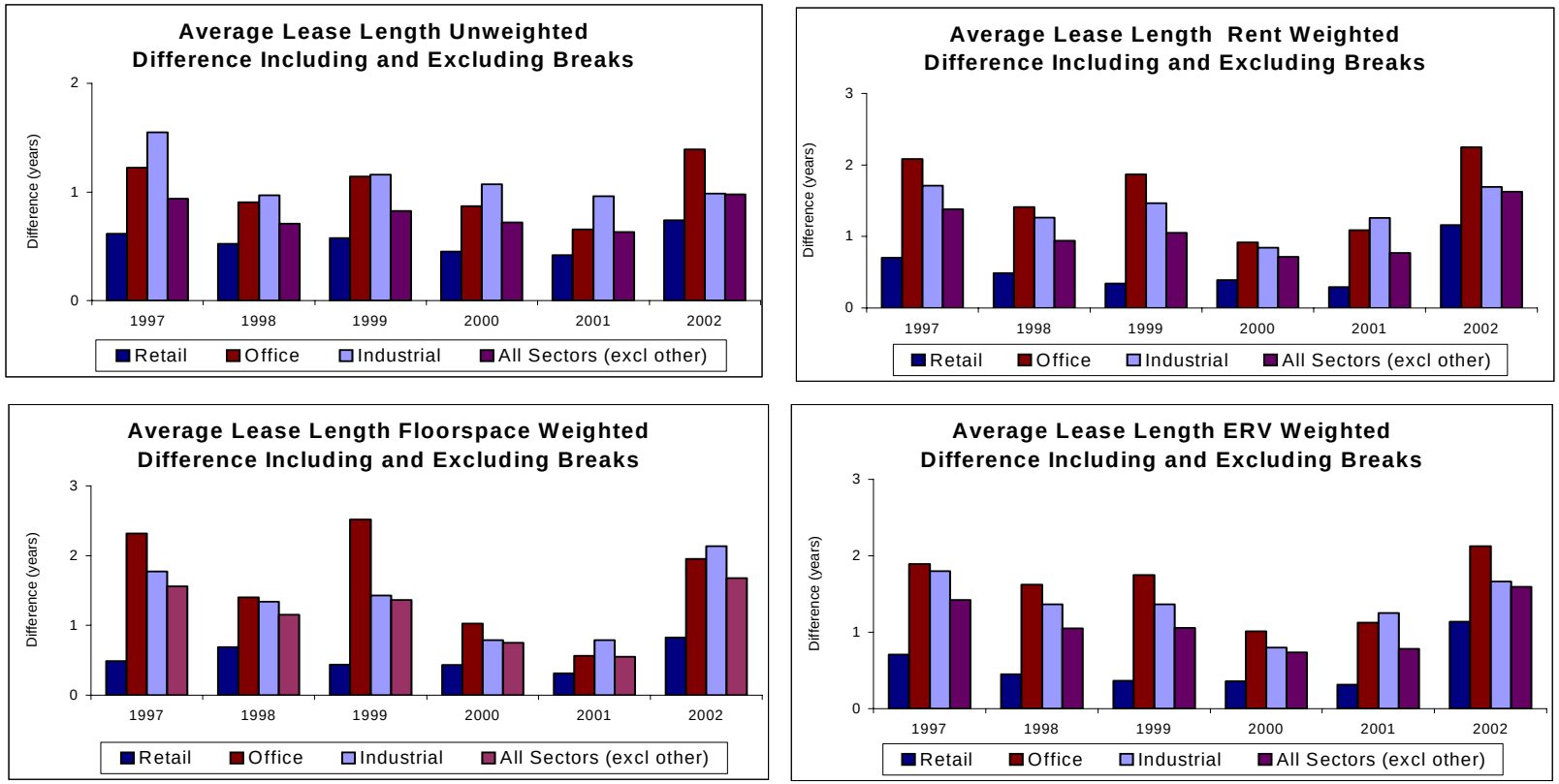


Figure 3.4 : Difference Between Average Lease Lengths Ignoring and Including Breaks

3.3. Frequency of Different Lease Lengths to 1st break

DETR (2000) reported that in 1990 around 60% by number and 90% by rent of all lettings were on 20 or 25 year leases. This does not include the effect of breaks.

If breaks are included, by 1997 just over 10% by number and 30% by rental value had lease terms of 20 years or over (Table 3.4 and Table 3.5). By 2002, the number at 20 years or over had dropped to just over 5% and by rental value this had dropped to less than 25%.

Table 3.4 : Un-weighted Frequency of Different Lease Lengths or Periods to 1st Break - 1997 and 2002

	All Prop	Retail	Office	Industrial
1997 - % of Leases				
< 1 yr	6.4%	7.6%	4.8%	5.7%
1 yr	11.3%	11.5%	12.9%	7.7%
2- 4 yrs	15.0%	12.1%	20.3%	14.5%
5 yrs	18.2%	14.2%	23.6%	22.0%
6-9 yrs	4.4%	2.1%	5.4%	11.2%
10 yrs	14.8%	14.2%	15.5%	15.4%
11-14 yrs	2.6%	2.5%	2.9%	2.2%
15 yrs	14.5%	19.7%	8.2%	8.3%
16-19 yrs	2.0%	1.6%	1.5%	4.6%
20 yrs	2.9%	2.8%	2.5%	3.9%
21-24 yrs	0.8%	1.4%	0.1%	0.2%
25 yrs	6.4%	9.3%	2.3%	4.1%
> 25 yrs	0.6%	1.0%	0.2%	0.3%
All years	100.0%	100.0%	100.0%	100.0%
2002 - % of Leases				
< 1 yr	8.6%	10.3%	7.9%	5.9%
1 yr	12.3%	12.1%	16.4%	7.8%
2- 4 yrs	20.8%	15.1%	23.2%	30.2%
5 yrs	16.6%	12.8%	18.8%	22.4%
6-9 yrs	5.7%	3.1%	6.3%	10.6%
10 yrs	11.4%	12.7%	9.8%	10.5%
11-14 yrs	2.5%	2.8%	2.5%	1.7%
15 yrs	15.4%	22.4%	9.1%	7.7%
16-19 yrs	1.4%	1.2%	2.8%	0.2%
20 yrs	2.1%	2.3%	1.9%	1.8%
21-24 yrs	0.4%	0.7%	0.3%	0.0%
25 yrs	2.5%	4.0%	0.9%	0.9%
> 25 yrs	0.4%	0.5%	0.4%	0.2%
All years	100.0%	100.0%	100.0%	100.0%

Table 3.5 : ERV Weighted Frequency of Different Lease Lengths or Period to 1st Break - 1997 and 2002

	All Prop	Retail	Office	Industrial
1997 % of ERV in Leases				
< 1 yr	2.5%	3.4%	1.5%	3.0%
1 yr	3.2%	3.7%	3.0%	2.7%
2- 4 yrs	4.6%	3.6%	5.4%	4.8%
5 yrs	9.4%	7.1%	10.3%	12.2%
6-9 yrs	3.9%	1.6%	5.3%	5.2%
10 yrs	10.2%	7.4%	12.4%	10.7%
11-14 yrs	3.9%	3.5%	5.0%	2.0%
15 yrs	23.4%	24.7%	25.1%	15.9%
16-19 yrs	5.4%	3.5%	7.8%	3.2%
20 yrs	8.6%	5.1%	9.0%	15.4%
21-24 yrs	1.0%	2.6%	0.0%	0.3%
25 yrs	20.9%	29.2%	12.8%	23.3%
> 25 yrs	3.0%	4.4%	2.4%	1.3%
All years	100.0%	100.0%	100.0%	100.0%
2002 % of ERV in Leases				
< 1 yr	4.0%	4.9%	3.1%	3.4%
1 yr	5.2%	4.3%	6.8%	4.6%
2- 4 yrs	11.7%	8.4%	14.4%	14.6%
5 yrs	10.8%	7.4%	10.8%	20.0%
6-9 yrs	3.9%	1.9%	5.1%	6.6%
10 yrs	11.1%	11.0%	11.6%	10.6%
11-14 yrs	4.0%	5.5%	3.1%	2.0%
15 yrs	20.1%	28.9%	9.1%	20.4%
16-19 yrs	4.6%	3.2%	8.3%	0.4%
20 yrs	12.0%	6.5%	20.6%	7.8%
21-24 yrs	2.5%	1.7%	4.6%	0.0%
25 yrs	9.4%	15.3%	2.1%	9.2%
> 25 yrs	0.7%	1.1%	0.3%	0.4%
All years	100.0%	100.0%	100.0%	100.0%

The incidence of long lease terms is therefore continuing to fall and they are now only used for some large value properties as measured by rent and rental value across all three sectors of the market. They are particularly prevalent in retail warehouses and offices, and more industrial properties outside of the South-East are let on longer terms than those in the South-East.

Figure 3.5 illustrates this continuing trend across the All Property index towards shorter lease terms. The slight but discernable movement of the trend lines upwards from left to right indicate an increasing number of lease terms of 15 years and less at the expense of the decreasing incidence, both un-weighted and weighted, of the longer terms of occupation. For example, the ERV weighted incidence of leases terms of less than 15 years has risen from around 30% to 40% between 1997 and 2002 and the number of leases with terms of 10 years and less has risen to over one-third.

The incidence of short lease terms of 5 years or less has increased over the period. Unweighted, these contracts constitute nearly 60% in 2002, having risen from just over 50% in 1997. ERV weighted, around 30% of 2002 lease terms are short compared to under 20% in 1997. The increase is mainly in the number of 2-4 year lease terms across all sectors and an increase in 5-year industrial lease terms.

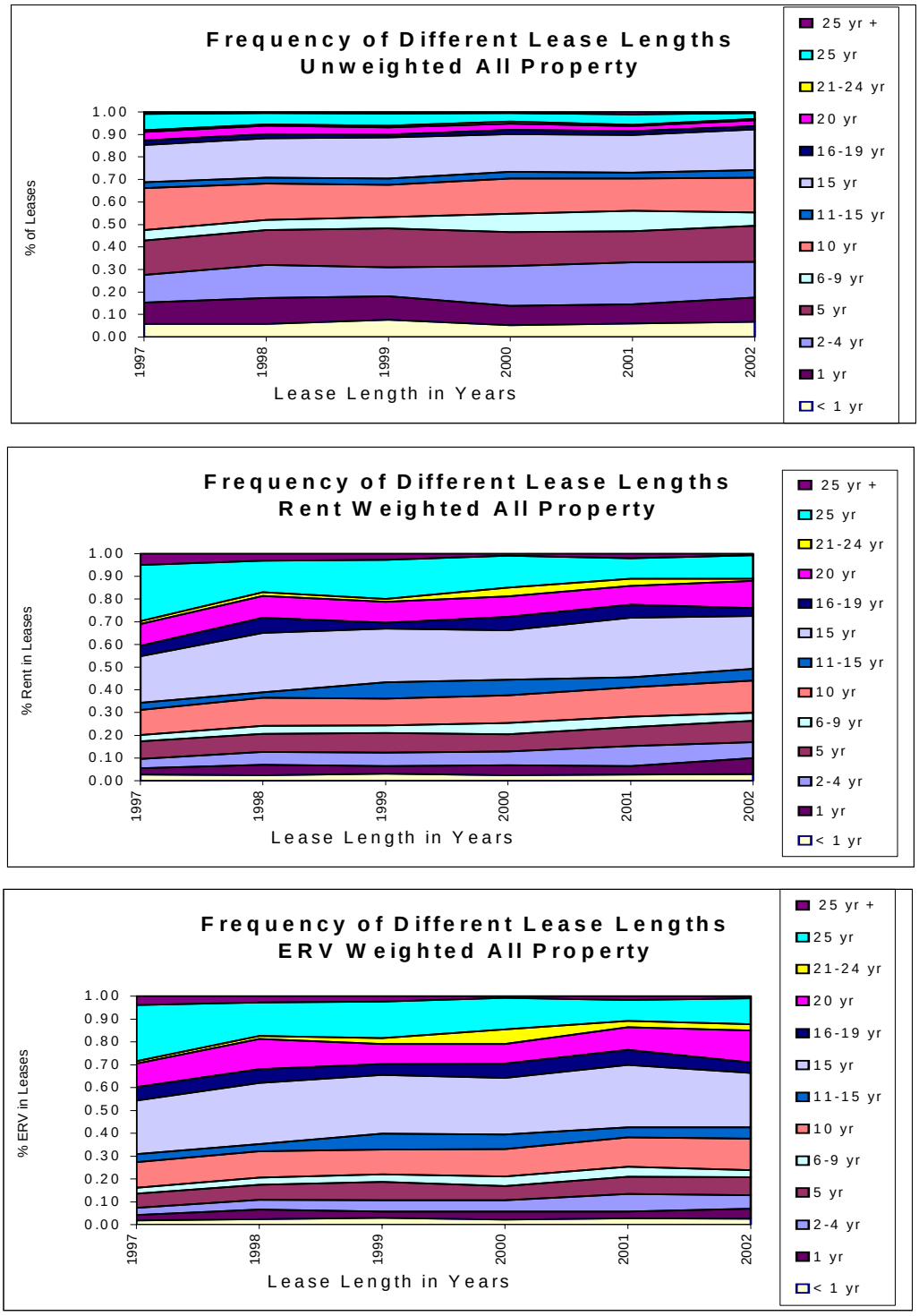


Figure 3.5 : Frequency of Different Lease Lengths/Periods to 1st Break – All Property 1997 to 2002

3.4. Rent Review

The average review term has hardly moved through the period 1997 to 2002. The standard review term is still five years and the average review term is just under five years. Tables 3.6 and 3.7 and Figures 3.6 and 3.7 set out the average review term and the distribution of different rent review periods including the number of leases without reviews.

Table 3.6 : Average Rent Review Periods Where Reviews Exist – 1997 to 2002

	1997	1998	1999	2000	2001	2002
Unweighted						
Retail	4.6	4.6	4.7	4.6	4.6	4.7
Office	4.4	4.4	4.7	4.7	4.6	4.6
Industrial	4.6	4.5	4.5	4.3	4.5	4.7
All Sectors (excl other)	4.5	4.6	4.7	4.5	4.6	4.6
Rent Weighted						
Retail	4.9	4.9	4.9	4.7	4.6	4.9
Office	4.8	4.9	4.9	4.8	5.0	4.8
Industrial	4.8	4.8	4.8	4.4	4.7	4.8
All Sectors (excl other)	4.8	4.9	4.9	4.7	4.7	4.8
Floorspace Weighted						
Retail	4.9	4.9	4.9	4.9	4.9	5.0
Office	4.8	4.8	4.8	4.9	4.9	4.9
Industrial	4.8	4.7	4.8	4.8	4.8	4.9
All Sectors (excl other)	4.9	4.8	4.9	4.8	4.9	4.9
ERV Weighted						
Retail	4.9	4.9	4.9	4.8	4.6	4.9
Office	4.9	4.9	4.9	4.8	5.0	4.8
Industrial	4.9	4.7	4.8	4.5	4.7	4.8
All Sectors (excl other)	4.9	4.9	4.9	4.7	4.8	4.9

The major difference is the un-weighted and weighted results, which show that between 20-30% of leases by number, dependent upon sector, have no reviews but this falls to around 10% when weighting of any kind is taken into account. Conversely around 60-70% of un-weighted leases have five-year reviews while this increases to between 80 and 90% when weighted. Smaller lettings with lower rents are therefore most likely to be on leases with no reviews. Industrial properties have the lowest incidence of 5-year reviews and the highest incidence of 3 year or no reviews. Retail has the highest number of 5-year reviews.

The unweighted incidence of leases of 5 years or less taking into account breaks was around 60% in 2002. Given the few leases with reviews of less than 5 years in the IPD, it suggests that the vast majority of those leases had no review before expiry or 1st break. The same would be true of the 30% of ERV weighted leases of five years or less.

Table 3.7 : Frequency of Different Review Periods – Main Sectors 2002

	All Property	Retail	Office	Industrial
Unweighted				
No Review	22.6%	19.8%	22.4%	28.8%
1 yr	4.8%	5.6%	6.0%	1.5%
2 yrs	0.9%	0.7%	1.1%	1.0%
3 yrs	3.7%	1.9%	3.0%	8.3%
4 yrs	0.7%	0.5%	0.7%	1.1%
5 yrs	66.9%	71.0%	66.6%	58.3%
> 5 yrs	0.5%	0.4%	0.2%	0.9%
	100.0%	100.0%	100.0%	100.0%
Rent Weighted				
No Review	11.2%	9.3%	11.9%	14.7%
1 yr	3.1%	2.9%	4.3%	1.4%
2 yrs	0.7%	0.5%	0.3%	1.9%
3 yrs	1.3%	0.7%	0.8%	3.2%
4 yrs	0.7%	0.1%	1.0%	1.5%
5 yrs	82.6%	85.8%	81.5%	76.6%
> 5 yrs	0.5%	0.6%	0.2%	0.6%
	100.0%	100.0%	100.0%	100.0%
ERV Weighted				
No Review	11.4%	9.7%	11.9%	15.0%
1 yr	2.8%	2.9%	3.1%	1.9%
2 yrs	0.6%	0.5%	0.1%	1.6%
3 yrs	1.1%	0.8%	0.7%	2.8%
4 yrs	0.6%	0.1%	0.7%	1.5%
5 yrs	83.2%	85.6%	83.3%	76.7%
> 5 yrs	0.4%	0.5%	0.2%	0.4%
	100.0%	100.0%	100.0%	100.0%

Figure 3.6 : Average Rent Review Periods 1997 - 2002

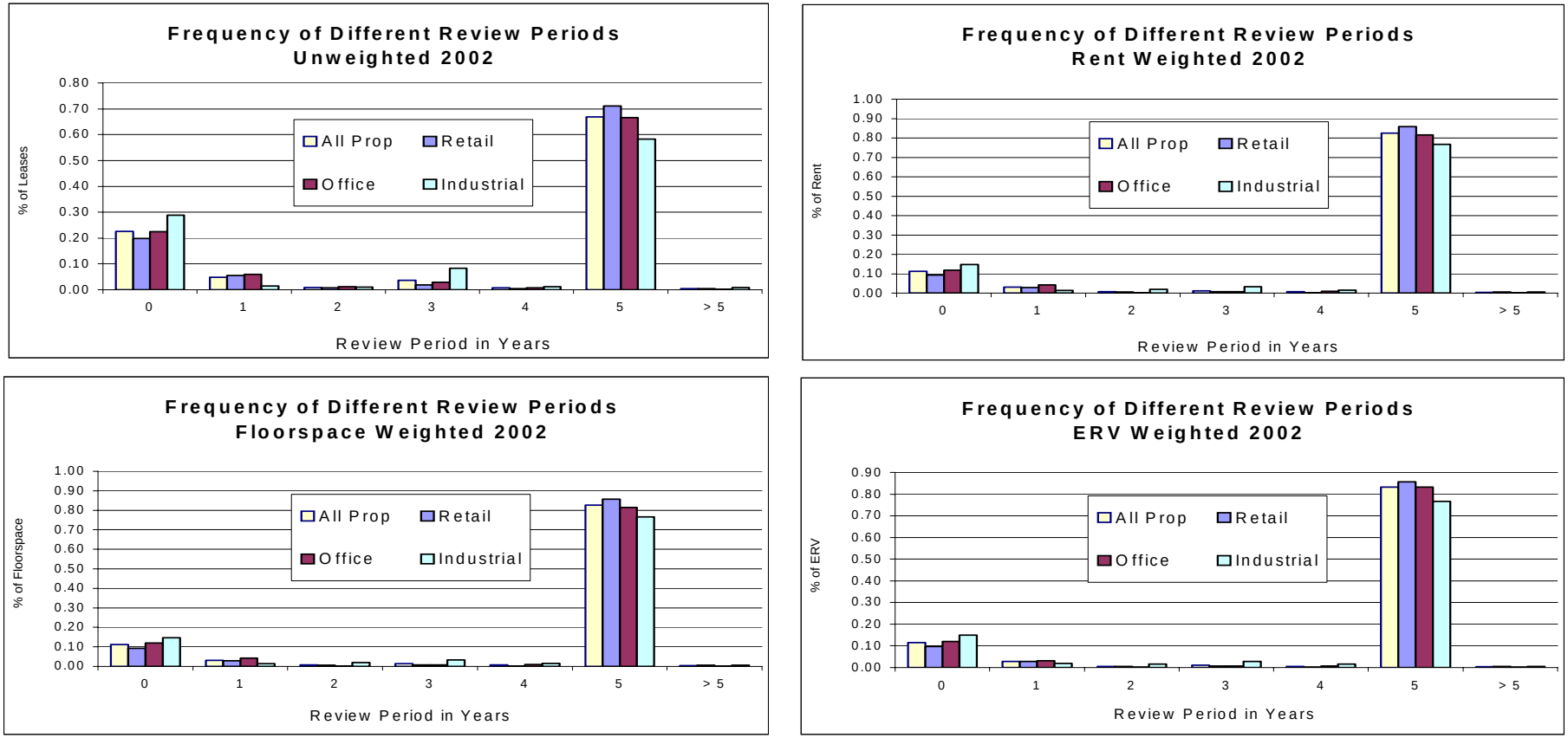


Figure 3.7 : Frequency of Different Rent Review Periods 2002

Table 3.8 and Figures 3.8 and 3.9 set out the incidence of non-standard review types and the incidence of upwards only reviews. This latter analysis is for 2002 only and is for a smaller sample of 2,292 leases where a new field in the IPD data collection form has been completed to identify either an upwards only or an upwards and downwards review.

Table 3.8 : Non Standard Review Types and Up/Down Reviews

Non Standard Review Type	**1997**	**1998**	**1999**	**2000**	**2001**	**2002**
Fixed uplift	6.9%	6.4%	9.0%	7.3%	3.8%	3.9%
Stepped	4.9%	4.8%	4.0%	2.8%	1.6%	2.6%
Turnover	0.6%	0.9%	0.4%	1.1%	1.2%	0.2%
RPI	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
Upwards Only						98.4%
Up/Down						1.6%

The number of non-standard reviews is still very low, with only 7% of leases having fixed review rents, less than 5% having stepped rents and around 1% having turnover provisions in the period 1997 to 2000. In 2001 and 2002, these proportions fell and by 2002 less than 4% of leases had fixed uplifts, around 2.5% had stepped rents and only 0.2% had turnover provisions. Between 1997 and 2002, the number of leases based on RPI provisions was virtually zero. Some of these leases still contain periodic market reviews.

The incidence of up/down reviews was also very low in 2002. Only 36 leases out of the 2,292 leases had the downwards provision while 2,256 had the traditional upwards only review.

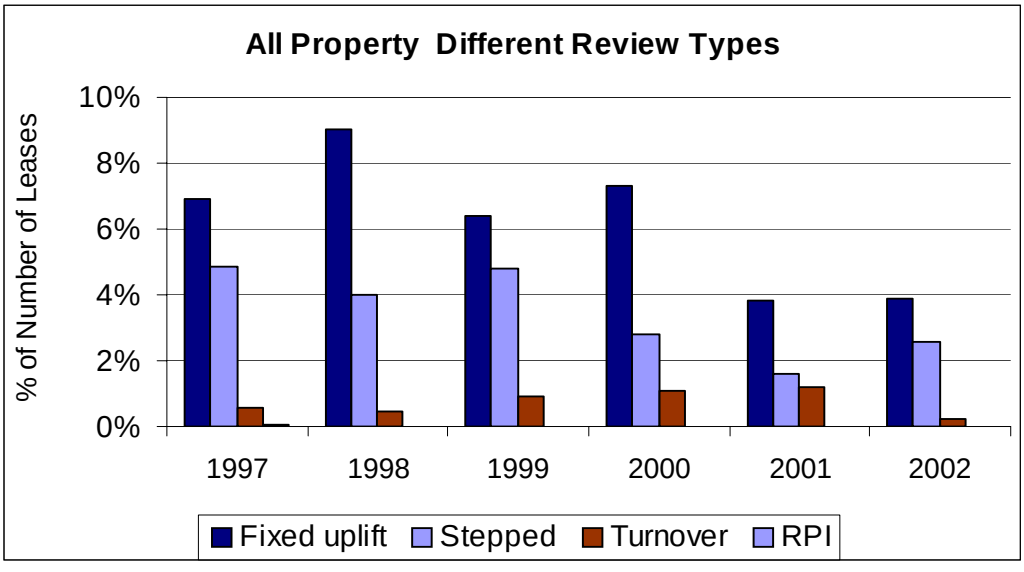


Figure 3.8 : Incidence of Non Standard Review Types 1997 – 2002

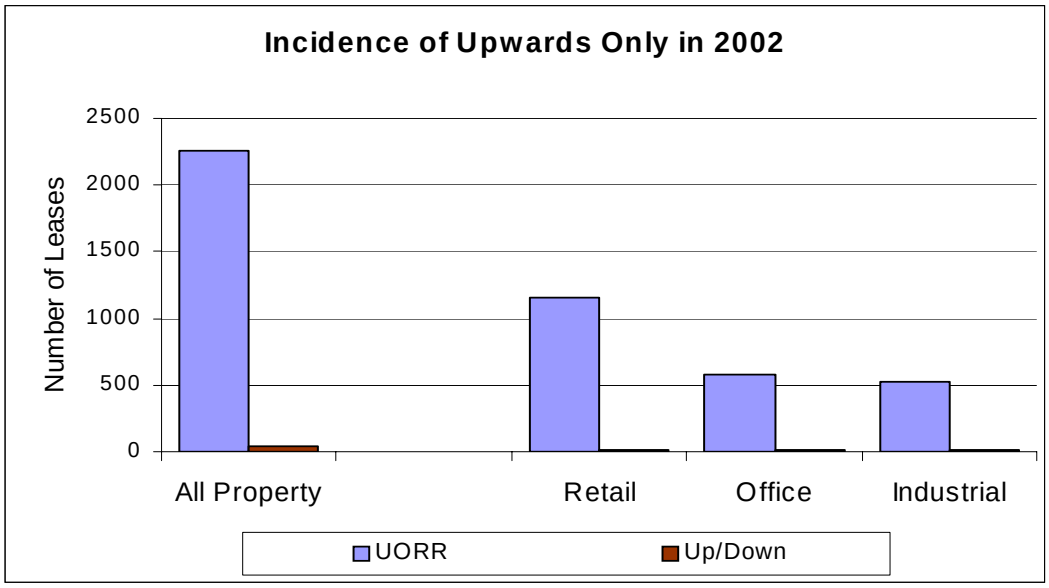


Figure 3.9 : Incidence of Upwards Only and Upwards and Downwards Reviews

3.5 Break Clauses and Rent Free Periods

Table 3.9 and Figures 3.10, and 3.11 illustrate the un-weighted incidence of break clauses and rent-free periods in leases.

Table 3.9 : Incidence of Break Clauses and Rent Free Periods – 1997 to 2002

Breaks	1997	1998	1999	2000	2001	2002
Retail	11.0%	10.5%	11.4%	9.7%	9.1%	15.0%
Office	24.7%	17.4%	23.4%	17.1%	12.9%	27.9%
Industrial	23.6%	19.2%	20.1%	25.4%	20.5%	19.0%
All Property	17.1%	13.9%	16.1%	15.6%	13.4%	19.5%
Rent Frees						
Retail	39.0%	37.8%	36.3%	37.4%	31.9%	35.8%
Office	38.1%	28.5%	29.3%	30.9%	26.6%	29.2%
Industrial	37.1%	32.6%	30.5%	21.3%	19.5%	22.1%
All Property	38.4%	34.2%	33.5%	31.6%	27.0%	30.9%

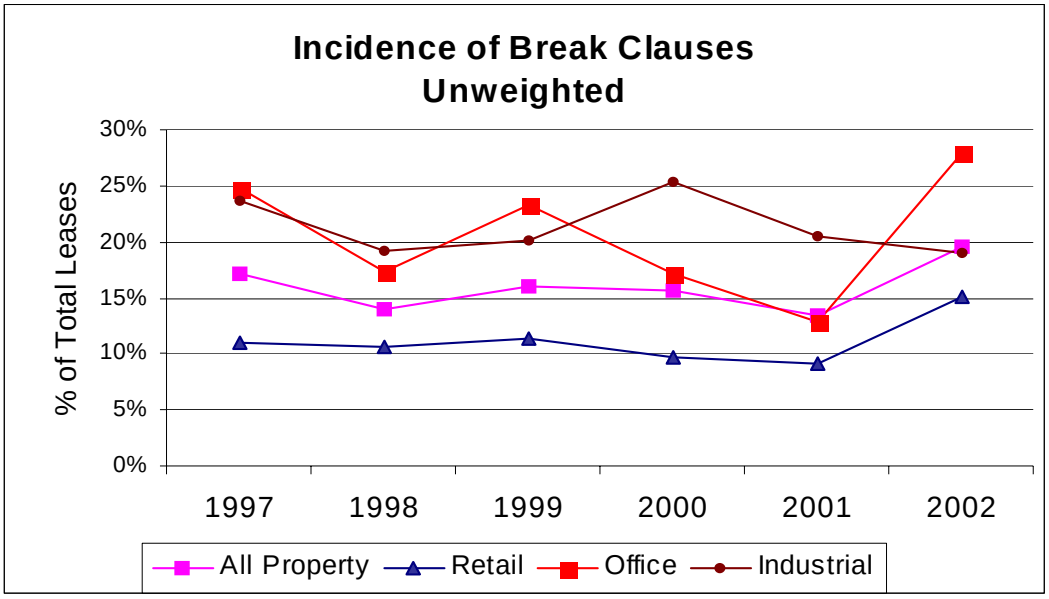


Figure 3.10 : Incidence of Break Clauses 1997 - 2002

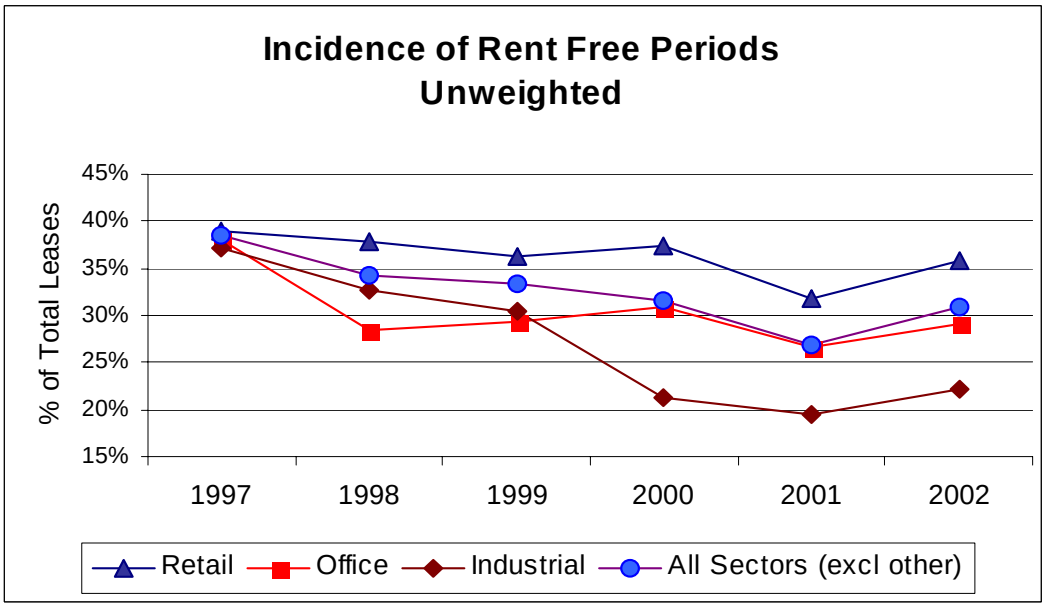


Figure 3.11 : Incidence of Rent Free Periods 1997 - 2002

Both incidences show a similar pattern in 2002 and there is a rise in both the incidence of breaks in leases and the incidence of rent-free periods. In 1997, around 25% of industrial and office leases and 10% of retail leases had break clauses and between 35% and 40% of all three sector leases had rent-free periods. Breaks in office and industrial leases reduced in 1998, increased in 1999 and then diverged in 2000, with only around 17% of office leases having breaks although they were in over 25% of industrial leases. In 2001 the incidence of breaks in office leases fell again to less than 15%, as did the incidence in industrial leases, but to around 20%. In the same time frame retail leases maintained a static profile with the incidence around

10% each year. However, the all property incidence of break clauses rose by over 5% in 2002 due to increases in the office and retail sectors to well over 25% and 15% respectively with industrials maintaining their 2001 level at around 20%.

A rise in the incidence of rent-free periods in 2002 followed on from a fairly consistent downward trend between 1997 and 2001. The incidence had fallen most in the industrial sector to 20% in 2001 from between 35% and 40% in 1997. The office sector had fallen to an incidence of just over 25% while the retail sector was standing at over 30%. Overall the incidence increased across all three sectors by about 5% in 2002.

The average time to the first break is illustrated in Table 3.10 and Figure 3.12 and it shows a consistent shortening trend throughout the period, both un-weighted and weighted. The average un-weighted time to first break was between 5-6.5 years in 1997 and has now fallen to between 3-4 years. Both rent and ERV weighted averages have fallen from between 9-11 years to between 4-6 years. The pattern is consistent across the three main property sectors.

Table 3.10 : Length of Time to 1st Break – 1997 to 2002

	1997	1998	1999	2000	2001	2002
Unweighted						
Retail	5.2	3.6	3.5	3.9	3.6	3.3
Office	5.5	4.9	4.1	5.1	4.6	4.0
Industrial	6.3	5.0	5.0	3.6	3.4	4.3
All Sectors (excl other)	5.6	4.4	4.1	4.1	3.7	3.8
Rent Weighted						
Retail	11.0	5.4	4.2	5.2	4.6	3.8
Office	8.6	8.5	8.2	7.3	7.2	4.6
Industrial	10.0	5.6	8.1	6.6	6.2	4.9
All Sectors (excl other)	9.5	7.1	7.6	6.7	6.3	4.5
Floorspace Weighted						
Retail	7.2	6.5	4.0	5.9	4.2	4.9
Office	7.7	11.2	9.4	6.2	6.6	5.8
Industrial	9.9	6.3	7.3	5.6	3.8	5.4
All Sectors (excl other)	8.8	8.4	7.6	5.8	4.4	5.5
ERV Weighted						
Retail	10.6	5.2	4.5	5.8	5.2	4.3
Office	8.9	11.7	9.3	8.5	7.4	6.4
Industrial	10.0	6.0	8.4	6.9	6.1	5.4
All Sectors (excl other)	9.4	9.6	8.3	7.7	6.5	5.6

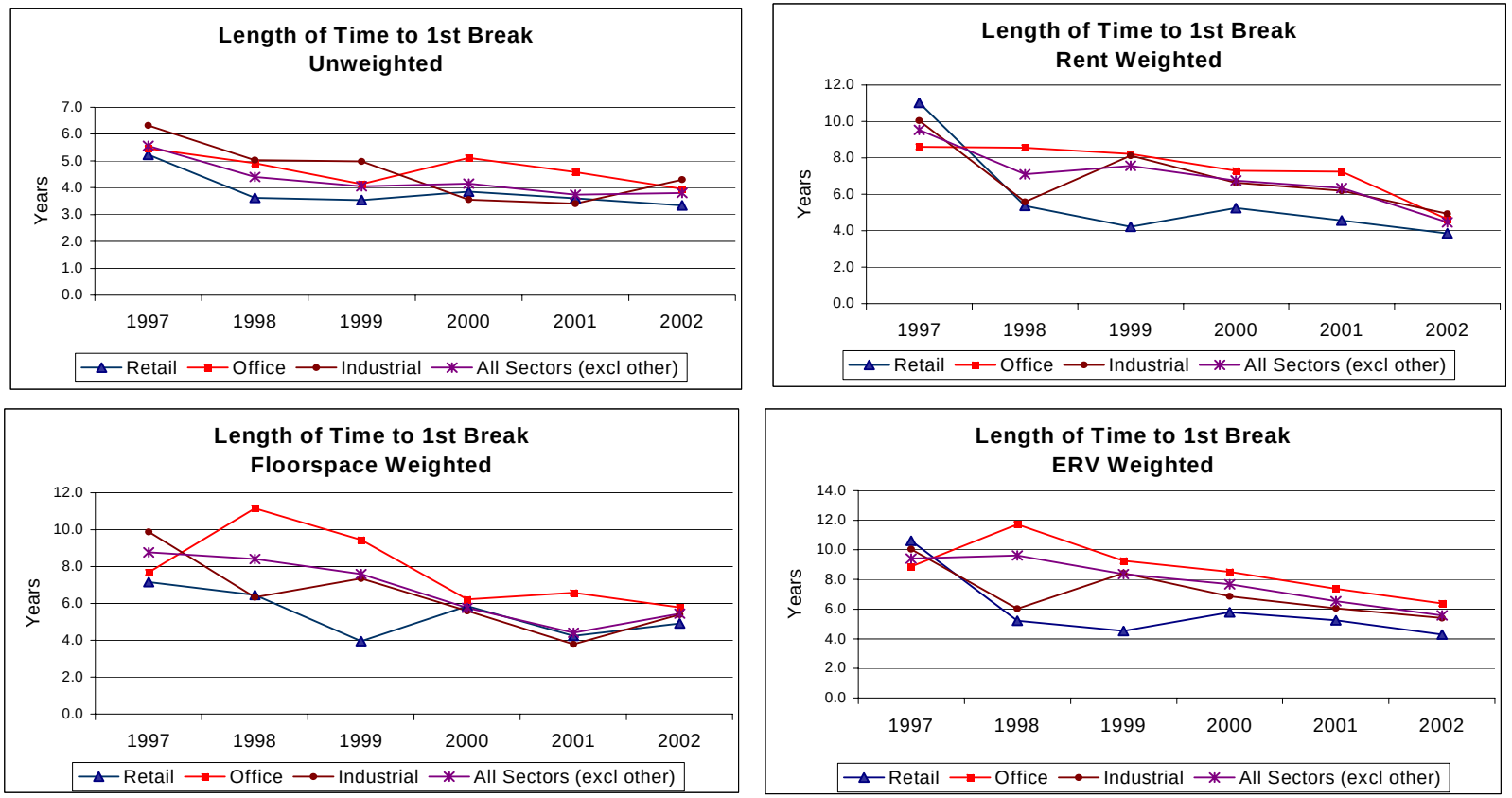
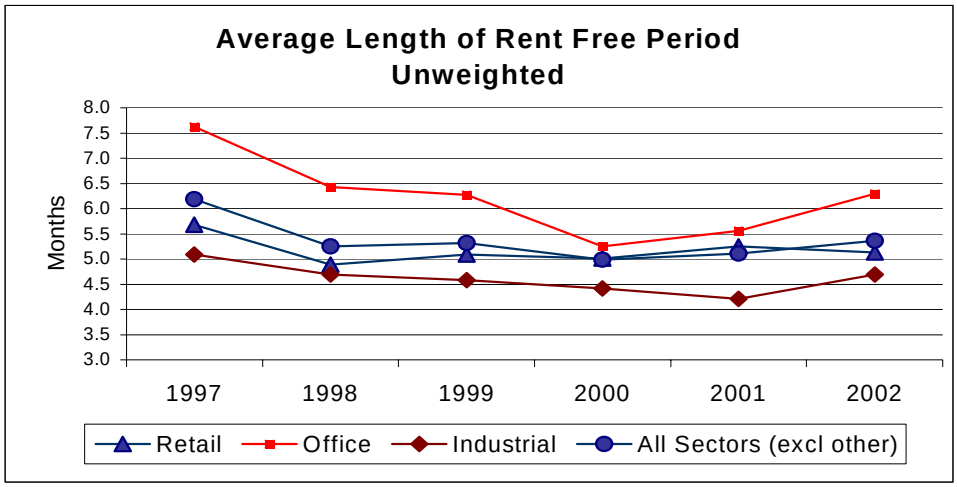


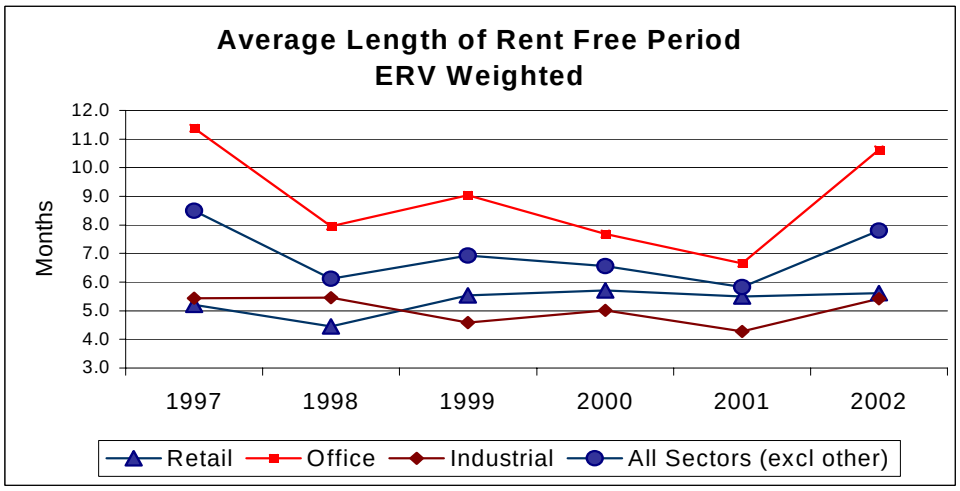
Figure 3.12 : Average Time to First Break in Leases Which Have Breaks – 1997-2003

Table 3.11 and Figure 3.13 illustrate that, while the average time to first break has been reducing, the length of rent-free periods, having fallen from 1997 to 1998, remained relatively stable between 1998 and 2001 at around an average 6 months weighted and 5 months un-weighted. However, in 2002 there are signs that the rent-free period has started to increase again back towards 1997 levels, with both ERV and un-weighted averages rising by 2 months and half a month respectively. The major change is in the office market and in markets with high rental values.

Table 3.11 – Average Rent Free Periods – 1997 to 2002

	1997	1998	1999	2000	2001	2002
Unweighted						
Retail	5.7	4.9	5.1	5.0	5.2	5.1
Office	7.6	6.4	6.3	5.3	5.6	6.3
Industrial	5.1	4.7	4.6	4.4	4.2	4.7
All Sectors (excl other)	6.2	5.2	5.3	5.0	5.1	5.4
ERV Weighted						
Retail	5.2	4.4	5.5	5.7	5.5	5.6
Office	11.4	7.9	9.0	7.7	6.7	10.6
Industrial	5.4	5.4	4.6	5.0	4.3	5.4
All Sectors (excl other)	8.5	6.1	6.9	6.6	5.8	7.8
Floorspace Weighted						
Retail	5.4	5.4	5.5	5.3	5.7	6.3
Office	9.0	8.3	10.8	6.7	7.3	6.8
Industrial	5.1	4.8	4.6	7.7	5.2	4.9
All Sectors (excl other)	6.3	6.1	7.0	6.8	5.8	6.0





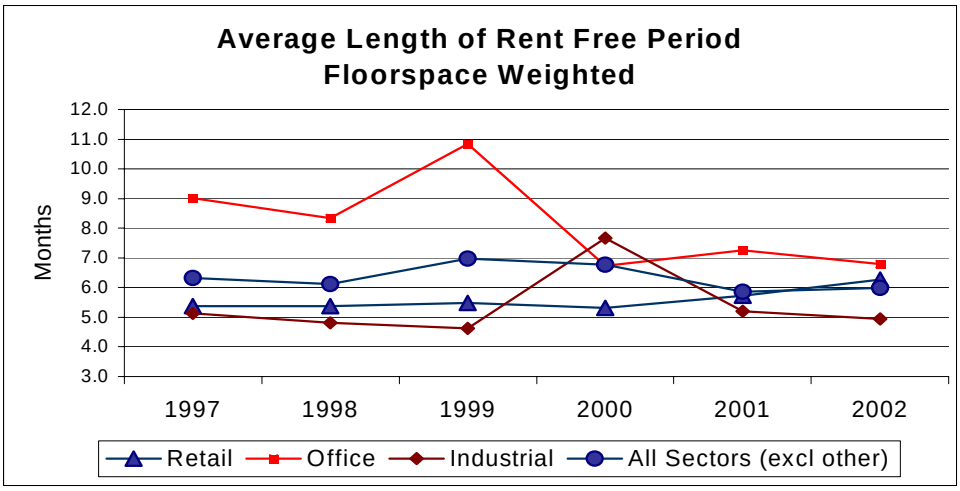


Figure 3.13 : Average Length of Rent-Free Period - 1997 – 2002

Figures 3.14 and 3.15 illustrate the distribution of time to 1st break and distribution of different lengths of rent-free periods from 1997 to 2002. Both weighted and un-weighted trends indicate the shortening of the time to 1st break with, for example, the number of ERV weighted 3-year breaks or less doubling from 20% to 40%. The un-weighted trend is less pronounced suggesting that the trend is more apparent in the larger lettings.

The overall trend towards shorter breaks is also mirrored as would be expected with a trend towards shorter rent-free periods. In 1997, 30% of the ERV weighted rent-free periods were for 10 months or more, by 2001 this had reduced to nearer 20%. However, in 2002, the incidence of longer rent frees re-appeared and although the reversal has not eliminated all of the reductions seen since 1997, it represents a significant reversal of the trend[6]. It would appear that in 2002, shorter break periods were negotiated and longer rent-free periods, both advantageous to tenants. However, there may be some interesting trade-offs occurring in different sub markets; the weakening market producing increasing lease lengths in certain office markets when accompanied by longer rent-free periods while in other markets reducing lease lengths and shorter breaks are occurring but these may not be accompanied by increasing rent-free periods.

[6] No rent-weighted analyses have been undertaken for rent-free periods as these are the analyses most affected by the nil weighting where the rent-free period is still in operation at the year-end.

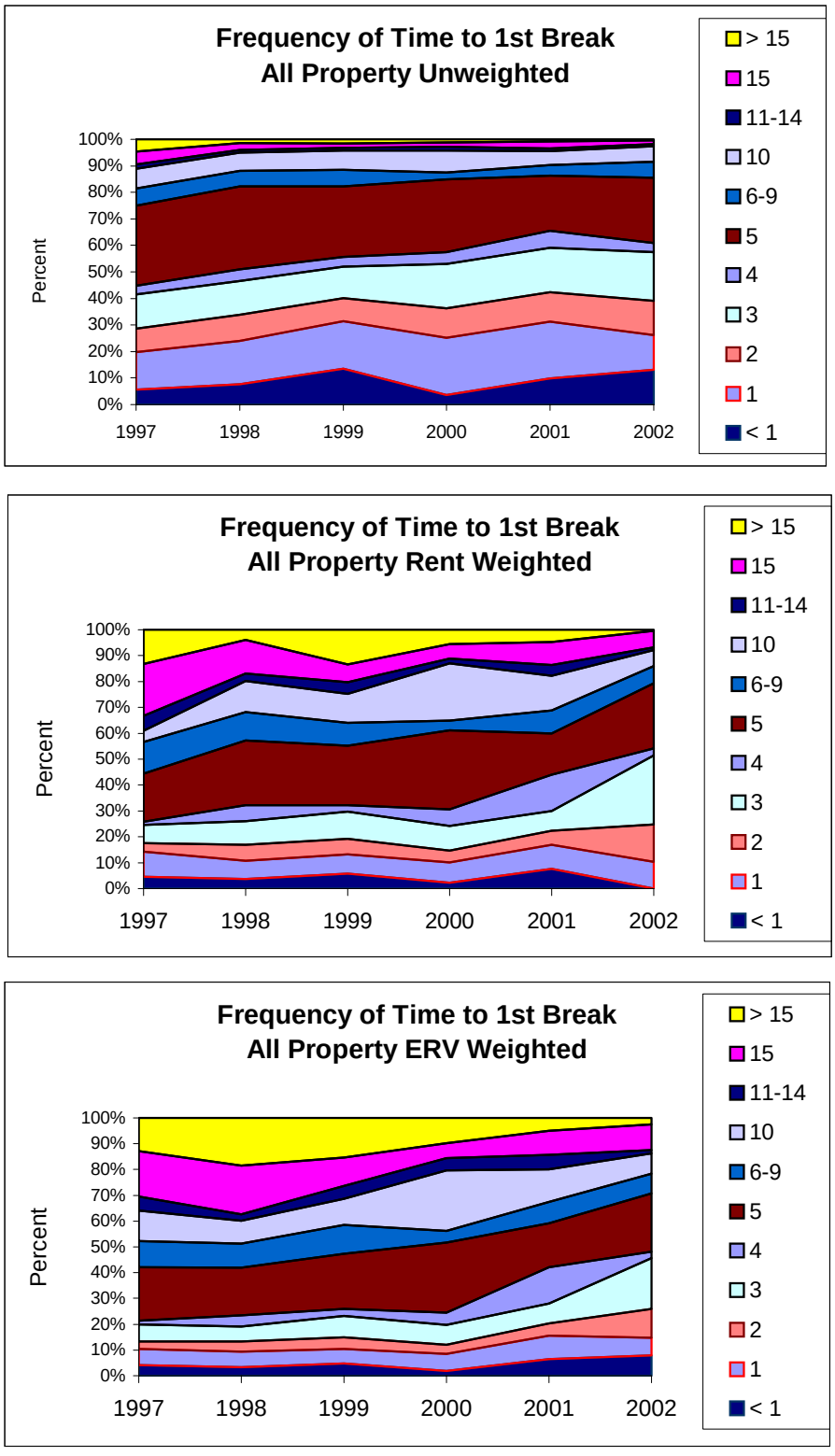
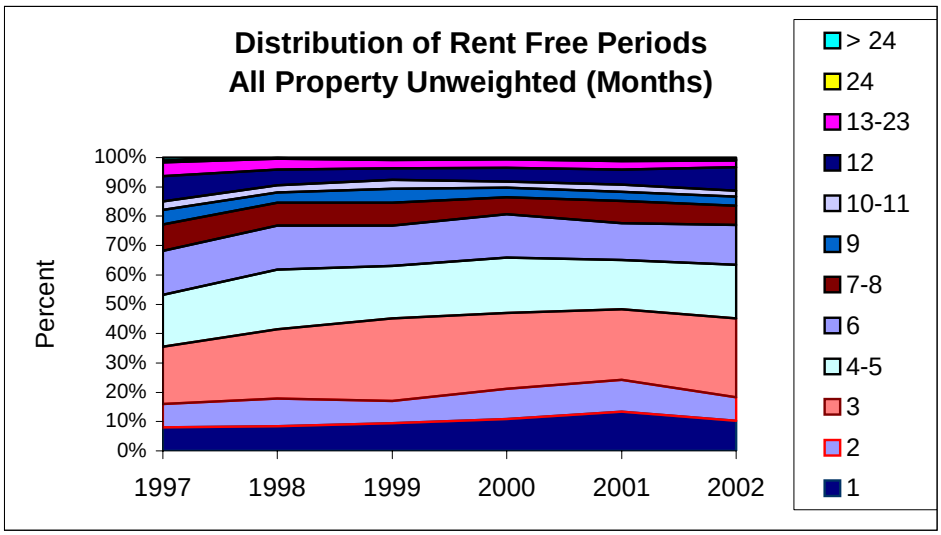


Figure 3.14 : Frequency of Time to 1st Break All Property 1997 – 2003



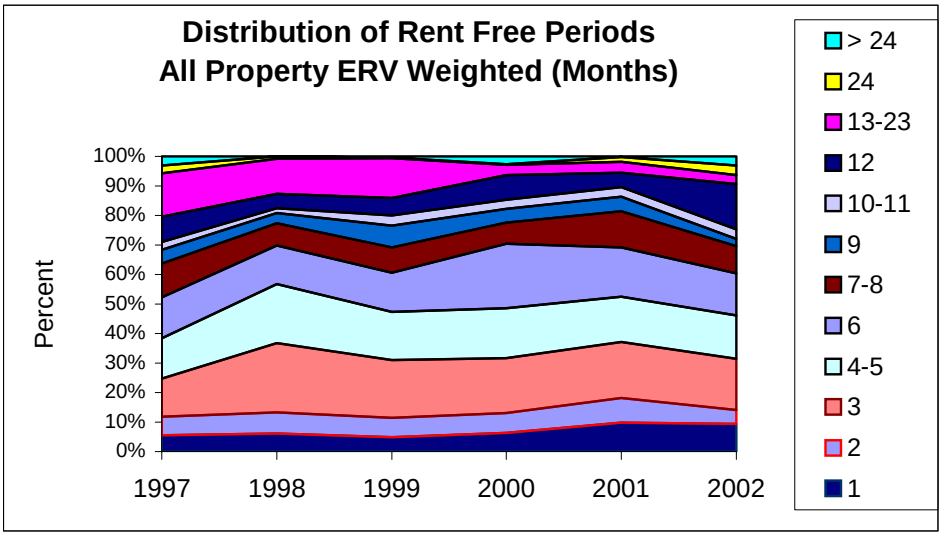


Figure 3.15 : Frequency of Rent Free Periods All Property 1997 – 2003

3.6 Cross Tabulations in the 2002 Dataset

The analysis of individual lease terms illustrates only the trends in those terms in isolation of their influence on each other. Although the preceding commentary has drawn out these relationships where apparent from the individual data, a number of relationships have been tested for the 2002 data. These are the relationship between the length of lease and the review period, time to first break clause and length of rent-free period. In the final report these initial analyses will be expanded to attempt to form a model of leasing behaviour and additional relationships, for example the timing of 1st break and its relationship with review period, will be considered.

Table 3.12 and Figure 3.16 illustrate the relationship between lease length and rent review pattern.

Table 3.12 : Relationship Between Lease Length and Review Pattern – All Property 2002

						Review Pattern		
Lease Length	**No Review**	**1 yr**	**2 yr**	**3 yr**	**4 yr**	**5 yr**	**5 yrs +**	***Total***
1 yr	274							**274**
2 yr	111	16						**127**
3 yr	169	27	2					**198**
4 yr	85	21	1	10				**117**
5 yr	218	20	3	25	2			**268**
6 yr	11	4	1	62	1	51		**130**
7 yr	5	2	2	2	2	39		**52**
8 yr	8	3	1	4	2	33		**51**
9 yr	12	6	1	14	1	129		**163**
10 yr	58	9	4	6	5	719	1	**802**
11 yr	9			1		52		**62**
12 yr	5			3	3	33		**44**
13 yr	9			1		20		**30**
14 yr	12	5		4		126		**147**
15 yr	60	4		5	2	868	3	**942**
16 yr	2	2				38		**42**
17 yr				1		16		**17**
18 yr	2					10		**12**
19 yr	5			2		19		**26**
20 yr	5			1		128		**134**
21 yr	3					6		**9**
22 yr	1					6		**7**
23 yr						7		**7**
24 yr	2					13		**15**
25 yr	11	1				131	1	**144**
25 yrs +	6		1			22		**29**
Total	**1083**	**120**	**16**	**141**	**18**	**2466**	**5**	**3849**

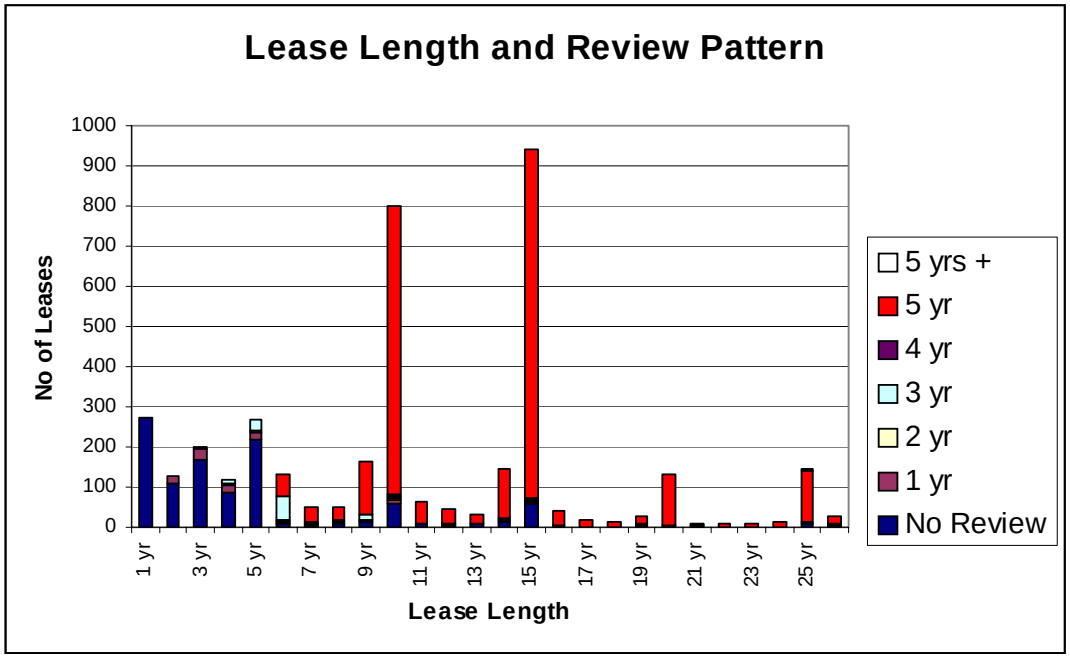


Figure 3.16 : Relationship Between Lease Length and Review Pattern

The majority of leases with no reviews, which make up 28% of this sample, are for 5 years or less (79%) but 17.5% of the leases with no reviews are for 10 years or more. Reviews at 1 or 2 years occur in short leases of 5 years or less (66% of 1 or 2 year reviews) but there is an expectation that many of these leases with a 1 year review will be turnover and stepped increases.

Three-year reviews make up the third most numerous period of review after 5 years or no reviews but they only account for 3.7% of the sample. Three-year reviews in 6-year leases account for 44% of the 3-year reviews and 9, 12 and 15-year leases account for another 16%. But there are therefore 40% of the 3-year reviews which do not match the lease term and 25% of all 3 year reviews are in 4 and 5-year leases. Around 75% of the 5 year reviews are in 10, 15, 20 or 25 year leases. The 5-year review accounts for 64% of all leases but 89% of leases that have reviews within them.

The pattern is much as expected with 5-year reviews dominating this part of the market but there are a small number of 3-year reviews, mostly in short leases of 4, 5 and 6 years.

Table 3.13 and Figure 3.17 illustrate the relationship between the length of lease and the timing of the break.

Table 3.13 : Relationship Between Lease Length and Timing of First Break – All Property 2002

	Roll Break	1 yr	2 yr	3 yr	4 yr	5 yr	6-9 yrs	10 yrs	11-14yrs	15 yrs	16-19yrs	20 yrs	Total
1 yr	20												**20**
2 yr	4	10											**14**
3 yr	2	6	1										**9**
4 yr	3	4	10	6									**23**
5 yr	1	15	21	44	3								**84**
6 yr	2	7		23	3								**35**
7 yr	3	1	4	1	3	1							**13**
8 yr		1	3	3		6							**13**
9 yr	2	4	4	7	13	6	4						**40**
10 yr	6	18	11	28	19	186	13						**281**
11 yr	1		2	1		5	3						**12**
12 yr	3		3		1	3	5						**15**
13 yr	4					2	8	1					**15**
14 yr	5	1	1		5	3	11	2					**28**
15 yr	2	13	7	19	6	36	21	49	2				**155**
16 yr		2				1	1						**4**
17 yr				1			1						**2**
18 yr							0						**0**
19 yr		2				2	2						**6**
20 yr		1	2	3		6	1	4	3	7	1		**28**
21 yr											1		**1**
22 yr													**0**
23 yr			1										**1**
24 yr										1			**1**
25 yr			2				1	1	2	6		1	**13**
25 yrs+		1	1							2		1	**5**
Total	**58**	**86**	**73**	**136**	**53**	**257**	**71**	**57**	**7**	**16**	**2**	**2**	**818**

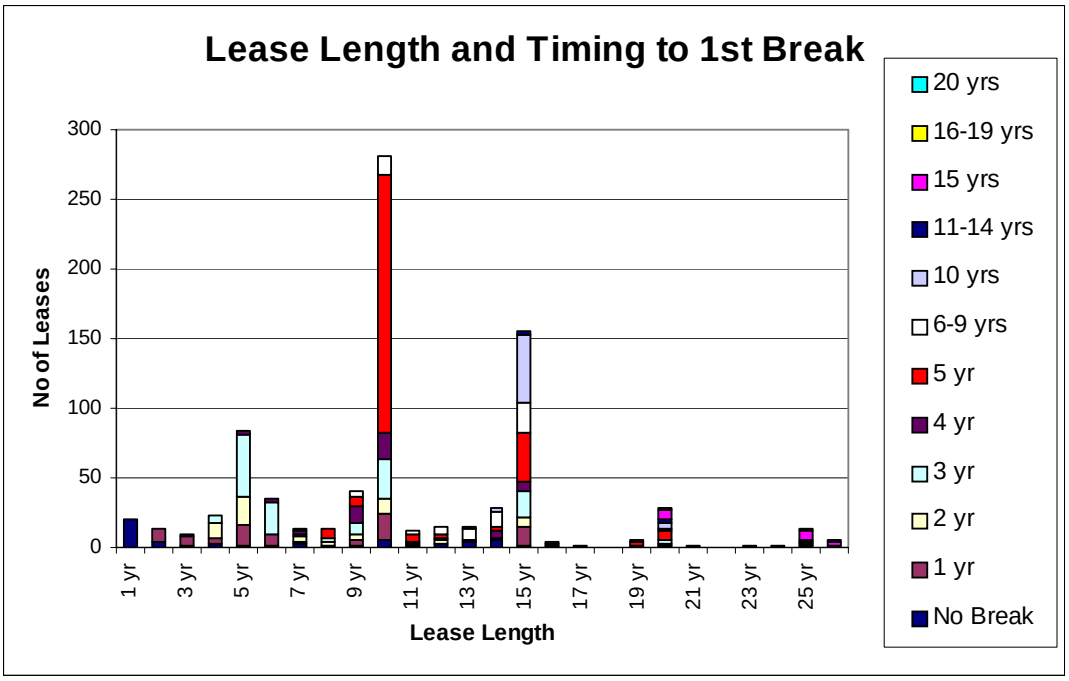


Figure 3.17 : Relationship Between Lease Length and Timing of 1st Break

This sample of 818 leases with breaks indicates that the most frequent break timing is after 5 years (257 leases, 31% of sample) and the majority of these 5 year breaks occur in 10 year leases (186, 72% of the five year breaks) with a further 14% occurring in 15 year leases. Three-year breaks are the second most frequent timing (136, 17% of the sample) but these are more evenly spread around the different lease lengths with 32% of the 3 year breaks in 5 year leases, 21% in 10 year leases, 17% in 6 year leases and 14% in 15 year leases. One and 2-year breaks are also used quite frequently (11% and 9% respectively of the sample) as are rolling breaks and 10 year breaks (both 7%). The 5-year breaks are normally in leases where the review period is also 5 years (221 out of 257, 86%). This tendency to put the break at the same date as a review occurs very frequently. In 561 leases which had both periodic breaks and periodic reviews, 332 (59%) were timed at the review.

Table 3.14 and Figure 3.18 illustrate the relationship between lease length and rent-free period.

Table 3.14 : Relationship Between Lease Length and Length of Rent Free Period – All Property 2002

		Months Rent Free																
	No Rent Free	**1**	**2**	**3**	**4**	**5**	**6**	**7**	**8**	**9**	**10**	**11**	**12**	**13-23**	**24**	**25-36**	**36+**	**Total**
1 yr	252	6	8	2	2			1	1	1				1	0	0	0	274
2 yr	116	3		2	2		1						3	0	0	0	0	127
3 yr	169	9	7	4	1		2	2		1			2	0	0	1	0	198
4 yr	84	7	5	9	2	1	1	1		1			2	2	2	0	0	117
5 yr	177	15	15	32	10	5	8	2				1	2	0	1	0	0	268
6 yr	98	7	2	8		3	1	2		1			6	2	0	0	0	130
7 yr	34	1	5	3	1	2	1			3				2	0	0	0	52
8 yr	33	3	3	4	1	2	1	1	1				1	0	0	0	1	51
9 yr	103	7	7	18	9	3	7	1	2	1	1		3	1	0	0	0	163
10 yr	418	16	16	117	57	23	77	17	11	12	7	1	23	6	1	0	0	802
11 yr	33	1		5	2	4		1					14	2	0	0	0	62
12 yr	30		3	3						1	1		5	0	1	0	0	44
13 yr	10		1	2	2		3		11		1			0	0	0	0	30
14 yr	81	1	9	16	8	8	10	1	3	5			4	1	0	0	0	147
15 yr	516	18	14	128	48	38	80	22	11	17	4	7	27	9	0	2	1	942
16 yr	20			2	4	2		1		1	1	4	5	2	0	0	0	42
17 yr	10			2			1	1			1			0	0	2	0	17
18 yr	8			1										0	1	1	1	12
19 yr	20	1				2	1							2	0	0	0	26
20 yr	59	6	1	11	4	10	12		3	5	1	2	16	4	0	0	0	134
21 yr	5			2					1				1	0	0	0	0	9
22 yr	4			2			1							0	0	0	0	7
23 yr	5						1			1				0	0	0	0	7
24 yr	13				1		1							0	0	0	0	15
25 yr	79	17	3	15	6	3	11		1		1		6	0	2	0	0	144
25 yrs +	10	1	0	1	0	0	1	2	0	0	2	0	9	1	0	0	2	29
Total	2387	119	99	389	160	106	221	55	45	50	20	15	129	35	8	6	5	3849

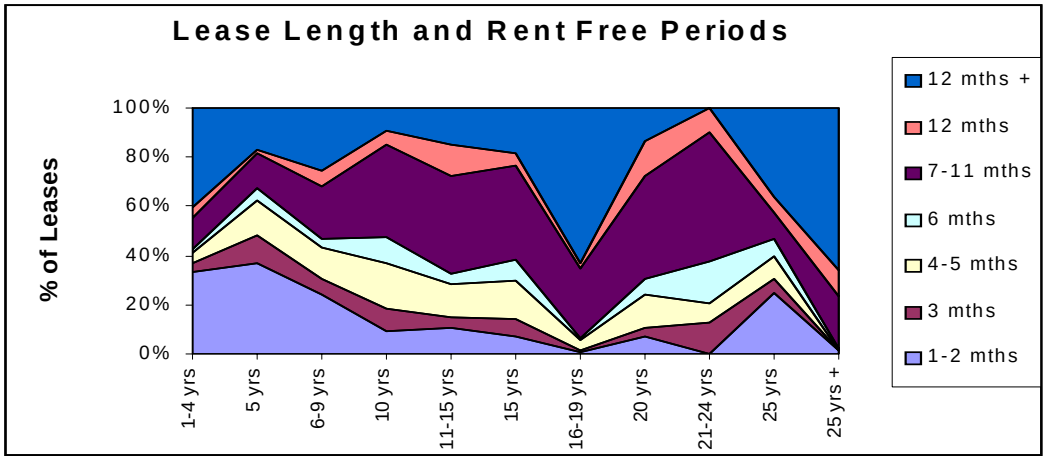


Figure 3.18 : Relationship Between Lease Length and Rent Free Period

The trend illustrated in Figure 3.18 is erratic but overall the incidence of longer rent-free periods is apparent in longer leases. Leases of 5 years or less attract 34% of the 1-month rent-free periods and nearly 30% of the 2-month rent-frees. They only attract 13% of the 3-month rent-frees, 5% of the 6-month rent-frees and 7% of the leases with rent-frees over 6 months.

In contrast, leases of 10 years and 15 years attract 30% and 33% respectively of the 3-month rent-frees and around 35% each of the 6 month rent-frees. The trend reverses slightly after 20 years with the incidence of longer rent-free periods smaller for 25-year leases than for 20-year leases.

This may be coupled to anecdotal comment that, in order to obtain a longer lease, some landlords will grant a very short first break as they feel tenants are unlikely to operate the break, especially if an expensive fit-out accompanied the taking of the leases. After the break is passed, the lease may well be in excess of 15 years with no further breaks. As IPD only collect first break, there is no opportunity to test this by determining how many of these long leases with short first breaks have subsequent breaks.

3.7. Summary of Findings

A cross sectional analysis of the IPD lease structure data from 1997 to 2002 has been carried out. This analysis enables conclusions to be drawn on changes to leasing practices in the retail, industrial and office sectors at the better quality end of the property market. There is no doubt that while considerable structural changes have taken place since 1990, when 90% of the rent within IPD was let on standard institutional 20-25 year leases, a number of the features of that lease remain intact, notably the upwards-only rent review.

The average lease length has continued to fall across all three main property sectors. The average un-weighted length fell from nearly 10 years in 1997 to just over 8 years in 2002, whereas the average ERV weighted lease length fell from over 16 years to just under 14 years over the same period. The number of longer leases of 20 or more years is falling and such leases are now primarily found in large value properties, particularly in retail warehouses and offices. Despite the weaker rental market of 2002 and the introduction of the Code of Practice the pace of fall in lease lengths has not accelerated. However the long-term trend is certainly downward as the improved market of the late 1990s did not itself witness a rise in lease lengths. Over the analysis period, there has been an increasing number of leases of 15 years or less, to the detriment of longer ones. The average lease length to the end of the term or to first break, where one exists, has also fallen in all three sectors, with the All Property unweighted average falling from 8.7 years to 7.3 years and the ERV weighted average falling from 15 years to 12.2 years. In 2002, break clauses are more frequent and the first break is earlier than in previous years. The largest influence of breaks on lease length is in the office and industrial sectors rather than retail. When breaks are taken into account the incidence of leases of 5 years and less has risen to 60% unweighted and 30% ERV weighted, an absolute rise of around 10% since 1997.

There is now irrefutable evidence that the standard institutional lease length no longer exists in the institutional sector of the market as measured by IPD. The diversity of

lease length is such that no one lease length has much more than 20% of all leases either unweighted or ERV weighted and the spread has widened slightly since the end of the monitoring of the first Code of Practice in 1998.

The opposite is the case for rent reviews. While other terms of the lease have shifted over the last 10 years, review term and type have resisted any change. The average review term is unchanged throughout the analysis period. The usual review period is overwhelmingly still five years and the average review period is still just under 5 years. There are a number of smaller lettings on lower rents which have no reviews but these proportions have remained similar between 1998 and 2002 (around 11% weighted and 25% unweighted). The majority of leases with no reviews are for five years or less and, as indicated above, where breaks are taken into account, the number of leases of five years and less is 30% weighted and 60% unweighted. This suggests that a significant number of leases either have no reviews or can be terminated at or before review. Where there are reviews, the universality of the upward only rent review remains intact. In 2002, upward only rent reviews were found in 98.4% of leases with reviews. The number of review types other than open market review remains very small.

In 2002 there was a rise in the occurrence of rent-free periods. This was a change from the downward trend showing from 1997 through to 2001. The average length of rent free periods remained stable from 1998 until 2001 but in 2002 the rent free period started to increase, particularly in the office market and markets with high rental values. When the distribution of lengths of rent free periods is observed, a trend towards shorter rent free periods can be seen, although this trend was reversed in 2002. Overall the incidence of longer rent-free periods is apparent in longer leases. However there is a break in the trend after 15 yrs and the trend reverses slightly after 20 years with the incidence of longer rent-free periods smaller for 25-year leases than for 20-year leases.

In 2002 there was a rise in the occurrence of breaks in leases, but the picture prior to this was very mixed from year to year across the sectors, with the exception of retail which was static until rising in 2002.

The average time to first break consistently gets shorter throughout the period. This is consistent across the three property sectors. When the distribution of breaks is looked at it is clear that this trend is more apparent in larger lettings. Where there is a break, the most frequent timing is after five years, and the majority of these occur in 10-year leases. They are also normally in leases with a five-year review period. The tendency to put the break at the same date as review occurs frequently.

Chapter Four - Analysis of Lease Structures within the Valuation Office Agency Databank

4.1. Introduction

The Valuation Office Agency (VOA) holds data on its centralised database of all lease transactions gathered by its Form of Return process and from other sources. It is used for VOA functions such as the periodic rating revaluations. The lease data is therefore information given by individual occupiers and is not always verifiable from formal documentation of any transaction. The VOA also holds survey information on all commercial properties which is prepared by experienced referencers/valuers within the Valuation Office and is therefore considered reliable.

Whilst being a large dataset there are gaps in the tenancy information in that certain fundamental data are not collected; break clauses are included in a catch-all question and the length of rent free periods has not, until recently, been separately recorded. On account of these omissions, only partial analysis can be undertaken.

The database potentially covers all commercial transactions in the UK. In order to sample this dataset, a spatial cluster approach has been used identical to that adopted for DETR (2000). Within the standard Government Office Regions of England and Wales, three different district types have been identified: a Metropolitan area, and industrial district and an urban/rural district. In addition an inner and outer London location has been included. This enables analysis to be undertaken of any effect on lease structures of town type and region in addition to analyses of the main different property types and size and quality of letting measured by rent and floorspace. For the interim report disaggregation has been undertaken at a main sector level, for the final report this will be extended to regional and town type analysis.

Individual occupiers are usually responsible for providing this data, and this raises issues of quality. Therefore a significant amount of filtering was necessary before the research team were confident that the remaining data was complete and robust enough for analysis. This required the removal of lease records unless the data on rent, floorspace, lease start date and lease length was included for analysis, and would allow for comparison by different weightings.

The number of transactions available for analysis is set out in Table 4.1. The analysis has been undertaken from 1998 to the end of 2002. The previous VOA data for DETR (2000) was collected until 1998, and included a partial 1999 analysis, so longer term analysis of trends can be identified to compare with the longer-term trends also available from the IPD analysis. There were a number of 2003 transactions available but, after the properties in the sample were compared to the characteristics of the data for other years, is was decided to omit any trend analysis beyond the end of 2002. However, the full dataset including the 2003 transactions has been utilised where analysis is over the whole of the period and is not identifying a trend.

The VOA can be segmented by property type as each property is classified into one of four "bulk codes"; Factory, Office, Shop, Warehouse. In addition, a large number of secondary codes are available and therefore more detailed analysis can be undertaken for the Final Report. For the Interim Report, analysis is confined to these bulk codes.

Table 4.1 : Number of transactions each year – VOA 1998 to 2003.

	1998	**1999**	**2000**	**2001**	**2002**	**2003**	***Total***
Factory	2173	1531	1454	1402	1157	399	**8116**
Office	4842	3692	3679	3178	2529	618	**18538**
Shop	5169	4120	3482	3216	3019	785	**19791**
Warehouse	1190	855	881	791	661	168	**4546**
Total	**13374**	**10198**	**9496**	**8587**	**7366**	**1970**	**50991**

The total number of transactions collected reduced after 1998 but this was a Rating Valuation antecedent date and therefore more resources appear to have been allocated to data collection than in the following years. The number of transactions recorded does appear to fall through the period, in contrast to IPD, which increases until 2001. No conclusions on the depth of the lettings market can be made from this data.

The main technical issue raised by previous analyses and discussed in Chapter Three is the biasing of the time series data by the use of data collected at one time point to create a time series up to that point. The VOA data is collected continuously and therefore bias may or may not exist depending upon whether the data collection is spread evenly over the period of analysis. Due to the importance of the antecedent valuation date for rating purposes, it could be hypothesised that data collection is uneven, and therefore bias may exist, with data collection in 1998 and 2003 (Rating valuation dates) more vigorous than in other years.

Unlike IPD, in addition to including the better quality property stock in the ownership of the financial institutions and the major property companies, it also includes the secondary and tertiary markets not covered by IPD, often occupied by small business tenants. Despite its limitations it therefore forms an important indicator of trends in those markets for which no other source of transactions data exists. The findings can also be tested against the opinions of professionals operating in this market who, during the interview survey, answered questions concerning factual data such as lease length and rent review period.

Appendix Two discusses in more detail the technical issues outlined above.

4.2 Average Lease Term

Table 4.2 : Average Lease Lengths 1998 – 2002

All Property Average Lease Lengths	1998	1999	2000	2001	2002
Un-weighted	7.4	7.7	7.4	7.4	7.6
Rent Weighted	12.9	13.0	12.9	12.1	13.2
Floorspace Weighted	12.1	10.9	12.0	10.6	11.8

Un-weighted Average Lease Lengths	1998	1999	2000	2001	2002
Retail	9.7	9.6	9.2	9.4	9.6
Office	6.2	6.6	6.5	6.2	6.3
Factory	5.1	5.8	5.8	5.7	5.7
Warehouse	6.6	6.8	6.8	6.9	7.1

Rent Weighted Average Lease Lengths	1998	1999	2000	2001	2002
Retail	15.8	15.7	15.7	14.4	15.8
Office	11.1	12.1	12.0	11.5	11.4
Factory	11.2	10.0	9.0	9.3	12.6
Warehouse	11.1	10.4	12.4	10.4	12.8

Floorspace Weighted Average Lease Lengths	1998	1999	2000	2001	2002
Retail	16.3	14.9	16.6	15.4	16.6
Office	10.0	10.6	10.8	10.4	10.9
Factory	12.3	9.3	11.2	9.7	10.7
Warehouse	11.4	10.2	11.6	9.0	11.7

Figure 4.1 illustrates that average lease lengths appear to have been static over the period 1998 to 2002. The all property un-weighted average lease length was 7.4 years in 1998 and 7.6 years in 2002. The rent weighted average rose marginally from 12.9 years to 13.2 years and the floorspace weighted average fell from 12.1 years to 11.8 years. The increases in the un-weighted and rent weighted averages are a product of increases in the industrial sector while offices and shops remained static. The floorspace weighted fall is a product of a reduction from an average 12.3 years to 10.7 years in the factories while the other three sectors showed small rises.

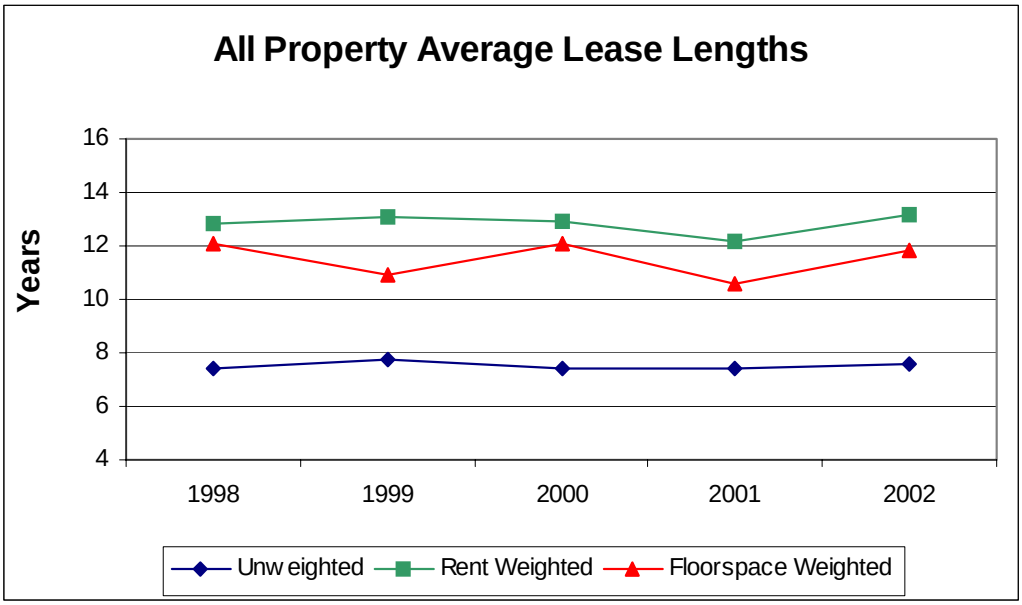
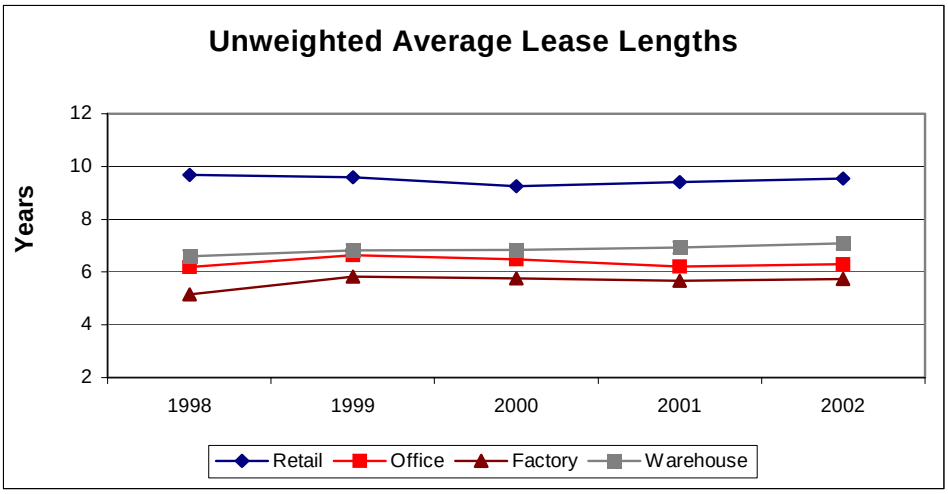
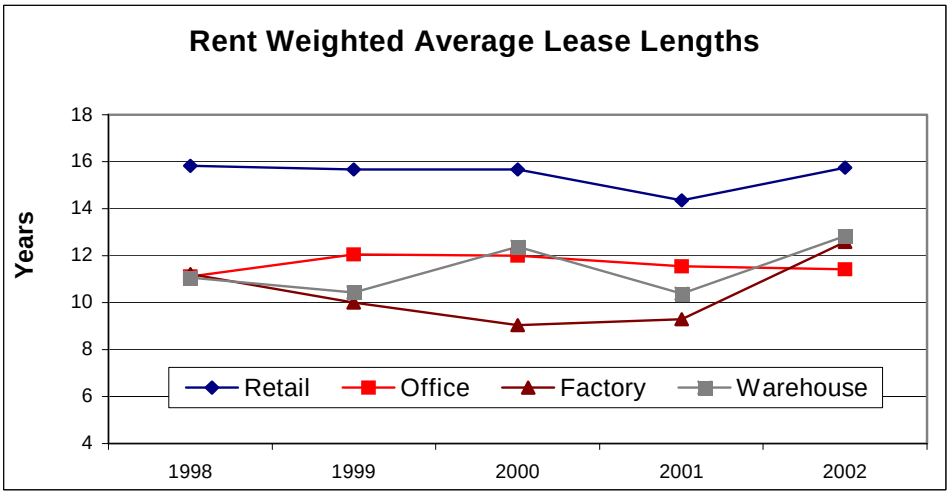


Figure 4.1 : All Property Average Lease Lengths 1998-2002

The sector differences are illustrated in Figure 4.2.

The market analysis in Chapter Two indicated a weaker lettings market in 2002 than in previous years especially in Central London. There is no evidence in 2002 that this weakening lettings market and the introduction of the Code of Practice has fed through into lease length changes.





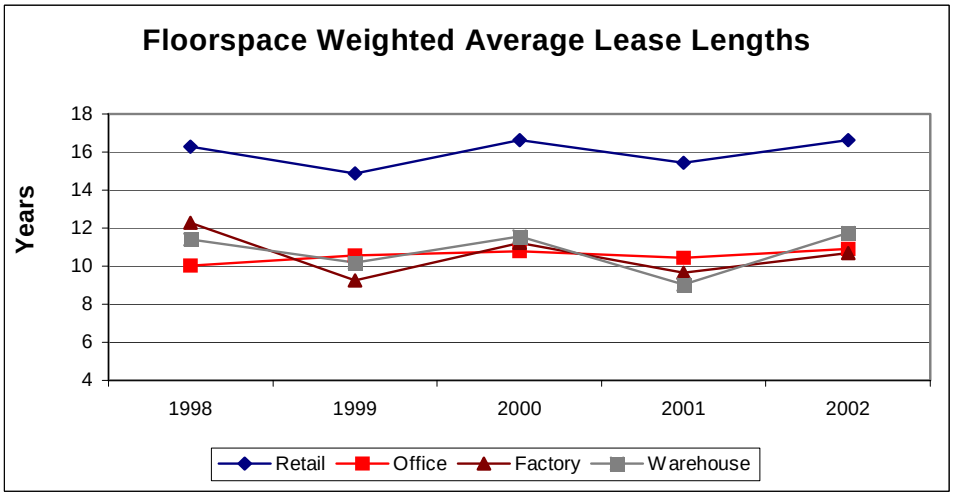


Figure 4.2 : Un-weighted and Weighted Average Lease Lengths in Main Sectors 1998-2002

4.3 Frequency of Different Lease Lengths

Table 4.3 : Frequency of Different Lease Lengths – All Property 1998 to 2002

All Property Un-weighted Frequency

Lease term	1998	1999	2000	2001	2002	Total
< 1 yr	2.8%	1.5%	2.0%	2.0%	2.7%	2.3%
1 yr	11.1%	6.9%	7.0%	9.0%	8.8%	9.1%
> 1 yr < 3 yrs	4.6%	4.4%	4.9%	5.5%	5.0%	4.8%
3 yrs	17.2%	18.5%	20.1%	18.9%	16.5%	18.1%
> 3 yrs < 5 yrs	3.0%	3.1%	2.8%	3.0%	2.2%	2.9%
5 yrs	14.9%	15.8%	16.2%	14.3%	14.2%	15.1%
> 5 yrs < 10 yrs	11.7%	13.3%	12.0%	11.2%	11.3%	11.9%
10 yrs	13.1%	14.5%	14.9%	15.3%	17.8%	14.8%
> 10 yrs < 15 yrs	4.8%	4.9%	4.1%	4.6%	4.8%	4.6%
15 yrs	8.9%	9.4%	9.3%	9.5%	10.1%	9.3%
> 15 yrs < 20 yrs	1.2%	1.2%	1.1%	1.0%	0.8%	1.1%
20 yrs	2.4%	2.7%	2.6%	2.6%	2.5%	2.6%
> 20 yrs < 25 yrs	1.0%	0.9%	0.8%	0.9%	0.8%	0.9%
25 yrs	2.7%	2.5%	2.0%	1.9%	1.9%	2.3%
> 25 yrs	0.4%	0.5%	0.3%	0.3%	0.4%	0.4%
	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%

All Property Rent Weighted Frequency

Lease term	1998	1999	2000	2001	2002	Total
< 1 yr	0.8%	0.6%	0.8%	0.7%	0.9%	0.8%
1 yr	2.1%	1.6%	1.6%	2.3%	2.9%	2.1%
> 1 yr < 3 yrs	2.3%	2.4%	2.4%	3.3%	2.9%	2.8%
3 yrs	5.4%	5.2%	5.2%	5.9%	4.8%	5.5%
> 3 yrs < 5 yrs	2.1%	2.2%	1.7%	2.4%	2.1%	2.1%
5 yrs	9.5%	11.1%	11.1%	11.2%	8.8%	10.3%
> 5 yrs < 10 yrs	8.5%	7.4%	6.2%	7.5%	7.3%	7.5%
10 yrs	15.8%	15.0%	15.6%	18.3%	17.8%	16.5%
> 10 yrs < 15 yrs	7.2%	5.3%	5.8%	6.0%	4.8%	5.9%
15 yrs	22.0%	20.7%	21.2%	17.7%	20.7%	20.4%
> 15 yrs < 20 yrs	3.3%	4.1%	5.4%	3.3%	2.1%	3.7%
20 yrs	6.2%	8.8%	11.0%	10.8%	8.5%	8.8%
> 20 yrs < 25 yrs	0.9%	3.0%	1.1%	1.2%	4.8%	2.1%
25 yrs	11.1%	10.6%	9.1%	7.7%	6.4%	9.0%
> 25 yrs	2.8%	2.1%	1.7%	1.6%	5.1%	2.5%
	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%

All Property Floorspace Weighted Frequency

Lease term	**1998**	**1999**	**2000**	**2001**	**2002**	**Total**
< 1 yr	0.9%	0.3%	0.7%	2.6%	1.1%	1.1%
1 yr	3.9%	3.0%	2.4%	3.6%	4.1%	3.6%
> 1 yr < 3 yrs	2.6%	2.8%	2.8%	3.7%	4.4%	3.3%
3 yrs	8.2%	10.0%	9.9%	9.4%	7.2%	9.1%
> 3 yrs < 5 yrs	2.2%	2.7%	1.5%	2.8%	1.3%	2.0%
5 yrs	12.5%	14.6%	14.4%	12.1%	8.9%	12.3%
> 5 yrs < 10 yrs	9.7%	10.8%	8.4%	10.4%	10.7%	9.9%
10 yrs	15.3%	17.3%	14.8%	18.8%	15.7%	16.6%
> 10 yrs < 15 yrs	5.1%	4.3%	4.5%	5.0%	7.2%	5.2%
15 yrs	15.2%	14.6%	14.4%	13.3%	14.0%	14.1%
> 15 yrs < 20 yrs	1.8%	1.9%	1.9%	1.8%	4.9%	2.5%
20 yrs	4.4%	6.5%	6.5%	5.2%	7.7%	5.9%
> 20 yrs < 25 yrs	0.9%	1.2%	1.2%	1.6%	2.0%	1.4%
25 yrs	13.6%	8.8%	14.1%	8.5%	7.2%	10.5%
> 25 yrs	3.7%	1.3%	2.4%	1.2%	3.5%	2.4%
	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%

In 1998, the un-weighted proportion of leases of 3 years or less was around 35% but by 2002 this had fallen marginally to 33%. The number of very long leases over 15 years remained around 5-6% throughout the period. The largest concentration of leases is for three years which in 2000 was 20% of all leases. Other popular lease lengths include 12 months (average 10%), 5 years (average 15%), between 5 and 10 years (mainly 6 and 9 years, average around 10%), 10 years (average 15%) and 15 years (average around 10%).

Weighted frequencies indicate the usual trend of longer leases for larger, higher rent properties. In 1998, 38% of leases were let on leases of 10 or 15 years and this had remained static by 2002, with a slight shift towards 10 years from 15 years. Floorspace weighted frequencies were lower for 15 year leases in 1998 but similar for 10 year leases, with the two accounting for 30% of leases in 1998 and 2002.

Figure 4.3 indicates the spread of lease length across the property sector as a whole for the last year of the analysis period, 2002.

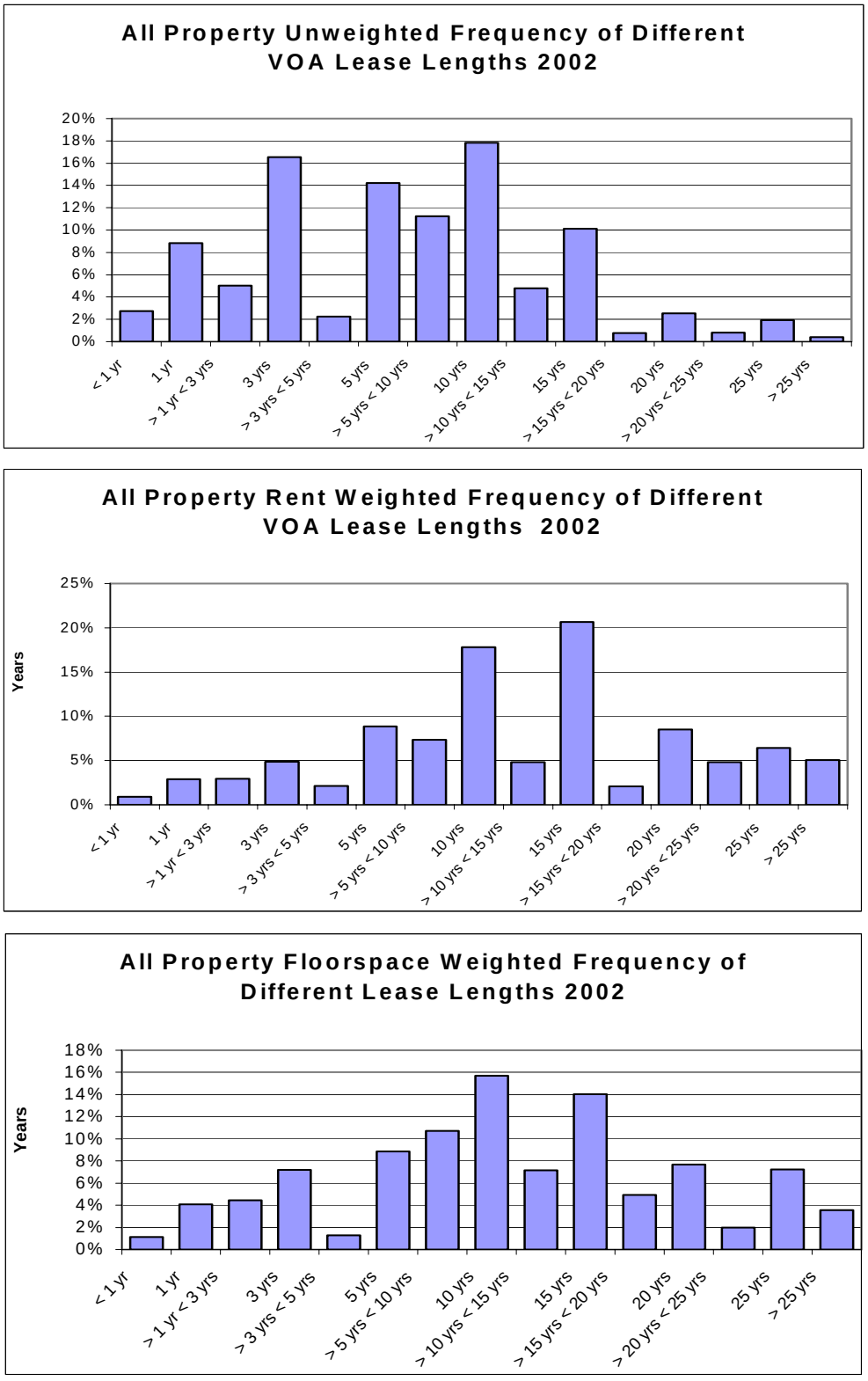


Figure 4.3 : Distribution of Different Lease Lengths : All Property 2002

Appendix Three sets out the frequency tables for the four bulk classes of shops, offices, factories and warehouses and also illustrates the following trends observable from the data.

Shop properties have the largest incidence of longer leases. Un-weighted, nearly 30% of leases are for 15 years or more in 1998 and by 2002 this had not changed. Rent weighted, leases of 15 years account for around 30% of the total. And shops are the only sector where there are still a significant number of large and/or high value properties let on 20 and 25-year leases. Over the period, rent weighted shop leases of 20 years or over averaged 30% of all leases. Therefore over 60% of retail rents are still in leases of 15 years or more. Un-weighted leases of 3 and 5 years account for around 25% of the total but rent weighted this falls to around 10%. Floor space weighted shop leases also exhibit the same trends as rent weighted; over 60% of floorspace let on leases of 15 years or more, 10% on 10-year leases and just over 10% on 3 and 5-year leases.

Only around 5% of office properties by number are let on 15-year leases and the total of leases of 15 years and above is below 10% for the whole of the period. Around 15% of leases are for 10 years but the number of leases of less than 10 years is well over 70% with nearly 20% each on 3 and 5-year leases. Rent weighted, the proportion of rent let on leases of 15 years and over rises significantly to around 40% with around 15% on 15 year leases and 10% on 20 year leases. The dominant lease length is 10 years with around 20% of leases throughout the period. As around 40% of all office rents are in leases of between 5 years and 10 years, only about 20% is in leases of less than 5 years. Floorspace weighted frequencies suggest that the number of shorter leases is greater with only around 30% of floorspace let on leases of 15 years and over. This means that 10% more space is let on leases of less than 15 years, with around 45% let on leases of 5 to 10 years and around 25% in leases of less than 5 years, both approximately 5% more than rent weighted frequencies.

Factory and warehouse premises lease lengths show a high proportion of 3-year leases with between 25-30% of factory and 20% of warehouse leases on this term throughout the period 1998 to 2002. Coupled with a high incidence of 1 year leases, especially it appears in 1998, over 50% of factory and around 40% of warehouse leases are for 3 years or less. Around 35 to 40% are for 5 to10 years leaving only a few leases of 15 years or more (less than 10% of factories and 15% of warehouses). Rent weighted this rises to 30% of factories and nearly 40% of warehouses and when floorspace is taken into account this equalises at about one-third for each segment in leases of 15 years and over. The most frequent lease lengths in both sectors are between 5 and 10 years with around 40% of floorspace.

Overall, the diversity of leases, both un-weighted and weighted, has remained fairly constant over the analysis period to 2002. No one lease term dominates across the four property sectors and this is illustrated in Appendix Three which sets out the distribution of leases recorded in the each of the four sectors across the period 1998 to 2002.

4.4 Rent Review

The VOA data includes incomplete information on review pattern and the data has been scrutinised for those properties where a review is recorded as taking place within the lease term. Properties where no review is recorded are ignored as this is not reliable evidence that a review is not included in the lease. There are cases of recording or input error, for example where reviews are recorded at longer intervals than the lease term. As set out in the technical appendix, these were not included.

In total, 19,367 transactions could be analysed from 1998 onwards. Table 4.4 sets out the average review terms both weighted and un-weighted.

Table 4.4 ; All Property Unweighted, Rent Weighted and Floorspace Weighted Average Rent Review Periods 1998 - 2002

Unweighted Average Review Pattern						
	1998	**1999**	**2000**	**2001**	**2002**	**Average**
Factory	3.1	3.3	3.2	3.3	3.5	3.3
Office	3.9	3.9	3.9	3.8	4.0	3.9
Retail	4.0	4.0	4.1	4.0	4.1	4.0
Warehouse	3.8	3.6	3.7	3.8	3.9	3.7
All Property	3.9	3.8	3.9	3.8	4.0	3.9
Rent Weighted						
	1998	**1999**	**2000**	**2001**	**2002**	**Average**
Factory	4.0	4.1	3.9	4.2	5.4	4.3
Office	4.8	4.8	4.8	4.6	4.6	4.7
Retail	4.7	4.8	4.8	4.7	4.7	4.7
Warehouse	4.3	4.2	4.6	4.6	4.7	4.5
Floorspace Weighted						
	1998	**1999**	**2000**	**2001**	**2002**	**Average**
Factory	4.1	4.1	4.0	4.3	4.8	4.2
Office	4.6	4.5	4.6	4.5	4.6	4.5
Retail	4.4	4.4	4.7	4.6	4.6	4.5
Warehouse	4.0	3.9	4.6	4.5	4.6	4.3

The average review period within the lease term has hardly moved through the period 1998 to 2002. The average review term is around four years un-weighted, rising to around 4.5 years weighted with slightly higher review periods rent weighted than floorspace weighted. Factories and warehouses have the lowest review period.

Five-year review periods dominate the rent weighted and floorspace weighted frequencies set out in Table 4.5. However, un-weighted, the number of three year reviews is around 30%.

Table 4.5 : All Property Frequencies of Different Review Periods

Review Period	Un-weighted	Rent Weighted	Floorspace Weighted
<1 yr	0.0%	0.0%	0.0%
1 yr	10.0%	3.0%	6.2%
>1 yr < 3 yrs	3.1%	0.9%	2.0%
3 yrs	30.6%	8.8%	17.4%
> 3 yrs < 5 yrs	3.9%	1.9%	1.9%
5 yrs	51.6%	84.3%	71.0%
> 5 yrs	0.8%	1.1%	1.4%

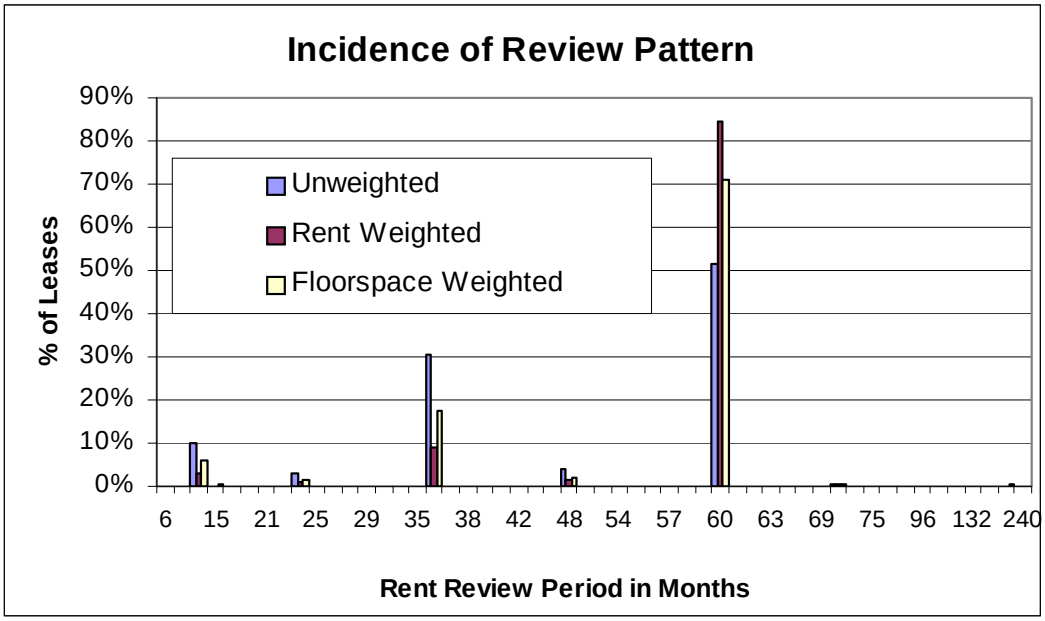


Figure 4.4 : Incidence of Different Review Periods – All Property

Office and shop properties have about 25% of leases with 3-year reviews while warehouses have around 30%. Over 50% of all office, shop and warehouse leases have 5-year reviews. However, factories have more 3-year reviews (40%) than 5-year reviews (35%). The un-weighted and rent and floorspace weighted frequencies of different review periods are set out in Appendix Three for each of the four main sectors.

The pattern of frequencies suggests that a significant number of leases of smaller and/or lower value properties have been let on shorter review periods, especially in the industrial sector. Combinations of lease and review patterns include a number of one year reviews in 2, 3, 5 and 6 year leases, 3 year reviews occur most in 6 year leases but also in 5, 9, 10, 12 and 15 year leases. Five-year reviews occur mainly in 10 and 15-year leases, but also in 20, 25 and 30-year leases. These combinations are illustrated in Figure 4.5.

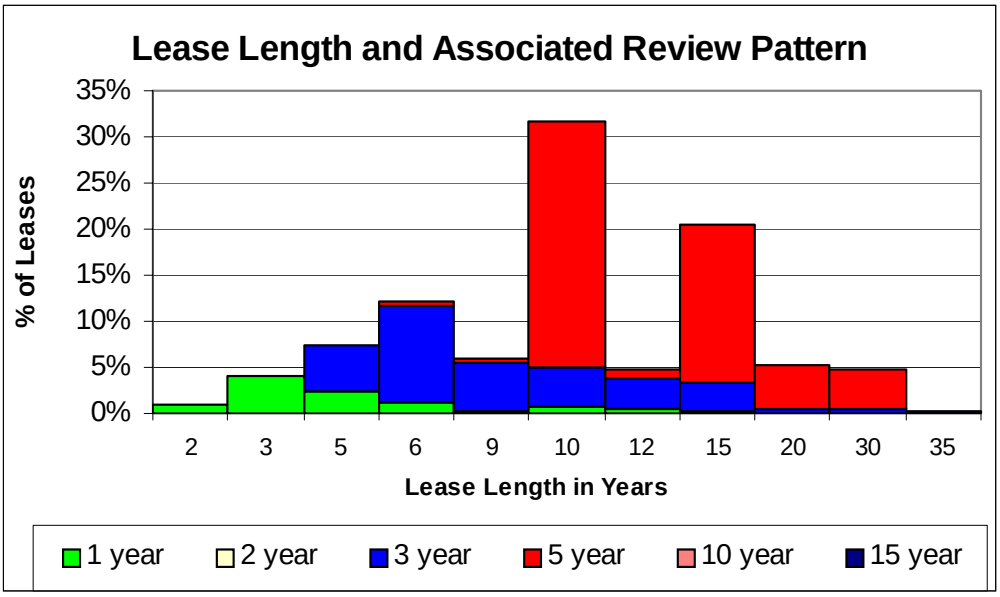


Figure 4.5 : Lease Length and Review Pattern

The VOA data collection includes a question on the review type and asks whether the rent can go down at review. Over 13,500 transactions had a review term identified at less than the lease term and also had a response to the upwards only question. The responses are set out below in Table 4.6 and illustrated in Figure 4.6.

Table 4.6 : Incidence of Upwards Only Reviews – All Property

Review Period	Can go down	Cannot Go Down	Total
1	241 (17%)	1179 (83%)	1420
2	60 (15%)	334 (85%)	394
3	695 (16%	3639 (84%)	4334
4	80 (15%)	440 (85%)	520
5	617 (9%)	6244 (91%)	6861
6	8 (18%)	36 (82%)	44
7	6 (25%)	18 (75%)	24
Total	1707 (12.6%)	11890 (87.4%)	13597

Over the whole period 88% of reviews appear to be upwards only. The length of the review pattern may have some effect on any variation around this average. The standard 5-year review does appear to have the most upwards only attached to it whereas the 3-year review, the second most frequent review pattern, does appear to have almost twice as many downwards reviews, along with a similar number attached to 1 year reviews. Shorter reviews, which usually appear in shorter leases, appear to be a driver towards the relaxation of the upwards only review but the upwards only form of review still dominates the commercial property sector where reviews exist.

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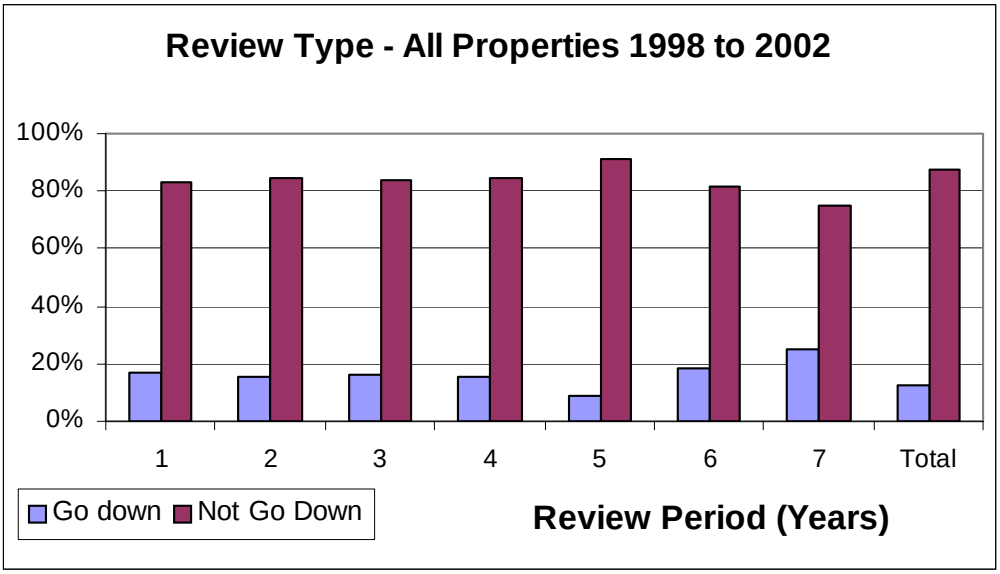


Figure 4.6 : Incidence of Upwards Only and Up/down Reviews by Review Term

The incidence of upwards only reviews appears to have remained fairly static within each sector through the analysis time frame as illustrated in Table 4.7 and Figure 4.7 below. Factories and warehouses appear to have a slightly lower incidence of upwards only reviews than shops and offices but over the whole period the difference is marginal.

Table 4.7 : Incidence of Upwards Only Rent Reviews Main Sectors 1998 to 2002

	1998	1999	2000	2001	2002	Average
Factory	84.5%	82.5%	87.6%	86.9%	85.2%	85.1%
Office	89.3%	90.4%	90.2%	89.4%	87.4%	89.4%
Shop	88.1%	88.3%	89.0%	88.3%	86.2%	87.9%
Warehouse	86.7%	86.1%	87.5%	85.5%	85.8%	86.5%

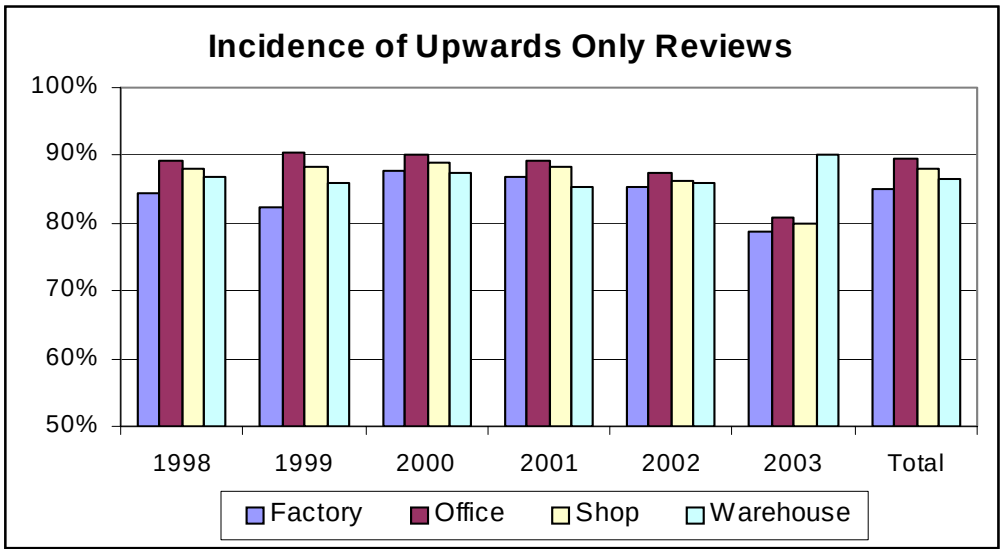


Figure 4.7 : Incidence of Upwards Only Reviews Main Sectors 1998 to 2002

The quality of the property does have an effect on whether there is an upwards only review or not. The rent-weighted incidence of upwards only reviews (Table 4.8) is higher than the un-weighted incidences reported above and the increase is especially apparent in the retail and warehousing sectors. On average, the incidence of rent let on upwards only reviews was 5% higher than the un-weighted incidence at over 93% and only the factory sector remained at a similar level.

Table 4.8 : Incidence of Upwards Only Reviews – Rent Weighted 1998-2002

	1998	1999	2000	2001	2002	Average
Factory	84.2%	83.4%	79.7%	89.7%	88.7%	84.8%
Office	87.9%	91.0%	92.5%	89.4%	94.1%	90.8%
Shop	94.4%	92.7%	95.1%	91.6%	91.8%	93.1%
Warehouse	91.0%	87.3%	89.6%	90.1%	92.5%	90.2%

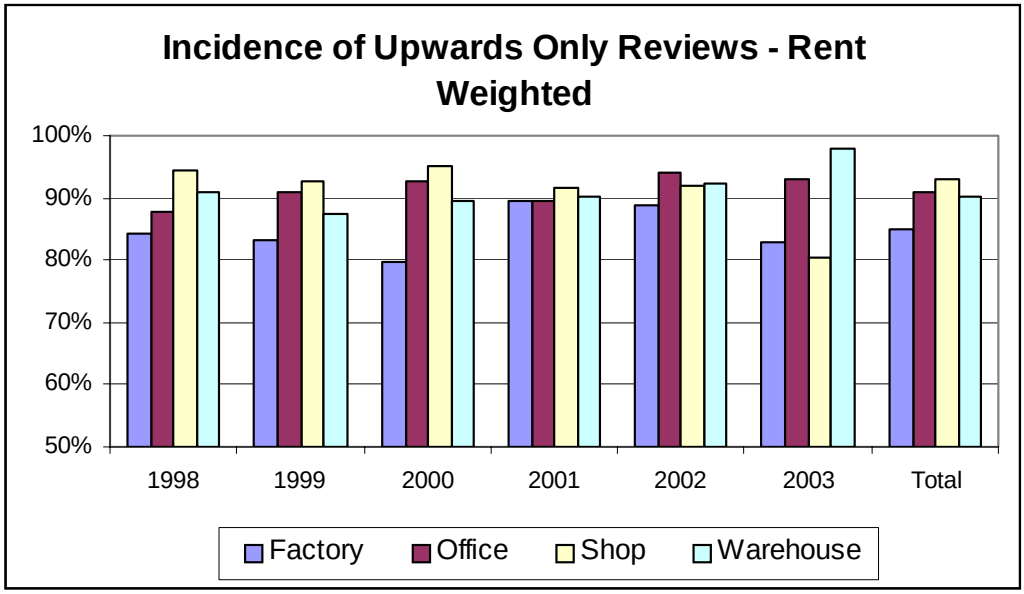


Figure 4.8 : Incidence of Upwards Only Reviews – Rent Weighted 1998 to 2002

4.5 Repairing Obligations

Of the 50,991 transactions analysed for lease length, 43,398 gave some indication of the internal and external repairing liabilities and 42,802 indicated whether they were the responsibility of landlord or tenant. However, given the ambiguity of the Form of Return questions described in Appendix Two there may be some confusion by tenants of what constitutes a full repairing lease and what does not. It is possible that tenants who pay for external and structural repairs by way of a service charge may state in the form that they are responsible for only the internal repairs. This would mean that the incidence of internal repairing leases is over-stated. Certainly the interview evidence suggests that the internal repairing leases are less common than is suggested by the VOA figures. The following analysis should therefore be treated with caution in terms of the absolute incidence, but time trends may well be unaffected as recording errors should not change over time.

Table 4.9 sets out the basic All Property analysis and indicates that weighted by rent and floorspace between 60% and 70% of all leases pass all responsibilities to the tenant. Around 25% to 30% are reported to be internal repairing by the tenant and external repairing by the landlord. However, un-weighted, the reported incidence of full repairing by the tenant falls to less than 50% and there are a similar number of leases which are internal repairing.

Table 4.9 : All Property Allocation of Repairing Liabilities

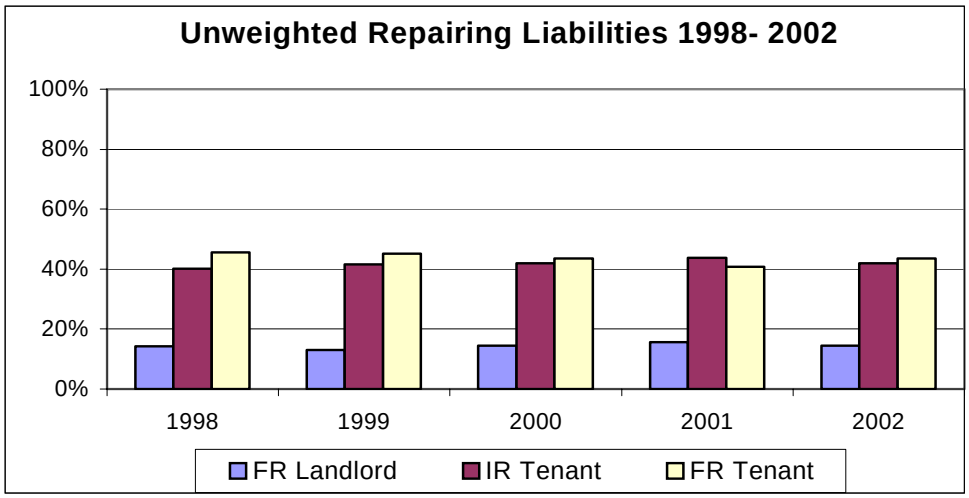
	Un-weighted	Rent Weighted	Floorspace Weighted
FR Tenant	43.8%	62.9%	67.7%
IR Tenant	41.9%	28.6%	25.1%
FR Landlord	14.3%	8.6%	7.1%

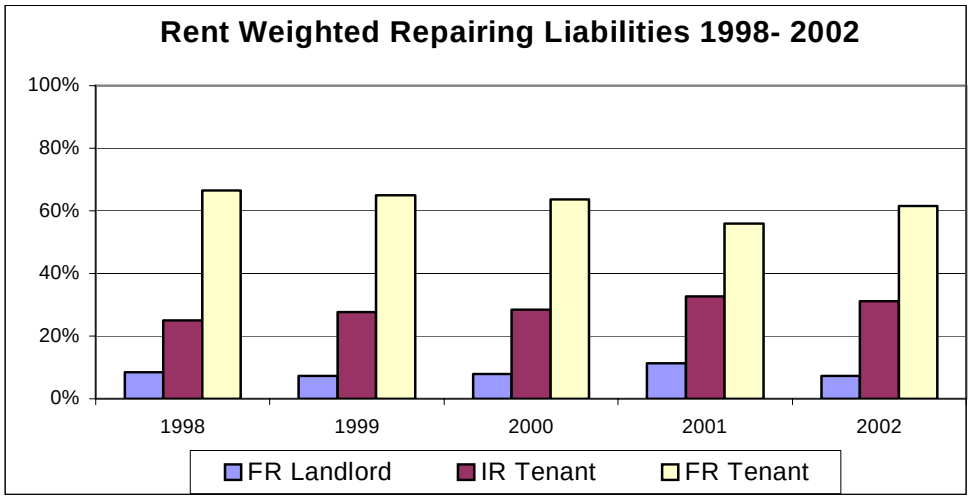
If all tenants who stated that they were not responsible for external repairs, but also stated that they paid a service charge, are assumed to be full repairing leases, the un-weighted tenant full repairing proportion grows from 43% to over 50%.

The trends through time are static with a very slight fall in the percentages of full repairing leases from 1998 to 2002. The results are set out in Table 4.10 below and illustrated in Figure 4.9.

Table 4.10 : All Property Weighted and Un-weighted Incidence of Repairing Liabilities 1998–2002

Un-weighted						
	1998	**1999**	**2000**	**2001**	**2002**	**Total**
FR Landlord	14.2%	13.1%	14.5%	15.6%	14.4%	14.3%
IR Tenant	40.1%	41.6%	41.9%	43.7%	42.0%	41.9%
FR Tenant	45.7%	45.2%	43.6%	40.7%	43.7%	43.8%
Rent Weighted						
	1998	**1999**	**2000**	**2001**	**2002**	**Total**
FR Landlord	8.4%	7.3%	8.0%	11.4%	7.3%	8.6%
IR Tenant	25.0%	27.6%	28.4%	32.7%	31.1%	28.6%
FR Tenant	66.5%	65.0%	63.6%	55.9%	61.6%	62.9%
Floorspace Weighted						
	1998	**1999**	**2000**	**2001**	**2002**	**Total**
FR Landlord	6.7%	6.3%	6.6%	9.4%	7.0%	7.1%
IR Tenant	23.2%	26.5%	25.1%	26.9%	23.5%	25.1%
FR Tenant	70.2%	67.3%	68.4%	63.7%	69.5%	67.7%





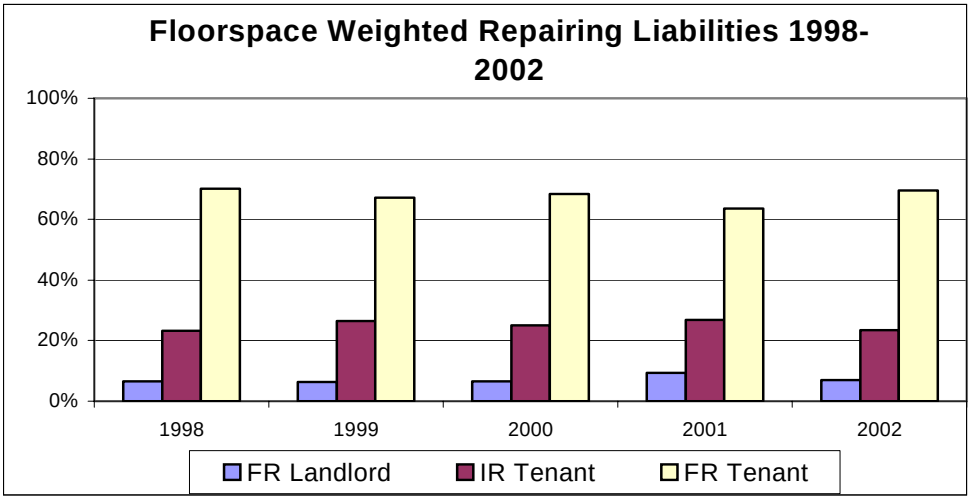


Figure 4.9 : All Property Incidence of Different Repairing Liabilities 1998-2002

The results for each of the four main property sectors are set out in Appendix Three and the most interesting point emerging from this analysis is that the sector with the least number of full repairing leases is the office sector which also has the lowest average lease lengths. However this could also be a function of the sector that has the most service charges and therefore the most distorted reporting of repairing liabilities. Shops also have a lower incidence of full repairing leases than the industrial sector weighted by both rent and floorspace, although the incidence is slightly lower than factories when un-weighted. Warehouses are most likely to have full repairing leases regardless of the weighting adopted.

4.7 Summary of Findings

A cluster sample of the VOA database of lease data from 1998 to 2002 has been analysed. The sample potentially covers all commercial transactions in the sample locations. Unlike IPD, in addition to including the better quality property stock in the ownership of the financial institutions and the major Property Companies, the VOA data also includes the secondary and tertiary markets not covered by IPD, which are often occupied by small business tenants. Thus conclusions can be drawn on changes in leasing practices over the market as a whole and the major analysis is segmented into four bulk codes; offices, shops, factories and warehouses.

Contrary to the decreasing trend in lease length throughout the period since the end of the monitoring of the first code in the IPD, there is little change in average lease lengths in the VOA data in the period 1998 to 2002,the average un-weighted lease length being 7.4 years in 1998 and 7.6 years in 2002. The rent weighted average rose marginally from 12.9 years to 13.2 years. There is no evidence in 2002 that the weaker lettings market identified in Chapter Two and the introduction of the 2002 Code of Practice, has fed through into lease length changes, although it is equally true to say that there was no increase in lease length in the strong market of the late 1990s.

Overall, the diversity of leases, both un-weighted and weighted, has remained fairly constant over the analysis period to 2002. No one lease term dominates across the four bulk property sectors. The number of short leases of three years or less has remained fairly constant through the analysis period with the largest concentration of leases being for three years. The much smaller number of very long leases over 15 years has also remained the same. Weighted frequencies indicate the usual trend of longer leases for larger, higher rent properties. Shop properties have the largest incidence of longer leases. Retail is also the only sector where there are still a significant number of large and/or high value properties let on 20 and 25-year leases. The dominant rent weighted lease length for offices is 10 years. Factory and warehouse premises lease lengths show a high proportion of 3-year leases throughout the period 1998 to 2002.

The rent review is not always reliably recorded in the dataset, and it is not possible to comment on the absence of a rent review. Nevertheless it is clear that the average review period within the lease term has hardly moved through the period 1998 to 2002, being around 4 years un-weighted, rising to around 4.5 years weighted. 5-year review periods dominate, particularly for office, shop and warehouse leases although factories have more 3-year reviews than 5-year reviews. However, on average, factories and warehouses have the lowest review period; a significant number of

leases of smaller and/or lower value properties appear to have been let on shorter review periods, especially in the industrial sector.

The incidence of upward only rent reviews is static. Over the whole period 88% of reviews appear to be upwards only, with little difference between sectors. The standard 5-year review does appear to be most associated with an upward only review whereas the -3year review, the second most frequent review pattern, does appear to have almost twice as many downwards reviews, along with a similar number attached to one-year reviews. Shorter reviews, which usually appear in shorter leases, appear to be a driver towards the relaxation of the upwards only review but the upwards only form of review still dominates the commercial property sector where reviews exist. The quality of the property does have a positive relationship with an upwards only review. This is especially apparent in the retail and warehousing sectors. Review frequency is driven by lease length with five-year reviews in 10 and 15-year leases and a number of 3 year reviews in 6-year and, to a lesser extent, 9-year leases.

The evidence on repairing liabilities has to be treated with caution. The interview evidence suggests that the incidence of internal repairing is less than that suggested by the VOA figures. Potentially, the most interesting point emerging from the analysis is that the sector with the least number of full repairing leases is the office sector, which also has the lowest average lease lengths. This may however be misleading and be connected to distorted reporting related to service charges. Shops also have a lower incidence of full repairing leases than the industrial sector. Warehouses are most likely to have full repairing leases regardless of the weighting adopted.

Chapter Five - The Interview Survey

5.1 Introduction

Two of the key objectives of this research are to measure the degree of flexibility and choice in the commercial leasing market. While the two are closely related, the monitoring of choice is more complex than the measuring of flexibility. As discussed in Chapter 1, the latter relates to an outcome – the actual form of lease agreed by the parties, while the monitoring of choice involves an examination of the process by which that outcome was achieved. Hence assessing flexibility, at least in broad terms, can primarily be carried out by the analysis of lease data (see Chapters 3 and 4); the monitoring of choice, however, requires the study of the way in which lease negotiations are conducted.

The two vehicles for monitoring the process by which a lease transaction occurs are a preliminary interview survey, which has been completed in time for the Interim Report, and a subsequent questionnaire survey of landlords, tenants, property professionals and lenders, which will feed into the Final Report. This two-pronged approach allows both a detailed investigation of the interaction between the parties to the negotiation, and a sample of broader opinions of a greater number and wider variety of parties involved in the transaction, to be undertaken. Timing these in two stages enables the detailed investigation to identify the major issues which can then later be tested on the wider sample. It also ensures that the Code of Practice has had sufficient time to start having an effect on the operation of the landlord and tenant relationship and its lease negotiation outcomes before any final view is taken. The interview survey was carried out in the Spring and Summer of 2003, ie after the Code had been in operation for one year. The questionnaire surveys are scheduled to be conducted in the early Summer of 2004, after the Code has been in place for two full years; the results of these will be included in the Final Report which is to be delivered at the end of 2004, enabling two years of the operation of the Code of Practice to be monitored.

However, the survey work has been designed to monitor more than choice. It also has an important role to play in testing flexibility. As discussed in Chapter 1, although flexibility can be measured in a broad fashion by the analysis of lease structures data, it is also important to obtain information on matters that are too detailed to be recorded by data collection systems, notably on the exact form of major lease covenants. In addition, assessing tenant awareness of property matters, the way in which practitioners approach the pricing of differing lease terms, and the extent to which the Code is influencing the market are also to be covered by the surveys. Accordingly, both the interviews and questionnaires address these areas.

This Chapter provides an analysis of the results of the interview survey.

5.2 The Framework for the Survey

5.2.1 The Interviewees: Property Agents and Solicitors

The negotiations leading up to a particular lease is a complex and inter-active process and lends itself to detailed investigation through interviews. However, interviews by their nature are time consuming and do not purport to provide a definitive view from a full sample of all possible interviewees. They are therefore only indicative.

It was concluded that the best coverage of lease negotiations per interviewee would be achieved by confining the interview survey to property agents and solicitors. It was felt that each such interviewee would be able to reflect his or her experience of the whole range of transactions in which they have been involved, to comment on the differing attitudes of a variety of landlords and tenants and to provide an indication of any significant differences between property types and property sectors. Exploring the views of landlords and tenants by means of the interview survey would not only have further diluted the sample of each type of interviewee, it would also have limited the scope of the interviewees since many landlords and tenants would be able to comment only on their own individual transaction.

Commercial lease negotiations are usually two-stage. The first normally involves a property agent and comprises the striking of the "commercial deal". The second stage is carried out by the parties' solicitors and is the process by which the commercial deal is translated into formal legal documentation – the lease itself. Inevitably this is a gross over-simplification of an infinitely variable process. The so-called commercial negotiations can be extremely detailed, in which case the lawyers' task can be little more than a drafting exercise. Equally, the commercial negotiations can be very basic, leaving the lawyers to settle matters that go well beyond mere drafting. Whatever the exact process, earlier research (Crosby and Murdoch, 2000) has shown that it is common for solicitors, when drafting a commercial lease, to either change or introduce, commercially significant provisions. For this reason, it was regarded as essential to interview both commercial property agents and solicitors. The investigation of the attitudes of both landlords and tenants is a vital aspect of this research; it is, however, being dealt with by means of the questionnaire surveys; the results of these will be included in the Final Report.

5.2.2 The Sampling Procedure

The selection of interviewees was loosely derived from the model developed in DETR (2000) which is also being used for the questionnaire surveys and Valuation Office lease structure data cluster analysis. This model is based on a range of locations and town types using the Standard Government Regions across England and Wales and the Classification of Local Authority Districts, which breaks each LA into a number of categories with Metropolitan Districts at the top and Mainly Rural Districts at the bottom. For the purposes of the questionnaire and VOA analysis, the town type classifications have been merged into three categories; Metropolitan Districts/Cities, Industrial Districts including Ports, and Urban/Rural Districts. These three merged categories were also used for the interview survey. The Standard regions were merged into three major regions, North, Midlands and South. Manchester was chosen as representing a Metropolitan District/City in the North; Chesterfield and the

surrounding districts as an Industrial Town in the Midlands and the area around Newbury and Salisbury as the Urban/Rural District in the South. A number of towns in the Midlands and the South were used to achieve the required number of interviewees; this was particularly necessary in respect of commercial agents who are fewer in most locations than are solicitors.

Interviews were also conducted in Newport, Gwent in order to obtain coverage in Wales. During the course of interviewing, it became apparent that, in each location, certain transactions were carried out using London agents and solicitors. These were therefore added to the sample; in order to maintain the integrity of the sampling London practitioners with experience in the sample locations and across the three main property sectors were chosen.

Individual interviewees were selected in each of the locations by reference to professional directories and databases. The solicitors were chosen using the Law Society's solicitors-online database. This provides detailed information on individual solicitors, their specialisations and their firms. Commercial property agents were selected using the Property Trade Directory. The information provided in these sources allowed us to identify practitioners in the designated locations who were known to have experience in the field of commercial property.

Whilst wishing to interview only those with expertise in commercial property, there was within that parameter an attempt to select those with varying degrees and types of experience from a range of sizes of firm. Although, inevitably, this framework was distorted by the unavailability of some of the chosen interviewees, the spread of those actually interviewed turned out to be wide. Most of the surveyors interviewed more usually acted for landlords rather than tenants when negotiating new leases; this is not surprising, given that many medium sized tenants and virtually all small business tenants do not employ an agent to act for them in lease negotiations. The solicitor interviewees commonly acted equally for both landlords and tenants; where this was not the case there was a balance between those who acted mostly for landlords and those who usually represented tenants.

A total of 21 solicitors were interviewed: 8 from Manchester, 4 from the Midlands, 5 from the South, 2 from Wales and 2 from London. A total of 25 surveyors were interviewed: 6 from Manchester, 6 from the Midlands, 7 from the South, 2 from Wales and 4 from London. These figures relate to the designated interviewee; in a few instances colleagues of the interviewee also participated in the interview so that the views of a further 8 practitioners were in fact obtained. However, any proportions alluded to in the analysis of the interviews refer only to one person per interview.

5.2.3 The Interviews

A semi-structured approach was adopted for the interviews. A different structure was devised for the property agents and the solicitors. The semi-structured approach was undertaken to allow interviewees a proper opportunity to explain and comment on the processes in which they were involved.

A set of detailed questions for property agents and solicitors were identified as part of the design for the questionnaire surveys and these were fully discussed with the

industry steering group for the project. Using these questionnaires as a basis, a set of issues was identified for the interview survey and these were raised in each interview. The interview plan was designed to proceed chronologically through the negotiation process. Inevitably, given the nature of the interviews, where each issue was allowed to develop, the interviewees tended to range across the various questions rather than to compartmentalise their answers. This reflects the holistic nature of the lease where one issue necessarily impacts on a variety of other matters.

In the majority of cases, the pre-devised structure was followed reasonably systematically. There were cases where it was not; these were usually where more than one interviewee was present.

To obtain as much consistency in the interviews as possible, all three members of the research team participated in the early interviews. Thereafter, virtually all interviews were conducted by two interviewers; only where this was impossible to organise was a single interviewer used. Each interview lasted for between one and one and a half hours.

The primary aim of both sets of interviews was to identify the degree of choice on offer during the negotiation of the lease. Therefore the objective of the interview was to examine the negotiation process. First, agents were asked how they marketed property, while solicitors were asked to identify when they first became involved in the process. Second, having identified the marketing process, the nature of the involvement of property agents and solicitors in market based negotiations, and the extent to which un-represented tenants were involved, was examined. Third, having established the way in which the lease is negotiated, individual lease terms were discussed, in order to identify trends, difficulties in negotiations and drafting, and the inter-action of these individual terms. Fourth, the nature of pricing was discussed with agents and, where appropriate, with solicitors. Fifth, any external constraints on parties to the lease were examined. Finally, interviewees were asked to reveal their own knowledge and understanding of the Code, their perception of the knowledge and understanding that landlords and tenants have of the Code, and the degree of influence that they believe the Code to be having on lease negotiations.

At a more general level, both sets of interviewees were asked for their views on the overall approach adopted by landlords and tenants to the negotiation process and on whether or not this is changing. In addition, since one of the objectives of this research is to investigate the extent to which small business tenants are aware of property matters, those interviewees who deal with small business tenants were asked for their views on how such tenants fare in the lease negotiation process.

5.2.4 The Analysis of the Interviews

All interviewees agreed to the taping of their interviews. It has therefore been possible to base the analysis on a full transcript of each interview. The transcripts were scrutinised so as to identify a range of practices and opinions within each of the main issues covered by each set of interviews and the degree of support among interviewees for each of these was logged. In general, the analysis only records views that gain the support of at least four interviewees. Where support (or otherwise) for any practice or opinion was limited by recognisable factors, for example by region,

property type, property sector or category of practitioner, this was tracked. In this way it has been possible to build a general picture that, it is felt, most of the interviewees would regard as a fair representation of their views and experiences.

Care should be taken when reading the analysis since it is essentially qualitative rather than quantitative. However, in order to give some indication of the weight to be attributed to particular views, specific proportions are sometimes provided. Where a point has specifically been made by a number of interviewees, that proportion is recorded. However, because interviewees were never posed closed questions, this must not be taken to mean that the other interviewees expressed the opposite view. So, for example, if it is stated that two-thirds of interviewees commented that leases were negotiable this does not mean that one third thought that they were not negotiable. Any proportions mentioned are therefore no more than broad barometers of practices and opinions.

5.3 Interviews with Surveyors

5.3.1 The Negotiation Process

5.3.1.1 General approach

Permeating through the interviews were broad views as to the general approach taken by the parties to the lease negotiation process. These can be summarised as follows.

- All interviewees felt that virtually all landlords are genuinely more adaptable and realistic as to the terms that can be achieved. The majority were non-committal as to when this change had occurred, describing the timing as "in recent years". Some were clear that the watershed was in the early 1990s. A few thought that it had occurred only in the past two to three years.

- The majority of the interviewees have private (ie non-institutional) landlords amongst their clients. These were felt to be increasing in number due to a noticeable shift in the investment of small private pension funds away from the stock market and into commercial property. Most of those who act for private landlords felt that such landlords are significantly more flexible and more prepared to "take a view" when leasing property than institutional landlords. A few thought that the latter had not actually changed their fundamental attitude to leasing at all and that any increased flexibility in that sector is entirely market driven.

- Virtually all interviewees referred to current market conditions being difficult for landlords at present and acknowledged that this is *a* driver of greater choice and flexibility; however, they were clear that it is not the only one.

- Virtually all interviewees considered that most tenants are now aware that lease terms are negotiable. The attitude of small business tenants in this regard is addressed below.

- Some of the interviewees operating in the retail sector felt that, save in a few high profile shopping centres, the large retail tenants drive the lease negotiations and are now getting the terms that they want.

5.3.1.2 The opening shot in negotiations

It is clear that the way in which a property is initially presented to the market will affect the perception that any prospective tenant will have of the degree to which any lease of it will be negotiable. The following information on the marketing process was gathered.

- A fifth of the interviewees had encountered a landlord making an up front offer of a priced "menu" of alternative leases. All referred to this as either a one-off experience or the practice of a specific landlord

- A very few of those from larger firms occasionally find either a landlord or a tenant with a set of explicit, and apparently non-negotiable, minimum requirements. These cases are almost always confined to the large retail sector.

- More than a third of the interviewees specifically mentioned that they adopt a very clear marketing policy of stating as little as possible about the proposed lease terms. They like to wait until there are enquiries about the property so that they can frame their opening shot on lease terms to suit the particular enquirer.

- The degree of information about the proposed lease that is put into property particulars is variable. That said, the following broad observations can be made:

    - Two thirds of the interviewees always state explicitly that any proposed terms are negotiable.
    - One third typically provide no more information on the lease than a rental figure (which itself is often described as a "guide" rent) with all other terms negotiable. The remaining two thirds would usually state a rent and the lease duration (or a minimum term) and some would indicate whether or not the lease was to be FRI (or subject to a service charge).

5.3.1.3 Heads of terms

The first stage of lease negotiations almost invariably culminates in "heads of terms" which record, in a non-binding form, the main lease terms that have been agreed. The degree of detail contained in these heads of terms, and whether these terms are changed or added to by solicitors, is an important aspect of both the negotiation process and the pricing of lease terms.

The picture painted of the role and content of heads of terms was very variable.

- Those employed by the larger firms tend to draft significantly more detailed heads of terms; those from the smaller firms often, but not always, use a very much briefer format.

- Sometimes the level of detail is driven by particular clients (some of whom want everything sewn up by their agents, while others want the detail left to their solicitors) and sometimes the level of detail depends on the nature of the deal, with the larger transactions commanding the more detailed heads of terms.

- About a fifth of the interviewees thought that solicitors either never, or only rarely change their heads of terms in any significant way. The remaining four fifths regarded such changes as relatively commonplace.

- Where significant changes to the heads of terms do occur, a fifth of the interviewees thought that there would very occasionally be either an adjustment to the rent or some other trade off. The vast majority thought that there would never be any rent adjustment or trade off.

5.3.1.4 Small business tenants

Given the concerns about how the smaller business tenant fares in the lease negotiation process, this was specifically addressed in the interviews. More than two-thirds of those interviewed regularly come into contact with such tenants and the proportions of interviewees' views recorded in the summary below relate to them and not the whole set of interviewees.

- The experience of virtually all of the relevant interviewees is that small business tenants are almost invariably un-represented in the commercial negotiations. Equally it was felt that nearly all such tenants do take legal advice from a solicitor before signing a lease. Indeed many of the interviewees positively advise such tenants to see a solicitor before signing up. A few, at the small end of the market, do sometimes sign up tenants directly.

- About one third thought that

    - Some small business tenants fully appreciate that the deal is negotiable and are reasonably "streetwise" in the negotiations: and
    - That some small business tenants simply take what is on offer without negotiating

- About half felt that those small business tenants who do negotiate are not able to get the best deal that they could because they do not know what to ask for.

- About one third, when acting for a landlord, do some "hand-holding" for the small business tenant;

    - Of these, two thirds go further and positively assist and advise the small business tenant because they believe that it is not in their landlord client's interest to tie such tenants into an inappropriate lease.

All of these interviewees were managing agents operating at the smaller end of the market, often within smaller communities.

5.3.1.5 External influences

The final shape of a lease may be affected by factors that are outside the control of the parties themselves. Interviewees were therefore asked whether such external influences exist and, if so, on their degree of impact.

- About a third of all the interviewees (and it should be noted that many interviewees had little or no experience of development work) thought that those providing forward funding for new developments do exert an influence on lease terms and that these funders are less flexible than the landlords are.

- About a third thought that lenders exert some influence over lease terms, more so on new build than on second hand property.

- Half of the interviewees considered that lease terms are shaped by their perceived impact on asset value. This is more so where the landlord is looking to sell.

- A few, mostly those from the larger firms, recognised that head lease restrictions on the form of any permitted sublease feeds through into the subletting market. There was no suggestion that this is causing widespread problems in practice, rather some indication that many landlords turn a blind eye where a tenant can only sublet on terms that breach the head lease.

- A number of interviewees commented on a noticeable increase in the number of landlords investing in commercial property in order to provide themselves with a pension fund. Much of this is done "informally". Where the SIPPS formalities are complied with, the interviewees felt that this has no influence on the lease terms; it does however significantly lengthen the deal time.

5.3.2 Lease Terms

In order to further develop understanding of both choice and flexibility, interviewees were asked for their views on trends on commercial lease structures and key covenants. The objective was to obtain information on those aspects that are difficult or impossible to gain from statistical data. The following summarises the material obtained from the interviews.

5.3.2.1 Lease Duration

- Virtually all interviewees thought that lease lengths have shortened and that this is a permanent change.

- A few, all in one small pocket in the South, thought that leases have lengthened since the early 1990s, especially at the very short end.

5.3.2.2 Tenants' Breaks

- More than two thirds of interviewees feel that tenants' breaks are now "more prevalent"
    - Of the few who were prepared to put a percentage on this, most put the proportion at 50%.
    - Such breaks were generally regarded as less common in retail and more common in leases of 5 years and less.

- More than half thought that breaks are usually timed to coincide with a rent review (with a third of these positively stressing that any interlinking with the review is avoided).

- A third felt that the timing of breaks is dictated by the tenant's operational requirements; this was particularly commented upon in the industrial sector in respect of the distribution business.

- The most prevalent period of notice attached to the exercise of a tenant's break is 6 months; periods of 12 months and 3 months are also used. The less comfortable the landlord is with the break, the longer the period of notice required.

- Some interviewees encountered the use of penalties on the triggering of a break; these tend to be occasional.

- Fewer than half of the interviewees felt able to give a view on the actual operation of tenants' breaks; of these, a significant majority felt that breaks are rarely operated and that, where they are, it is for operational rather than rent reasons.

5.3.2.3 Rent Reviews

- All bar one interviewee thought that rent reviews are always, or virtually always the ratchet form of upwards only market rent review. One interviewee achieves an up/down review in 30 – 50% of cases when acting for a tenant.

- Just over a quarter occasionally employ either RPI linked reviews, turnover rents or stepped rents; some of these also include a market based upwards only review

- The vast majority of interviewees thought that most tenants never ask for an up/down review; those that do bother to ask, do so without any expectation of getting one. This was said to be as true for major retailers as for other sectors.

- Over a third of interviewees expressed the view that upwards only rent reviews are simply not an issue for tenants.

5.3.2.4 Repairs

- More than two thirds of the interviewees were of the view that the FRI lease (or one with repairs funded by a service charge) is the norm.

- More than half thought that, where the property is second hand, the modification of FRI terms by the use of schedules of condition is increasing.

    - A quarter thought that the schedule of condition in respect of such properties is now either "common" or "the norm", although rather less so in the retail sector.

5.3.2.5 Other Terms

The interviews showed that it was relatively rare for agents to become involved in negotiating other lease terms in any detail. These tended to be left to the solicitors. Some of the interviewees, usually those from the larger firms might, on larger deals, negotiate some detail on assignment and subletting provisions. These were also aware of the problems posed by tight restrictions on the form of any permitted sublettings.

5.3.3 Pricing of Lease Terms

Very little of substance could be extracted from the interviews on the pricing of lease terms at grass roots level. The most commonly held views were as follows.

- The parties agree the rent and then the landlord achieves the best possible terms around that rent.

- There is no explicit pricing of lease terms – pricing is simply rolled up in the whole package.

- In the rare cases where a more flexible package is offered at a price, the tenant will not normally pay the extra; either the tenant gets the flexibility without paying more or it will revert to the less flexible package rather than pay.

- Any pricing is usually intuitive. Some of the larger landlords have developed models but these are not used in practice.

- Tenants' breaks tend to be priced through length of notice, penalties or the shortening of rent free periods, rather than through the rent.

- Up front, priced menus of terms are very rare; they are used by some specific landlords – two were mentioned by name. A number expressed the view that such a practice would be confusing for prospective tenants.

5.3.4 The Code of Practice

When arranging the interviews, interviewees were informed that they would be asked about current commercial leasing practices; the Code was not specifically mentioned. They were, however, sent copies of the draft questionnaire surveys that included questions on the Code of Practice; not all interviewees had, in fact, had time to look at these prior to the interview. While some of the interviewees were clearly aware, in advance, that this exercise was part of the research into monitoring the Code of Practice, the majority, especially those from the smaller firms, were not.

Interviewees were asked to comment upon their own knowledge and understanding of the Code and that of landlords and tenants. They were also asked for their views on the extent to which the Code is influencing attitudes to lease negotiations.

5.3.4.1 Interviewee Awareness

- Virtually all of the interviewees were aware of the Code; only two were not aware of the existence of the Code.

- More than half described themselves as reasonably conversant with its contents and purpose, while a third simply knew it exists.

- About a fifth are pro-active in telling landlord clients about the Code.

5.3.4.2 Landlord Awareness

- A few interviewees thought that all landlords were aware of the Code; in most of these cases the interviewee's firm had adopted a policy of informing all their clients about the Code.

- About half thought that "some" landlords – usually the bigger ones – were aware of the Code.

- More than a third thought that landlords did not know about the Code.

5.3.4.3 Tenant Awareness

- The vast majority thought that tenants either did not know about the Code at all or were far less likely than landlords to know about the Code.

- A few thought that the only tenants who know about the Code are the big ones.

5.3.4.4 Influence

- Two thirds of the interviewees thought that the Code has no influence on lease negotiations at all. One fifth thought that it was having some small, indirect impact.

- A few expressed the view that where large landlords are "implementing" the Code only a few are doing so genuinely; the remainder are merely paying it lip service.

- A fifth had on one or two occasions encountered a tenant using the Code as part of its lease negotiations, usually to no effect

- One interviewee regularly uses the Code to good effect on behalf of tenant clients.

5.4 Interviews with Solicitors

5.4.1 The Negotiation Process

The interviews showed that all of the interviewees usually only become involved in lease negotiations on receiving heads of terms from either the landlord or the landlord's agent (when acting for the landlord) or on receipt of the draft lease (when acting for a tenant). Some occasionally have an input into the heads of terms, either because the deal is particularly big or complex, or because that is how the particular landlord client likes things done.

5.4.1.1 Heads of Terms

- Virtually all the interviewees regarded heads of terms as very variable in their detail; most thought that the better quality agents produced more detailed and more useful heads of terms.

- Some thought that some landlords, and a few large retail tenants, prescribe heads of terms in advance.

- The vast majority thought that, when settling the final form of lease, they make commercially significant adjustments to the agreed heads of terms.

    - Most thought that this never leads to any adjustment in the rent; a few thought that this happens only where repairing obligations are significantly changed, eg from FRI to internal repairing terms.
    - About half thought it more likely, although still not common, that such changes result in adjustments to, or the introduction of, incentives such as rent frees. Very occasionally there can be a trade off on other terms.

5.4.1.2 General Approach to Lease Negotiations

- Only two interviewees thought that landlords are now more flexible from the outset. About half thought that landlords are now more amenable to changes in the lease, but that it is still for the tenant to ask, rather than the landlord to offer. About a third felt that there is no underlying change of attitude from landlords – they seek to dictate terms and any flexibility is market driven.

- Some interviewees, usually those from the larger firms, are positively encouraging their landlord clients to send out more balanced and neutral draft leases as a starting point, feeling that this saves time and money.

- About a quarter of the interviewees felt that the final lease is either a reasonably fair, a balanced, or a "commercial" document, or that it is the best that the landlord is able to offer.

5.4.1.3 Small Business Tenants

Just over half of the interviewees had regular experience of acting on transactions involving small business tenants. The following summary relates to the views of this group rather than to the interviewees as a whole.

- Virtually all thought that the small business tenant negotiates the heads of terms for themselves without any professional property advice.

- While a few thought that small business tenants are quite canny and can look after themselves in these negotiations, the majority thought that most such tenants lack property awareness (although some noted that this is less so where they have had previous experience of leases).

- The interviewees referred to a number of factors that can make it difficult for them, as solicitors, to negotiate a better form of lease for this type of client. These include

    - Unsatisfactory heads of terms already negotiated by the tenant and from which the landlord will not now depart
    - The unreasonable speed with which the tenant wishes the deal to be concluded
    - The length of the lease documentation sent out by the landlord's solicitor and the cost constraints that this produces.

- One person expressed a very strong view that, in the licensed premises sector, small business people, who are often sinking all their savings into a new business venture, are routinely exploited by landlords insisting on seriously unbalanced and unfair leases.

- More than half of the interviewees considered that a short, fair, standard form of lease (preferably from a neutral external source) was needed for small business tenants.

    - Most, but not all, regarded the Law Society small business lease as positively bad
    - None mentioned, or had experience of, the BPF short form of lease.

- A significant minority were positively against shorter standard form leases and regarded a comprehensive lease as better for both sides. A number of other justifications for lengthy lease documentation were offered

  - It is easier to send out one standard precedent in all cases
  - It is easier to spot and then negotiate on matters that are in a document than to pick up what has been left out
  - Defensive lawyering – the fear of being held legally liable for matters omitted from lease documentation

- Some thought that all leases are too long and could be shortened without loss.

5.4.1.4 External Influences

- Just over a third of all of the interviewees (and, as with the property agents, a significant number of the interviewees had no experience of new developments) thought that funders or mortgagees exerted some controls over the terms of a lease; this was far more likely to be the case on new developments.

  - Of these, half thought that the controls were either more reasonable than in the past or were more negotiable.

- Nearly a quarter of interviewees regarded inexperienced junior solicitors (often from large City firms) as a positive hindrance to speedy and successful negotiations. They were viewed as inflexible and prone to "go by the book".

  - This view was firmly rejected by the City solicitors interviewed (who were not themselves inexperienced).

- More than a quarter of the interviewees regarded over-long and inappropriate draft leases as a hindrance to negotiability. All of these dealt with small business tenants and lower value premises.

- Nearly half of the interviewees recognised that over strict conditions on subletting restrict negotiability in the subletting market; however, few could point to any direct experience of this.

5.4.2 Lease Terms

It was expected that the interviews with solicitors involved in drafting leases would be particularly helpful in discovering whether or not the precise detail of particular key lease provisions is demonstrating more flexibility. The following is a summary of the findings in this area.

5.4.2.1 Lease Duration

- Virtually all of the interviewees thought that lease lengths have shortened. Their views were mixed as to whether this had occurred in the early 1990s and stayed that way or whether there had been a further shortening more recently.

5.4.2.2 Tenants' Breaks

- The vast majority were agreed that tenants' breaks are now "more common" or "regularly encountered".
    - Some emphasised that they are still not the norm. The few who mentioned percentages talked of 50%.
    - There was a suggestion that they are less common in the retail sector.

- Tenants' breaks are timed either to coincide with a rent review or are geared to the tenant's operational requirements. Interestingly, this split was usually on an interviewee basis, rather than each interviewee experiencing both alternatives. Some interviewees regarded the insertion of an early break for start up businesses as desirable.

- The period of notice required by landlords was very variable, ranging from 12 – 3 months. The shorter periods of notice appeared to be more prevalent in the small business market.

- All the interviewees considered that the old style strict conditional breaks (which were often, in practice, inoperable) are now a thing of the past; however, a quarter of the interviewees thought that landlords still try them on. Most breaks now appear to be conditional only on the payment of rent.

- Although about a quarter regularly encountered the use of penalties, the majority had either never, or rarely, come across them. Two interviewees mentioned one-off cases where the tenant would be given a rent holiday if the break was not operated.

- No interviewee had any real handle on the actual operation of breaks. Many thought that they are not often exercised.

5.4.2.3 Rent Reviews

- Interviewees were unanimously of the view that rent reviews are virtually always the ratchet form of upwards only market review.

- Some interviewees occasionally encounter RPI linked reviews, turnover and stepped rents.

- The majority stated that tenants never ask for a downwards review; this included those acting for major retailers (for whom it was said "not to be a major issue"). Of the remainder, the majority ask for a downward review "tongue in cheek" and with no expectation of it being conceded.

- Only two interviewees regularly press for a downwards review (one citing the Code); their requests have always been rejected.

- The majority of reviews are said to be 5-yearly. 3-yearly reviews are the norm for those practising in the East Midlands; they are also encountered by

practitioners in the South and in Wales. There is some evidence that 3-yearly reviews are being inserted into 5 or 6 year leases.

5.4.2.4 Repairs

- A significant majority considered most leases to be either FRI or service charged.

- Where the property is second hand and stand alone

    - More than half of the interviewees thought that schedules of condition are now more common and more readily accepted by landlords.
    - Just over a quarter thought schedules of condition had always been around and that there was no change.
    - Some thought that the increase in the use of schedules was due to the wide availability of digital cameras and camcorders.
    - A number were critical of the over-reliance on photographic schedules which they regarded as inadequate.

- A quarter of the interviewees thought that tenants are now more aware of the significance of repairing liabilities.

- There was some indication that tenants of prime retail properties are very happy with full FRI leases since they want their properties to look good.

5.4.2.5 Assignment

- About a quarter of the interviewees commented that very short leases, ie of 3 years or less, are usually made unassignable.

- A substantial majority thought that other conditions attached to the right to assign have softened since the initial 1996 flurry of tight conditions.

    - A number thought that the conditions now put forward by landlords are often negotiable.
    - However a number of interviewees complained that landlords often blindly include silly and inappropriate conditions. They also commented that some of the financial conditions, notably that requiring an assignee to be of equal financial standing, can make a lease virtually unassignable.

- However, all bar one interviewee considered that it is standard for the landlord to require an automatic AGA as a pre-requisite of the right to assign

    - Only a fifth ever sought to have this modified so as to ensure that the AGA is only required where this is reasonable. While one claimed to achieve this is in 50% of cases (quoting the Code), the others admitted that they were not usually successful in obtaining any amendment.

5.4.2.6 Subletting of the Whole

- The vast majority of the interviewees said it is standard for landlords to set pre-conditions to the right to sublet the whole that require the sublease to be on the same terms and either at the passing rent or at market rent. The remainder, who felt that subletting was usually constrained only by the landlord's consent which could not unreasonably be withheld, all dealt with properties at the smaller end of the market.

- Although more than half of the interviewees were aware of the difficulties posed by the strict conditions, the remainder did not see any problems with them.

- Most of those who appreciated the problems could usually negotiate a modification from passing rent to market rent.

- Of those who were aware of the problems, a number from the larger firms were actively considering how to deal with the fall-out form the decision in *Homebase*.

5.4.2.7 Other Terms

Interviewees were asked whether other lease provisions, notably those alluded to in the Code, ie service charges, insurance, alterations and user, give rise to any particular difficulties in lease drafting. The vast majority were of the view that these do not cause any problems.

5.4.3 The Code of Practice

When arranging the interviews, interviewees were informed that they would be asked about current commercial leasing practices; the Code was not specifically mentioned. They were sent copies of the draft questionnaire surveys that included questions on the Code of Practice; not all interviewees had, in fact, had time to look at these prior to the interview. While some of the interviewees were clearly aware, in advance, that this exercise was part of the research into monitoring the Code of Practice, the majority, especially those from the smaller firms, were not.

Interviewees were asked to comment upon their own knowledge and understanding of the Code and that of landlords and tenants. They were also asked for their views on the extent to which the Code is influencing attitudes to lease negotiations.

5.4.3.1 Interviewee Awareness

- Virtually all of the interviewees were aware of the Code; only two interviewees were not aware of the Code.

- About half knew of its contents and purpose. Some had, as a firm, given positive consideration to its implications and given briefings to clients. The remainder were aware of the Code's existence but not of its contents or purpose.

5.4.3.2 Landlord Awareness

- Nearly half thought that that, where their landlord clients were either large institutions/organisations or "professional property people", they did know about the Code.

- The remainder of the interviewees (ie more than half) thought that landlords simply did not know about the Code.

5.4.3.3 Tenant Awareness

- Just over a quarter of interviewees thought that some tenants know of the Code

- More than half thought that tenants do not know about the Code

5.4.3.4 Influence

- Virtually all of the interviewees regarded the Code as having no influence at all.

- A few thought that some landlords are paying lip service to the Code but that it was having no substantive effect on outcome.

- Only 3 interviewees had, when acting for tenants, used the Code as a negotiating device to achieve amendments. One firm had adopted this approach as a general policy and the interviewee was satisfied that it was useful and effective. The other two acknowledged that citing the Code had no effect.

5.5 Summary of Findings

5.5.1 The Negotiation Process

The interviews with property agents (who predominantly act for landlords in the negotiation of new leases) indicate that landlords have become more adaptable and realistic on lease terms since the early 1990s. Institutional landlords are regarded as less flexible than their private counterparts. While the difficult market conditions are contributing to this change, it is felt that there is a genuine softening of approach by landlords. Most tenants are felt to be fully aware that lease terms are open to negotiation, with the big retail tenants now normally driving their deals, save in a few high profile shopping centres.

The solicitor interviewees (who acted for both landlords and tenants in a reasonably even split) were more sceptical about a permanent change of approach; a significant proportion believe this to be purely market driven. Many recognise that landlords are currently more ready to accept changes to their draft lease, but still feel that it is for the tenant to ask rather than the landlord making the offer.

Property is generally marketed in a way that makes it very apparent from the outset that the deal is negotiable. While the use of an up front menu of a range of alternative

terms is rare, so is the set of explicit and apparently non-negotiable minimum requirements. There appears to be a widespread practice on the part of landlords' agents of seeking to frame their opening shot on lease terms in a way that suits the particular tenant.

The commercial side of the negotiations virtually invariably culminate in agreed "heads of terms". The degree of detail achieved at this stage is very variable. Heads of terms drafted by agents from the bigger firms, or in respect of bigger deals tend to be more detailed. Otherwise, heads of terms can be quite brief, leaving more scope for further negotiations when the matter gets handed on to the solicitors.

The solicitor's role in commercial lease transactions usually goes beyond the mere straight translation of the heads of terms into the legal documentation of a lease. In most instances, the broad elements of the lease such as lease length, the existence of tenants' breaks, the form of rent review, assignability and the nature of repairing responsibilities are settled in the commercial negotiations. However, the detailed drafting of most of these aspects is usually in the hands of the solicitors and can have a significant effect on the final form of the lease.

Commercially significant changes to the heads of terms are commonly made by the parties' solicitors; this is less likely to occur where the heads of terms are very detailed. Such changes very rarely result in any change to the agreed rent. Other responses, such as an adjustment to incentives such as rent frees or a trade off on other terms, only occur very occasionally.

A significant proportion of solicitors believe that landlords' solicitors send out over-long lease documentation that can often, especially in the case of small business premises, also be inappropriate. Others felt quite strongly that every transaction, big or small, deserves a proper – necessarily lengthy – lease document. A full consideration of a long form of lease is difficult to achieve within the cost constraints applying to tenants at the smaller end of the market. A majority of those dealing with small business tenants favour the development, preferably by a neutral body, of a short form standard lease. A significant minority were positively against this idea.

5.5.1.1 Small Business Tenants

It is very rare for such tenants to be represented in the commercial negotiations, although it is equally unusual for them not to take legal advice before signing a lease. It is felt that a few small business people are reasonably aware of property issues, especially where they have had previous experience of leasing. However, their general lack of property awareness, coupled with the absence of property advice at the initial stage of negotiations, means that the vast majority of small business tenants are regarded as being unable to strike the most advantageous bargain that might otherwise have been available to them. Most are aware that lease terms are negotiable, but some simply take what is on offer. Only at the smaller end of the market, and where the landlord's negotiator is also his property manager, does there appear to be a view that it is in the interests of both parties for the tenant to be given a lease appropriate to his business needs whether or not he actually knows enough to negotiate such a lease for himself.

While there was no suggestion that a solicitor cannot rescue a small business tenant from a manifestly unsuitable deal, it is clear that it can be difficult and sometimes impossible for the solicitor to make good deficiencies in the agreed heads of terms. This is compounded by the client's impatience to get into the premises and his desire to have the lease settled, often unreasonably quickly.

5.5.1.2 External Influences

Funders and lenders are regarded as exerting some influence on lease terms, especially on new developments. These controls are seen to be either more reasonable or more negotiable than in the past. Lease provisions are shaped by their perceived impact on asset value. This is more so where the landlord is likely to sell. There is a recognition, more so amongst solicitors, that tight restrictions on subletting can feed down and lead to inflexibility in the subletting market. However, there is no suggestion that this is causing widespread problems in practice. A significant minority of the solicitors regarded young and inexperienced solicitors, and the length of lease documentation as an impediment to a flexible outcome.

5.5.2 Lease Terms

Lease lengths are said to have shortened since the early 1990s – but not necessarily more so in the last few years. The agents considered this change to be permanent. The VOA data illustrating a number of smaller lettings on six-year leases with three-year reviews, not apparent in the IPD data, was confirmed in interviews for secondary and tertiary property.

Tenants' breaks are now more prevalent than in the past, but have not yet become the norm; there is no widespread view that puts the proportion of leases with tenants' breaks at more than 50%. Tenants' breaks are noticeably less common in the retail sector.

Tenants' breaks are timed either at review or are geared to the tenants' known operational requirements. Some interviewees regard the insertion of an early break for start up businesses as desirable. A number stress the importance, where a break is timed to coincide with a rent review, of positively avoiding the interlinking of the two. The period of notice required by landlords varies from 3 – 12 months, with 6 months' being the most prevalent. The less happy the landlord is with the break, the longer the period of notice required. The use of penalties on the triggering of a break is occasional rather than widespread. The drafting of tenants' breaks so that they are conditional upon strict compliance with the lease terms has virtually disappeared. The feeling is that tenants' breaks are rarely actually exercised, although most interviewees admitted to having little hard experience on which to base this view. There is some indication that the exercise of breaks is usually for operational reasons rather than because the rent has become unaffordable.

Rent reviews are almost invariably the ratchet form of upwards only market review. RPI linked reviews, turnover rents and stepped rents are occasionally encountered; these often also include an upwards only market based review. Tenants either never ask for a downwards review or, if they do, do so without any expectation of achieving

one. Upwards only rent reviews are often not an issue for tenants, even the large retailers.

The FRI lease, including one funded by a service charge, remains the norm. In the case of stand alone second hand property, the modification of the strict FRI terms by reference to a schedule of condition is now more common and more acceptable to landlords, perhaps even becoming the norm. There is a suggestion that schedules of condition increasingly are in photographic form and that these are not necessarily satisfactory.

Conditions attached to the right to assign have softened since the initial flurry of tight conditions in 1996; those that are now imposed are more often negotiable. However there are some concerns that a widely used test requiring any assignee to be of equal financial standing to the outgoing tenant can make some leases virtually unassignable. One tight condition has remained virtually intact – that of the standard imposition of a requirement for an automatic AGA without reference to reasonableness.

It appears to be standard, at the bigger end of the market, for landlords to require subleases of the whole to be on the same terms as the head lease and at either the passing rent or at market rent. It is rare for the landlord to accept any modification of this apart from that from passing rent to market rent. This can cause difficulties should the tenant later wish to sublet; however, the interviewees had no experience of such problems actually materialising.

5.5.3 The Pricing of Lease Terms

Little of substance on lease pricing can be gleaned from the interviews. The use of explicit appropriately priced alternative sets of terms at the commencement of negotiations is rare and appears to have been adopted by only a very few landlords. Pricing at grass roots level is said to be intuitive and rarely explicit; it tends to be rolled up in the whole package. Parties often first agree a rent, with the landlord thereafter simply seeking to achieve the best possible terms within that rent. Although some pricing models are known to have been developed by landlords, these are not used in practice. In the rare case where a more flexible package is explicitly offered at a price, the tenant refuses to pay the extra and would rather revert to the less flexible deal. The only area in which there is any consensus on pricing is tenants' breaks. However, these tend to be priced through length of notice, penalties, or the shortening of rent free periods rather than via the rent. Solicitors often introduce commercially significant changes to heads of terms. However, it is virtually unheard of for this to bring about any adjustment to the rent; furthermore, any other sort of trade off is unusual.

5.5.4 The Code of Practice

Virtually all of the interviewees know about the Code, although a few do not. Just over half are reasonably conversant with its content and purpose; the remainder simply know that it exists. Relatively few regard themselves as having any role to play in the dissemination of the Code to their clients. Some of those that did were very positive and pro-active.

Very few think that all landlords know of the Code; these tend to be those who had taken a policy decision to tell all their clients about it. About half think that some landlords – usually the bigger ones – know about the Code. The remainder consider that landlords are ignorant of the Code. A few think that some big tenants are aware of the Code, but the vast majority believe that tenants either do not know at all, or are less likely to know, about the Code.

Most consider that the Code is having no influence at all on lease negotiations, although some of the agent interviewees regard it as having some small, indirect, influence. Only two interviewees, one surveyor and one solicitor, are actively and regularly using the Code when negotiating on behalf of tenants. Both are satisfied that this approach is both useful and effective. Two other interviewees have cited the Code in negotiations and both had found this to be of no effect. A small number believe that a few large landlords are genuinely trying to implement the Code; there is also a view that some of the large landlords are merely paying lip service to the Code.

Chapter Six - Lease Pricing

6.1 Introduction

The 2002 Code of Practice for Commercial Leases implies that lease terms should be appropriately priced and there is a suggestion in recommendations five and six that alternative lease terms should be offered to tenants with each one appropriately priced. Appropriate pricing may imply a systematic approach to lease pricing that can be applied to different lease terms taking into account both landlords' and tenants' aspirations. If the pricing mechanism is biased towards one party, it can lead to lease terms being inappropriately priced for the other party. However, the interview survey revealed little evidence of systematic pricing and this chapter develops the pricing issue as it was identified in DETR (2000) as a major constraint to the delivery of flexible leasing in the UK.

The aspirations of the two parties to a lease will be different but that does not necessarily lead to different required outcomes; for example both landlord and tenant may want the same lease length for different reasons. However, Crosby *et al* (2003) do suggest that in general corporate occupiers require shorter leases with more flexible exit conditions than landlords wish to offer. However, Crosby *et al* (2003) also suggest that not all tenants are prepared to pay more to achieve their aspirations. Logic suggests that if landlords are offered terms that affect their asset value and/or the present value of their prospective cash flow by tenants who feel that the lease terms improve their business efficiency, then the rent should be adjusted to compensate. It is the approach to, and the extent of, these adjustments that are the core of this chapter.

Chapter Two identified a number of influences which drive the aspirations of landlords and tenants and a pricing model must recognise these drivers in order to correctly price the lease from both perspectives. This chapter reviews the literature on commercial property lease pricing to identify current practice and potential future changes to practice. It also draws from the evidence gained from the primary research interviews to identify current practice. It illustrates new approaches to pricing leases developed from the wider finance literature and how those approaches are being operatated in the current market. Using models developed from these new approaches it identifies some simple case studies, which illustrate possible adjustments for basic lease terms such as length, break clauses and up and down reviews. Finally it reports on a major study of three segments of the IPD Property Analysis System to determine whether there is any evidence of lease pricing differentials in the UK market.

6.2 Market Approaches to Lease Pricing

6.2.1 A Brief History of the Development of Lease Pricing

Before 1990, the standard institutional lease was almost universally used for institutional class property owned by the financial institutions and major property companies. By value 90% of the Investment Property Databank was let on 20 or 25-year leases, 5 yearly upwards only rent reviews and often full repairing and insuring terms (DETR, 2000).

This had developed from the 1960s when the financial institutions started to invest heavily in property due to the realisation of the poor performance of bonds in an inflationary economy. In 1963 the pension funds and insurance companies invested about 10% of their net investment in property. By 1970 this had risen to over 20% each year and it remained around 15% to 20% for most years into the 1980s (Darlow, 1983). At the same time, the nature of property investment was changing. In 1960 the better located commercial property had been let on long leases (21 years was common) without rent review but during the 1960s it was realised that inflation and growth were now endemic. The response was to insert rent reviews, at first after 14 years but then very quickly every seven years became common. In the early 1970s this reduced further to five years and lease terms moved to multiples of five years, 20 or 25 years. Secondary property lease lengths were originally much shorter, averaging 7 years throughout the same period that prime property review periods were falling. They also introduced rent reviews at more variable intervals, with some attempts to introduce 3-year reviews in secondary properties during the high inflationary times of the 1970s and 80s (Baum and Crosby, 1988).

This pattern remained in place until the commercial property crash of 1990. The effect of a standard set of lease lengths and terms was that, upon new letting, there was virtually no discussion of the effect on rent of varying lease terms. The appraisal model in the UK at the time was based on a comparable approach to other property rents and asset values (see, for example, Baum and Mackmin, 1989). The three main drivers of value are location, physical characteristics and lease terms; given that lease terms remained constant most interest centred on locational and physical differences. Comparables were obtained from properties let on virtually identical leases so there was no need to adjust for this aspect.

However, the development of rent reviews resulted in a whole new industry of lawyers and surveyors specialising in the valuation for rent of properties let within the hypothetical world generated by increased intricacy in the drafting of review clauses. Pricing issues emerged as a result of the inherent differences between reality and the hypothetical world of rent review and changes in market conditions from the granting of the lease to the date of the review. For example, some leases were drafted so that at review the existence of future reviews was to be excluded (National Westminster Bank plc v Arthur Young McCelland Moores & Co [1985] 1 EGLR 61). Similarly, leases signed in the 1960s with a 21 year or 14 year review pattern were now ‘abnormal’ because no new leases had this review period. Both these instances introduced a situation where the review surveyor had to determine a rent for one review period where the evidence of value was gleaned from comparables on a different review pattern. Hence they were forced to estimate the value of different lease terms.

The impact of different lease terms has come up for third party determination and, in the case of appeal or lease renewal, has also been before the courts. The property valuation literature illustrates the approach taken to these questions.

The main lease pricing issues that have come before the courts or have been debated before third parties are lease length, rent review period, rent review type, user clause and tenant’s improvements and repairing liabilities. The issue of lease incentives has

also been considered as, from 1990 onwards, varying lease terms have been accompanied by the granting of financial incentives to persuade tenants to take leases. This chapter therefore addresses both the pricing of lease terms and the pricing of lease incentives.

In addition to this area of rent review practice, the methods of appraising properties let on leases has been the target of intense scrutiny in the UK for 30 years starting with Wood (1973) and Greaves (1972) and continuing unabated through the 1970s and 1980s in both the academic and professional literature. This debate was given new impetus in the early 1990s with the property crash introducing the new phenomenon of over-renting (it had occurred briefly in the early 1970s in some sub-markets but rents recovered their previous rental levels within one review period so it had not been a major valuation issue). Both professional (for example Epstein, 1993) and academic interest (Baum and Crosby, 1995) in appraisal techniques was rekindled in this period.

Interest in asset valuation was also fuelled by the rise and rise of the property performance measurement industry from the 1980s onwards, based on the increasing holdings of the major financial institutions and property companies. This measurement is being undertaken on increasingly shorter time scales with monthly and quarterly assessments in addition to the normal time span of one year. The shorter the time span the more the performance is dominated by the change in asset value over the period. This change is a function of the movement in asset *valuation* so there is intense interest in asset values in the UK investment community

The outcome of these developments is that appraisal mentality is aimed at assessing the asset value of the property and therefore every change in the rent and lease terms is often assessed by reference to the effect on the valuation of the asset rather than its affect on the future cash flow

6.2.2 Asset Valuation

A review of valuation approaches to lease pricing in the UK identifies that they are asset value rather than cash flow based. If asset values were assessed via cash flow then this would be a semantic difference. But they are not and the traditional appraisal model is crudely based on assessing the multiplier from current rent to current asset value by reference to similar properties. If the similar properties have different lease characteristics, there are few mechanisms for assessing the change in rental other than assessing the change in the multiplier, the reciprocal of which is variously termed the all risks yield, valuation yield, equivalent yield or capitalisation rate in UK valuation terminology. This yield is usually amended by experience rather then technique so the valuer's intuitive view is represented by subjective adjustments to the yield. Their attitude to different lease terms is therefore key to the changes.

When assessing the pricing of break clauses, Herd and Lizieri (1994) found that valuers did use *ad hoc* adjustments to the yield and the Investment Property Forum (1993) found that, in answer to questions concerning privity of contract and upwards-only reviews, valuers would move the all risks yield up by significant amounts to compensate for the perceived additional risk of leases without these features. Interestingly, the proposed movements for privity were wildly exaggerated by both investors and valuers. Evidence from the Investment Property Databank on

equivalent yield movements shows that properties have increased yields when the lease falls below 10 years unexpired term. This confirms interview evidence from Crosby and French (1994). Discussions with major firms of valuers by the research team in the recent past indicate that valuers take an individual rather than a portfolio approach to each valuation; this means that they are more likely to assume a break actually occurs or a lease renewal does not occur, thus introducing additional costs and void periods. On average, these assumptions appear to be unrelated to the actual incidence of breaks and renewals, information which appears not to be routinely collected by either landlords or valuers. The effect is that the valuations are assuming worse case scenarios than actually occur, discriminating against short leases and those with breaks. It could be argued that this is prudent, but there is no doubt it affects the asset value more than the additional risk implies it should.

Valuation practice also appears more comfortable with the landlord's rather than the occupying tenant's interest. There has been considerable criticism of traditional leasehold valuation approaches (for example, Baum and Crosby, 1995). The payment of capital sums by occupiers to purchase leases where the property professionals believe the rent is a full one has also caused difficulties. Crosby and Murdoch (2000) have suggested that part of the answer to the phenomenon whereby incoming occupiers pay premiums to occupy at a rent which is already a full one lies in the different rental levels obtainable at new letting and rent review and the purchase of the option to renew the lease. Although tenants have relatively short time horizons, and the prime motivation is to secure the site, these rental advantages still have some impact on the value and need to be considered in any appraisal method. Traditional approaches cannot rationalise this process. For example, in assessing the value of the surrender and renewal of leases and the assessment of premiums and reverse premiums, the traditional approach assumes that, where the rent passing is equal to the rental value, there is no occupational value (for an illustration of this approach, see Baum and Mackmin, 1989)

A review of traditional approaches to valuation suggests that valuers will be more comfortable with a landlord-based asset value driven approach to assessing the value of a change in lease terms from the comparable information. It also indicates that, prior to the 1990s, there was no real need for lease pricing except in the arena of rent review and the approach to the technical problems in this area helps to reinforce the conclusion made above.

6.2.3 Lease Pricing Issues Addressed via the Rent Review and Other Processes

As suggested earlier, the main areas of discussion at rent review are lease length, type and period of review, user clause, lease length and improvement and repairs. This is also true at lease renewal and in the interpretation of rental values within the rating process.

Lease length is an interesting issue in that when standard long institutional leases dominated the UK market, lease drafting attempted to ensure that the rent was determined at each rent review by reference to the original term of the lease and not by reference to a lease of the unexpired term. This implies that landlords expected lower rents for shorter terms. This wording can now have the opposite effect if it can

be argued that the longer assumed term causes the lease to be too long and therefore onerous to the tenant, attracting a lower rent (Bernstein and Reynolds, 2003).

Given the virtual absence of up/down rent reviews in current leases, the question of the price of an up/down review is usually only rehearsed in courts. In seven cases set out in Rees and Hayward (2000) where rent reviews were inserted in renewed leases by the courts between 1967 and 1994, six were set as upwards and downwards with only one upwards only. The approach to value has been to make intuitive adjustments, for example in *Amarjee v Barrowfen Properties Ltd* [1993] 30 EG 98 the up and down review at lease renewal was priced at 2.5% higher than for a comparable lease with an upwards-only review.

In the case of review period, the adoption of more sophistication is often attempted. For example, where the assessment of rent based on long leases signed in the 1960s with a 21 or 14-year review period had to be assessed in the late 1970s/early 1980s from rental evidence based on the common 5-year review period, three approaches are documented. The first is an intuitive uplift to the rent. The second is a rule of thumb which suggested that the uplift should be based on the number of years the actual review was longer than the review of the comparable multiplied by a percentage ranging from 0% if the property was thought to have minimal growth prospects and high obsolescence characteristics to 2% if the opposite were true. In effect the calculation becomes (21-5) = 16 x (say) 1% = 16% uplift. For a 14-year review period the calculation is (14-5) = 9 x (say 0.5%) = 4.5% uplift (no doubt rounded to 5%) (Crosby and Murdoch, 1991).

Given that this debate occurred in the 1970s and 1980s when there was significant academic interest in valuation approaches, a number of commentators suggested that a cash flow model would give a more rational solution. Cash flow models tended to suggest much higher uplifts than being agreed at rent review and suffered from two assumptions. First, they used landlord based discount factors and second they used landlord time horizons. Tenants were not prepared to pay substantial uplifts out of current cash flow to fund possible savings which in the case of 21 year reviews could be as much as 10 years in the future, and were at least five years away (Crosby and Murdoch, 1992). It appears that tenants were able to convince third parties that the landlord's cash flow approach did not properly reflect the true rental value under these terms.

In the case of user clauses, a range of different user clauses have given rise to a range of different uplifts. A very restrictive user clause in *Plinth Property Investments Ltd v Mott, Hay and Anderson* [1979] 1 EGLR 17 was valued at over a 30% reduction in rent but usually the adjustments are less. In most of these cases the assessment would have been based on expert evidence and it can be assumed that the evidence was also offered on an informed intuitive opinion basis. Goodwyn in Rees and Hayward (2000) suggests that this type of adjustment for user cannot be as a result of precise calculation, implying intuitive rather than technical assessment. Professional based practice texts such as Rees and Hayward (2000) suggest that practice is still adopting these approaches to lease clause rental adjustments.

Tenant's improvements are outside the scope of this chapter but rents upon lease renewal ignore improvements done by the tenant so the valuation is of the property

provided by the landlord. The repairing liability is virtually the only instance from the interview surveys where agents suggested that a change in liability should be accompanied by a change in the rent. Convention is that in the absence of specific repairing costs for the letting, valuers use percentages of the rental value to add or deduct for liabilities and in rating valuation 5% for each of internal and external repairs is often adopted. Using rental value requires intuitive adjustment for age and condition of the premises and for relative size; for example, a prime shop property will have a very high rent per square foot and so cost much less to repair as a proportion of rent than say a large old factory unit.

6.2.4 Lease Incentives Pricing

One of the major impacts of the property market crash of 1990 was the introduction of inducements or incentives to let. Landlords faced with a mismatch of demand and supply and a dearth of new tenants were forced to offer either very low rents or a combination of higher rents offset by a number of different inducements to underpin the payment of the higher rent. Incentives are not lease terms in that the rent should be a product of the terms of the lease while incentives to let are financial inducements to persuade the tenant to take the lease. But the rent is affected by these packages and therefore any model of rent must take into account both lease terms and incentives to be able to isolate how the lease was priced.

The assessment of effective rents (the rent assuming no inducements to let were given) is necessary in practice for a number of reasons connected with the interpretation of evidence for rent review and in some cases, performance measurement and general valuation work. As indicated above, inducements are not lease terms but many inducements rely on lease terms to underpin them; for example, the upwards only rent review and the lack of an early break clause are essential for a long rent free period and/or large capital payment. The main types of inducement are set out in the forthcoming RICS Information Paper on incentives to let (RICS, 2004). These are:

- Rent free periods of longer than the fitting out period, normally at the beginning of the lease but could be at other times during the lease

- Stepped rents rising on a periodic basis to fixed amounts, usually on an annual basis up to the first review

- Cash payments to tenants, normally at the commencement of the lease but can be at various intervals throughout the lease.

- Fitting-out costs paid for by the landlord. These can be the tenants works paid for by the landlord, a capital payment which matches the fitting-out costs or the landlord can do the fitting-out for the tenant.

- Take-back of existing premises. Where the landlord does not own the tenant's existing premises, this will take the form of taking on the liabilities under the existing lease, either partially or fully. Where the landlord owns the existing premises, the existing lease can be surrendered back to the landlord, an

assignment may be allowed that in other circumstances could have prevented and the transaction may include the abatement of other costs and dilapidations.

As with the abnormal rent review pattern, there is some technique associated with the assessment of the impact of inducements on rent. The RICS paper identifies two practice-based approaches to inducements and also identifies more sophisticated cash flow possibilities. Each of these, with varying levels of sophistication, assume that the value of the property interest without inducements is equal to the value of the property interest after inducements less the value of the inducements offered to the tenants. Brown and Matysiak (2000) formalise this as:

$V_{omv} = V_{con} - PV_c$

Where :

V_{omv} = Present value of the equivalent open market rent without inducements
V_{con} = Present value of the headline rent subject to inducements
PV_c = Present value of the inducements

The foregoing equation can be interpreted as either asset value or cash flow driven. In its purest form, it represents the explicit cash flow approach. However, it can also be interpreted within the context of actual market practice where the present value of the cash flow is undertaken by traditional all risks yield approaches.

Appendix Four sets out the various techniques. In line with the approach to abnormal rent review periods, professional practice generally approaches this problem from a pragmatic viewpoint and adopts some basic rules.

The value of an inducement is a comparison of the cash flow difference between offering and not offering the incentive. One approach is therefore based on a simple addition of the benefits and liabilities from letting on a lease with or without inducements. For example if there is one-year rent free period in a lease for five years and the rent is £100,000 pa, the four annual rents would be spread over the five year lease to give an effective rent of £80,000 pa.

Another approach is identical to the first method above but also uses the time value of money. It uses traditional valuation assumptions of existing rental levels and the use of all risks yields to discount the cash flow.

One of the major issues, where there are reviews in the lease, is whether to amortise the inducements to the first review or to the end of the lease. Practice has often suggested that this decision is based on the different viewpoints of landlord and tenant (landlords wanting to write off to the end of the lease as it gives a higher rental value for use as comparables with other properties, the tenants wanting the opposite to be the case). In reality it is a question of assumption as to whether the effective rental value will overtake the headline rent at the review. If it does then the effect of the inducement will be extinguished at review; if not, the effect of the inducement remains in place, albeit at a reduced level of value (assuming rental values have grown). This illustrates that practice is well aware of the need to see landlord and

tenant calculations and methods from both viewpoints but has a partisan view of the issues.

The RICS paper gives a number of other examples and discusses the alternatives to the two practice based approaches outlined above. It includes explicit Discounted Cash Flow (DCF) but elects to go no further although it flags a number of other developments in lease pricing, which are the subject of Section 6.3.

6.2.5 Conclusions

This discussion on market practice in the lease-pricing arena raises a number of issues.

First, it brings into focus the differing aspirations and time horizons of tenants as distinct from landlords. Lease pricing methods therefore need to assess both sides of the process and also need to look beyond the current asset value framework towards the effect on cash flow. The different time horizons may be included in this cash flow framework.

Second, apart from the analysis of inducements and the assessment of different review periods, market practice uses intuitive expert assumptions rather than explicit technique to determine adjustments to leases. These adjustments tend to suggest that rents will be amended upwards for a short lease over a long lease, a longer review period, an up/down review, a shift of repairing liability to the tenant and an inducement to the tenant where professionals or judges are asked to determine rents at rent review, lease renewal and, as part of the process, rating assessment.

Finally, traditional approaches do have some difficulty in extending beyond current asset value frameworks using comparative property market indicators and are therefore unsuitable for assessing the true value of alternative lease terms. The research team feel that the use of traditional valuation techniques, particularly the intuitive adjustments to valuation yields based on over cautious assumptions on issues such as short leases and breaks, and the dominance of asset driven performance measurement techniques have been a major constraint to lease flexibility being delivered and advances in lease pricing hold the key to releasing the flexibility agenda.

6.3 Pricing Leases Using Finance Based Techniques

6.3.1 Techniques.

Generally, cash flow appraisal models have greater information needs than traditional pricing models and more sophisticated approaches can include detailed assumptions on both current and future rental and capital values, depreciation allowances for both future rental and capital values, future capital expenditure assumptions, explicit growth in all of the future aspects, transaction and management costs and discount rates including risk premium. This is the main reason they have not been widely use in lease pricing.

DCF may help alleviate some of the traditional pricing constraints set out in the previous sections and can add to the rigour of the pricing of short leases and breaks but it is a limited tool. The main limitation is that it cannot take into account the volatility of the cash flow unless the single point estimate of each individual input is relaxed and possible distributions of each input along with some correlation of how each input reacts to each other are determined. In view if this, the development of applications of option pricing techniques to the property market in general and lease pricing in particular have been advanced over the last 10-15 years.

Leases are made up of a series of options; to renew, to increase the rent (but not to reduce it if the lease is upwards-only), to break, etc. Some will be operated if a certain event happens (rent to increase if rental values increase above passing rent), others may not be operated under such simple conditions (breaks). Haug (1997) sets out numerous applications and adaptations of basic option pricing techniques which have been developed to value a multitude of different types of option. There has been considerable interest in the potential application of these techniques to property investment and development decisions (see Grenadier, 1995; Ward, 1997; French *et al* 1998; and Rowland, 2000).

In a typical option product the investor acquires the right to buy (call option) or sell (put option) an underlying asset before or at a pre-agreed date. In this case, since the concern is with options to vacate, the similarity is with a put option where the tenant has the right to vacate (sell) at a pre-agreed date. The value of the option is a function of movement in the price of the underlying asset. Logically, the price volatility of the underlying asset is a key determinant of the value of the option with increasing volatility producing higher option values. Although mathematically complex in derivation, the operation of option pricing models is relatively simple. The key variable – volatility – is either estimated from analysis of historic price data or is obtained by analysing implied volatility in transactions.

The volatility of property rental and yield series can impact on the financial implications of an option to vacate. Where the rental value at the point of potential lease termination is lower than the rent passing, the right to vacate may act as a downward rent review. This point is further analysed below. However, the reliable application of these pricing models is, therefore, predicated on reliable historic time series and/or adequate transaction data. There are well-documented problems with both these requirements in the commercial property market. Moreover, even in markets which are relatively deep, mis-estimation of volatility is a problem in valuing options (Hodges, 1992).

A good example of the limitations of the application of option pricing models to leasing is given in Ward (1997), discussing in particular break clauses. He presents an approach derived from the binomial option-pricing model. Ward identifies volatility in rents as the primary factor affecting value, making assumptions about the circumstances in which the tenant will vacate. Pricing outcomes are presented on the basis of a range of assumptions about rental volatility. Moreover, the focus on future rental levels (and associated volatility) ignores the role of other issues such as tenant circumstances and break clause structure. The emphasis on volatility as the primary determinant of option value will be more appropriate where there is uniformity in the structure of the option but may be problematic where there is heterogeneity in the

probability of exercise. In a typical option, the rational investor will always exercise the option when they are 'in the money'. However, in the property market each break option is unique in terms of structure of the option and the tenant's attitude to exercising the break.

This can be contrasted with the case of pricing upward/downward rent reviews (Ward and French, 1997). In this case, the rationale for the application of option pricing models seems more appropriate. Where the open market rental value is below the rent passing, the rent will always fall in the case of a non-upwardly only rent. Ward's break option pricing model assumes that this rule also hold for break clauses. In reality, tenants may choose to exercise the break whether rents have fallen or not and in some cases may be unwilling to use the 'threat' of break to lower the rent. Moreover, in the case of downward rent reviews, the pricing implications are dependent simply upon the volatility assumption and Ward and French (1997) demonstrate the relatively wide range of possible volatility-dependent pricing outcomes.

It is clear that option pricing can provide a basis of solutions to lease pricing issues. Simulation, one form of pricing options, has been used commercially to price UK leases. It can be integrated into conventional spreadsheet models, is flexible enough to cope with non-standard or unusual situations/assumptions, is relatively transparent and permits the analyst to identify the key determinants of the outputs.
Advances in pricing theory need to be developed into products if they are to be integrated into professional practice and this process has commenced. One such product is Oprent, developed by Oxford Property Consultants, described as a "property pricing software system developed over the period 2000-2003 to help solve complex flexible lease pricing problems for property owners". This project has access to this program and it has been used to give some broad indicative case study solutions to specific lease pricing problems.

6.3.2 Operation of More Sophisticated Pricing Models

6.3.2.1 Short Leases and Breaks

Future cash flow assumptions generate speculation concerning the behaviour of tenants upon lease expiry or break. In a pure finance model, a option is exercised if profitable to do so, in real estate leasing there is a view that tenants will have a number of operational reasons for breaking or not breaking, and for example, the payment of an excess rent over market value will not necessarily mean a break is exercised.

In the case of lease expiry (or tenant's break), an assessment of the value of the lease should be based upon issues such as :

- the probability of the tenant leaving at the end of the lease,
- the effect that would have on the landlord with regard to costs and benefits incurred, and
- the timing of these events.

These costs and benefits are a function of :

- the time taken to secure a new tenant,
- the transaction costs incurred in finding a new tenant over and above re-letting to the existing tenant,
- the increase/decrease in rent obtained from the new tenant set against that obtainable from the existing tenant,
- the changing lease terms available from a new tenant against a lease renewal negotiation, and
- the increase/decrease in tenant quality.

There is an assumption that a landlord should accept a lower rent for a longer lease without break clauses compared to a shorter lease and/or one with breaks as the certainty of cash flow is increased with the longer period. However, a model that takes the above factors into account would be able to identify any *premium* sometimes paid for shorter unexpired terms in strong letting markets as well as the more normal discount for a shorter lease term/unexpired term. This would occur when there is a prospect of a quick letting at a new letting rent which can be higher than the provable rent at rent review or lease renewal (Crosby and Murdoch, 2000). It is these institutional structure based nuances of the market that make finance models so difficult to apply in real estate pricing. This improvement would only occur if the tenant left and this is not likely in very strong lettings markets when supply of alternatives may be restricted.

However, normally, risk averse investors would assume some of the characteristics of a weak lettings market. There may be a high probability of the tenant leaving, an assumption of a long void period before finding a tenant, a rent-free period and a possible decrease in tenant quality, all leading to an increase in the all risks yield after letting, plus a transaction cost of new letting at say 15% of rent rather than a cost of say 5% to negotiate a renewal, and no improvement in the rental value over and above that which could have been achieved at a renewal negotiation. Even if the tenant does stay, they will be able to negotiate a package which fully reflects the inducements being offered to new tenants including rent-free periods.

It can be seen that one of the crucial pricing issues in short leases is the incidence of renewal. There are problems with this analysis as current information is relatively sparse and what information there is a function of expiring leases that are much longer than the average lease being taken currently. However, there is some data on the incidence of renewal in the Investment Property Databank over the past few years and it is set out in Table 6.1 below. This analysis has only taken place on records where the IPD are sure of the outcome and this analysis actually relates to around 2000 leases each year.

Table 6.1 – Incidence of Lease Renewal of Expiring Leases 1998 – 2002 (%)

	1998	1999	2000	2001	2002
Industrial - Rest of UK	33	30	30	27	39
Industrial - South Eastern	38	22	26	29	31
Offices - City	46	41	36	48	28
Offices - Rest of South East	43	44	49	31	36
Offices - Rest of UK	30	18	21	47	34
Offices - West End	34	33	24	40	32
Retail Warehouses	42	19	26	48	43
Shopping Centres	40	36	32	37	38
Standard Retail - Rest of UK	26	35	35	30	27
Standard Retail - South East	32	37	40	43	38
Total	37	34	33	37	35

Source : Investment Property Databank

This suggests that on average over the last five years just over one-third of all leases have been renewed but as on average another 15-20% are holding over on expired leases at the end of each year, the final incidence of renewal may be over 40%.

Break clauses tend to be much more variable than 'standard' short leases. There is no single, universal form or type of break clause. Details related to precise drafting, timing, beneficiary, penalties and frequency are variable.

In the past there has been some problems with drafting in that landlords sought to make it extremely difficult for tenants to operate breaks (DETR, 2000). This aspect has been discussed in Chapter Two but there still remain breaks which are virtually impossible to implement although most new leases will not have these restrictions.

Breaks have been timed to coincide with reviews in a large number of cases and DETR (2000) found that 85% of retail leases with breaks and with a review after 5 years, had the break on the review date in the period 1990 to 1998. In the IPD, around 60% of breaks were timed at the review date in the period 1998 to 2002. The interview survey identified an increasing awareness that tactically this may favour tenants who can use the threat of break at review to force a lower rent and even break the upwards only review. This has lead to some landlords making the break operation notice date occur before the trigger notice date for the rent review. In this way tenants will not know the rent being proposed when they have to make the decision to break or not. However, this assumes rent is a driving force for tenants breaking and anecdotal comment is that tenants do not break for this sort of property specific reason but for business operation reasons such as the space being the wrong size for the operation.

Breaks can be priced in two ways; an initial rent increase or a tenant's penalty payment upon operation. The penalties generally relate to the rental payment and can be for amounts of additional rent from 3 months to over a year payable at the point of operation. The penalty pricing mechanism means that the tenant does not have to pay for the flexibility of the break unless it is actually operated whereas if it priced in the rent the tenant is paying up front for a benefit that may not accrue. The landlord's loss occurs at the point of break and gives a benefit to the tenant that can be directly

related to the landlord's loss which could be a void period (loss of rent) while waiting to find a new tenant.

The two issues of market state at the date of lease expiry and probability of the tenant leaving drove the valuation of the short lease. The pricing issues surrounding break clauses are similar in that if a tenant chooses not to break the lease, both landlord and tenant remain in the same position as if the break did not exist. The tenant is gaining flexibility of operation, the landlord acquiring increased risk exposure in that the operation of the break may change prospective cash flow, change the quality of the tenant and change the lease terms. As for short leases this may increase the level of cash flow upon new letting, improve the quality of the tenant and change the lease terms beneficially as far as cash flow and/or value are concerned. But risk aversion will place greater weight on the possibility that all these factors are harmed by the operation of the break.

Breaks differ from lease renewals in a number of respects. The tenant has a right to stay at renewal but is exercising the right to leave at break. But in effect, in both cases the tenant has both the option to stay or to leave. Leaving could be harder at break than renewal subject to the conditions imposed on the break and staying could be harder at renewal, as it is subject to the landlord's right to remove the tenant under certain conditions.

Also the break will often be in newer leases as breaks are a fairly recent phenomenon and, given the length of older leases, renewals will be generally of older property that had longer leases. This suggests that tenants may have had longer to write off their setting up costs and be more willing to leave if the quality of the property (offices and industrial) had reduced due to obsolescence. In the early 1990s when breaks first appeared as an inducement, many landlords felt more comfortable with an early break in the lease as they felt it was less likely to be operated than a longer break due to fitting out and setting up costs having to be written off over a longer term and the property was less likely to have become unsuitable for the business (especially in well established business) over such a short time. It would therefore be hypothesised that break clauses would be less likely to be operated than renewals, core business functions would have less likelihood of being subject to break than peripheral functions and longer breaks more likely to be operated than short breaks. Table 6.2 setting out the incidence break clause analysis undertaken by IPD on a similar basis to the lease renewal analysis confirms the first of those hypotheses.

Table 6.2 : Incidence of Breaks Operated 1998-2002 (%)

	1998	1999	2000	2001	2002
Industrial – Rest of UK	24	24	19	18	13
Industrial – South Eastern	11	21	15	12	21
Offices – City	11	18	13	26	30
Offices – Rest of South East	19	24	19	24	29
Offices – Rest of UK	28	29	28	21	20
Offices – West End	20	28	12	15	20
Retail Warehouses	33	0	10	11	33
Shopping Centres	20	18	11	13	14
Standard Retail – Rest of UK	36	9	9	10	25
Standard Retail – South East	9	7	9	10	9
Total	19	20	15	17	19

6.3.2.2 Other Lease Terms

There are a number of other lease terms which require pricing such as repairs and insurance, user clauses and different types of review, including upwards only rent reviews. As indicated before, a number of the option pricing finance papers have identified the upwards only review as the simplest lease pricing application of these models as the option to revalue the rent downwards is operated at virtually nil cost by the tenant when rental values fall below passing rents. The value of the up/down review to the tenant at the granting of the lease might be assumed to be zero if the general expectation of the market is that rents will increase over the review period. If a cash flow model was applied with these single point assumptions, the price of the lease would indeed be identical. But the volatility around the positive growth in rents might cause the rent to be reviewed downwards under certain scenarios and a simulation would pick up this possibility on a number of occasions while creating a valuation from a large number of simulated outcomes. In summary, while in a number of simulations, the two review types will be valued identically assuming positive growth, in a minority of simulations the review will be operated downwards in one case and not in the upwards only case, so creating a mean valuation for the upwards only review higher than for the up/down review.

Generally, the rigour of the outcome depends as much on the information base as the model itself and there are large gaps in the information needed to operate these models. Data on volatility and the operation of breaks and lease renewals and the reasons why tenants choose to move or stay are obvious mainstream examples of data deficiencies in operating these models.

6.4 The Outcome of a Model – OPRent Case Study

Generally, Oprent is a simulation cash flow model which uses a set of user defined inputs to find the present value of a standard lease with an observable rent and to set this against the rent under a non-standard lease which would give the same present value. The user defines the growth rate in rents over the lease term and the risk adjusted discount rate (or risk adjusted void) which can vary for each lease. The user enters a lease rent under a set of standard terms for term, review pattern and type,

rent-free period, repairing liabilities and capital payments. The user then enters the alternative lease defining term, review pattern and type, incidence and timing of any breaks, rent free periods, repairs, rent caps and floors, break notice period, capital payments, empty property costs, re-letting and refurbishment options, voids on break and renewal and break and renewal probabilities.

There are default settings for voids, breaks and renewal probabilities based upon both interview survey data for a set of eight property market sub-sectors (the seven set out in Table 6.3 plus Business Parks) and IPD data on the incidences of breaks and renewals, set out in the previous section, but these can be over-ridden. There is also a set of rental volatility statistics which are built into the model and these cannot be user defined. They are also set out in Table 6.3 and relate to the eight main segments identified above.

The case studies chosen relate to seven of these segments. These are City, West End and Provincial Offices, Standard Retail Units, Shopping Centres and Retail Warehouses and All Industrials. For each of these segments, for 2002, the average rent and the median lease term (where median not clear, note was taken of the mean lease length) was adopted as the control scenario. In all cases bar one the control lease became a 15 year lease with upwards only five year reviews and no breaks. The retail warehouse standard lease was for 20 years. A discount rate of 9% with annual growth rate of 1.5% (based roughly on the implied growth rate to move 2002 equivalent yields to the discount rate) was chosen arbitrarily[7].

Three scenarios were tested against this base; first, a 15 year lease with upwards only rent reviews and breaks at years five and ten; second, a 15 year lease with up and down rent reviews at years five and ten and no breaks; and third, a short five year lease with no reviews. The results are set out in Table 6.3.

On average across all sectors (un-weighted) the 15-year lease with 2 breaks is priced at an 8.2% uplift, the 15-year lease with up/down reviews is priced at a 3.2% uplift and the short 5 year lease is priced at a 11.5% uplift above the standard lease. There is considerable variation across the segments based on the probabilities of breaks being operated and leases renewed, and any resulting voids which occur. In the case of industrials with a high break and lease non-renewal probability, the breaks and the short lease generate around a 15% uplift whereas the low break and high renewal incidence in standard retail and shopping centres produces uplifts of only around 2.5 to 4.5%. In contrast, the up/down review is a function of the volatility of future rental growth and the value of the upwards only review will increase if the rental growth volatility is expected to increase. The reason that the retail warehouse sector has a higher uplift is because of the longer standard lease having one extra review within it, every other result is tied directly to the volatility.

[7] For the Final Report, this analysis can be developed but given the findings of the interview survey concerning the impact of technical lease pricing it was felt inappropriate to benchmark any results of lease pricing outcomes against this model.

Table 6.3 : Oprent increases in initial rent from standard lease to one with breaks, up down reviews or a shorter lease using default settings

	Average Rent	Standard Lease Length	15 with Breaks	15 with Up/down Review	5 Year Lease	Break Prob	Renewal Prob	Void Yrs	Rental Volatility
Standard Shops	£75,000	15	2.5%	2.8%	5.4%	10%	90%	0.5	6.2%
Shopping Centres	£65,000	15	3.1%	2.5%	5.0%	10%	90%	0.75	5.7%
Retail Warehouses	£210,000	20	5.6%	4.3%	4.5%	20%	75%	0.25	5.2%
City Offices	£165,000	15	10.6%	3.0%	17.8%	30%	25%	1	6.5%
West End Offices	£110,000	15	10.9%	2.9%	16.5%	30%	40%	1	6.3%
Provincial Offices	£135,000	15	10.9%	3.0%	15.3%	30%	50%	1	6.5%
Industrial	£50,000	15	13.2%	1.9%	16.2%	50%	25%	1	4.8%
Average	£115,714		8.2%	3.2%	11.5%				

6.5 Lease Pricing Analysis of the IPD

Appendix Five sets out a detailed analysis of the IPD in order to attempt to identify any differences in rent between different lease terms; for example, do short leases have higher rents? The analysis has been specifically commissioned for this research project. The interview survey and other published work reviewed earlier in this report suggest that some different lease terms should lead to different rents. However, there is also evidence that increased flexibility may not be specifically priced in rent. Although it may be rational to assume that tenants would pay less for leases that on the surface appear not to suit their business needs, the interview survey suggests that the market often operates by deciding on the level of rent in isolation from or prior to the agreement of terms, with terms being negotiated and renegotiated rather than rent.

The previous discussion suggests these two possible hypotheses. The first is that the traditional approach to pricing different lease terms, for example in the rent review process, would follow a rational approach in that a change to the contract terms would lead to a change in the price of that contract. The insertion of breaks, shorter leases, less onerous user clauses and upwards and downwards reviews would all lead to increases in the rent determined in comparison with properties let on, say for example, standard lease lengths for the sub-sector, no breaks, upwards only review clauses, etc. In addition, where incentives to let were included in the package, such as capital payments to tenants, rent-free periods and take back of existing premises, these would also lead to higher headline contract rents. A model of rent determination would therefore expect to find that rent is a function of all of these lease terms and incentives. The model specified for the IPD analysis assumes this rational market pricing process.

However, previous research and the interview surveys suggest that in the letting of many business premises, this process is, at worst, reversed with the rent determined prior to the terms and, at best, muddled with some rational pricing processes interspersed with some later contract term changes that fail to trigger a price re-

negotiation. An alternative hypothesis is that lease terms are a function of other lease terms. This has not been tested in the lease pricing paper although the analysis of both IPD and VOA data in Chapters Three and Four identify some definite linkages between certain lease terms (for example, length and review pattern, break and review pattern, length and break pattern and length and rent free period).

Three segments of the IPD data were examined for evidence of lease pricing; the segments being Southern industrials, Southern shops and London West End offices. These segments were chosen as they represent distinct sub-markets of the UK commercial property market and had sufficient new leases to analyse in two different periods, 1998 and 2002.

The aim was to identify whether different elements of the lease package, such as length, rent free period and existence of a break clause, had a significant effect on the rent agreed between landlords and tenants on new leases. This was done using cross-sectional regression methods. Both preparing the test sample and the modelling were not straightforward. Location and time influences on rent had to be controlled for, but the more tightly the samples were defined, the less lease evidence there was available to use. The number of leases used in the final models is shown in Table 6.4.

Table 6.4: Number of New Leases

	1998	**2002**
Southern Shops	100	68
West End Offices	94	65
Southern Industrials	104	187

The aim was to apply the following basic theoretical model in each of these segments:

> Rent = *f* (building characteristics, location characteristics, tenant characteristics, lease structure)

This model is for rent at a particular point in time and for an individual letting. The model is similar to that adopted by Dunse and Jones (1998) in a previous study of office rents, except that here, the influence of tenant characteristics is recognised because of the use of actual rents, whereas their model used asking rents and only included the first two factors (though tenure rights were recognised as a potential rent determinant). However, the data on tenant characteristics was only available for the 2002 samples and not for all leases in those samples. Therefore, in practice, the model used was as follows, though sub-samples that had the tenant data were tested using the tenant data as well.

> Rent = *f* (building characteristics, location characteristics, lease structure)

The actual models tested were more complicated than this theoretical model might suggest. This is because for each set of characteristics, several variables are required to capture the different effects. The variables chosen vary between segments to reflect inherent segment differences and they are outlined in more detail in Appendix Five.

An alternative set of models were also tested. These used the yield of the property as a proxy for the building and some of the micro-location characteristics. The reasoning here was that a lot of the physical and locational attributes are taken into account by valuers when a property is valued. Therefore, rather than try and quantify all those different factors individually for rent modelling, the yield could be used instead, giving a simpler and more efficient model. It may also have advantages in capturing a number of influences which are otherwise difficult to quantify. For instance, the appearance of a building may have a very real effect on rents, but it would be difficult and time consuming to measure in a variable of its own. The general model applied was as follows:

Rent = *f* (yield, lease structure)

The yield measure used was the equivalent yield of the property before it was let. However, though the yield model appears an attractive alternative to the hedonic model that was described above, several problems were encountered during the testing and therefore it was dropped in favour of the first model specified above. The reasoning is set out in more detail in Appendix Five.

The first segment to be examined was Southern industrials. In both periods, 1998 and 2002, this segment had the most lease records available for analysis. However, little evidence for the pricing of lease terms was found. Lease length was found to be a significant factor, but, in both years, it showed a positive rent effect with higher rents for longer not shorter leases. In general, the evidence for lease pricing in this segment was slight.

Southern shops was the next segment to be analysed. Here, the evidence for lease pricing was much stronger. In the 1998 sample, both break clauses and rent-free period were found to be important variables for explaining rent per m². Both had a positive coefficient, indicating that where they were in place, a rent premium was being paid for both rent-free periods and break clauses. However, the same result was not found in the 2002 data, with rent-free period being insignificant and break clauses significant but having the opposite sign suggesting that the inclusion of the break reduced rent. Lease length was significant in both years, but again had positive coefficients suggesting that longer leases attracted higher rents.

The final segment to be tested was London West End offices. Modelling this segment proved to be difficult, partly because of the unique features of some of the properties and partly because of strong segment rental growth. However, some evidence for the pricing of break clauses was found in the 1998 sample and some evidence for rent-free periods was found in the 2002 sample. Length showed the usual positive coefficients, but interestingly, for the 2002 sample, it became insignificant when short leases were excluded and this may indicate a change in the length-rent relationship. This finding is not certain, though, due to the small sample of leases and low explanatory power of the model involved.

A summary of the results is set out in Table 6.5 and indicates the statistical significance of lease variables at the 5% level, indicating whether the relationship to rent is positive (+) or negative (-).

Table 6.5 : Statistical significance of lease variables at 5% level

	Industrial 1998	**Industrial 2002**	**Shops 1998**	**Shops 2002**	**Offices 1998**	**Offices 2002**
Lease length	Significant +	Significant +	Significant +	Significant (10%)+	Significant +	Significant +
Break clause	Not significant	Not significant	Significant +	Significant -	Significant + (when length to break)	Not significant
Rent free period	Not significant	Not significant	Significant +	Not significant	Not significant	Significant +
No rent review	Significant +	Not significant	Not significant	Not significant	Significant +	Not significant
Non-standard review cycle	Not significant	Not significant	Not significant	Not significant	N/A	N/A

In summary, only limited evidence could be found from the IPD data for the pricing of lease terms. The core issue of lease length does appear to be significant at the 5% level but the longer the lease the higher the rent across all segments tested except shops in 2002. This counter intuitive result would suggest that the model is failing to distinguish between lease issues and other locational and physical characteristics. Higher value, better located properties do command longer leases and so the segments may not be homogenous in terms of location and quality. More work needs to be done to identify segments that would enable lease effects to be more accurately isolated. Results for other issues such as rent-frees and breaks are variable and there is no data on the price of an upwards only review as hardly any leases exist with that type of review.

The lack of any relationships between lease clauses and rents may well be because identifiable distinctions between lease clauses and rents do not exist and this would be in line with the findings of the interviews. Basically this research has failed to find any evidence of tenants paying for shorter leases, breaks and other lease terms.
Another explanation confirmed by the interview survey is that the whole lease package may be judged against a standard market package without the individual elements being explicitly priced by the parties and further analysis could attempt to model these aspects rather than rents.

6.7 Summary of Findings

6.7.1 Traditional Approaches to Lease Pricing

Up to 1990 almost all property was let on virtually identical terms, the differences between properties being location and physical differences. Therefore the issue of pricing lease terms didn't arise in new lettings.

The introduction of rent reviews from the 1960s onwards in an era of changing market conditions created the necessity to consider the value of lease terms in a negotiation or third party determination situation. The lease terms considered in this context include rent review period, rent review type, lease length, user clauses and improvements. Since 1990 lease incentives have also been part of this discussion.

Where attempts have been made to assess the value of different lease terms by applying technique, this has invariably been based on a reconciliation of asset values. Valuation technique appears more comfortable with freehold or leasehold investment valuation rather than the appraisal of occupational leasehold interests. Although attempts have been made to assess from both landlord and tenant viewpoints, some of the leasehold valuation techniques have been heavily criticised.

Abnormal rent review periods and lease incentives within the rent review valuation are two areas where some form of technique has been applied to lease pricing; here, valuations have adopted conventional techniques and more sophisticated cash flows are rarely used. Although cash flow models were developed in the 1970s and 80s, and applications to the abnormal rent review pattern suggested, these models tended to reflect landlord's discount factors and time horizons and did not produce answers in accord with the tenant's view of true rental value. This one-sided approach reinforces asset valuation rather than cash flow comparisons.

Conventional asset valuations are not based on cash flow, but on a multiplier of current rent. Multipliers are subjectively amended by valuers to reflect changes in lease terms such as a shorter lease or the introduction of a break clause. There is evidence that valuers assume worse case scenarios and over-compensate for risk in amending multipliers.

6.7.2 Pricing Leases Using Finance Based Techniques

DCF goes some way to overcoming the limitations of traditional valuation techniques but does not take into account the volatility of the cash flow. In theory, different lease clauses can be compared with real options in the finance markets and therefore option pricing techniques have been linked with the pricing of different lease clauses; such as the upwards only and up/down review, short leases, breaks and renewal rights.

Option pricing techniques such as simulation can be applied. Option pricing is most appropriate for the pricing of upward/downward reviews but has limitations when applied to situations that do not depend primarily on rental volatility, such as in predicting the tenant's decision to operate a break clause. As the tenant's likelihood of exercising the option to break is more than just a finance decision, it becomes more complicated than for example the likelihood of exercising an option to have a downwards review.

In the case of a short lease or a tenant's break, an assessment of the value of the lease should be based upon issues such as; the probability of the tenant leaving at the end of the lease, the effect that would have on the landlord with regard to costs and benefits incurred and the timing of these events. The costs and benefits are a function of; the time taken to secure a new tenant, the transaction costs incurred in finding a new tenant over and above re-letting to the existing tenant, the increase/decrease in rent

obtained from the new tenant set against that obtainable from the existing tenant, the changing lease terms available from a new tenant against a lease renewal negotiation, and the increase/decrease in tenant quality.

Break clauses are difficult to price as there is great variation in them. There is no single form or type of break clause as they vary in structure, timing, method of pricing and frequency. The likelihood of operation of a break is an important input into a pricing model. A tenant is less likely to leave by operating a break clause than they are because of non-renewal of an existing lease. This is confirmed by IPD data. It is suggested that early breaks are less likely to be operated than later ones.

In the case of the upwards only review, the major issue in pricing is the level of volatility in the cash flow rather than the probability of tenant vacation.

Given the immaturity of the development of these models in real estate, they are not likely to have a major impact on current practice even if they are being applied within some major property owning and occupying organisations.

6.7.3 OPRent Case Study

OPRent is a simulation cash flow model into which the user enters the details of a standard lease, including elements such as the rent, term, review pattern and repairing liabilities, as well as the expected rental growth rate and discount rate. The user then changes elements of the lease package creating a non-standard lease. The result is a rent for the non-standard lease which gives the same present value as does the original yardstick. Important elements of the model are the probabilities for voids, breaks and renewals which are based on interviews and IPD data but can be adjusted by the user.

Three scenarios were tested against standard leases for various segments in each of the major property sectors to see what effect changing various lease terms would have on rents. The lease terms tested were up/down reviews, break clause and short lease term. These scenarios produced a wide range of results reflecting the variation in expected renewal and break probabilities. However, the up/down review was priced at less than 5% higher than the upwards only review while a short lease of 5 years was priced on average at over 10% higher than a 15 year lease.

6.7.4 Quantitative Analysis of Lease Pricing Within IPD

In order to examine whether any evidence of differential pricing for different lease clauses exists, an analysis of three segments of the IPD was carried out in the years 1998 and 2002. The analysis was undertaken using cross-sectional regression methods.

Only limited market evidence was found for differential pricing of lease terms. Lease length does appear to be significant at the 5% level, but showing a higher rent for longer leases rather than the expected higher rent for shorter leases. But the modelling was not straight forward and the results suggest that the current model cannot distinguish between lease issues and other locational and physical characteristics. More work is necessary to identify segments that enable lease effects to be more correctly isolated. However, the lack of any relationship between the lease

terms and rent could simply because there are no identifiable links between individual lease clauses and rent. This counter intuitive outcome is corroborated in the findings of the interviews where the lease package appears to be judged as a whole against other lease packages, after the rent has been agreed. Therefore further analysis could model relationships between different lease terms rather than rents.

Chapter Seven – Summary and Conclusions

7.1 Aims, Objectives and Methodology

The overall aim of this research project is to monitor the operation of the 2002 Code of Practice for Commercial Leases and assess its impact on the commercial leasing market. This assessment will inform future policy decisions about whether to continue relying on voluntary mechanisms or to introduce statutory controls.

The specific objectives of the research are to:

- evaluate changes in commercial property market conditions over the period April 2002 to April 2004;
- measure flexibility in the commercial property leasing market;
- assess the degree of choice in the commercial property leasing market focusing on alternatives to the upwards-only review;
- measure the degree of awareness of property matters among occupiers of commercial property, particularly small business tenants; and
- assess how far the Code had influenced the market over the period of review.

This Interim Report gives some preliminary observations on any changes in the commercial lettings market in the first year of operation of the Code, including any changes to lease structures, and also an evaluation of the lease negotiation process. In this way both issues of flexibility and choice can be partially addressed providing a basis for further monitoring work planned for 2004.

The main tasks undertaken for this Interim Report are:

- the measurement of trends in leases through analysis of data from two main sources, the Investment Property Databank and the Valuation Office Agency, set against broad economic and property market information to identify different market states in the period since the last monitoring exercise of the 1995 Code of Practice.

- an examination of the process by which leases are negotiated and this has been addressed by an interview survey of negotiators of leases across England and Wales.

- An examination of lease pricing by means of reviews of current market practice and current and possible developments in theory and practice supported by a set of case studies and an analysis of the IPD data to identify any significant rental differences for individual lease terms.

The research undertaken so far will be augmented for the Final Report. The lease structure analysis will be expanded and updated to give a longer time trend on any changes to leases. Questionnaire surveys of landlords, tenants, property agents, solicitors and lenders will be conducted in order to extend and complete the

assessment of choice, flexibility, the property awareness of small business tenants and the influence of the Code.

7.2 Summary of Findings

7.2.1 General Economic Background

Overall, the new Code of Practice for Commercial Leases has been introduced in a significantly different economy than the first Code of Practice. In 1996, 1997 and 1998, the first three years of operation of the first Code, there was an improving market and generally increased growth rates in many of the key economic indicators. However, the economy has weakened since then with 2002, the year of the introduction of the second Code, being especially weak.

The growth in GDP has slowed to a point where, for the first quarter of 2003, it was only just positive. Manufacturing output had exhibited positive growth every year from 1993 to 2000 but then fell in 2001 and 2002 before rising marginally in the first quarter of 2003. In this latter period the unemployment claimant count increased, the first time this had happened since 1993. Retail sales volume and consumer expenditure had continued to be strong in 2001 and 2002. However, the 2003 first quarter results showed a significant downturn as consumers' expenditure growth was low and retail sales volume fell.

Bankruptcy numbers, having fallen during 1996 and 1997, started to increase again during 1998 and have continued do so since then. There was a large increase in 1999, followed by a very gradual rise until 2002 when the total increased by nearly 5%. Insolvencies in the service sector account for nearly the whole of the increase in bankruptcies between 1995 and 2002.

Although figures from the DTI indicate that the total number of businesses rose slowly in 1998, 1999 and 2000, the reports from Barclays Bank suggest that the number of businesses has shrunk every quarter since the beginning of 2000 until the first quarter 2003.

In DETR (2000), the economic environment suggested a lettings market recovering from the property crash of the early 1990s. If no major structural change was taking place in leases and trends were totally market driven, the demand side indicators should have led to a reversal in the trend apparent in the early 1990s for leases to become shorter and more flexible. In fact DETR (2000) found that from around 1995 onwards, lease structures remained relatively static and were certainly not returning to the long, inflexible terms of the late 1980s. This was evidence that progress had been made towards the Government objectives of more flexible leasing despite the fact that lease structures had not changed significantly within the first three years of the operation of the first Code.

As indicated previously, the current review of the operation of the second Code of Practice takes place in a different environment. Although the retail indicators suggest that the market resisted any down turn until the end of 2002, the demand side drivers are significantly weaker and therefore it would be expected that tenants would be able

to negotiate more flexible terms in all three main sectors of the property market purely on account of the changed market state between April 2002 and April 2003.

The fact that nearly half of new businesses do not appear to survive more than four years has major implications for lease structures. What is not clear from any of the statistics is whether it is the small businesses that fold early or the survival rates apply to all types and sizes of businesses. Nevertheless, these survival rates raise significant questions concerning the length of the premises contract and exit strategies.

7.2.2 The Property Market

The commercial property market demonstrates some very different characteristics to those found at the time the first Code was introduced. The majority of key economic indicators suggested that office and industrial letting markets should have been experiencing major weaknesses in 2002 and this is apparent in the property market indicators examined in this review. The retail sector has been shielded from the economic downturn to some extent by the continued rise in consumer credit. However, growth in the main economic indicators which drive activity and values in retail market have reduced sharply in the first quarter of 2003 and it would be expected that the relatively good performance of retail property markets will be harder to achieve in 2003.

Real headline rental growth rates are negative in the case of industrial property in 2002 and have averaged less than 1% in the office market since 1999, although the real figure could be less as effective rents may be lower. Total returns to these two sectors have held up surprisingly well due to falls in the equivalent yield when increases may have been expected, but this may be a product of the weakness of equity markets, low interest rates and the high comparative income yields available in the property market, all fuelled by availability of finance. Construction orders are falling in both these sectors and vacancy rates have risen with the London Office market showing major weaknesses with a surplus of supply over demand, falling rents and increasingly generous letting packages.

Against this market background, lending to the property sector is still buoyant with institutions and banks continuing to provide finance and funds for asset purchases but there are some small signs of a more cautious approach in 2002, with slightly higher interest rate margins in some banking sectors, a forecast of a reducing growth rate in outstanding bank lending for 2003 and a significant reduction in the amount of new institutional money to property in 2002. Equivalent yields suggest that this did not affect property capital markets in 2002 but occupational market weaknesses should eventually feed into capital markets, as would any lease structure change.

7.2.3 The Institutional Framework of the Commercial Leasing Process

7.2.3.1 Legal

The largely non-interventionist legal framework for commercial lease terms changed just as the first Code of Practice was launched, with the Landlord and Tenant (Covenants) Act 1995. This abolished privity of contract and allowing landlords to have greater control over assignments, most notably by an authorised guarantee

agreement (an AGA). Such a device when made automatic on lease assignment can make the lease difficult to assign and therefore restrict flexibility. The current Code of Practice specifically recommends that AGAs should not be required unless absolutely necessary.

The issue of subletting has come in to the spotlight with the Court of Appeal ruling in *Allied Dunbar v Homebase Ltd;* the court has refused to accept a well-used (but previously untested) device for side stepping conditions in a head lease that dictate the terms of any subletting of the whole. The imposition of strict controls on subletting can obviously seriously restrict the tenant's ability to sublet in a market where it is no longer possible to match the terms achieved in the head lease. Such restrictions on subletting can be seen as a device that constrains flexibility in the subletting market and, by the way that they attempt to hide falls in rental value, they can also be viewed as a mechanism to obscure market transparency.

As a result of the Land Registration Act 2002, all new leases are, since 13 October 2003, subject to new registration requirements. This will involve lease documentation being open to public inspection unless specifically exempted. This could have a substantive impact on lease structures as concerns over confidentiality may encourage landlords to keep the lease length at seven years or less.

Part II of the 1954 Act is to be amended by the Regulatory Reform (Business Tenancies)(England and Wales) Order 2003 ('RRO 2003'). Most of the amendments affect the procedure for contracting out, termination and renewal. The simplified process for contracting out may lead to an increase in the number of tenancies outside of the Act. However, these changes do not come into operation until June 1st 2004 and any such effect would be outside the period of monitoring covered by this project..

7.2.3.2 Accounting and Taxation Issues

Changes to the way occupational leases are dealt with in company accounts are still only proposals, and it remains to be seen if, when brought into effect, the market expectation of shorter leases is fulfilled.

Similarly the result of the new lease stamp duty regime is awaited. The changes came into effect in December 2003 and require all leases to be capitalised at a standard 3.5% discount rate for the term of the lease, duty of 1% being charged to the occupier where the capitalised value exceeds the threshold of £150,000. The impact of these changes on landlord and tenant in lease negotiations may lead to shorter leases, whilst it is possible that, in order to avoid increased tax liabilities, longer leases have may be signed in the period immediately prior to the changes, thus influencing lease structures in the last year of the Code monitoring period.

7.2.3.3 Influences on Landlords

DETR (2000) identified a number of possible influences on landlords and these have yet to be fully tested in this research. Attitudes of landlords will be part of the objectives for the final report. However, the interview surveys do give some insight into the effect on lease structures and these are set out in section 7.2.6 of this chapter.

A range of possible influences has been suggested and a number of these were set out and investigated in DETR (2000). Some were concerned with the long-term security of the cash flow and included the effect on funding and appraisal of properties let on short leases compared to those on longer leases. Concerns regarding the effect of shorter and or more flexible leases on property investment asset values in urban regeneration areas in particular and, more generally, within pension funds have been raised by parts of the property industry. There is some evidence that lenders do offer different terms on account of lease structure and that valuers discount for short unexpired terms and breaks. While it is not surprising that a more risky cash flow is discounted at a greater rate, the accurate pricing of the differential is important and there is evidence of more sophisticated pricing products in the market to assist this process. Section 7.2.7 of this chapter discusses whether any evidence of lease pricing exists.

However, there are also signs that some landlords are providing different types of products with non-standard occupation contracts. As suggested above, cash flows from these arrangements may be less predictable, this may be reflected in their capitalisation, and there can also be an effect on the cost and availability of finance. However the extent to which landlords' attitudes have changed in unclear at present and will be examined in the Final Report.

There is also concern that some tenants are not prepared to pay for better lease terms and Crosby, *et al* (2003) and the interview survey evidence support these anxieties. If tenants do expect to obtain a less onerous product at the same price, or even give the impression that they are not prepared to pay more for the required product, this will be a constraint on landlords offering that product.

7.2.3.4 Influences on Tenants

A recent survey of corporate tenants showed that there is some dissatisfaction with the UK leasehold system and a perception that it undermines their ability to operate effectively. The international corporate tenants are significantly more dissatisfied than their UK counterparts. Their main concerns are lease length and break clauses (or lack of them). In the same survey the upwards-only review was fifth on the list of tenant issues. However, shorter leases and breaks dissipate many of the onerous effects of the upwards only review so it is difficult to interpret this response precisely.

The pricing issue remains a question for tenants as well as for landlords. As summarised previously, it is clear that not all tenants are prepared to pay for better terms and the interview surveys give some insight into the pricing issue from both landlord and tenant perspectives.

Changing business practices continue to have an effect with differences in attitude to leases on core and periphery space requirements. Short-term contracts in the distribution industry, or on account of outsourcing certain activities, need to be matched by the ability to break the occupation of property if the contract is terminated. Major changes over the last 10 years have been the increase in e-business, e-procurement and teleworking but the implications of this for the lease requirements of tenants are not clear. Shorter lease lengths and easier entry and exit

strategies are what the corporate occupiers think they require. However, where sale and leasebacks are occurring, different criteria may apply.

There is currently no evidence of what the small business tenants think concerning leases, although some surveys suggest that property matters are not high on the agenda of SMEs in the UK. This is hardly surprising given that these surveys are of tenants still in business answering questions about the difficulties of obtaining suitable accommodation.

The tenants' surveys are needed to add to the understanding of what influences tenants in lease negotiations.

7.2.3.5 The Code of Practice

This is part of the context of landlord and tenant negotiations. A review of the property press gives an insight into the dissemination and impact of the Code, particularly with regard to property professionals and lawyers. From this review it is clear that the current Code has been well publicised and discussed, and awareness amongst those professionals involved in lease negotiations is expected to be higher than in DETR (2000). This hypothesis will be examined in the Final Report.

7.2.4 Lease Structure Change in the IPD

A cross sectional analysis of the IPD lease structure data from 1997 to 2002 has been carried out. This analysis enables conclusions to be drawn on changes to leasing practices in the retail, industrial and office sectors at the better quality end of the property market. There is no doubt that while considerable structural changes have taken place since 1990, when 90% of the rent within IPD was let on standard institutional 20-25 year leases, a number of the features of that lease remain intact, notably the upwards-only rent review.

The average lease length has continued to fall across all three main property sectors. The average un-weighted length fell from nearly 10 years in 1997 to just over 8 years in 2002, whereas the average ERV weighted lease length fell from over 16 years to just under 14 years over the same period. The number of longer leases of 20 or more years is falling and such leases are now primarily found in large value properties, particularly in retail warehouses and offices. Despite the weaker rental market of 2002 and the introduction of the Code of Practice the pace of fall in lease lengths has not accelerated. However the long-term trend is certainly downward as the improved market of the late 1990s did not itself witness a rise in lease lengths. Over the analysis period, there has been an increasing number of leases of 15 years or less, to the detriment of longer ones. The average lease length to the end of the term or to first break, where one exists, has also fallen in all three sectors, with the All Property unweighted average falling from 8.7 years to 7.3 years and the ERV weighted average falling from 15 years to 12.2 years. In 2002, break clauses are more frequent and the first break is earlier than in previous years. The largest influence of breaks on lease length is in the office and industrial sectors rather than retail. When breaks are taken into account the incidence of leases of 5 years and less has risen to 60% unweighted and 30% ERV weighted, an absolute rise of around 10% since 1997.

There is now irrefutable evidence that the standard institutional lease length no longer exists in the institutional sector of the market as measured by IPD. The diversity of lease length is such that no one lease length has much more than 20% of all leases either unweighted or ERV weighted and the spread has widened slightly since the end of the monitoring of the first Code of Practice in 1998.

The opposite is the case for rent reviews. While other terms of the lease have shifted over the last 10 years, review term and type have resisted any change. The average review term is unchanged throughout the analysis period. The usual review period is overwhelmingly still five years and the average review period is still just under 5 years. There are a number of smaller lettings on lower rents which have no reviews but these proportions have remained similar between 1998 and 2002 (around 11% weighted and 25% unweighted). The majority of leases with no reviews are for five years or less and, as indicated above, where breaks are taken into account, the number of leases of five years and less is 30% weighted and 60% unweighted. This suggests that a significant number of leases either have no reviews or can be terminated at or before review. Where there are reviews, the universality of the upward only rent review remains intact. In 2002, upward only rent reviews were found in 98.4% of leases with reviews. The number of review types other than open market review remains very small.

In 2002 there was a rise in the occurrence of rent-free periods. This was a change from the downward trend showing from 1997 through to 2001. The average length of rent free periods remained stable from 1998 until 2001 but in 2002 the rent free period started to increase, particularly in the office market and markets with high rental values. When the distribution of lengths of rent free periods is observed, a trend towards shorter rent free periods can be seen, although this trend was reversed in 2002. Overall the incidence of longer rent-free periods is apparent in longer leases. However there is a break in the trend after 15 yrs and the trend reverses slightly after 20 years with the incidence of longer rent-free periods smaller for 25-year leases than for 20-year leases.

In 2002 there was a rise in the occurrence of breaks in leases, but the picture prior to this was very mixed from year to year across the sectors, with the exception of retail which was static until rising in 2002.

The average time to first break consistently gets shorter throughout the period. This is consistent across the three property sectors. When the distribution of breaks is looked at it is clear that this trend is more apparent in larger lettings. Where there is a break, the most frequent timing is after five years, and the majority of these occur in 10-year leases. They are also normally in leases with a 5-year review period. The tendency to put the break at the same date as review occurs frequently.

7.2.5 Lease Structure Change in the VOA Data

A cluster sample of the VOA database of lease data from 1998 to 2002 has been analysed. The sample potentially covers all commercial transactions in the sample locations. Unlike IPD, in addition to including the better quality property stock in the ownership of the financial institutions and the major Property Companies, the VOA data also includes the secondary and tertiary markets not covered by IPD, which are

often occupied by small business tenants. Thus conclusions can be drawn on changes in leasing practices over the market as a whole and the major analysis is segmented into four bulk codes; offices, shops, factories and warehouses.

Contrary to the decreasing trend in lease length throughout the period since the end of the monitoring of the first code in the IPD, there is little change in average lease lengths in the VOA data in the period 1998 to 2002,the average un-weighted lease length being 7.4 years in 1998 and 7.6 years in 2002. The rent weighted average rose marginally from 12.9 years to 13.2 years. There is no evidence in 2002 that the weaker lettings market identified in Chapter Two and the introduction of the 2002 Code of Practice, has fed through into lease length changes, although it is equally true to say that there was no increase in lease length in the strong market of the late 1990s.

Overall, the diversity of leases, both un-weighted and weighted, has remained fairly constant over the analysis period to 2002. No one lease term dominates across the four bulk property sectors. The number of short leases of three years or less has remained fairly constant through the analysis period with the largest concentration of leases being for three years. The much smaller number of very long leases over 15 years has also remained the same. Weighted frequencies indicate the usual trend of longer leases for larger, higher rent properties. Shop properties have the largest incidence of longer leases. Retail is also the only sector where there are still a significant number of large and/or high value properties let on 20 and 25-year leases. The dominant rent weighted lease length for offices is 10 years. Factory and warehouse premises lease lengths show a high proportion of 3-year leases throughout the period 1998 to 2002.

The rent review is not always reliably recorded in the dataset, and it is not possible to comment on the absence of a rent review. Nevertheless it is clear that the average review period within the lease term has hardly moved through the period 1998 to 2002, being around 4 years un-weighted, rising to around 4.5 years weighted. 5-year review periods dominate, particularly for office, shop and warehouse leases although factories have more 3-year reviews than 5-year reviews. However, on average, factories and warehouses have the lowest review period; a significant number of leases of smaller and/or lower value properties appear to have been let on shorter review periods, especially in the industrial sector.

The incidence of upward only rent reviews is static. Over the whole period 88% of reviews appear to be upwards only, with little difference between sectors. The standard 5-year review does appear to be most associated with an upward only review whereas the 3-year review, the second most frequent review pattern, does appear to have almost twice as many downwards reviews, along with a similar number attached to one-year reviews. Shorter reviews, which usually appear in shorter leases, appear to be a driver towards the relaxation of the upwards only review but the upwards only form of review still dominates the commercial property sector where reviews exist. The quality of the property does have a positive relationship with an upwards only review. This is especially apparent in the retail and warehousing sectors. Review frequency is driven by lease length with five-year reviews in 10 and 15-year leases and a number of 3 year reviews in 6-year and, to a lesser extent, 9-year leases.

The evidence on repairing liabilities has to be treated with caution. The interview evidence suggests that the incidence of internal repairing is less than that suggested by the VOA figures. Potentially, the most interesting point emerging from the analysis is that the sector with the least number of full repairing leases is the office sector, which also has the lowest average lease lengths. This may however be misleading and be connected to distorted reporting related to service charges. Shops also have a lower incidence of full repairing leases than the industrial sector. Warehouses are most likely to have full repairing leases regardless of the weighting adopted.

7.2.6 The Interview Survey

The following summarises the main findings from the interviews survey.

7.2.6.1 The Negotiation Process

The interviews with property agents (who predominantly act for landlords in the negotiation of new leases) indicate that landlords have become more adaptable and realistic on lease terms since the early 1990s. Institutional landlords are regarded as less flexible than their private counterparts. While the difficult market conditions are contributing to this change, it is felt that there is a genuine softening of approach by landlords. Most tenants are felt to be fully aware that lease terms are open to negotiation, with the big retail tenants now normally driving their deals, save in a few high profile shopping centres.

The solicitor interviewees (who acted for both landlords and tenants in a reasonably even split) were more sceptical about a permanent change of approach; a significant proportion believe this to be purely market driven. Many recognise that landlords are currently more ready to accept changes to their draft lease, but still feel that it is for the tenant to ask rather than the landlord making the offer.

Property is generally marketed in a way that makes it very apparent from the outset that the deal is negotiable. While the use of an up front menu of a range of alternative terms is rare, so is the set of explicit and apparently non-negotiable minimum requirements. There appears to be a widespread practice on the part of landlords' agents of seeking to frame their opening shot on lease terms in a way that suits the particular tenant.

The commercial side of the negotiations virtually invariably culminate in agreed "heads of terms". The degree of detail achieved at this stage is very variable. Heads of terms drafted by agents from the bigger firms, or in respect of bigger deals tend to be more detailed. Otherwise, heads of terms can be quite brief, leaving more scope for further negotiations when the matter gets handed on to the solicitors.

The solicitor's role in commercial lease transactions usually goes beyond the mere straight translation of the heads of terms into the legal documentation of a lease. In most instances, the broad elements of the lease such as lease length, the existence of tenants' breaks, the form of rent review, assignability and the nature of repairing responsibilities are settled in the commercial negotiations. However, the detailed drafting of most of these aspects is usually in the hands of the solicitors and can have a significant effect on the final form of the lease.

Commercially significant changes to the heads of terms are commonly made by the parties' solicitors; this is less likely to occur where the heads of terms are very detailed. Such changes very rarely result in any change to the agreed rent. Other responses, such as an adjustment to incentives such as rent frees or a trade off on other terms, only occur very occasionally.

A significant proportion of solicitors believe that landlords' solicitors send out over-long lease documentation that can often, especially in the case of small business premises, also be inappropriate. Others felt quite strongly that every transaction, big or small, deserves a proper – necessarily lengthy – lease document. A full consideration of a long form of lease is difficult to achieve within the cost constraints applying to tenants at the smaller end of the market. A majority of those dealing with small business tenants favour the development, preferably by a neutral body, of a short form standard lease. A significant minority were positively against this idea.

Small business tenants

It is very rare for such tenants to be represented in the commercial negotiations, although it is equally unusual for them not to take legal advice before signing a lease. It is felt that a few small business people are reasonably aware of property issues, especially where they have had previous experience of leasing. However, their general lack of property awareness, coupled with the absence of property advice at the initial stage of negotiations, means that the vast majority of small business tenants are regarded as being unable to strike the most advantageous bargain that might otherwise have been available to them. Most are aware that lease terms are negotiable, but some simply take what is on offer. Only at the smaller end of the market, and where the landlord's negotiator is also his property manager, does there appear to be a view that it is in the interests of both parties for the tenant to be given a lease appropriate to his business needs whether or not he actually knows enough to negotiate such a lease for himself.

While there was no suggestion that a solicitor cannot rescue a small business tenant from a manifestly unsuitable deal, it is clear that it can be difficult and sometimes impossible for the solicitor to make good deficiencies in the agreed heads of terms. This is compounded by the client's impatience to get into the premises and his desire to have the lease settled, often unreasonably quickly.

External Influences

Funders and lenders are regarded as exerting some influence on lease terms, especially on new developments. These controls are seen to be either more reasonable or more negotiable than in the past. Lease provisions are shaped by their perceived impact on asset value. This is more so where the landlord is likely to sell. There is a recognition, more so amongst solicitors, that tight restrictions on subletting can feed down and lead to inflexibility in the subletting market. However, there is no suggestion that this is causing widespread problems in practice. A significant minority of the solicitors regarded young and inexperienced solicitors, and the length of lease documentation as an impediment to a flexible outcome.

7.2.6.2 Lease Terms

Lease lengths are said to have shortened since the early 1990s – but not necessarily more so in the last few years. The agents considered this change to be permanent. The VOA data illustrating a number of smaller lettings on six-year leases with three-year reviews, not apparent in the IPD data, was confirmed in interviews for secondary and tertiary property.

Tenants' breaks are now more prevalent than in the past, but have not yet become the norm; there is no widespread view that puts the proportion of leases with tenants' breaks at more than 50%. Tenants' breaks are noticeably less common in the retail sector.

Tenants' breaks are timed either at review or are geared to the tenants' known operational requirements. Some interviewees regard the insertion of an early break for start up businesses as desirable. A number stress the importance, where a break is timed to coincide with a rent review, of positively avoiding the interlinking of the two. The period of notice required by landlords varies from 3 – 12 months, with 6 months' being the most prevalent. The less happy the landlord is with the break, the longer the period of notice required. The use of penalties on the triggering of a break is occasional rather than widespread. The drafting of tenants' breaks so that they are conditional upon strict compliance with the lease terms has virtually disappeared. The feeling is that tenants' breaks are rarely actually exercised, although most interviewees admitted to having little hard experience on which to base this view. There is some indication that the exercise of breaks is usually for operational reasons rather than because the rent has become unaffordable.

Rent reviews are almost invariably the ratchet form of upwards only market review. RPI linked reviews, turnover rents and stepped rents are occasionally encountered; these often also include an upwards only market based review. Tenants either never ask for a downwards review or, if they do, do so without any expectation of achieving one. Upwards only rent reviews are often not an issue for tenants, even the large retailers.

The FRI lease, including one funded by a service charge, remains the norm. In the case of stand alone second hand property, the modification of the strict FRI terms by reference to a schedule of condition is now more common and more acceptable to landlords, perhaps even becoming the norm. There is a suggestion that schedules of condition increasingly are in photographic form and that these are not necessarily satisfactory.

Conditions attached to the right to assign have softened since the initial flurry of tight conditions in 1996; those that are now imposed are more often negotiable. However there are some concerns that a widely used test requiring any assignee to be of equal financial standing to the outgoing tenant can make some leases virtually unassignable. One tight condition has remained virtually intact – that of the standard imposition of a requirement for an automatic AGA without reference to reasonableness.

It appears to be standard, at the bigger end of the market, for landlords to require subleases of the whole to be on the same terms as the head lease and at either the

passing rent or at market rent. It is rare for the landlord to accept any modification of this apart from that from passing rent to market rent. This can cause difficulties should the tenant later wish to sublet; however, the interviewees had no experience of such problems actually materialising.

7.2.6.3 The Pricing of Lease Terms

Little of substance on lease pricing can be gleaned from the interviews. The use of explicit appropriately priced alternative sets of terms at the commencement of negotiations is rare and appears to have been adopted by only a very few landlords. Pricing at grass roots level is said to be intuitive and rarely explicit; it tends to be rolled up in the whole package. Parties often first agree a rent, with the landlord thereafter simply seeking to achieve the best possible terms within that rent. Although some pricing models are known to have been developed by landlords, these are not used in practice. In the rare case where a more flexible package is explicitly offered at a price, the tenant refuses to pay the extra and would rather revert to the less flexible deal. The only area in which there is any consensus on pricing is tenants' breaks. However, these tend to be priced through length of notice, penalties, or the shortening of rent free periods rather than via the rent. Solicitors often introduce commercially significant changes to heads of terms. However, it is virtually unheard of for this to bring about any adjustment to the rent; furthermore, any other sort of trade off is unusual.

7.2.6.4 The Code of Practice

Virtually all of the interviewees know about the Code, although a few do not. Just over half are reasonably conversant with its content and purpose; the remainder simply know that it exists. Relatively few regard themselves as having any role to play in the dissemination of the Code to their clients. Some of those that did were very positive and pro-active.

Very few think that all landlords know of the Code; these tend to be those who had taken a policy decision to tell all their clients about it. About half think that some landlords – usually the bigger ones – know about the Code. The remainder consider that landlords are ignorant of the Code. A few think that some big tenants are aware of the Code, but the vast majority believe that tenants either do not know at all, or are less likely to know, about the Code.

Most consider that the Code is having no influence at all on lease negotiations, although some of the agent interviewees regard it as having some small, indirect, influence. Only two interviewees, one surveyor and one solicitor, are actively and regularly using the Code when negotiating on behalf of tenants. Both are satisfied that this approach is both useful and effective. Two other interviewees have cited the Code in negotiations and both had found this to be of no effect. A small number believe that a few large landlords are genuinely trying to implement the Code; there is also a view that some of the large landlords are merely paying lip service to the Code.

7.2.7 Lease Pricing

7.2.7.1 Traditional Approaches to Lease Pricing

Up to 1990 almost all property was let on virtually identical terms, the differences between properties being location and physical differences. Therefore the issue of pricing lease terms didn't arise in new lettings.

The introduction of rent reviews from the 1960s onwards in an era of changing market conditions created the necessity to consider the value of lease terms in a negotiation or third party determination situation. The lease terms considered in this context include rent review period, rent review type, lease length, user clauses and improvements. Since 1990 lease incentives have also been part of this discussion.

Where attempts have been made to assess the value of different lease terms by applying technique, this has invariably been based on a reconciliation of asset values. Valuation technique appears more comfortable with freehold or leasehold investment valuation rather than the appraisal of occupational leasehold interests. Although attempts have been made to assess from both landlord and tenant viewpoints, some of the leasehold valuation techniques have been heavily criticised.

Abnormal rent review periods and lease incentives within the rent review valuation are two areas where some form of technique has been applied to lease pricing; here, valuations have adopted conventional techniques and more sophisticated cash flows are rarely used. Although cash flow models were developed in the 1970s and 80s, and applications to the abnormal rent review pattern suggested, these models tended to reflect landlord's discount factors and time horizons and did not produce answers in accord with the tenant's view of true rental value. This one-sided approach reinforces asset valuation rather than cash flow comparisons.

Conventional asset valuations are not based on cash flow, but on a multiplier of current rent. Multipliers are subjectively amended by valuers to reflect changes in lease terms such as a shorter lease or the introduction of a break clause. There is evidence that valuers assume worse case scenarios and over-compensate for risk in amending multipliers.

7.2.7.2 Pricing Leases Using Finance Based Techniques

DCF goes some way to overcoming the limitations of traditional valuation techniques but does not take into account the volatility of the cash flow. In theory, different lease clauses can be compared with real options in the finance markets and therefore option pricing techniques have been linked with the pricing of different lease clauses; such as the upwards only and up/down review, short leases, breaks and renewal rights.

Option pricing techniques such as simulation can be applied. Option pricing is most appropriate for the pricing of upward/downward reviews but has limitations when applied to situations that do not depend primarily on rental volatility, such as in predicting the tenant's decision to operate a break clause. As the tenant's likelihood of exercising the option to break is more than just a finance decision, it becomes more

complicated than for example the likelihood of exercising an option to have a downwards review.

In the case of a short lease or a tenant's break, an assessment of the value of the lease should be based upon issues such as; the probability of the tenant leaving at the end of the lease, the effect that would have on the landlord with regard to costs and benefits incurred and the timing of these events. The costs and benefits are a function of; the time taken to secure a new tenant, the transaction costs incurred in finding a new tenant over and above re-letting to the existing tenant, the increase/decrease in rent obtained from the new tenant set against that obtainable from the existing tenant, the changing lease terms available from a new tenant against a lease renewal negotiation, and the increase/decrease in tenant quality.

Break clauses are difficult to price as there is great variation in them. There is no single form or type of break clause as they vary in structure, timing, method of pricing and frequency. The likelihood of operation of a break is an important input into a pricing model. A tenant is less likely to leave by operating a break clause than they are because of non-renewal of an existing lease. This is confirmed by IPD data. It is suggested that early breaks are less likely to be operated than later ones.

In the case of the upwards only review, the major issue in pricing is the level of volatility in the cash flow rather than the probability of tenant vacation.

Given the immaturity of the development of these models in real estate, they are not likely to have a major impact on current practice even if they are being applied within some major property owning and occupying organisations.

7.2.7.3 OPRent Case Study

OPRent is a simulation cash flow model into which the user enters the details of a standard lease, including elements such as the rent, term, review pattern and repairing liabilities, as well as the expected rental growth rate and discount rate. The user then changes elements of the lease package creating a non-standard lease. The result is a rent for the non-standard lease which gives the same present value as does the original yardstick. Important elements of the model are the probabilities for voids, breaks and renewals which are based on interviews and IPD data but can be adjusted by the user.

Three scenarios were tested against standard leases for various segments in each of the major property sectors to see what effect changing various lease terms would have on rents. The lease terms tested were up/down reviews, break clause and short lease term. These scenarios produced a wide range of results reflecting the variation in expected renewal and break probabilities. However, the up/down review was priced at less than 5% higher than the upwards only review while a short lease of 5 years was priced on average at over 10% higher than a 15 year lease.

7.2.7.4 Quantitative Analysis of Lease Pricing Within IPD

In order to examine whether any evidence of differential pricing for different lease clauses exists, an analysis of three segments of the IPD was carried out in the years

1998 and 2002. The analysis was undertaken using cross-sectional regression methods.

Only limited market evidence was found for differential pricing of lease terms. Lease length does appear to be significant at the 5% level, but showing a higher rent for longer leases rather than the expected higher rent for shorter leases. But the modelling was not straight forward and the results suggest that the current model cannot distinguish between lease issues and other locational and physical characteristics. More work is necessary to identify segments that enable lease effects to be more correctly isolated. However, the lack of any relationship between the lease terms and rent could simply because there are no identifiable links between individual lease clauses and rent. This counter intuitive outcome is corroborated in the findings of the interviews where the lease package appears to be judged as a whole against other lease packages, after the rent has been agreed. Therefore further analysis could model relationships between different lease terms rather than rents.

7.3 Conclusions

The Interim Report has addressed issues of flexibility, choice, small business tenant awareness and the initial impact of the Code of Practice. It draws some preliminary conclusions based on the short time between the introduction of the Code in April 2002 and the end of 2002 for the lease structure data and April 2003 for other evidence.

Two key objectives of this research are the measurement of choice and flexibility; these concepts are difficult to separate and define. This project treats flexibility as an outcome and choice as the process by which the outcome is achieved. The monitoring of both of these involves an examination of individual lease terms but as these terms impact on each other they must be assessed as part of the whole package. Broad indications of lease flexibility can be identified by measuring individual lease terms, but this does not necessarily demonstrate that each tenant has a lease which matches their particular business needs. Equally, evidence that tenants are being offered a choice of lease terms does not necessarily mean that the resulting lease is flexible.

7.3.1 Flexibility in Lease Terms

The introduction of the Code occurred in a difficult period for the commercial lettings market, especially for office and industrial property. There may be an expectation that leases would be influenced by the weaker market conditions in 2002 and tenants would be able to negotiate leases which match more closely their business needs.

Lease structures in 2002 do not show any significant acceleration in trends from previous years. There is a continuing fall in the average lease length of the better quality property that makes up the Investment Property Databank since the end of the previous Code monitoring period. The evidence across the whole of the property market from the Valuation Office Data (VOA) is that lease lengths have remained relatively stable over the same period. However, the increasing incidence of break clauses and a reduction in the time to the first break means that the average lease length to first break does show an accelerating downward trend in 2002. The continuing fall in average lease lengths in IPD compared with the lack of a falling

trend in VOA data suggests that the difference between prime and secondary markets is diminishing. All markets show little change in the spread of lease lengths, although the IPD does show a shift towards shorter leases.

Some other lease terms have changed over a longer time frame but not specifically within the last year. Breaks have become more operable and full repairing liabilities, while not shifting from tenant to landlord, are now more likely to be mitigated by schedules of condition.

However, there are some lease terms where there is little evidence of change. Assignments and sublettings are still subject to absolute conditions; in particular, automatic AGAs remain standard on assignment.

The evidence on rent review indicates no change. The upwards only review is virtually universal and the incidence of alternative review types is still rare. Review patterns remain the same with five-yearly reviews standard in the institutional market while 3-yearly reviews are still more common in secondary and tertiary property on shorter leases.

Overall, therefore, these broad indicators show a varied picture on flexibility. Over the long term, reducing lease lengths, reducing periods to first break, the easier operation of breaks and schedules of condition combine to give tenants more flexible arrangements. However, movement towards greater flexibility is not occurring in assignment, subletting and rent review.

Where flexibility has increased, this has occurred despite the relatively strong economic and property market environment of the late 1990s and this suggests that the change is structural. Over the short term, any expected acceleration of the trend towards flexibility in the relatively weak market of 2002 is not immediately apparent from the lease data. However, because property markets tend to lag, a further year's data is necessary to identify whether the market downturn will affect lease structures.

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These broad indicators cannot demonstrate whether or not individual tenants are obtaining lease terms that meet their particular business needs. This question will be addressed through the questionnaire surveys for the Final Report.

7.3.3 Choice

Choice is a central issue within the 2002 Code of Practice which recommends that tenants should be offered a range of forms of lease, with specific reference to appropriate pricing of alternative sets of terms. The research has examined the negotiation process in order to assess whether choice is being delivered and has also examined the current state of lease pricing within the market.

An explicit range of appropriately priced alternative lease terms is not being offered to tenants at the commencement of negotiations. It happens very occasionally but is not the usual approach. One of the main difficulties with such an approach is pricing and lease pricing is a complex and difficult technical process which is only just beginning to permeate real estate markets and practice. It is clear that the application of financial models, which could form the basis of a more sophisticated and technical

approach to lease pricing, will not be fully developed within the time frame of this review. Therefore it is unreasonable to expect a menu of priced terms in the short term. In any event, "appropriate" pricing may currently be a function of a trade off of terms rather than rent as the research can find no evidence that rents are adjusted for different lease terms. In the longer term, lease pricing advances should encourage choice and therefore flexibility.

The absence of priced alternatives at the commencement of negotiations does not mean that tenants have no choice. Tenants are aware of their ability to negotiate and appear to be being offered choice when negotiating their leases. Whilst the explicit offer of a range of alternative lease terms is rare, it appears to be unusual for landlords to be prescriptive about the lease on offer. There are signs that many landlords seek to tailor the initial lease terms offered to the requirements of the tenant although, inevitably this will depend on the demand for the particular premises. However, in the rare cases where priced alternatives are being offered and in the more general case where choice is being negotiated across a variety of lease terms, evidence suggests that some tenants appear reluctant to pay any higher price. This issue remains an important aspect of the research next year for the Final Report. In practice, it appears that rent is seen as a price for a building and not for a lease; rents appear to be set at the same time or even before terms are agreed and are rarely renegotiated if lease terms are later changed or added.

The interview survey indicates that tenants do appear to be enjoying a degree of choice on individual lease terms, although this often has to be sought rather than being positively offered by landlords from the outset. There are strong indications that, in the commercial negotiations, landlords are now more adaptable and realistic in their overall approach to the lease terms that can be achieved.

There is no evidence that choice is being offered or sought in respect of rent review type. Where a lease is to contain a rent review, it appears to be accepted by both parties that it will be a standard upwards-only review to market rent. Landlords are not offering either the threshold review or any other alternative but there is equally no evidence that that tenants are asking for it or would be prepared to pay rent or any other payment for the relaxation of this term. Upwards only rent reviews are said not to be a major issue for tenants but further explanations for the apparent inertia on rent reviews will form an important element of next year's landlord and tenant surveys. These surveys will also expand our knowledge of whether the choice available to tenants is appropriate for their particular business requirements.

7.3.4 Small Business Tenants

The initial indications, based on the perceptions of agents, are that the position of small business tenants has not changed since 1998. Their apparent unwillingness to take commercial property advice, often combined with a lack of property awareness, means they are frequently ill-equipped to negotiate the best available lease. Legal advice is usually taken but it can often be difficult for solicitors to rescue a poor commercial agreement. Furthermore, the new Code is not assisting small business tenants in their negotiations because the evidence suggests that they are completely unaware of its existence.

Despite the view that small unrepresented business tenants does not get the best terms, it is clear from the lease data that they occupy commercial premises in the secondary and tertiary market on different terms from the corporate occupier in the prime market. In addition, there is some evidence that, in the tertiary market, some landlords' agents, especially where they are the managing agent, seek to ensure that the lease matches the tenant's business requirements.

A questionnaire survey will specifically address issues relating to small business tenants and provide a more detailed picture for the Final Report.

7.3.5 The Impact of the Code of Practice

For the purposes of this Interim Report, the impact of the 2002 Code of Practice has been assessed merely by monitoring press coverage and through the interview survey of property professionals. The questionnaire surveys will provide a fuller evaluation for the Final Report.

The Code has had a greater impact than its predecessor to the extent that it has been more widely disseminated. However, at this stage knowledge of the Code appears to be limited to property professionals and large landlords and tenants; awareness of the Code outside of this group seems to be very limited. Even where the Code is known about, it was felt that the Code was having very little direct impact on lease negotiations a year after its introduction.

The present Code, unlike its predecessor, contains a number of quite specific recommendations on lease terms. Some implementation of these in the first year of its operation would be an indication that the Code is influencing the market. The evidence so far is that these recommendations are not finding their way into the market place.

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Appendix One - Technical Appendix to IPD Analysis

A1.1 Introduction

This appendix outlines the main technical issues that were encountered during the IPD analysis. Some of the issues relate to the character of the dataset in question, some relate to the approaches adopted for the analysis and some issues relate to the processing of the data itself. Each of these areas will be considered in turn. In a concluding section, the main differences between this study and previous studies will then be summarised.

A1.2 Characteristics of the dataset

At the end of 2002, over 13,400 properties were held by funds contributing to the Investment Property Databank (IPD). 11,400 of these were eligible to be included in the published IPD *UK Annual Index*, which is estimated to represent approximately 75% of the property assets of UK institutions and listed property companies (IPD, 2003). The number of tenancy records represented by these properties is far greater. On average, there were just over 77,000 tenancy records in each year, including both existing and new leases for those periods. These records form what can be termed the 'December databank', because all the tenancy observations are made as at 31st December of the year in question.

In addition to this, there are also a small number of funds that contribute data once a year for a March year-end. These are funds which have their accounting year-end at this time and whose properties are only valued annually. In this 'March databank', there were, on average, 11,000 tenancy records before filtering, again including both existing and new leases for those periods. The number of *new* leases, once these two databanks are combined, is approximately 5,500 in each year of the study period. It is the new leases that are the subject of our analysis.

Leases from both these databanks were included in the analysis, not only to increase the amount of evidence, but also because they have different characteristics. The larger December databank contains most of the institutional (insurance company and pension fund) portfolios and only a few property company portfolios. The March databank contains mostly property company portfolios, so its inclusion increases the amount of evidence on lettings by this sector and broadens overall coverage of the market. Both databanks are also used in the BPF/IPD *Annual Lease Review* (BPF/IPD, 2002).

However, it is important to note that even this combined dataset only represents a certain part of the UK real estate market – that is the prime investment market in commercial property. Some secondary properties are represented in the data, but, predominately, the trends will reflect the better quality property stock in the better locations. Such property is also more likely to be occupied by major national and international tenants. Therefore, this analysis may show different trends to the analysis of the Valuation Office Agency (VOA) data, in which the secondary and tertiary property markets have a greater representation and where the spread of tenants taking new leases will be wider.

Another point to note is that institutional property investment in the UK is concentrated in London and the South East. This influences both the sample and the segmentations that can be used. In this working paper, a sectoral division of the UK real estate market (Retail, Office, Industrial) has been used together with a mixed sector-region division, the IPD Portfolio Analysis Service (PAS) segments. The regional divisions in the PAS breakdown reflect this regional issue, with the UK being segmented into London and/or the South East and the "Rest of UK". The actual segments and the number of new leases in each during the analysis period are shown in Table 3.1 in the main body of the chapter.

A1.3 Approaches to analysis

There were two major issues regarding how the analysis should be carried out. One was to do with whether the analysis should be longitudinal or cross-sectional, that is selecting one dataset and using the lease data for different years within it or using historic datasets, which show information on new leases when first collected. The other main issue was what weights should be used in the analysis for the production of value weighted results. Both these issues are considered in the subsections below. A third subsection then discusses the identification of new lettings from lease renewals, as separate analyses split on this basis were planned, but are unavailable at this stage.

A1.3.1 Adoption of cross-sectional approach

Some analyses of lease lengths and other terms using IPD data have adopted a longitudinal approach (for example, Crosby & Lizieri (1998), BPF/IPD (2002) and Nelson Bakewell/OPD (2003)). This approach has the advantage of utilising the most recent data held by IPD at any one point, but has limitations if the aim is to compare lease trends through time. This is because there is a natural bias involved. Whereas the full range of leases can be observed for the last year of a longitudinal analysis, only unexpired leases can be observed for the earlier years. So if 1997 leases were being analysed using end 2002 data, any leases granted in that year which were 5 years or less in length will have expired and so no longer be recorded. Average lease lengths for that year would therefore be calculated from the longer leases that remain and so be biased upwards.

This limitation was recognised in Crosby & Lizieri (1998), though no adjustments were made to the analysis. Meanwhile, in the BPF/IPD (2002) study, the issue is partially addressed with leases less than 4 years in length excluded from the data and analysis altogether. However, the time series comparison in BPF/IPD is still over a 10 year period and averages for the earliest years will still suffer some bias resulting from the approach.

The alternative approach is to use historic data and conduct a cross-sectional analysis. In other words, rather than measure lease trends using recently collected data, figures for each year are calculated using the data collected in that year. This has the advantage of eliminating the bias described above. However, one problem in adopting this approach in the past was the limited availability of historic tenancy datasets. For instance, in the DETR study (DETR, 2000), while a cross-sectional approach could be used for three of the years of interest – 1995, 1997 and 1998 – the longitudinal method had to be used to analyse other years. In this study, historic data was available

for each year back to 1997, so a cross-sectional approach could be adopted. This enables a time-series comparison over six years and gives this study some overlap with the DETR work. For an analysis of earlier years, though, the use of longitudinal methods is unavoidable.

A1.3.2 Weighted analysis

Lease trends can be calculated on an un-weighted basis, with all leases in the sample having an equal influence in the analysis. However, it is useful to compare un-weighted figures with ones calculated to reflect the size or value of properties in the market. Such comparison enables differences between different parts of the market to be identified, if they exist. For instance, it may be that lettings on more valuable properties are longer than on less valuable properties or that larger properties have more break clauses than smaller ones.

Three weighting factors have been used in this analysis: the rent passing on each lease, the estimated rental value (ERV) and the floorspace of each unit in square metres. Definitions of these variables are shown below in Table A1.1. Rent and ERV observations were available for all leases in the samples. Floorspace, however, was not available for every lease record, so these figures are calculated on smaller, though still substantial, samples in each year.

Table A1.1: Definitions of the variables used for weighted analysis

Rent passing	This is the annual rent agreed between landlord and tenant for the lease and which is therefore payable by the tenant.
ERV	ERV is the estimate of rental value for the unit. It is made for valuation purposes and represents the amount at which the unit would be expected to let at in the open market at the date of valuation.
Floorspace	This is the internal floorspace of the let unit, in square metres.

Most of the previous analyses mentioned in section A3.3.1 have used rent passing as the main weighting factor. However, during this analysis, a potential problem with rent weighting was discovered. The problem arises where leases are granted with rent-free periods. If a rent-free period is in operation at the date the data is collected for (either 31st December or 31st March), then the rent recorded by IPD for those leases is zero. This then means they are effectively excluded from the weighted averages, though they still contribute to the un-weighted results.

To illustrate, if a new lease was granted in June of a particular year with a three month rent-free period, then that period will have expired by data collection and so the rent passing (as an annual figure) will be recorded in the rent field of the databank and be available to use. If the June lease was granted with a nine-month rent-free period, though, the rent will still show as zero in December. Unfortunately, IPD are not able in these cases to identify the contract rent from the client data, which could have served as an alternative.

This is important for two reasons. Firstly, longer leases may be more likely to have long rent-free periods than short leases. This, in turn, would make it more likely that their rent-free was still in operation at the data collection date and so mean they are more likely to be excluded from the weighted results. Secondly, in certain market conditions, rent-free periods may be more common in some market segments than others. This could cause more properties from a particular segment to be excluded, creating unknown biases in the weighted results.

Therefore, the ERVs for each lease were also used to produce weighted results. These are an estimate of the rental value of the space in each case. However, as they are valuation based figures, they rely in part on the assumptions being used by the valuer in each case. Previous research has indicated that there are inconsistencies with the basis of these valuations (Crosby and Murdoch, 2001). However, these are minor differences and should occur randomly across the data so the ERV weighting is less likely to bias the results and therefore provides a more realistic view of the value weighted trends. In the latest BPF/IPD (2003) Annual Lease Review they have addressed the problem by using rent weighting where a rent exists and ERV where one doesn't. Either approach should reduce any bias to a minimum.

It should be noted, though, that in longitudinal analyses, this issue only affects figures for the last year of the analysis. Rent-free periods for leases signed in earlier years are likely to have expired in the data set being used. The issue would therefore be more serious for cross-sectional analyses if not addressed, as these use data from each year for each year's new leases.

A1.3.3 Distinguishing new lettings and renewals in the IPD data

As well as presenting weighted and un-weighted results for all leases and for various market segments, an analysis split between new lettings and lease renewals was also planned. A new letting is defined here as a lease agreed between a landlord and new tenant, whereas a renewal is the agreement of a new lease between landlord and existing occupier.

Currently, identification of whether leases are new lettings or renewals is unavailable. IPD currently conduct a matching process, which traces lease events between two years' datasets, but the number of leases that are matched is small relative to the total samples used in this report. An alternative way of identifying new leases, by using data on how long each unit was void for before letting, was also tested. However, there were some problems with this method, not least that the absence of a void does not automatically mean that the lease in question is a renewed lease. We are therefore working with IPD to find a way of producing this analysis for the final report.

A1.4 Processing issues

This section briefly describes some of the issues and steps involved in processing the data.

Datasets were obtained for each year between 1997 and 2002 (inclusive). Information from both the December and March databanks was used. Leases in the March data were partitioned on a calendar year basis, so new leases starting in 2001 recorded in

the March 2002 data were grouped with the other 2001 leases, while those starting between January and March 2002 were included in the 2002 analysis. This is in contrast to previous analyses that used both December and March data, such as BPF/IPD (2002), which used a 15 month time window instead.

The March 2003 databank was among those available for analysis. So new leases in this data beginning in 2002 could be included in the 2002 calculations. The availability of this data also raised the possibility of obtaining some 2003 figures – based on those leases starting between January and March of this year. However, only 250 leases were found in the data that were signed in this period. This was felt to be too small a sample, given that the figures would be compared to other evidence based on 4,000-6,000 leases and also because it did not allow any disaggregation. Tenancy data for 2003 from the larger December databank will be available from April 2004, in time for analysis for the final report.

In defining the sample of new leases to test, a number of filters were employed. Firstly, any headleases, licences or leases for the purpose of property development were removed. Leases for properties outside the main commercial sectors were also dropped, such as agricultural or car park leases. Some leases over 50 years in length were excluded, as these are unlikely to be market leases and would skew the averages, a policy also adopted in other studies. Finally, leases in Scotland and Northern Ireland were removed, as the Code does not apply to these areas of the UK.

A1.5 Summary

It can be seen from the sections above that there were several technical issues that needed to be considered in the preparation and execution of this analysis. Addressing these technical issues has led to a number of differences between this analysis and previous studies using IPD data. The two major issues are now summarised below.

Firstly, this study is cross-sectional, whereas almost all previous studies have been carried out on a longitudinal basis. In other words, to analyse lease trends in a particular year, this study has used data from the end of that year, whereas other studies have used data from the last year of their period in each case. However, a longitudinal approach has a natural bias, as short leases from early years will have expired and dropped out of the most recent data records. A cross-sectional analysis avoids this bias.

Secondly, this analysis uses three weighting schemes to reflect the size and value of leases in the dataset. These were weighting by the rent passing (agreed rent) on the lease, weighting by the estimated rental value (ERV) and weighting by unit floorspace. Previous studies have typically only used one weighting scheme, that of rent passing. It was shown above that there are potential problems with using rent, though, as where rent free periods are granted, the recorded rent is zero and so some leases are excluded from the calculations. By using three weighting schemes, the consistency or otherwise of weighted figures can be compared but ERV weighting has been adopted as the main benchmark.

Appendix Two – Valuation Office Lease Data Technical Appendix

A2.1 Introduction

This annex deals with the main issues surrounding the analysis of the VOA data. The background and origins of the dataset are described, followed by a summary of the data processing undertaken by the research team. Several data reliability issues were encountered during the course of this processing which are set out below. The paper finishes with a description of the filtered dataset used in the analysis.

A2.2 Nature of the Database

The Valuation Office Agency holds and maintains an address based database containing, among other things, survey and tenancy information for commercial property in England and Wales. This information is largely gathered in connection with the VOA's statutory rating function. The vast majority of the tenancy information comes from the rent returns completed by occupiers. The rest is from a variety of sources such as Stamp Duty documentation and landlords' rent schedules.

A2.3 Data Collection

Because of the connection with the rating function, the collection of rental information was traditionally concentrated around rating valuation dates. However, in recent years the VOA has put into place a computerised lease register system with the aim of collecting information as an ongoing process. Although there are still more resources put into data collection at the 5 yearly valuation dates, the lease register system does mean that there is now more rental information being gathered between these dates.

Rent returns are intended to be completed by occupiers. For many of the large occupiers these forms are completed by their own property departments or by rating agents. However, the small and medium sized occupiers generally complete the forms themselves and this gives rise to various issues concerning the quality of the data. In DETR (2000) it was found that many occupiers seem unable to provide accurate answers to questions such as whether the lease is new or a renewal. Thus many forms are partially completed or contain answers that seem improbable. The VOA has redesigned its rent return forms with each rating revaluation, to try and make them easier to complete and to improve the quantity and quality of responses. However, because the forms are asking for lease information in some detail, they are necessarily lengthy and somewhat complicated.

A2.4 Data Provided to the Research Team

The head office of the VOA collects a monthly download of data from the national database for their own purposes. The download contains a large number of rental and survey data fields for commercial property, but it does not include all of those in the database. The data provided to the research team was drawn from the download of 31 August 2003. The data provided included all records of leases in specified local

authorities with a lease start date on or after 1 January 1998. The data fields include both tenancy and survey information, but not details of the tenant or landlord.

There were limitations on the data fields that could be provided to the team; because of technical reasons, only those fields found in the monthly download could be provided. Also, the VOA introduced new rent return forms in November 2002, and some of the information from these forms is not yet part of their central download. Therefore, although the main fields on lease length, review and repairs are present, it was not possible to access fields to distinguish new lettings from renewals. Nor was it possible to have the information on rent free periods or capital payments being collected on the new rent returns.

It is hoped that some of these limitations will be removed for the 2004 data download for the project as some amendments to the VOA's download programs are anticipated.

A2.5 Filtering of Dataset

The dataset comprised 63465 records. Some filtering then had to be done as described under the following headings:

A2.5.1 Non-Bulk Records

The research is looking at the changes in lease structures for the main bulk classes of offices, shops and industrial property. Approximately 3400 records were deleted as they were for other types of property such as advertising rights, car parking spaces, schools etc.

A2.5.2 No Lease Term

Of the bulk class records, over 7000 had no information on the length of the lease, this field being blank. This may be because of partial completion of the rent returns from which the data is extracted. As lease length is a crucial part of the analysis, these records were deleted.

A2.5.3 Leases of Over 50 Years

Some 220 bulk class records had a lease length of over 50 years. It is likely that many of these are ground leases or other leases not at market rent. Therefore they were deleted as being not relevant to this study and in any event to prevent a few very long leases biasing the analysis.

A2.5.4 Records with No Description Codes

Each record has a field for a bulk class code to categorise it as a shop, office, factory or warehouse. As the categorisation by bulk class is central to the analysis it was necessary, where the field was blank, to either enter a bulk class code or to delete the record. Some records were blank in this field, although they had a description code for the year 2000 rating list and other survey data which made the property type clear; in these instances the field was populated by the team. In other cases there were no survey data or description codes. This was largely because the lease information

related to historic (non-live) rating assessments and the survey information in the download is drawn from the current (live) rating list records. In these 1500 cases the records had to be deleted.

A2.5.5 Other

Another 200 records were deleted as they had no floorspace data or were so incomplete or internally inconsistent regarding lease details as to be unuseable.

A2.6 Data Quality Issues

A2.6.1 Lease Length

There is a specific question on the VOA rent returns asking for the length of the lease. For the central download this answer is converted into months. In the current bulk class rent return the respondent is required to give the number of years and months (in that order). The previous rent return, which was in use until November 2002, required the answer to be given as months followed by years. This latter format gave the potential for answers to be given wrongly e.g. a respondent reading the form quickly could easily enter 5 years as 5 months. There could be some over reporting of very short leases because of this. The only changes that have been made to the data set are in a very few cases where such confusion in the answers to the question is entirely apparent e.g. a record shows lease length 1 (month), review period 12 (months). In this case the lease length has been amended to 12 months.

A2.6.2 Rent Review Intervals

The dataset received had an inconsistent format of entries for this field. The earlier rent return forms asked for the rent review interval to be given in an unstructured answer, the interval was then entered on the database as years and months and converted to months for the central download. The current rent return asks for the answer in a more structured manner of years and months, this is then similarly converted to months for the download. The information in the dataset that originates from sources other than rent returns is entered free form into the database and had not been reformatted for the download or into the data set received by the team. Examples of entries on this field are '5y', '5' or '5y 0m'. These entries have been converted to months where it has been possible to establish what the answer means. In the very few cases where it was not possible to establish the meaning of the answer, such as where the review period was given as 'yes', the field was made blank to remove it from analysis of review patterns.

More than half of the records in the dataset were blank in the field on rent review interval. This cannot be taken to mean that there is no rent review. Although this may be the case in some instances, it may reflect the partial nature of completion of rent returns by occupiers.

There were records showing rent review intervals that were greater than the length of the lease. Again this may reflect the problems occupiers have with recording the details of their lease. In these cases the rent review field was made blank as it was impossible to work out what the correct interval was.

A2.6.3 Repairing Liability

The phrasing of the questions on repairing liability questions on the rent returns may lead to inaccurate reporting and this translates into entries in the dataset that are difficult to interpret. The rent return asks the occupier who is responsible for each of external and internal repairs and also insurance. Although it is explained that the answer required is 'tenant' if a service charge is paid to cover repair or insurance costs this aspect could be overlooked by respondents, leading to an over reporting of non-FRI leases.

A2.7 2003 data

The filtered dataset contained 1,970 records for the year 2003. As the download was done on 31 August 2003, it was expected that there would be some records for the first half of 2003. Because the number of records for the year is only approximately 25% of the number for the previous full years, and has been collected so early in the year, the records were scrutinised to see if they differed markedly from other years or could reliably be presented as an indication of this year's trends.

It was found that 26% of the 567 records in the industrial sector (factories and warehouses) came from one town in Wales and were from non-rent return sources. Average rents in 2003 were significantly lower than the average of the previous five years and in the warehouse sector this was because of smaller floorspace in each letting. The average size of the retail properties was virtually half that of the average of the previous five years data and the rent about two-thirds, showing that the retail data was heavily biased towards smaller shops. The office sector was the only sector to have similar size and rent characteristics as for the previous five years.

Because of these issues it was clear that the 2003 data could not reliably be used to identify time trends in the data although it was decided that, as the transactions were less than 4% of the total data from 1998 onwards, they could be included where analysis was in aggregate over the whole period.

A2.8 Final Dataset

The final dataset consisted of 50,991 lease transactions and comprises those records for 1998 to 2003 where the research team is confident that the data on lease start and lease length are robust for analysis, the property type can be identified and where the data on rent and floorspace is present to enable comparison to be made using different weightings. Where annual time trends are being analysed the data is reduced to 49,021 leases signed between 1998 and the end of 2002. The data set has additional information on rent review pattern and repairing liability although this is not present for all records.

Appendix Three – VOA Data Tables and Figures

A3.1. Lease Length Frequencies for Four Main Sectors 1998 to 2002

Retail unweighted

	1998	1999	2000	2001	2002	Total
< 1 yr	2.1%	1.3%	1.4%	1.5%	1.7%	1.7%
1 yr	5.9%	4.1%	4.8%	5.4%	5.3%	5.2%
> 1 yr < 3 yrs	2.5%	2.4%	3.0%	3.7%	3.0%	2.9%
3 yrs	13.1%	13.2%	14.8%	13.4%	12.0%	13.3%
> 3 yrs < 5 yrs	2.0%	1.9%	2.0%	2.0%	1.2%	1.8%
5 yrs	12.4%	14.1%	14.1%	12.1%	12.5%	12.9%
> 5 yrs < 10 yrs	12.2%	13.6%	12.3%	12.2%	10.8%	12.2%
10 yrs	14.7%	15.6%	15.6%	16.7%	20.3%	16.3%
> 10 yrs < 15 yrs	6.2%	6.5%	5.4%	5.1%	6.3%	5.9%
15 yrs	15.0%	15.0%	15.1%	16.2%	16.1%	15.4%
> 15 yrs < 20 yrs	2.0%	1.7%	1.4%	1.5%	1.2%	1.6%
20 yrs	4.6%	4.5%	4.7%	4.4%	4.5%	4.6%
> 20 yrs < 25 yrs	1.7%	1.1%	1.2%	1.7%	1.3%	1.4%
25 yrs	4.9%	4.4%	3.8%	3.8%	3.3%	4.1%
> 25 yrs	0.8%	0.6%	0.4%	0.4%	0.6%	0.6%
	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%

Office unweighted

	1998	1999	2000	2001	2002	Total
< 1 yr	3.3%	1.6%	2.4%	2.2%	2.9%	2.6%
1 yr	11.1%	7.2%	7.5%	10.8%	10.8%	9.6%
> 1 yr < 3 yrs	6.6%	6.3%	6.6%	7.4%	7.2%	6.8%
3 yrs	16.7%	19.2%	19.0%	19.2%	16.9%	18.1%
> 3 yrs < 5 yrs	4.7%	4.3%	4.0%	4.1%	3.9%	4.2%
5 yrs	19.2%	19.0%	19.0%	18.1%	16.8%	18.6%
> 5 yrs < 10 yrs	10.8%	12.4%	12.0%	9.8%	12.0%	11.4%
10 yrs	14.4%	16.0%	16.6%	15.4%	17.0%	15.7%
> 10 yrs < 15 yrs	4.4%	3.7%	3.1%	4.1%	3.8%	3.8%
15 yrs	5.2%	5.6%	6.1%	5.2%	5.5%	5.4%
> 15 yrs < 20 yrs	1.0%	1.1%	1.1%	0.7%	0.5%	0.9%
20 yrs	1.0%	1.5%	1.3%	1.6%	1.1%	1.3%
> 20 yrs < 25 yrs	0.5%	0.6%	0.4%	0.3%	0.6%	0.5%
25 yrs	1.1%	1.0%	0.7%	0.8%	0.7%	0.9%
> 25 yrs	0.2%	0.3%	0.3%	0.4%	0.2%	0.3%
	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%

Factory unweighted

	1998	1999	2000	2001	2002	Total
< 1 yr	3.5%	1.6%	2.5%	2.6%	4.8%	3.0%
1 yr	23.1%	12.5%	11.6%	14.0%	12.3%	16.7%
> 1 yr < 3 yrs	4.2%	4.8%	4.1%	5.3%	5.4%	4.6%
3 yrs	25.9%	29.9%	31.2%	29.1%	26.5%	27.8%
> 3 yrs < 5 yrs	1.8%	3.2%	1.9%	3.4%	1.5%	2.3%
5 yrs	12.3%	13.2%	15.8%	10.9%	13.1%	12.8%
> 5 yrs < 10 yrs	11.3%	14.5%	11.4%	12.1%	12.4%	12.0%
10 yrs	7.1%	8.7%	9.7%	10.3%	12.2%	9.2%
> 10 yrs < 15 yrs	2.9%	3.1%	3.0%	4.4%	3.1%	3.3%
15 yrs	3.7%	3.7%	4.2%	4.6%	5.6%	4.2%
> 15 yrs < 20 yrs	0.4%	0.2%	0.6%	0.5%	0.3%	0.4%
20 yrs	1.2%	1.2%	1.4%	1.0%	1.3%	1.2%
> 20 yrs < 25 yrs	0.7%	1.2%	1.0%	0.9%	0.4%	0.9%
25 yrs	1.6%	1.6%	1.2%	0.9%	0.7%	1.3%
> 25 yrs	0.3%	0.5%	0.4%	0.2%	0.3%	0.3%
	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%

Warehouse unweighted

	1998	1999	2000	2001	2002	Total
< 1 yr	2.4%	1.4%	1.4%	2.3%	3.0%	2.0%
1 yr	12.2%	9.0%	6.4%	8.1%	10.9%	9.9%
> 1 yr < 3 yrs	6.6%	5.5%	5.9%	5.7%	5.3%	5.8%
3 yrs	20.6%	20.9%	26.4%	21.4%	18.3%	21.6%
> 3 yrs < 5 yrs	2.8%	3.5%	2.4%	2.5%	2.0%	2.6%
5 yrs	13.0%	15.9%	15.1%	13.7%	14.1%	14.2%
> 5 yrs < 10 yrs	13.3%	13.8%	11.4%	11.8%	8.6%	11.9%
10 yrs	12.0%	12.6%	13.2%	17.4%	20.1%	14.6%
> 10 yrs < 15 yrs	4.5%	4.6%	5.4%	4.6%	4.5%	4.8%
15 yrs	7.2%	8.4%	7.3%	8.3%	8.2%	7.7%
> 15 yrs < 20 yrs	0.5%	0.2%	0.5%	0.9%	0.6%	0.5%
20 yrs	1.3%	1.4%	2.2%	1.8%	1.2%	1.6%
> 20 yrs < 25 yrs	0.9%	0.5%	0.6%	0.1%	0.3%	0.5%
25 yrs	2.4%	1.6%	1.6%	1.1%	2.7%	1.9%
> 25 yrs	0.3%	0.6%	0.5%	0.4%	0.2%	0.4%
	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%

Retail rent weighted

	1998	1999	2000	2001	2002	Total
< 1 yr	0.7%	0.4%	0.5%	0.4%	0.5%	0.6%
1 yr	1.1%	0.8%	0.9%	1.4%	1.8%	1.2%
> 1 yr < 3 yrs	1.2%	0.6%	1.1%	1.2%	1.7%	1.1%
3 yrs	3.1%	3.4%	4.2%	3.5%	3.0%	3.5%
> 3 yrs < 5 yrs	1.1%	0.9%	0.5%	1.0%	0.6%	0.9%
5 yrs	5.5%	6.7%	6.5%	7.0%	6.7%	6.4%
> 5 yrs < 10 yrs	4.1%	5.2%	4.1%	5.7%	4.7%	4.8%
10 yrs	11.0%	11.0%	10.7%	14.7%	15.0%	12.4%
> 10 yrs < 15 yrs	7.3%	6.9%	4.4%	5.2%	4.7%	5.9%
15 yrs	29.6%	28.4%	28.2%	30.2%	29.5%	29.1%
> 15 yrs < 20 yrs	4.3%	2.0%	1.8%	2.3%	1.2%	2.5%
20 yrs	6.7%	10.0%	12.1%	10.2%	7.1%	9.1%
> 20 yrs < 25 yrs	1.5%	0.9%	2.3%	1.8%	1.1%	1.5%
25 yrs	16.6%	19.2%	21.0%	14.0%	12.8%	16.6%
> 25 yrs	6.3%	3.5%	1.6%	1.3%	9.7%	4.4%
	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%

Office rent weighted

	1998	1999	2000	2001	2002	Total
< 1 yr	0.8%	0.4%	1.0%	0.6%	1.1%	0.8%
1 yr	2.1%	1.3%	1.4%	2.5%	2.9%	1.9%
> 1 yr < 3 yrs	2.9%	3.5%	2.5%	4.5%	3.6%	3.6%
3 yrs	5.4%	4.3%	4.3%	5.6%	4.7%	5.1%
> 3 yrs < 5 yrs	3.0%	2.7%	2.5%	3.2%	3.7%	3.0%
5 yrs	11.4%	12.7%	11.3%	12.7%	10.6%	11.7%
> 5 yrs < 10 yrs	10.9%	7.7%	7.0%	7.7%	10.0%	8.6%
10 yrs	20.1%	18.5%	18.1%	20.0%	20.3%	19.4%
> 10 yrs < 15 yrs	7.8%	4.9%	7.1%	6.6%	5.2%	6.4%
15 yrs	18.7%	17.2%	19.9%	11.4%	16.1%	16.7%
> 15 yrs < 20 yrs	3.2%	6.7%	8.1%	4.5%	2.3%	5.2%
20 yrs	6.5%	8.8%	12.2%	13.5%	8.3%	9.6%
> 20 yrs < 25 yrs	0.4%	4.8%	0.3%	1.0%	9.8%	2.8%
25 yrs	6.7%	5.0%	2.7%	4.1%	1.1%	4.0%
> 25 yrs	0.2%	1.5%	1.5%	2.1%	0.4%	1.1%
	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%

Factory rent weighted

	1998	1999	2000	2001	2002	Total
< 1 yr	1.5%	2.7%	1.3%	0.6%	1.9%	1.6%
1 yr	5.5%	5.7%	4.6%	4.6%	3.8%	5.2%
> 1 yr < 3 yrs	3.2%	2.4%	3.1%	3.5%	2.8%	3.0%
3 yrs	12.0%	14.8%	12.6%	14.9%	9.5%	12.7%
> 3 yrs < 5 yrs	1.9%	3.3%	1.5%	3.4%	1.2%	2.2%
5 yrs	11.5%	13.0%	25.6%	16.8%	9.3%	14.9%
> 5 yrs < 10 yrs	10.9%	11.5%	9.2%	12.1%	8.1%	10.2%
10 yrs	12.6%	14.0%	15.3%	15.1%	19.1%	15.1%
> 10 yrs < 15 yrs	6.6%	2.5%	3.4%	4.3%	3.2%	4.4%
15 yrs	10.6%	9.5%	7.8%	12.0%	12.7%	10.5%
> 15 yrs < 20 yrs	0.9%	1.0%	1.6%	0.9%	5.4%	1.9%
20 yrs	4.9%	5.9%	5.4%	1.6%	3.0%	4.2%
> 20 yrs < 25 yrs	1.1%	3.0%	2.4%	1.7%	0.6%	1.7%
25 yrs	16.4%	9.6%	4.7%	8.1%	4.2%	8.9%
> 25 yrs	0.5%	1.0%	1.4%	0.4%	15.1%	3.5%
	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%

Warehouse rent weighted

	1998	1999	2000	2001	2002	Total
< 1 yr	0.6%	0.2%	0.4%	2.6%	0.5%	0.8%
1 yr	3.2%	2.6%	2.2%	2.5%	5.5%	3.3%
> 1 yr < 3 yrs	4.0%	3.5%	5.5%	3.7%	4.0%	4.1%
3 yrs	9.2%	9.2%	9.1%	8.2%	6.6%	8.5%
> 3 yrs < 5 yrs	1.4%	3.5%	0.9%	1.7%	1.1%	1.6%
5 yrs	14.7%	18.9%	12.9%	11.8%	7.6%	12.9%
> 5 yrs < 10 yrs	12.3%	12.4%	6.0%	8.4%	3.6%	8.6%
10 yrs	15.5%	10.8%	15.9%	25.6%	15.0%	16.8%
> 10 yrs < 15 yrs	3.6%	3.2%	3.7%	6.3%	5.5%	4.3%
15 yrs	18.1%	19.7%	17.7%	16.0%	19.6%	18.2%
> 15 yrs < 20 yrs	1.4%	0.1%	2.9%	1.6%	0.5%	1.3%
20 yrs	3.9%	6.7%	2.9%	4.1%	19.6%	7.4%
> 20 yrs < 25 yrs	0.5%	0.2%	1.2%	0.0%	0.1%	0.4%
25 yrs	6.9%	8.6%	14.0%	6.8%	10.6%	9.5%
> 25 yrs	4.9%	0.3%	4.5%	0.5%	0.1%	2.1%
	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%

Retail floorspace weighted

	1998	1999	2000	2001	2002	Total
< 1 yr	0.8%	0.3%	0.5%	0.5%	0.5%	0.6%
1 yr	2.1%	1.5%	1.5%	2.9%	2.2%	2.1%
> 1 yr < 3 yrs	0.9%	0.8%	1.0%	1.4%	2.6%	1.3%
3 yrs	4.8%	5.1%	5.4%	5.2%	4.3%	5.0%
> 3 yrs < 5 yrs	1.2%	0.9%	0.7%	2.1%	0.7%	1.1%
5 yrs	8.3%	10.7%	5.4%	8.3%	6.8%	7.9%
> 5 yrs < 10 yrs	5.9%	6.1%	4.4%	5.3%	5.2%	5.5%
10 yrs	9.8%	14.3%	9.0%	9.5%	12.3%	11.0%
> 10 yrs < 15 yrs	3.8%	5.3%	3.9%	3.8%	3.2%	4.1%
15 yrs	21.1%	14.9%	22.4%	19.8%	21.8%	20.0%
> 15 yrs < 20 yrs	1.9%	1.2%	0.8%	1.6%	1.1%	1.5%
20 yrs	5.1%	12.7%	9.5%	9.1%	8.3%	8.8%
> 20 yrs < 25 yrs	1.7%	0.7%	2.7%	3.0%	1.0%	1.8%
25 yrs	22.7%	23.8%	27.8%	23.9%	17.6%	22.9%
> 25 yrs	9.7%	1.8%	5.1%	3.6%	12.4%	6.4%
	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%

Office floorspace weighted

	1998	1999	2000	2001	2002	Total
< 1 yr	0.9%	0.3%	0.8%	0.6%	1.0%	0.8%
1 yr	3.5%	1.4%	2.5%	3.0%	3.8%	2.9%
> 1 yr < 3 yrs	3.0%	3.2%	3.5%	4.2%	3.4%	3.7%
3 yrs	7.2%	8.0%	8.0%	8.3%	8.2%	8.1%
> 3 yrs < 5 yrs	3.5%	3.2%	2.8%	3.5%	2.7%	3.1%
5 yrs	14.1%	15.3%	13.9%	14.7%	11.0%	13.8%
> 5 yrs < 10 yrs	10.8%	9.5%	8.8%	7.0%	8.6%	9.1%
10 yrs	22.8%	20.8%	19.1%	25.1%	22.1%	22.1%
> 10 yrs < 15 yrs	5.8%	3.9%	6.5%	4.9%	8.1%	5.7%
15 yrs	14.3%	18.1%	14.3%	10.0%	10.9%	13.5%
> 15 yrs < 20 yrs	3.3%	4.7%	4.5%	3.1%	2.5%	3.7%
20 yrs	5.4%	5.0%	8.5%	7.1%	4.7%	5.9%
> 20 yrs < 25 yrs	0.5%	1.4%	0.7%	1.6%	7.6%	2.2%
25 yrs	4.6%	2.8%	6.0%	5.7%	5.4%	4.7%
> 25 yrs	0.4%	2.2%	0.2%	1.2%	0.1%	0.8%
	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%

Factory floorspace weighted

	1998	1999	2000	2001	2002	Total
< 1 yr	1.3%	0.3%	1.0%	0.9%	2.2%	1.3%
1 yr	5.3%	5.9%	3.4%	4.9%	4.2%	5.1%
> 1 yr < 3 yrs	2.6%	2.5%	2.8%	4.0%	2.3%	2.7%
3 yrs	12.3%	15.5%	12.9%	15.2%	10.0%	13.3%
> 3 yrs < 5 yrs	2.0%	3.5%	0.9%	3.8%	0.7%	1.9%
5 yrs	9.2%	13.1%	19.2%	10.5%	8.7%	11.8%
> 5 yrs < 10 yrs	9.7%	13.2%	7.1%	13.3%	19.1%	12.1%
10 yrs	9.8%	18.8%	15.3%	15.5%	14.5%	15.1%
> 10 yrs < 15 yrs	6.5%	2.7%	2.8%	5.0%	3.1%	4.1%
15 yrs	12.7%	10.4%	8.3%	12.2%	10.1%	10.5%
> 15 yrs < 20 yrs	0.7%	0.6%	1.8%	1.0%	12.7%	3.4%
20 yrs	4.1%	5.5%	5.6%	3.0%	2.6%	4.0%
> 20 yrs < 25 yrs	1.2%	2.0%	0.9%	2.5%	0.5%	1.3%
25 yrs	22.0%	5.6%	15.8%	8.0%	3.5%	11.4%
> 25 yrs	0.5%	0.3%	2.0%	0.3%	5.8%	1.9%
	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%

Warehouse floorspace weighted

	1998	1999	2000	2001	2002	Total
< 1 yr	0.6%	0.3%	0.3%	7.5%	0.5%	1.7%
1 yr	3.7%	2.8%	1.6%	3.4%	4.9%	3.4%
> 1 yr < 3 yrs	3.6%	4.0%	3.2%	4.2%	8.2%	4.7%
3 yrs	6.5%	9.9%	11.1%	7.1%	4.7%	7.7%
> 3 yrs < 5 yrs	1.5%	2.4%	1.3%	1.6%	1.1%	1.5%
5 yrs	17.9%	18.5%	14.7%	13.3%	8.4%	14.0%
> 5 yrs < 10 yrs	10.9%	13.4%	12.4%	13.6%	5.7%	10.8%
10 yrs	17.4%	12.9%	13.0%	20.5%	13.7%	15.9%
> 10 yrs < 15 yrs	3.4%	6.3%	5.0%	5.7%	12.3%	6.7%
15 yrs	15.4%	14.7%	17.1%	14.1%	17.1%	15.7%
> 15 yrs < 20 yrs	1.4%	0.2%	0.0%	1.2%	0.2%	0.8%
20 yrs	3.1%	4.7%	3.6%	3.4%	14.9%	6.3%
> 20 yrs < 25 yrs	0.3%	0.1%	1.3%	0.0%	0.1%	0.4%
25 yrs	6.5%	9.3%	11.9%	3.5%	8.2%	8.0%
> 25 yrs	7.8%	0.6%	3.5%	0.8%	0.1%	2.5%
	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%

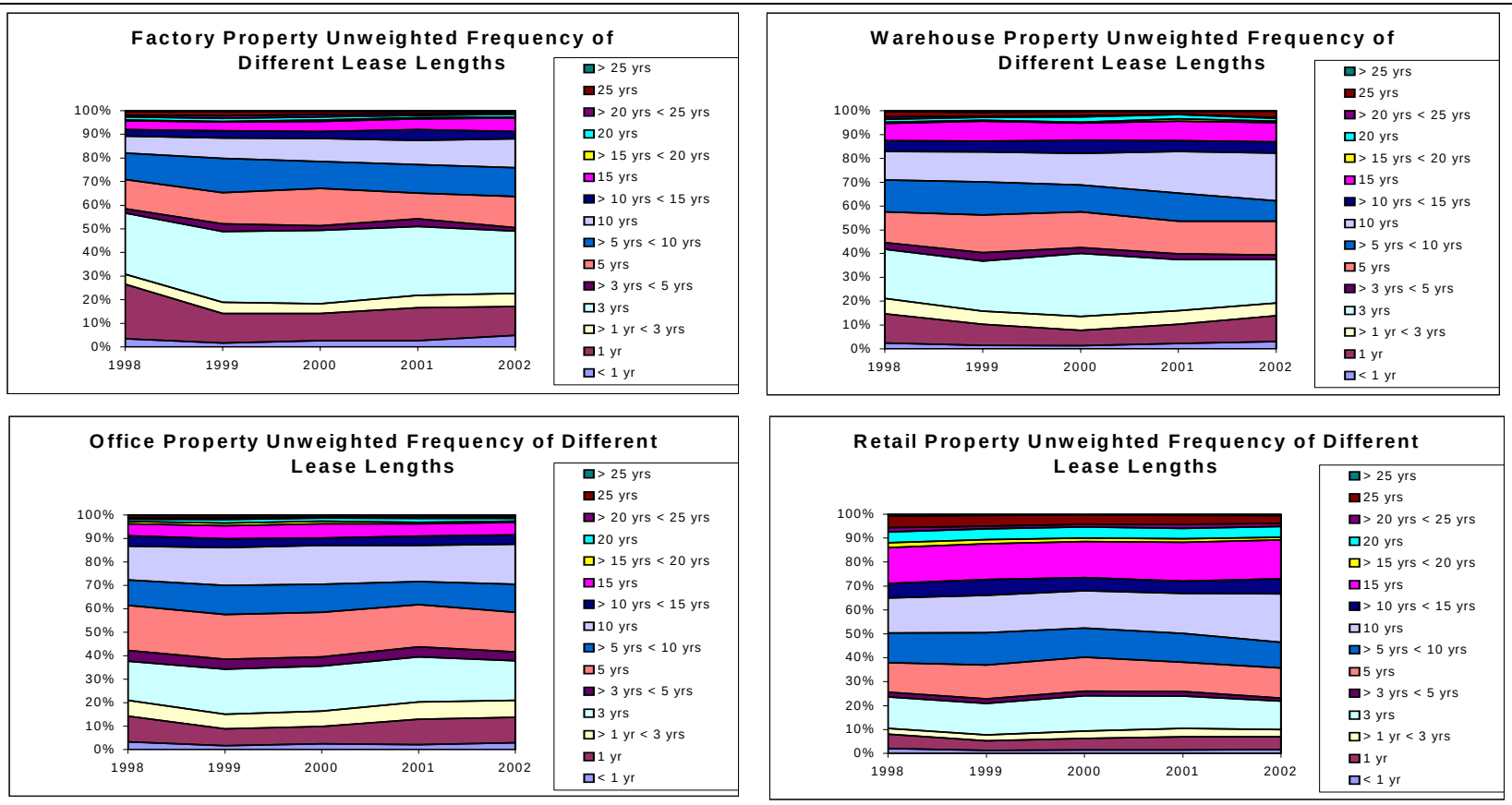

Figure A3.1: Un-weighted Distribution of Different Lease Lengths Main Property Sectors 1998 – 2002

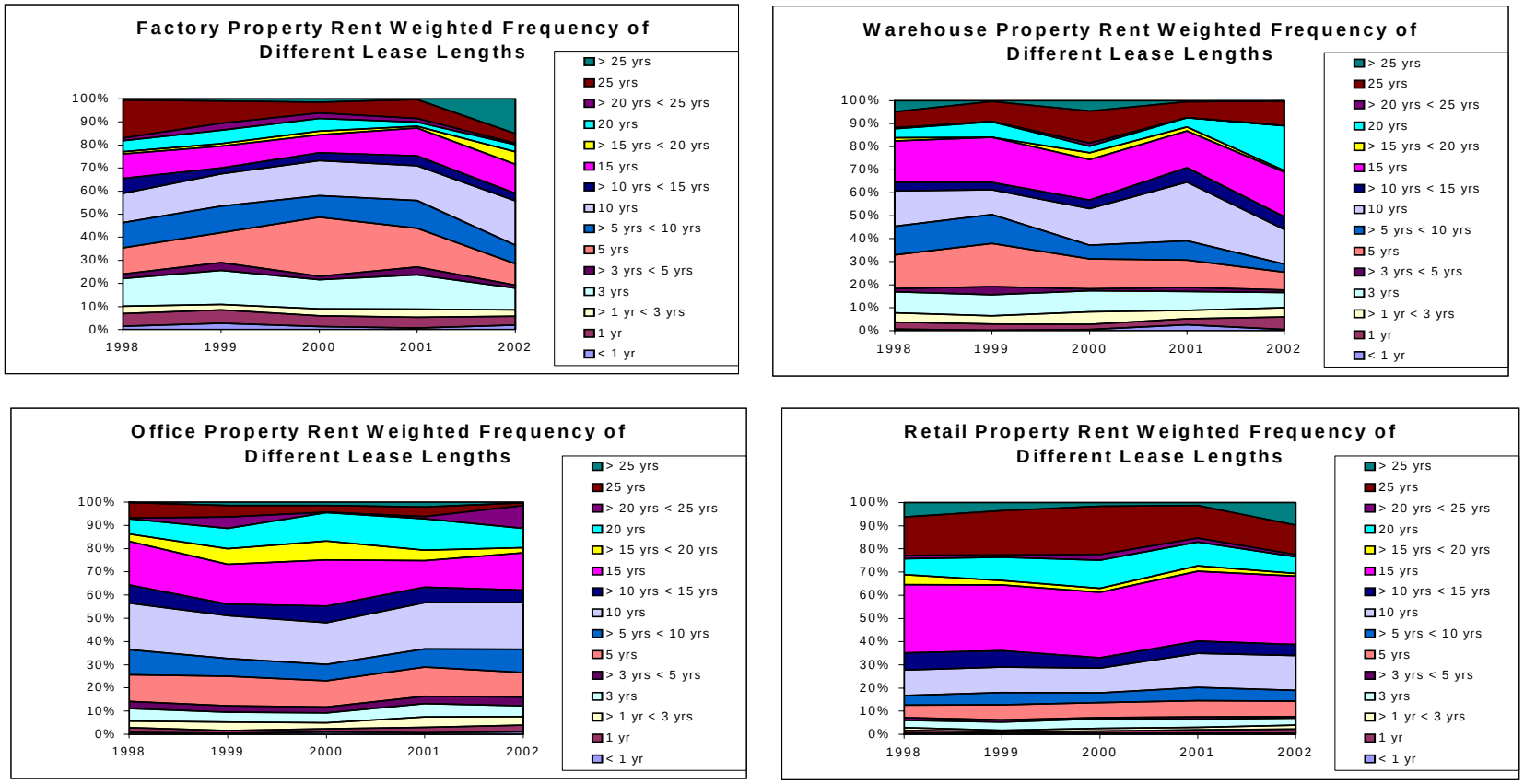

Figure A3.2 : Rent Weighted Distribution of Different Lease Lengths Main Property Sectors 1998 – 2002

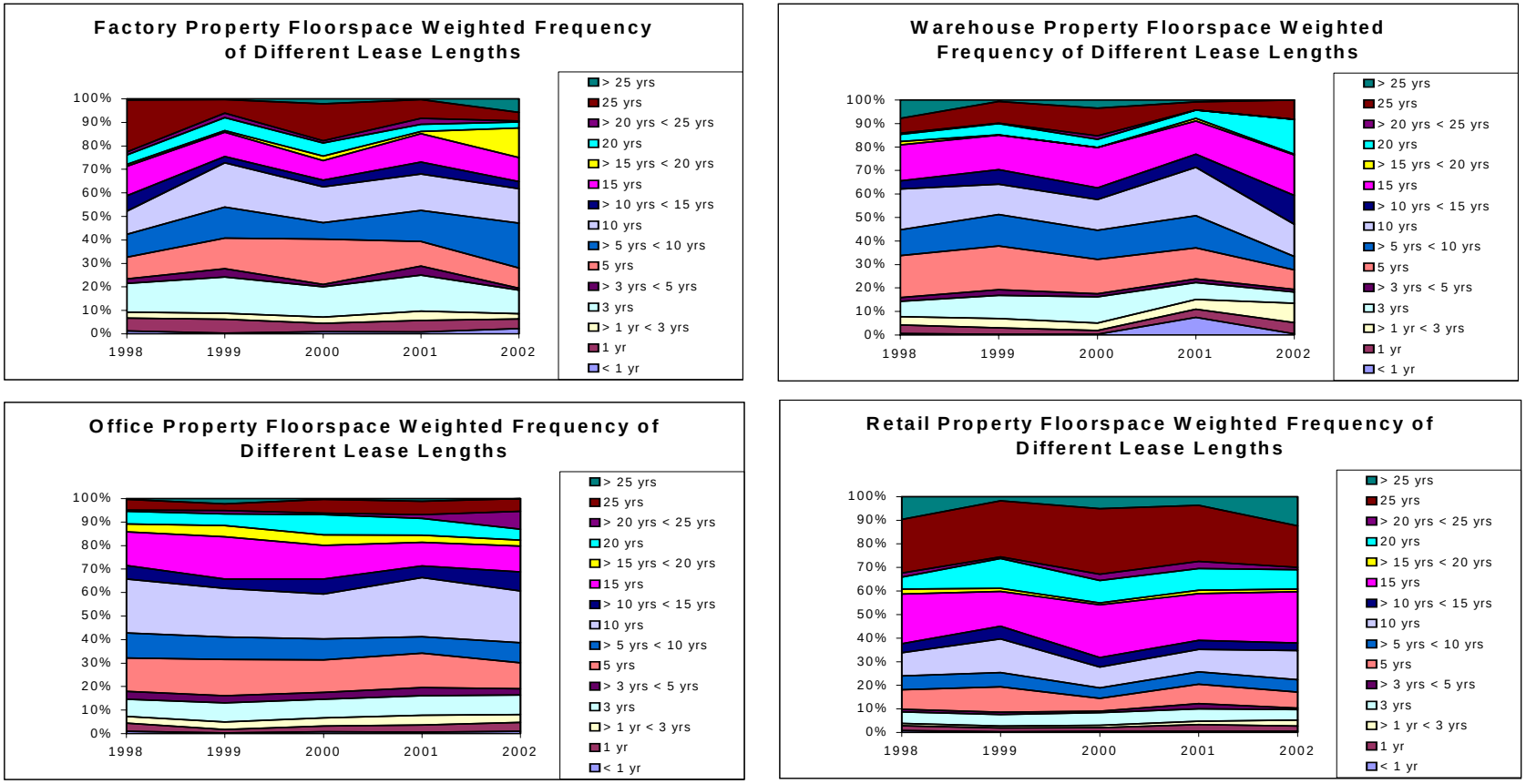

Figure A3.3 : Floorspace Weighted Distribution of Different Lease Lengths Main Property Sectors 1998 – 2002

A3.2. Frequencies of Different Review Periods

Table A3.1 - Un-weighted Frequencies of Different Rent Review Periods for Main Sectors

Factory Unweighted	**1998**	**1999**	**2000**	**2001**	**2002**	**Total**
< 1 yr	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
1 yr	21.1%	15.6%	22.0%	19.3%	13.9%	18.5%
>1 yr < 3 yrs	4.5%	4.8%	4.7%	4.2%	3.0%	4.3%
3 yrs	43.5%	47.0%	39.9%	38.6%	41.9%	42.4%
>3 yrs < 5 yrs	3.3%	4.0%	2.2%	2.5%	5.3%	3.3%
5 yrs	26.8%	28.4%	29.7%	34.9%	35.0%	30.7%
>5 yrs	0.8%	0.2%	1.5%	0.5%	1.0%	0.8%

Office Unweighted	**1998**	**1999**	**2000**	**2001**	**2002**	**Total**
< 1 yr	0.1%	0.0%	0.0%	0.0%	0.1%	0.1%
1 yr	11.2%	10.6%	12.6%	16.1%	8.9%	11.9%
>1 yr < 3 yrs	2.1%	3.5%	3.1%	4.6%	4.0%	3.4%
3 yrs	26.9%	28.7%	25.3%	22.3%	26.3%	26.2%
>3 yrs < 5 yrs	3.5%	3.1%	2.2%	3.2%	4.9%	3.3%
5 yrs	55.3%	53.3%	56.2%	52.3%	53.3%	54.2%
>5 yrs	0.9%	0.8%	0.5%	1.5%	2.5%	1.1%

Shop Unweighted	**1998**	**1999**	**2000**	**2001**	**2002**	**Total**
< 1 yr	0%	0%	0%	0%	0%	0%
1 yr	7%	6%	6%	8%	4%	6%
>1 yr < 3 yrs	2%	2%	2%	3%	3%	2%
3 yrs	29%	33%	29%	29%	30%	30%
>3 yrs < 5 yrs	4%	5%	5%	5%	5%	5%
5 yrs	57%	54%	58%	55%	58%	56%
>5 yrs	0%	1%	0%	1%	1%	1%

Warehouse Unweighted	**1998**	**1999**	**2000**	**2001**	**2002**	**Total**
< 1 yr	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
1 yr	11.2%	11.4%	11.6%	12.1%	10.7%	11.5%
>1 yr < 3 yrs	3.4%	6.1%	3.2%	4.5%	3.9%	4.2%
3 yrs	35.5%	38.0%	35.7%	30.6%	25.4%	33.7%
>3 yrs < 5 yrs	2.7%	2.3%	2.9%	1.9%	2.4%	2.7%
5 yrs	46.0%	41.2%	45.7%	50.6%	57.1%	47.0%
>5 yrs	1.2%	0.9%	1.0%	0.4%	0.5%	0.8%

Table A3.2 : Rent Weighted Frequencies of Different Rent Review Periods for Main Sectors

Factory Rent Weighted	**1998**	**1999**	**2000**	**2001**	**2002**	**Total**
< 1 yr	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
1 yr	9.4%	5.7%	9.0%	8.1%	6.6%	7.7%
>1 yr < 3 yrs	3.9%	1.5%	5.7%	3.5%	1.0%	3.2%
3 yrs	23.8%	26.8%	26.8%	23.0%	23.4%	24.8%
>3 yrs < 5 yrs	1.5%	6.3%	1.3%	1.1%	5.3%	3.0%
5 yrs	59.9%	59.2%	55.7%	63.0%	51.4%	58.4%
>5 yrs	1.4%	0.3%	1.5%	1.1%	12.3%	2.9%

Office Rent Weighted	**1998**	**1999**	**2000**	**2001**	**2002**	**Total**
< 1 yr	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
1 yr	2.9%	2.5%	2.2%	3.3%	4.3%	2.8%
>1 yr < 3 yrs	0.3%	0.8%	0.6%	1.3%	1.5%	0.8%
3 yrs	6.8%	5.5%	5.0%	9.9%	6.3%	6.8%
>3 yrs < 5 yrs	1.4%	1.4%	1.5%	1.5%	3.6%	1.7%
5 yrs	85.2%	89.2%	90.1%	83.5%	81.4%	86.4%
>5 yrs	3.3%	0.5%	0.7%	0.6%	2.8%	1.4%

Shop Rent Weighted	**1998**	**1999**	**2000**	**2001**	**2002**	**Total**
< 1 yr	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
1 yr	1.9%	1.6%	1.5%	2.0%	1.2%	1.7%
>1 yr < 3 yrs	0.4%	0.4%	0.4%	0.6%	1.2%	0.5%
3 yrs	8.2%	7.8%	5.5%	8.8%	10.2%	8.1%
>3 yrs < 5 yrs	1.4%	1.7%	1.8%	2.6%	2.9%	2.0%
5 yrs	87.9%	87.9%	90.7%	85.2%	84.1%	87.3%
>5 yrs	0.2%	0.5%	0.1%	0.8%	0.5%	0.4%

Warehouse Rent Weighted	**1998**	**1999**	**2000**	**2001**	**2002**	**Total**
< 1 yr	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
1 yr	9.5%	8.8%	2.6%	3.1%	2.6%	6.0%
>1 yr < 3 yrs	1.0%	2.4%	1.3%	1.7%	1.0%	1.4%
3 yrs	16.2%	18.0%	12.5%	12.2%	6.6%	13.0%
>3 yrs < 5 yrs	1.1%	0.7%	1.7%	0.6%	0.8%	1.1%
5 yrs	71.0%	69.5%	81.5%	82.3%	88.3%	77.8%
>5 yrs	1.1%	0.5%	0.4%	0.2%	0.7%	0.6%

Table A3.3 : Floorspace Weighted Frequencies of Different Rent Review Periods for Main Sectors

Factory Floorspace Weighted	**1998**	**1999**	**2000**	**2001**	**2002**	**Total**
< 1 yr	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
1 yr	9.4%	6.1%	8.3%	7.7%	11.1%	8.3%
>1 yr < 3 yrs	4.6%	1.7%	6.1%	4.4%	1.7%	3.8%
3 yrs	21.6%	28.6%	24.7%	24.2%	24.4%	24.3%
>3 yrs < 5 yrs	2.2%	5.8%	0.5%	1.3%	4.2%	2.6%
5 yrs	60.9%	57.4%	58.9%	59.8%	49.6%	58.4%
>5 yrs	1.4%	0.5%	1.5%	2.7%	9.1%	2.6%

Office Floorspace Weighted	**1998**	**1999**	**2000**	**2001**	**2002**	**Total**
< 1 yr	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
1 yr	4.8%	4.9%	4.1%	4.9%	2.7%	4.4%
>1 yr < 3 yrs	0.4%	2.4%	1.1%	1.8%	1.2%	1.3%
3 yrs	12.3%	12.5%	11.8%	13.1%	13.2%	12.9%
>3 yrs < 5 yrs	2.0%	1.3%	2.0%	1.7%	2.2%	1.8%
5 yrs	79.3%	78.4%	79.7%	77.2%	77.2%	78.2%
>5 yrs	1.2%	0.5%	1.3%	1.3%	3.5%	1.3%

Shop Floorspace Weighted	**1998**	**1999**	**2000**	**2001**	**2002**	**Total**
< 1 yr	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
1 yr	3.4%	7.8%	2.3%	3.6%	2.0%	4.1%
>1 yr < 3 yrs	0.6%	0.7%	0.7%	1.0%	1.2%	0.8%
3 yrs	21.2%	12.2%	9.0%	13.2%	11.6%	14.3%
>3 yrs < 5 yrs	1.6%	1.8%	1.6%	2.6%	2.8%	1.9%
5 yrs	73.0%	77.0%	85.2%	78.0%	81.4%	78.0%
>5 yrs	0.2%	0.5%	1.2%	1.5%	1.0%	0.8%

Warehouse Floorspace Weighted	**1998**	**1999**	**2000**	**2001**	**2002**	**Total**
< 1 yr	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
1 yr	10.3%	11.7%	3.1%	3.1%	6.1%	7.4%
>1 yr < 3 yrs	1.5%	3.3%	1.8%	1.7%	0.8%	1.7%
3 yrs	27.3%	24.2%	13.7%	15.2%	8.1%	17.6%
>3 yrs < 5 yrs	2.0%	1.8%	1.4%	0.7%	0.5%	1.3%
5 yrs	57.7%	58.4%	79.2%	79.0%	83.7%	71.2%
>5 yrs	1.2%	0.5%	0.8%	0.3%	0.8%	0.7%

A3.3. Weighted and Un-weighted Incidence of Repairing Liabilities 1998–2002 by Main Property Sectors

Unweighted

Factory	1998	1999	2000	2001	2002	Total
FR Landlord	13.8%	11.5%	14.2%	14.3%	15.0%	13.5%
IR Tenant	41.7%	40.1%	38.1%	41.4%	37.5%	40.9%
FR Tenant	44.5%	48.4%	47.7%	44.4%	47.6%	45.5%

Office	1998	1999	2000	2001	2002	Total
FR Landlord	20.7%	20.4%	21.8%	23.9%	22.2%	21.8%
IR Tenant	40.4%	42.3%	43.8%	45.0%	45.1%	42.8%
FR Tenant	38.9%	37.3%	34.4%	31.1%	32.7%	35.4%

Shop	1998	1999	2000	2001	2002	Total
FR Landlord	8.1%	7.5%	7.3%	7.9%	7.4%	7.7%
IR Tenant	40.9%	42.8%	43.6%	46.0%	43.1%	43.1%
FR Tenant	51.0%	49.7%	49.1%	46.1%	49.5%	49.1%

Warehouse	1998	1999	2000	2001	2002	Total
FR Landlord	12.9%	9.2%	9.4%	11.7%	9.9%	10.7%
IR Tenant	32.7%	35.9%	34.5%	33.9%	33.7%	34.4%
FR Tenant	54.3%	54.9%	56.1%	54.4%	56.4%	54.9%

Rent Weighted

Factory	1998	1999	2000	2001	2002	Total
FR Landlord	6.7%	4.7%	6.8%	7.0%	9.5%	6.8%
IR Tenant	22.4%	25.2%	24.8%	26.2%	19.6%	23.9%
FR Tenant	70.9%	70.0%	68.3%	66.8%	71.0%	69.2%

Office	1998	1999	2000	2001	2002	Total
FR Landlord	10.3%	7.8%	10.4%	15.4%	8.8%	10.6%
IR Tenant	27.2%	28.7%	32.2%	35.2%	38.6%	31.6%
FR Tenant	62.5%	63.5%	57.4%	49.4%	52.7%	57.7%

Shop	1998	1999	2000	2001	2002	Total
FR Landlord	6.5%	8.2%	4.1%	5.3%	5.6%	6.2%
IR Tenant	24.0%	28.1%	24.9%	34.4%	29.9%	27.6%
FR Tenant	69.5%	63.6%	71.0%	60.2%	64.5%	66.2%

Warehouse	1998	1999	2000	2001	2002	Total
FR Landlord	5.7%	2.8%	3.4%	5.6%	3.1%	4.5%
IR Tenant	16.2%	19.7%	14.8%	15.6%	10.9%	15.6%
FR Tenant	78.1%	77.4%	81.8%	78.8%	86.0%	79.9%

Floorspace Weighted

Factory	1998	1999	2000	2001	2002	Total
FR Landlord	5.2%	4.8%	5.7%	8.6%	9.7%	6.4%
IR Tenant	19.7%	21.0%	22.9%	27.2%	23.3%	22.6%
FR Tenant	75.1%	74.2%	71.4%	64.2%	67.0%	71.0%

Office	1998	1999	2000	2001	2002	Total
FR Landlord	9.5%	9.5%	10.1%	13.6%	9.4%	10.3%
IR Tenant	31.3%	35.9%	34.7%	37.4%	37.4%	34.9%
FR Tenant	59.2%	54.5%	55.2%	48.9%	53.2%	54.7%

Shop	1998	1999	2000	2001	2002	Total
FR Landlord	4.5%	5.5%	7.3%	7.2%	6.2%	5.9%
IR Tenant	24.7%	31.1%	26.5%	32.6%	26.9%	28.3%
FR Tenant	70.9%	63.4%	66.2%	60.2%	66.9%	65.8%

Warehouse	1998	1999	2000	2001	2002	Total
FR Landlord	6.1%	4.0%	2.8%	6.5%	3.0%	4.8%
IR Tenant	15.1%	16.5%	15.1%	13.0%	12.0%	14.7%
FR Tenant	78.8%	79.5%	82.1%	80.5%	84.9%	80.5%

Appendix Four : Lease Incentives Examples

Example - A 2 year rent free period, supported by a £50,000 capital payment, including a normal fitting out period on a 15 year lease with upwards-only market reviews every 5 years. The rent agreed for the 3 years of the lease to first review after the rent-free period expires is £100,000 pa. Assume an all-risks yield of 7%.

Method 1 – Rent and value apportionment not assuming time value of cash flows

(a) To first review only

Value of Headline rent -	100,000 x 3 years =	£300,000
Less value of capital payment		£50,000
Net value of Headline rent less capital payment		£250,000
Value of equivalent rent = value of headline rent less incentives		£250,000
Spread over the full five-year term less fitting out period	- Divide by	4.75
Equivalent Rent		£52,632 pa

(b) To end of lease

Value of Headline rent -	100,000 x 13 years =	£1,300,000
Less value of capital payment		£50,000
Net value of Headline rent less capital payment		£1,250,000
Value of equivalent rent = value of headline rent less incentives		£1,250,000
Spread over the full five-year term less fitting out period	- Divide by	14.75
Equivalent Rent		£84,746 pa

Method 2- Rent and value apportionment assuming time value of cash flow utilising traditional valuation principles (current rents and rental values capitalised at equivalent yields implying any future value change).

(a) To first review only

Present Value of Headline Rent - 100,000 x YP 3 years in 2 years @ 7%	£229,218
Less value of capital payment	£50,000
Net value of Headline rent less capital payment	£179,218
Value of equivalent rent = value of headline rent less incentives	£179,218
Divide by YP 4.75 years x PV 0.25 yrs @7%	3.8606
Equivalent Rent	£46,422 pa

(b) To end of lease

Present Value of Headline Rent - 100,000 x YP 13 years in 2 yrs @ 7%	£729,990
Less value of capital payment	£50,000
Net value of Headline rent less capital payment	£679,990
Value of equivalent rent = value of headline rent less incentives	£679,990
Divide by YP 14.75 years x PV 0.25 yrs @7%	8.8683
Equivalent Rent	£76,676 pa

Method 3 – Comparison by reference to effect on investment value using traditional techniques

Headline rent	£100,000
YP Perp @ 7% deferred 2 yrs	12.4777
	£1,247,770
Less capital payment	£50,000
Valuation	£1,197,700
Net effective rent	£x
YP Perp @ 7% deferred 0.25 yrs	14.0461
	14.0461x

x = 1197700/14.0461

Net effective rent	£85,269 pa

Since the investment let at the headline rent is over-rented (in comparison with the rent-review rental value), it is arguable that a higher capitalisation yield should be applied. Using an 8% ARY in the headline rent capitalisation reduces the net effective rent to £72,737 pa.

Method 4 – Discounted cash flow - Rent and value apportionment assuming time value of cash flow utilising equated yields and explicit rental growth rates.

(a) To first review only

Present Value of Headline Rent - 100,000 x YP 3 years in 2 years at 9%	£213,054
Less value of capital payment	£50,000
Net value of Headline rent less capital payment	£163,054
Value of net effective rent = value of headline rent less inducements	£163,054
Divide by YP 4.75 years x PV 0.25 yrs @ 9%	3.6528
Net effective Rent	£44,648 pa

(b) To end of lease

The complications start here. To assess the value of the headline rent over the 15 years, the rent at review must be interpreted. The market rent at first review is the higher of the then net effective rental value or the existing headline rent, as the review is upwards only.

Immediately the illogical basis of any set write off period is exposed. If the net effective rental value rises above the headline rent by first review, the rent under either scenario is the market rental value for the second and third five-year periods of the lease. There is no difference in cash flow value so any inducement is therefore written off only to the first review. But if the headline rent is not overtaken at the first review by the then net effective rental value, the headline rent still operates over the second review period and the inducement has therefore to be written off over the longer period; and, if the net effective rental value does not rise above the headline rent by the expiry of the second five-year period, the write off period will be extended still further. Assessing the write off period has therefore nothing to do with opposing philosophies of landlord or tenant, it is a financial calculation according to the circumstances. The larger the package of inducements, the more likely it is that they will last beyond the first review. The calculations require an element of iteration as the rental growth is applied to the net effective rental value, the issue being investigated.

If it is assumed that the net effective rent is £44,648 and that rental growth is 2% per annum then it is obvious that the headline rent will not be overtaken by year 5 (£44,648 x $(1.02)^5$ = £49,295). So the write off period must extend to 10 years at least.

Value of headline rent over 10 years = 100,000 x YP 8 years in 2 years @ 9% =	£465,845
Less Capital payment	£50,000
Value of headline rent package over 10 years	£415,845

Value of net effective rental value over the first 10 years of the lease

Rental value	£x pa	
YP 4.75 years in 0.25 years @ 9%	3.6528	3.6528x
Rental value in 5 years £x $(1.02)^5$	1.1041x	
YP 5 yrs x PV 5 yrs @ 9%	2.5280	2.7912x
Value of first ten years of net effective rent		6.4440x

If the value of packages are equal then £415,845 = 6.4440x : Net effective rent (x) = £64,532

If the write off period is indeed 10 years then the net effective rent would have to rise from £64,523 pa to £100,000 over the next ten years. At 2% pa the increase is in fact to:
£64,532 x $(1.02)^{10}$ = £78,665 pa.

The write off period is therefore the full 15 years in this case.

Value of headline rent over 15 years = 100,000 x YP 13 years in 2 years @ 9% =	£630,158
Less Capital payment	£50,000
Value of headline rent package over 10 years	£580,158

Value of net effective rental value over the 15 years of the lease

Rental value	£x pa	
YP 4.75 years in 0.25 years @ 9%	3.6528	3.6528x
Rental value in 5 years £x $(1.02)^5$	1.1041x	
YP 5 yrs x PV 5 yrs @ 9%	2.5280	2.7912x
Rental value in 10 years £x $(1.02)^{10}$	1.2190x	
YP 5 yrs x PV 10 yrs @ 9%	1.6430	2.0029x
Total value of first 15 years at net effective rent		8.4469x

£580,158 = 8.4469x Therefore x = 580,000/8.4469

Net effective rent £68,683 pa

After 5 years the net effective rent is £68,683 x 1.1041 = £75,833

After 10 years the net effective rent is £68,683 x 1.2190 = £83,727

At each review the headline rent is retained under the upwards only provision in the lease and so the inducements do indeed last for the full term, although the difference is reduced at each review in the notional net effective rent lease.

In this case, after 15 years, the net effective rental value has still not reached the headline rent of £100,000 as it is still, on these assumptions, only £92,438 pa.

Alternative solution based on explicit growth forecast

Rather than adopting a constant compound growth rate, the valuer may consider that the perception of the parties was that the net effective rent will recover significantly over the first five years

Rental value	£x pa	
YP 4.75 years in 0.25 years @ 9%	3.6528	3.6528x
Plus Rental value in 5 years, say	£90,000	
YP 5 yrs x PV 5 yrs @ 9%	2.5280	£227,520
Plus Rental value in 10 years £90,000 x $(1.02)^5$	£99,369	
YP 5 yrs x PV 10 yrs @ 9%	1.6430	£163,263
Total value of first 15 years at net effective rent	3.6528x + £390,763	

£580,158 = 3.6528x + £390,763 Therefore x = 189,375/3.6528
Net effective rent £51,844 pa

Summary of Results

	M1 – Straight line	M2 - Traditional	M3 – Asset value	M4 - DCF
To first review	£52,632	£46,422		£44,648
To end of lease	£84,746	£76,676	£85,269	£68,683

The above extract from the RICS (2004) forthcoming information paper does show that practice papers do have some level of sophistication in assessing lease incentives but also the information paper makes it clear that this sophistication is not expected to be used in other than the largest cases dealing with institutional standard property.

Appendix Five - IPD Lease Pricing Analysis[8]

A5.1 Introduction

The aim of the study in this appendix was to discover whether any evidence could be obtained from the commercial lease data held by Investment Property Databank (IPD) for the pricing of the lease package. Specifically, once other factors were controlled for, the research looked at whether and how the length of the lease and other features and incentives agreed between a landlord and tenant affected the rent that was then set by the parties.

The Appendix presents both the methodology adopted to investigate this question and the results obtained from its application. Three distinct sub-markets were investigated, each drawn from a key sector of the UK commercial property market. In two different periods, 1998 and 2002, all new leases in those sub-markets for which there was sufficient information were tested. The testing process is presented in an organic sequence that shows how the modelling took place, which will enable the reader to follow through and evaluate the steps in the process as the model is constructed.

A5.2 The Methodology

In this section, the methodology that was adopted for testing the affect of lease lengths on the rent of new leases is presented. Cross-sectional regression methods have been used so that the effects of lease lengths and other factors can be measured and tested for significance. Firstly, though, some of the issues and obstacles to modelling leases are discussed, as these inevitably affected the models that were constructed. Our initial theoretical models are then outlined and the process for testing these is set out. Finally, the section ends with a discussion of the data and variables used in the analysis.

A5.2.1 Issues in Modelling Lease Pricing

There are a number of issues to be considered when trying to model the rent agreed for new leases. These generally fall into two camps. One set of issues is related to defining the sample of leases to be tested. The other set is about measuring and controlling for the characteristics of the properties involved.

Sample selection issues

- Spatial aggregation: ideally, for good estimation and validity of the results, the sample of new leases needs to be as large as possible. However, an important factor to control for in this kind of analysis is location. The location of a property will have an enormous influence on rental level, potentially enough to obscure the effect of other factors. This is true both at a macro scale, with variations in rent between different towns and regions, and

[8] This paper has been prepared by Steven Devaney and James Crutcher in accordance with a specification agreed within The University of Reading and Investment Property Databank Research Team. Steven is the IPD Research Officer based at the University of Reading and James Crutcher is Research Officer for IPD.

at a micro scale, with, for example, large variations between high street and suburban locations within the same town. Therefore, the area from which the sample of new leases is drawn needs to be small in order to minimise locational impact. The smaller the area chosen, though, the less evidence there will be available for analysis within a particular period. Hence there is a tension between controlling for location and obtaining a large sample.

- Temporal aggregation: another important influence on rent is the time period in which the lease is negotiated. Our interest is in comparing leases that start in the same period, but which have different lengths, so a cross-sectional model has been chosen. However, even with a cross-sectional approach, temporal aggregation is still an issue. This is because there is insufficient letting evidence within the space of a day or even a month on which analysis can be done. The actual window used in this analysis is one year. It can be seen, though, that there might be significant changes in market conditions within the space of a year. So once again, there is a tension, this time between sample size and keeping the time window short. The problem is similar to that faced in the construction of transaction indices, where the aim is to capture market movement at a single point, but a wide time frame is needed for sufficient sale evidence to be available (see Geltner & Miller (2001) for a discussion).

- Sample selection bias: another issue to be borne in mind is that the quality of units leased may vary in a non-random manner from period to period depending on market conditions and other factors. This is not so problematic for analysis of a single cross-section, but it may be an issue when making comparisons between the 1998 and the 2002 results. Sample selection bias is another issue that is discussed widely in the transaction index literature; for instance, see Gatzlaff & Haurin (1997).

Issues relating to property characteristics

- Heterogeneity: even with time and location controlled for, there will still be large variations in the rents agreed on buildings. This is due to the unique features of each property and unit such as construction, condition of the premises and internal spatial configuration. These factors cannot practically be controlled for by restricting the sample. Therefore, some of them must be included as variables within the regression and modelled alongside lease lengths.

- Omitted variables: there will be some characteristics which are not measurable or for which data has not been collected. Not all of these will have a significant effect on rent, but the possibility of bias arising from omitted variables is present. An example of such a variable is occupancy costs. It can be seen that if the occupancy costs of a building relative to others are high, then the rent negotiated might be lower than that of the comparable properties to reflect the added costs that the tenant will have to bear. However, data on occupancy costs is not collected by IPD[9]. Another

[9] Some data is collected by OPD, but this cannot be matched to IPD tenancy records.

example is repair clauses, with no data held on whether leases have FRI or internal repairing and insuring clauses. In such cases, part of the effect (if any) of the missing variables will be reflected in the coefficients of the other variables or captured by the regression's constant term.

- Multicollinearity: this is where two or more explanatory variables are highly related to one another. So, for instance, the age of a building is likely to partly determine its condition. However, both are also likely to have a significant (but not identical) affect on agreed rent. In such cases, the coefficients may not reflect the independent influence of each factor and the power of the statistical tests is weakened.

These are some of the main issues in trying to model lease rents. However, there are still other factors that might be difficult to control for, which could also have been discussed, such as the particular characteristics of the landlords or tenants. It can be seen from the above discussion that modelling rents is not a straightforward process.

A5.2.2 Our Theoretical Models

Bearing the above issues in mind, three segments were chosen in which there were sufficient new leases agreed within one year and in which there might be a reasonable degree of spatial homogeneity. These were Southern Industrials, Southern Shops and West End Offices. The basic theoretical model that we aimed to apply in each of these segments was as follows:

Rent = *f* (building characteristics, location characteristics, tenant characteristics, lease structure)

This model is for rent at a particular point in time and for an individual letting. It is also a model for the actual rent agreed on a particular unit and not the asking rent or a rental figure for a whole property. It is important to note that if we had been modelling across time, then demand and supply factors would also have had to be taken into account[10].

The model is similar to that adopted by Dunse and Jones (1998) in a previous study of office rents, except that here, the influence of tenant characteristics is recognised because of the use of actual rents, whereas their model used asking rents and only included the first two factors (though tenure rights were recognised as a potential rent determinant). However, the data on tenant characteristics was only available for the 2002 samples and not for all leases in those samples. Therefore, in practice, the model used was as follows, though sub-samples that had the tenant data were tested using the tenant data as well.

Rent = *f* (building characteristics, location characteristics, lease structure)

The actual models tested were more complicated than this theoretical model might suggest. This is because for each set of characteristics, several variables are required

[10] As it is, we are probably making an assumption that the prevailing demand and supply conditions are affecting all units in the sample equally. It may be that this is unrealistic, particularly given the temporal aggregation issue mentioned earlier.

to capture the different effects. The variables chosen vary between segments to reflect inherent segment differences and they are outlined in more detail in section A5.2.4. The models are essentially "hedonic" models of rent in that they quantify the impact of the various characteristics. In reality, we are interested in the impact of the lease structure variables (such as length, break clause and rent free period), but the other characteristics must be included in order for the true impact of lease structure to be discerned.

Hedonic models are well established in the Real Estate literature, being applied in housing studies, for the construction of transaction indices, for mass appraisal and in the measurement of environmental impacts on values. However, there are few hedonic models of rent and very few that have used lease structure variables. Reviews of the literature that exists can be found in Dunse and Jones (1998) and Wheaton and Torto (1994).

An alternative set of models were also tested. These used the yield of the property as a proxy for the building and some of the micro-location characteristics. The reasoning here was that a lot of the physical and locational attributes are taken into account by valuers when a property is valued. Therefore, rather than try and quantify all those different factors individually for rent modelling, the yield could be used instead, giving a simpler and more efficient model. It may also have advantages in capturing a number of influences which are otherwise difficult to quantify. For instance, the appearance of a building may have a very real effect on rents, but it would be difficult and time consuming to measure in a variable of its own. The general model applied was as follows:

$$\text{Rent} = f(\text{yield, lease structure})$$

The yield measure used was the equivalent yield of the property before it was let. This was selected for two reasons. Firstly, it is necessary to use yield before letting as any measurement made afterwards will reflect the income and lease structure in place and so could frustrate separate identification of the effect of length and other factors. Secondly, no yield information was available at the tenancy level, so a property level yield had to be used.

However, though the yield model appears an attractive alternative to the hedonic model that was described above, several problems were encountered during the testing. The yield models for the segments had much lower explanatory power than their hedonic counterparts and, in some cases, the yield variable itself was not significant, casting doubt on its ability as a proxy for other factors. This in turn raises doubts about whether the results for the lease factors are 'true' results or are influenced by missing factors, not accounted for in the specification. Also, it can be seen that there are other reasons why the property yield might be deficient. For instance, while it should not reflect the current tenancy (being measured from up to 12 months before the letting), if the property is multi-let, the yield will take other tenants and lease arrangements into account. So it will not only be proxying for property factors, but also for other things that do not belong in our model of rent at all. Also, in the multi-let case, the yield can miss individual unit characteristics whereas the hedonic model has the potential to include them (a good example of this is unit floorspace – see section A5.2.4).

Hence, although the original plan was to present the results of two different types of model for each segment, a hedonic model and a yield-based model, only the results from hedonic models are presented in this report, as output from the yield models could not be relied upon.

A5.2.3 The Modelling Process

All the modelling for this investigation was carried out within a linear framework. This has advantages in terms of ease of interpretation, although sometimes in the hedonic literature, log-linear or Box-Cox specifications are applied for improved model performance (see Bond, 2001). Any potential non-linear relationships were dealt with by transforming individual explanatory variables.

A general-to-specific approach to the modelling was adopted. The idea in this approach is to enter as many of the potential variables as possible into the first estimation and then eliminate variables that do not contribute significantly to model explanation. Variables are dropped in stages rather than all at once, because when some are removed, the coefficients and t-statistics of the others can change, particularly if to begin with, multicollinearity is present. The aim is to arrive at a model where all remaining variables are significant and which is fairly straight-forward.

The relevant test for deciding whether a single variable should be dropped is the t-statistic and associated p-value. However, in the early stages, it is usually possible to drop a number of variables at once, in which case, a joint significance test needs to be applied. The test that was chosen for this analysis was the Wald test (also known as the F-test). This compares what is termed an unrestricted model (the model before removing variables) with a restricted model (the model after variables have been dropped). The resulting test statistic follows an F-distribution and its p-value can easily be calculated.

For each model during the process, model selection criteria were calculated. These are tests that evaluate the performance of the model relative to both the amount of explanation and the number of variables used. The simplest of these is the adjusted r^2, but this is not a particularly powerful test, so three others were also calculated – the Akaike Information Criterion (AIC), the Finite Prediction Error (FPE) and the Schwarz Bayesian Criterion (SBC)[11]. As a model improves, the scores produced by these tests get smaller. In most, but not all cases, the three tests reached the same conclusions.

Diagnostic tests were performed on the regression residuals to test whether each model satisfied the basic statistical assumptions under which coefficients and significance tests can be relied upon. These were the Shapiro-Wilk test for normality (Shapiro & Wilk, 1965) and the Breusch-Pagan test for heteroscedasticity (Breusch & Pagan, 1979). Checks were also made for the presence of multicollinearity in the models using the correlation matrices of the estimators and these checks are mentioned where appropriate.

[11] The references for these tests can be found in Ramanathan (1998)

Finally, a simple test for temporal aggregation problems was carried out at the outset of each modelling run. It tested the assumption that a year is a reasonably homogeneous time period over which new lease evidence can be assessed. Dummy variables were constructed for the month in which each unit was let. These were then entered into the initial regression and their joint significance was tested. The null hypothesis was that the coefficients (the effects on rent) were all equal to zero. If this was rejected, then this indicated that the use of an annual time frame could be problematic in the case of that sample. However, the actual modelling of rent per m² always proceeded without the month dummies (if unclear, see steps in section A5.3).

A5.2.4 Data and variables used

The starting point for data collection was to identify all new leases for each of the years in the segments of interest. Then, from this sample, some leases had to be dropped. General filters were applied to remove records with data missing from essential fields and non-market leases, such as headleases. After this, further filters were applied so that the data met the specific requirements of the model. For instance, as the dependent variable in the model is rent per m², any unit where floorspace was not recorded had to be dropped. Some leases with non-standard features such as stepped rent increases were also removed. The number of new leases left in each segment after this process is shown in Table A5.1.

Table A5.1: Sample sizes in each of the Segments after filtering

	1998	**2002**
Southern Shops	161	118
West End Offices	126	134
Southern Industrials	172	308

The table shows the *maximum* number of new leases that were available for analysis. In the actual models, though, fewer observations were used. This was because not all the leases had entries for all the variables. The most important variable in this respect was age. The age of the property in which the letting took place was found to be an important factor in explaining the rent per m². However, the date of construction, which was needed for the age calculation, was only available for approximately half of the records. Then, during the modelling process, some other observations were identified as outliers and had to be removed. The number of observations in the final models is shown in Table A5.2.

Table A5.2: Number of observations used in the final models

	1998	2002
Southern Shops	100	68
West End Offices	94	65
Southern Industrials	104	187

Another issue encountered while defining the samples relates to rent free periods. Where a rent free period has been granted, this causes the dependent variable, rent passing, to be zero until such period has expired. Therefore, if at the time the data was recorded[12], the rent free period is still in operation, the lease in question cannot be included in the samples. As IPD do not keep a time series of rent at the tenancy level, the rent in these cases could not be identified from later records. However, it may be possible to obtain the unknown rent figures by searching the subsequent year's frozen cross-section (i.e. the 1999 and 2003 tenancy files) and this is something we will be seeking to address for the final report.

The actual variables calculated and used in the analysis are shown in Table A5.3. Some of them are specific to a particular segment or year and some are alternatives to each other, such as age and ln(age). The agreed contract rent was chosen as the dependent variable due to the purpose of the modelling exercise. There is some discussion in the literature as to whether this is an appropriate measure to use (Dunse and Jones, 1998), but our aim was to model the impact of lease terms and incentives explicitly, so it was more appropriate in this case than either asking rents or effective rents. The contract rent was then divided by the size of the building in each case, as leaving rent in levels would simply show that more rent is paid on bigger buildings.

Despite using rent per m², though, the floorspace of the let unit was still included as one of the explanatory variables. This is because it could have an influence on rent beyond that of a simple multiplier. The precise nature of the influence is uncertain and could vary between locations and periods (Wheaton and Torto, 1994). In certain circumstances, large units could attract a premium where decent blocks of space are in short supply. On the other hand, they may suffer a discount, as the target market for such space may be more restricted.

The influence of floorspace may also be non-linear. For example, for a large unit, the effect on rent of an extra 10 m² is likely to be less than for a small unit. Such a relationship implies diminishing marginal benefits (Bond, 2001). Therefore, it may be more appropriate to use a log transformation of floorspace that takes into account this particular kind of non-linearity. Similarly, in the case of age, the effect on rent of a building being 5 years older than another may be less when they are 30-40 years old than for when they are 5-10 years old. So log version of both floorspace and age were tested and they were used where they provided more explanation.

[12] Most information is collected as at December. So this means that if a lease is granted in June of a particular year with a 3 month rent free period, then that period will have expired by data collection and the rent will be available to use. However, if it is granted with a 9 month rent free period, the rent will still show as zero in December and the record cannot be used.

Table A5.3 : Variables tested during the Modelling Process

Variable	Description	Availability	Units	For
Rentpersqm	Rent passing on the lease divided by the unit's floorspace	Defines sample	£ / sq m	All Prop
Independent variables				
Lease characteristics				
Lengthyrs	Length of lease (full term)	All	Years	All Prop
Length2yrs	Length to expiry or break	All	Years	All Prop
Breakclause	Dummy variable: 1 if break exists, 0 otherwise	All	0/1	All Prop
Rentfree	Length of rent free period if granted	All	Months	All Prop
Norentrev	Dummy: 1 if no rent review, 0 otherwise	All	0/1	All Prop
Revcycle	Dummy variable: 1 if non-standard, 0 if five year or none	All	0/1	Ret/Ind
Building characteristics				
Floorunit	The floorspace of the leased unit	All	sq m	All Prop
Floorunitln	Natural log of unit floorspace (for non-linear r/ship)	All	Ln(sq m)	All Prop
Age	Calculated from date of construction	Half of samples	Years	All Prop
Ageln	Natural log of age variable (for non-linear relationship)	Half of samples	Ln(years)	All Prop
New	Dummy variable: 1 if built in last 5 years, 0 otherwise	Half of samples	0/1	All Prop
Old	Dummy variable: 1 if over 20 years old, 0 otherwise	Half of samples	0/1	All Prop
Retailold	Alternative age dummy: 1 if over 40 years old, 0 otherwise	Half of samples	0/1	Retail
Capexprop	Amount of capital expenditure as a % of property value	All	%	All Prop

Cappropadj	Capex with newly developed props set to 0	All	%	All Prop
Singlelet	Dummy: 1 if property is let to a single tenant, 0 otherwise	All	0/1	All Prop
Tenant characteristics				
Score	Tenant covenant score (from Dun & Bradstreet info)	2002 data only	0 to 100	All Prop
Internat	Dummy: 1 if let to an international tenant, 0 otherwise	2002 data only	0/1	All Prop
Tenant types	Based on SIC Codes or IPD Retail categories	2002 data only		All Prop
Rettype1	Dummy: 1 if let to clothing / footware retailer, 0 otherwise	2002 data only	0/1	Retail
Rettype2	Dummy: 1 if let to mobile phone retailer, 0 otherwise	2002 data only	0/1	Retail
Offtype1	Default Dummy: let to manufacturer/primary industry	2002 data only	N/A	Office
Offtype2	Dummy: 1 if let to Wholesale/Retail trade, 0 otherwise	2002 data only	0/1	Office
Offtype3	Dummy: 1 if let to Service sector, 0 otherwise	2002 data only	0/1	Office
Offtype4	Dummy: 1 if let to Financial Services, 0 otherwise	2002 data only	0/1	Office
Offtype5	Dummy: 1 if let to Public/Government, 0 otherwise	2002 data only	0/1	Office
Indtype1	Default Dummy: let to manufacturer/primary industry	2002 data only	N/A	Industrial
Indtype2	Dummy: 1 if let to Wholesale/Retail trade, 0 otherwise	2002 data only	0/1	Industrial
Indtype3	Dummy: 1 if let to Transport/Distribution, 0 otherwise	2002 data only	0/1	Industrial
Indtype4	Dummy: 1 if let to Service/Public sectors, 0 otherwise	2002 data only	0/1	Industrial
Macro-location codes				
Hierarchy	Town hierarchy per *Management Horizons* code	Nearly All		Ret/Ind
Hierarchy1	Dummy: 1 if in minor or local centre, 0 otherwise	Nearly All	0/1	Ret/Ind
Hierarchy2	Dummy: 1 if in minor district or district, 0 otherwise	Nearly All	0/1	Ret/Ind
Hierarchy3 *	Dummy: 1 if in major district or sub-regional, 0 otherwise	Nearly All	0/1	Ret/Ind
Hierarchy4	Default Dummy: unit in regional centre	Nearly All	N/A	Ret/Ind
Hierarchy5	Dummy: 1 if in major regional centre, 0 otherwise	Nearly All	0/1	Ret/Ind

Micro-location codes				
Retailloc #	Retail microlocation: 0 if main high street, 1 otherwise	All	0/1	Retail
Officeloc $	Office microlocation: 1 if Central Office Area, 0 otherwise	All	0/1	Office
Industryloc1	Dummy: 1 if in 2 miles of Motorway, 0 otherwise	All	0/1	Industrial
Industryloc2	Dummy: 1 if in 15 miles of Airport, 0 otherwise	All	0/1	Industrial
Month codes	Month in which unit was let	Nearly All		All Prop
Month1	Default dummy: let in January	Nearly All	N/A	All Prop
Month2	Dummy variable: 1 if let in Feb, 0 otherwise	Nearly All	0/1	All Prop
Month3	Dummy variable: 1 if let in Mar, 0 otherwise	Nearly All	0/1	All Prop
Month4	Dummy variable: 1 if let in Apr, 0 otherwise	Nearly All	0/1	All Prop
Month5	Dummy variable: 1 if let in May, 0 otherwise	Nearly All	0/1	All Prop
Month6	Dummy variable: 1 if let in June, 0 otherwise	Nearly All	0/1	All Prop
Month7	Dummy variable: 1 if let in July, 0 otherwise	Nearly All	0/1	All Prop
Month8	Dummy variable: 1 if let in Aug, 0 otherwise	Nearly All	0/1	All Prop
Month9	Dummy variable: 1 if let in Sept, 0 otherwise	Nearly All	0/1	All Prop
Month10	Dummy variable: 1 if let in Oct, 0 otherwise	Nearly All	0/1	All Prop
Month11	Dummy variable: 1 if let in Nov, 0 otherwise	Nearly All	0/1	All Prop
Month12	Dummy variable: 1 if let in Dec, 0 otherwise	Nearly All	0/1	All Prop

Notes:

* in the case of Standard Shops, hierarchy3 becomes the default dummy (major district up), as not enough observations for further splits.

the original intention was to have more micro-location codes for retail, with dummies for fringe of town centre, suburban areas and non-urban areas. However, the characteristics of the samples are such that the data is almost entirely split between high street and fringe town centre units, making only one dummy variable possible.

$ The tightly defined area for the West End means that there are only two practical micro-location alternatives – Central Office Area and Central but non-office.

A5.3. The Testing Process

In this section, the models tested for the chosen segments and years are presented in turn, together with a commentary on the process adopted. Separate modelling runs were made with full term lengths (lengthyrs) and lengths to expiry or break (length2yrs) as explanatory variables. The results using full term lengths are given precedence, but models using lengths to expiry or break are discussed where there are interesting differences between the results.

A5.3.1 Southern Industrials 1998

Southern Industrials was chosen as the first segment for modelling. It comprises of standard industrial units located in the southern regions of England – South East, South West and Eastern – but excluding properties within London. Once the sample had been selected and filtered, the first step was to construct a general model including all variables and the month dummies for the temporal aggregation test. At this stage, log and level versions of floorspace and age were also tested. The first model of rent per m² for Southern Industrials in 1998 (with full term lengths) was as follows:

```
. reg rentpersqm lengthyrs breakclause rentfree norrentrev revcycle floorunitln age
new   old   cappropadj   singlelet   hierarchy1   hierarchy2   hierarchy3   industryloc1
industryloc2 month2-month12

      Source |       SS       df       MS              Number of obs =     104
-------------+------------------------------           F( 27,    76) =    7.73
       Model |  43119.2772    27  1597.01027           Prob > F      =  0.0000
    Residual |  15701.0319    76  206.592525           R-squared     =  0.7331
-------------+------------------------------           Adj R-squared =  0.6382
       Total |  58820.3091   103  571.070962           Root MSE      =  14.373

------------------------------------------------------------------------------
  rentpersqm |      Coef.   Std. Err.      t    P>|t|     [95% Conf. Interval]
-------------+----------------------------------------------------------------
   lengthyrs |    1.83769   .4015577     4.58   0.000     1.037919    2.637462
 breakclause |   .9128769   4.338025     0.21   0.834    -7.727048    9.552802
    rentfree |   .0184233   .8118032     0.02   0.982    -1.598423    1.635269
  norrentrev |   11.84437   5.099177     2.32   0.023     1.688478    22.00026
    revcycle |   5.752683   4.832334     1.19   0.238    -3.871745    15.37711
 floorunitln |  -12.82191   1.878484    -6.83   0.000    -16.56323   -9.080582
         age |  -.4432943   .3955018    -1.12   0.266    -1.231004    .3444158
         new |   7.013364   8.886689     0.79   0.432    -10.68601    24.71274
         old |  -5.467423   7.112537    -0.77   0.444    -19.63327    8.698421
  cappropadj |  -1.025473   .5097951    -2.01   0.048    -2.040818   -.0101281
   singlelet |   5.868906   6.791084     0.86   0.390     -7.65671    19.39452
  hierarchy1 |  -16.11919   7.227192    -2.23   0.029    -30.51339   -1.724991
  hierarchy2 |  -3.462309   6.132352    -0.56   0.574    -15.67595    8.751328
  hierarchy3 |   1.826846   6.965175     0.26   0.794     -12.0455    15.69919
industryloc1 |    15.7855   3.635804     4.34   0.000     8.544171    23.02683
industryloc2 |    11.7014   3.999307     2.93   0.005     3.736093    19.66671
      month2 |  -2.514973   9.481559    -0.27   0.792    -21.39913    16.36919
      month3 |  -9.255313   7.069496    -1.31   0.194    -23.33544    4.824809
      month4 |   .8731618   9.550708     0.09   0.927    -18.14872    19.89505
      month5 |  -6.481991   7.921076    -0.82   0.416    -22.25818    9.294198
      month6 |  -2.589548   8.011641    -0.32   0.747    -18.54611    13.36702
      month7 |  -8.004661   8.062263    -0.99   0.324    -24.06205    8.052728
      month8 |  -3.072019   7.873847    -0.39   0.698    -18.75414    12.61011
      month9 |   5.745279     8.2199     0.70   0.487    -10.62607    22.11663
     month10 |  -18.86617   10.26273    -1.84   0.070    -39.30618    1.573836
     month11 |   1.785006    8.54911     0.21   0.835    -15.24202    18.81203
     month12 |  -7.666682   10.26713    -0.75   0.458    -28.11543    12.78207
       _cons |   124.3492   15.55764     7.99   0.000      93.3635     155.335
------------------------------------------------------------------------------


Model Selection Scores
. di aic, fpe, sbc
```

```
258.6698 262.21359 527.15981

Diagnostic Tests

Cook-Weisberg test for heteroskedasticity using fitted values of rentpersqm
     Ho: Constant variance
         chi2(1)      =      4.39
         Prob > chi2  =      0.0363


                  Shapiro-Wilk W test for normal data
    Variable |    Obs        W          V          z     Prob>z
-------------+--------------------------------------------------
           e |    104    0.99159      0.717     -0.738  0.76977
```

This first model has a reasonably high explanatory power (adjusted r^2 of 64%) and passes the diagnostic tests, albeit only at 1% in the case of the heteroscedasticity test. Therefore, the next step was to examine the temporal aggregation issue by testing the joint significance of all the monthly dummy variables. As for other variable tests in this analysis, this took the form of a Wald test.

```
Wald test on unrestricted (with dummies) vs restricted (time coefficients all equal
zero).

F( 11,    76) =    1.14           Prob > F =    0.3417
```

The F-statistic and p-value produced by the Wald test mean that we cannot reject the null hypothesis that the time coefficients equal zero. Therefore, we can be more comfortable that, in this case, the new lettings are from a reasonably homogeneous time period and that changes in rent per m^2 will not be dominated by market movement[13]. So the month dummies were then dropped and the second general model estimated, which was as follows:

```
. reg rentpersqm lengthyrs breakclause rentfree norrentrev revcycle  floorunitln age
new  old  cappropadj  singlelet  hierarchy1  hierarchy2  hierarchy3  industryloc1
industryloc2

      Source |       SS       df       MS              Number of obs =     104
-------------+------------------------------           F( 16,    87) =   12.04
       Model |  40523.7968    16   2532.7373           Prob > F      =  0.0000
    Residual |  18296.5123    87  210.304739           R-squared     =  0.6889
-------------+------------------------------           Adj R-squared =  0.6317
       Total |  58820.3091   103  571.070962           Root MSE      =  14.502

------------------------------------------------------------------------------
  rentpersqm |      Coef.   Std. Err.      t    P>|t|     [95% Conf. Interval]
-------------+----------------------------------------------------------------
   lengthyrs |   1.751768   .3903864     4.49   0.000     .9758326    2.527703
 breakclause |  -2.192063   4.078165    -0.54   0.592    -10.29786    5.913731
    rentfree |  -.0709533    .728617    -0.10   0.923    -1.519158    1.377252
  norrentrev |   10.40424   4.832564     2.15   0.034     .7989938    20.00948
    revcycle |   6.694021   4.722288     1.42   0.160    -2.692037    16.08008
 floorunitln |  -12.72243    1.65388    -7.69   0.000     -16.0097   -9.435168
         age |  -.6437735   .3872416    -1.66   0.100    -1.413458     .125911
         new |   3.296409   8.564782     0.38   0.701    -13.72702    20.31984
         old |   -1.73254   6.780268    -0.26   0.799    -15.20906    11.74398
  cappropadj |  -.9494835   .4902322    -1.94   0.056    -1.923873    .0249061
   singlelet |   4.960421   6.274027     0.79   0.431    -7.509887    17.43073
  hierarchy1 |  -15.33514   6.621163    -2.32   0.023    -28.49542   -2.174863
  hierarchy2 |  -2.503623   5.553487    -0.45   0.653    -13.54178    8.534534
  hierarchy3 |   3.140405   6.529515     0.48   0.632    -9.837712    16.11852
industryloc1 |   16.44895   3.504895     4.69   0.000     9.482594    23.41531
industryloc2 |   11.68149   3.827307     3.05   0.003     4.074299    19.28867
```

[13] From this point forward, outputs with month dummies and associated Wald tests will not be presented unless there is a particularly important reason for showing them. The results will just be commented on.

```
       _cons |   122.1735   13.09274     9.33   0.000     96.15029    148.1968
------------------------------------------------------------------------------

Model Selection Scores
. di aic, fpe, sbc
243.95845 244.68148 375.87405


Diagnostic Tests

Cook-Weisberg test for heteroskedasticity using fitted values of rentpersqm
     Ho: Constant variance
         chi2(1)      =      0.90
         Prob > chi2  =      0.3437


                  Shapiro-Wilk W test for normal data
    Variable |    Obs        W          V          z     Prob>z
-------------+-------------------------------------------------
           e |    104    0.99163      0.714     -0.747  0.77259
```

This second model shows improved model selection scores and diagnostic test results. It also has a number of features of interest. The coefficients on the building and location variables generally behave as expected. There are negative coefficients for age and 'old' properties, for poor macro-locations (hierarchy1 and hierarchy2 representing minor centres or districts) and for ln(floorspace). Positive coefficients exist for 'new' properties, good micro-locations (with industryloc1 and industryloc2 representing proximity to motorways or airports) and for single let units. However, coefficients for the lease variables are more problematic. Length is very significant, but shows rent increasing as the agreed term increases. It might be expected that shorter leases rather than longer leases would attract a premium. However, finding this could be confounded by longer leases being agreed on more valuable space in general[14]. Neither the incidence of break clauses nor rent free period is significant. The absence of a rent review and non-standard review cycles are significant, though, and show a rent premium.

The inclusion of "no rent review" as a variable may raise issues of multicollinearity. It would be expected that where there is no rent review, the length of the lease would be short. The two variables could therefore be highly correlated. Another potential problem is between break clauses and length, with breaks perhaps more likely on long leases. So at this and subsequent stages of the modelling, the correlation between the coefficients was examined to try to detect multicollinearity issues. This showed some correlation between norentrev and length and so the model was rerun with norentrev omitted. However, breakclause, rentfree and revcycle were still not significant and the coefficient on length remained stable. Therefore, norentrev was returned. There were also high correlations between the different age variables and between the location variables. As these are control variables, though, multicollinearity is less of an issue than for the lease variables.

Using the second general model as a base, a model simplification process was then embarked on. This involved dropping insignificant variables in stages, as described in section A5.2.3. The first variables to be dropped were rentfree and 'old'. Then, in the second stage, 'new', breakclause, hierarchy2, hierarchy3 and singlelet dropped out of

[14] It may be that the distribution of possible lease terms that could be agreed on more valuable space is much more restricted than the comparable distribution for low value units.

the model. After this, only revcycle remained insignificant. This was then dropped to leave the following final model:

Final model:

```
. reg rentpersqm lengthyrs norrentrev floorunitln age cappropadj hierarchy1
industryloc1 industryloc2

      Source |       SS       df       MS              Number of obs =     104
-------------+------------------------------           F(  8,    95) =   24.45
       Model |  39592.1532     8  4949.01915            Prob > F      =  0.0000
    Residual |  19228.1559    95  202.401641            R-squared     =  0.6731
-------------+------------------------------           Adj R-squared =  0.6456
       Total |  58820.3091   103  571.070962           Root MSE      =  14.227

------------------------------------------------------------------------------
  rentpersqm |      Coef.   Std. Err.      t    P>|t|     [95% Conf. Interval]
-------------+----------------------------------------------------------------
   lengthyrs |   1.796335   .3632147     4.95   0.000     1.075263    2.517408
  norrentrev |   9.974478    4.17579     2.39   0.019     1.684486    18.26447
 floorunitln |  -12.62335   1.363324    -9.26   0.000    -15.32989   -9.916811
         age |  -.7278011   .1843298    -3.95   0.000    -1.093742   -.3618602
  cappropadj |  -1.006304   .4432481    -2.27   0.025    -1.886263   -.1263458
  hierarchy1 |  -14.68278     4.3354    -3.39   0.001    -23.28964   -6.075924
industryloc1 |   16.09704   3.002371     5.36   0.000     10.13658    22.0575
industryloc2 |   11.97833   3.538449     3.39   0.001     4.953618    19.00304
       _cons |   121.8089   9.700125    12.56   0.000     102.5517    141.0661
------------------------------------------------------------------------------


Model Selection Scores
. di aic, fpe, sbc
219.82174 219.91717 276.34732


Diagnostic Tests

Cook-Weisberg test for heteroskedasticity using fitted values of rentpersqm
     Ho: Constant variance
         chi2(1)      =      0.95
         Prob > chi2  =      0.3300

                  Shapiro-Wilk W test for normal data
    Variable |    Obs        W          V          z     Prob>z
-------------+-------------------------------------------------
           e |    104    0.99317      0.583     -1.200  0.88503
```

Compared to the starting models, this model has improved adjusted r^2, F-statistic and model selection scores. It is also relatively simple and all of the variables are significant at the 5% level. The only unexpected coefficient is on the capital expenditure variable, which is slightly negative. However, this final model has few of the lease structure variables, with most being found insignificant at various stages. Length remains, but the coefficient is still positive. Two further tests were made – dropping norentrev again and excluding all leases under 5 years in length – but this did not alter the length result. Therefore, the evidence from this data for lease pricing in 1998 in this segment is quite weak.

As mentioned earlier, modelling was also carried out with the length to expiry or break in place of full term length. The final model was almost identical to the one above, with just a straight substitution between lengthyrs and length2yrs. However, there was one interesting difference between the two processes. Breakclause dropped out later in the process and in the models it had the (expected) positive sign, implying that new leases with break clauses have a rental premium (the occupier has to pay more). It is important to stress, though, that it was a statistically insignificant variable

and that there was much higher correlation between it and the length2 variable than with the full term length. Nevertheless, the penultimate model, with breakclause significant at the 15% level, is presented below:

```
. reg rentpersqm length2yrs breakclause norrentrev floorunitln age cappropadj
hierarchy1 industryloc1 industryloc2

      Source |       SS       df       MS              Number of obs =     104
-------------+------------------------------           F(  9,    94) =   20.88
       Model |  39207.8137     9  4356.42375           Prob > F      =  0.0000
    Residual |  19612.4954    94  208.643568           R-squared     =  0.6666
-------------+------------------------------           Adj R-squared =  0.6346
       Total |  58820.3091   103  571.070962           Root MSE      =  14.444


------------------------------------------------------------------------------
  rentpersqm |      Coef.   Std. Err.      t    P>|t|     [95% Conf. Interval]
-------------+----------------------------------------------------------------
  length2yrs |   1.744737   .3782018     4.61   0.000     .9938083    2.495666
 breakclause |   6.147547    4.13927     1.49   0.141     -2.07107    14.36616
  norrentrev |   9.638426   4.422905     2.18   0.032     .8566434    18.42021
 floorunitln |  -12.35278   1.374471    -8.99   0.000    -15.08182   -9.623737
         age |  -.7639223   .1863755    -4.10   0.000    -1.133975   -.3938695
  cappropadj |   -1.06094   .4598786    -2.31   0.023    -1.974039   -.1478401
  hierarchy1 |  -13.01125   4.374374    -2.97   0.004    -21.69667   -4.325824
industryloc1 |   16.29494   3.069887     5.31   0.000      10.1996    22.39027
industryloc2 |   12.62314   3.690222     3.42   0.001      5.29612    19.95016
       _cons |   121.2411   9.966102    12.17   0.000     101.4532    141.0291
------------------------------------------------------------------------------


Model Selection Scores
. di aic, fpe, sbc
228.56919 228.70545 294.74404


Diagnostic Tests

Cook-Weisberg test for heteroskedasticity using fitted values of rentpersqm
     Ho: Constant variance
         chi2(1)      =      0.88
         Prob > chi2  =      0.3490


                  Shapiro-Wilk W test for normal data
    Variable |    Obs        W          V          z     Prob>z
-------------+-------------------------------------------------
           e |    104    0.99081      0.784     -0.541  0.70567
```

A5.3.2 Southern Industrials 2002

For this sample, information on tenant characteristics was available in addition to the existing variables for building, lease and location factors. However, a complete set of tenant variables was only available for about half of the observations. Rather than overly deplete the sample, two separate runs were done for each of the length variables – one on a large sample of data, using the same variables as in the 1998 analysis, and one on a smaller sample with the tenant factors added in. The results for the large sample were generally better, so they are presented first and then the results for the small sample are discussed afterwards.

Once again, the first step in modelling the rents was to construct a general model including all variables and the month dummies. The 2002 sample proved to be more difficult to analyse than the 1998 one, though, with initial models failing diagnostic

tests. Examination of residual plots revealed that this was due to several outliers, which corresponded to high values of rent per m². Seven observations were then dropped, increasing the adjusted r² of the initial model from 31% to 47%. In the models, log versions of both age and floorspace were preferred, in contrast to the 1998 models, where age was kept in levels.

The first model shown below is the initial model after both outliers and the month dummies were removed. The null hypothesis that the month dummies were jointly equal to zero could not be rejected (p-value of 0.1855). Hence they could be dropped, as this result would seem to indicate that temporal aggregation should not cause any major distortion to the results.

```
. reg rentpersqm lengthyrs breakclause rentfree norentrev revcycle floorunitln ageln
new   old   cappropadj   singlelet   hierarchy1   hierarchy2   hierarchy3   industryloc1
industryloc2

      Source |       SS       df       MS              Number of obs =     189
-------------+------------------------------           F( 16,   172) =   10.76
       Model |  69535.9743    16   4345.9984           Prob > F      =  0.0000
    Residual |  69490.2718   172  404.013208           R-squared     =  0.5002
-------------+------------------------------           Adj R-squared =  0.4537
       Total |  139026.246   188  739.501309           Root MSE      =   20.10

------------------------------------------------------------------------------
  rentpersqm |      Coef.   Std. Err.      t    P>|t|     [95% Conf. Interval]
-------------+----------------------------------------------------------------
   lengthyrs |   .5671772   .4600115     1.23   0.219    -.3408175    1.475172
 breakclause |   .8382891   3.742051     0.22   0.823    -6.547967    8.224545
    rentfree |   .7400396   1.100388     0.67   0.502    -1.431964    2.912043
   norentrev |  -14.67775   5.106771    -2.87   0.005    -24.75776   -4.597736
    revcycle |  -6.952652   4.961128    -1.40   0.163    -16.74518    2.839881
 floorunitln |  -15.86019   1.410387   -11.25   0.000    -18.64408   -13.07629
       ageln |  -10.27621   4.705502    -2.18   0.030    -19.56417   -.9882424
         new |  -5.900316   10.21683    -0.58   0.564    -26.06683    14.26619
         old |   5.905403   5.176467     1.14   0.256    -4.312177    16.12298
  cappropadj |   .3868526    .405874     0.95   0.342    -.4142826    1.187988
   singlelet |    24.4749   10.27899     2.38   0.018     4.185683    44.76411
  hierarchy1 |  -7.650456   10.04267    -0.76   0.447     -27.4732    12.17229
  hierarchy2 |   -3.77045   9.812632    -0.38   0.701    -23.13913    15.59823
  hierarchy3 |   2.160816   10.38901     0.21   0.835    -18.34556    22.66719
industryloc1 |   6.547835   3.859251     1.70   0.092    -1.069755    14.16543
industryloc2 |  -1.232305    3.47888    -0.35   0.724    -8.099099    5.634489
       _cons |   182.4254   20.26277     9.00   0.000     142.4297    222.4211
------------------------------------------------------------------------------


Model Selection Scores
. di aic, fpe, sbc
440.1384 440.35302 589.14653


Diagnostic tests

Cook-Weisberg test for heteroskedasticity using fitted values of rentpersqm
     Ho: Constant variance
         chi2(1)      =      0.36
         Prob > chi2  =      0.5473


                  Shapiro-Wilk W test for normal data
    Variable |    Obs        W          V          z     Prob>z
-------------+-------------------------------------------------
           e |    189    0.99204      1.131      0.282  0.38911
```

These early results were not particularly promising and the 2002 data continued to be much more difficult to model than the 1998 data. Although the model above passes diagnostic tests, the amount of explanation is quite low (45%), especially when

compared with the same stage model for 1998 (63%). Length begins as insignificant, but it becomes a stronger variable once others are removed. Meanwhile, there were several variables with 'wrong' coefficients, most notably the two age dummies. The correlations between the coefficients were then examined for potential multicollinearity issues. This revealed that both revcycle and norentrev had quite strong correlations with ln(floorunit), which may explain their negative coefficients, as they could be capturing some of the floorspace effect.

The next stage was to attempt model simplification. However, rather than begin with the least significant variables, the first factor to be dropped was the singlelet dummy. This was because it only represented five leases, which raised questions about its reliability, despite statistical significance. Then other variables were dropped, including breakclause and rentfree, to leave the final model shown below. During the process, two more outliers were also removed.

Final model:

```
. reg rentpersqm lengthyrs floorunitln ageln industryloc1

      Source |       SS       df       MS              Number of obs =     187
-------------+------------------------------           F(  4,   182) =   36.96
       Model |  60768.5779     4  15192.1445           Prob > F      =  0.0000
    Residual |  74812.6847   182  411.058707           R-squared     =  0.4482
-------------+------------------------------           Adj R-squared =  0.4361
       Total |  135581.263   186  728.931519           Root MSE      =  20.275

------------------------------------------------------------------------------
  rentpersqm |      Coef.   Std. Err.      t    P>|t|     [95% Conf. Interval]
-------------+----------------------------------------------------------------
   lengthyrs |    1.24597    .370852     3.36   0.001     .5142478    1.977692
 floorunitln |  -13.11793   1.214698   -10.80   0.000    -15.51463   -10.72123
       ageln |   -4.70189   1.599338    -2.94   0.004     -7.85752   -1.546261
industryloc1 |   10.43996   3.158415     3.31   0.001     4.208138    16.67178
       _cons |    138.246    9.17725    15.06   0.000     120.1385    156.3535
------------------------------------------------------------------------------


Model Selection Scores
. di aic, fpe, sbc
422.0442 422.04958 460.12736


Diagnostic Tests

Cook-Weisberg test for heteroskedasticity using fitted values of rentpersqm
     Ho: Constant variance
         chi2(1)      =      0.75
         Prob > chi2  =      0.3853

                  Shapiro-Wilk W test for normal data
    Variable |    Obs        W          V          z     Prob>z
-------------+-------------------------------------------------
           e |    187    0.99444      0.783     -0.562  0.71300
```

In this model, the variables that remain are significant at the 5% level. It can be seen that the other variables were dropped at only a small cost to adjusted r^2, which is only 1% lower than for the general model. However, just lengthyrs survived out of all of the lease variables and, again, it showed a positive coefficient, altering only slightly when leases under 5 years long were excluded from analysis. Coefficients on floorunitln, ageln and industryloc1 were all as might be expected.

The modelling using length to expiry or break followed a similar path. The same variables dropped out at the same stages, except for the norentrev dummy, which stayed in the model to the end, though with its coefficient showing a rental discount. The coefficient values for the other factors in the final model were very similar to those above. Therefore, these models are not presented, but they can be provided on request.

The analysis was then rerun with tenant variables added in. These included "score", a measure of covenant strength, "internat", indicating whether the occupier was a UK or foreign owned business, and dummies describing the industry sector to which the tenant belonged. With the extra variables, it was expected that the amount of explanation would increase, but, in fact, the models in this analysis were generally weaker (with adjusted r^2 of 30-40%), which may be due to smaller sample size. Ironically, most of the tenant variables dropped out in the early stages of the modelling process. Length and the age variables were insignificant in many of the models, but they were not dropped owing to their theoretical importance and the fact that they were very strong factors in the main industrial models. Another feature of these models was that rent free period was a much stronger influence than before, dropping out late in the full term model and staying in to the end when lengths to expiry or break were used.

The penultimate model using length to expiry or break is shown below, as this has a number of interesting features.

```
. reg rentpersqm length2yrs rentfree floorunitln old internat hierarchy1 industryloc2

      Source |       SS       df       MS              Number of obs =     100
-------------+------------------------------           F(  7,    92) =    9.77
       Model |  21356.7607     7  3050.96582           Prob > F      =  0.0000
    Residual |  28732.2276    92  312.306822           R-squared     =  0.4264
-------------+------------------------------           Adj R-squared =  0.3827
       Total |  50088.9884    99  505.949377           Root MSE      =  17.672

------------------------------------------------------------------------------
  rentpersqm |      Coef.   Std. Err.      t    P>|t|     [95% Conf. Interval]
-------------+----------------------------------------------------------------
  length2yrs |   .3448331   .4519284     0.76   0.447    -.5527357    1.242402
    rentfree |   2.913432   1.280817     2.27   0.025     .3696202    5.457245
 floorunitln |  -11.01276   2.009146    -5.48   0.000     -15.0031   -7.022424
         old |  -8.921914   4.302868    -2.07   0.041    -17.46778    -.376046
    internat |        -11   7.777121    -1.41   0.161    -26.44603    4.446037
  hierarchy1 |   -16.8542   4.653978    -3.62   0.000     -26.0974   -7.610998
industryloc2 |   9.027466   3.911153     2.31   0.023     1.259579    16.79535
       _cons |   129.0869   11.96941    10.78   0.000     105.3147    152.8592
------------------------------------------------------------------------------


Model Selection Scores
. di aic, fpe, sbc
337.17581 337.29137 415.30705


Diagnostic Tests

Cook-Weisberg test for heteroskedasticity using fitted values of rentpersqm
     Ho: Constant variance
         chi2(1)      =      0.86
         Prob > chi2  =      0.3525


                  Shapiro-Wilk W test for normal data
    Variable |    Obs        W          V          z     Prob>z
-------------+--------------------------------------------------
           e |    100    0.98564      1.186      0.378  0.35255
```

In this model, only the dummy for international tenants remains out of all the tenant variables that were used. Here, it is not significant at the 10% level and so it was the next variable to be removed (as length2yrs was retained throughout). However, the coefficient is interesting, as it suggests that international tenants commanded a slight rent discount over UK tenants, with all else held constant. The model also suggests that rent per m² rises as the rent free period gets longer. The coefficients on the control variables are as expected, with hierarchy1 indicating a poor macro-location and industryloc2 indicating a good micro-location (proximity to airport).

A5.3.3 Southern Shops 1998

Southern Shops was chosen as the second segment for modelling. It covers standard shop units located in the southern regions of England that are not part of shopping centres. The regional definition is the same as that for Southern Industrials. Initial modelling encountered a number of problems in trying to pass diagnostic tests and several outliers had to be removed before a reliable model was found.

The test for temporal aggregation was once again undertaken. However, in this case, the test was failed at the 5% level. It turned out that one month in particular was causing the test to be failed and further investigation suggested that this was due to the nature of the lettings rather than a true time problem. Further outliers then had to be dropped once the monthly dummies were removed. Altogether, 15 leases were lost in these initial stages. The first model without time dummies and with outliers dropped was as follows:

```
. reg rentpersqm lengthyrs breakclause rentfree norentrev revcycle floorunitln ageln
new old cappropadj singlelet  hierarchy1 hierarchy2 retailloc

      Source |       SS       df       MS              Number of obs =     100
-------------+------------------------------           F( 14,    85) =    6.86
       Model |   756082.28    14  54005.8771           Prob > F      =  0.0000
    Residual |  668965.256    85  7870.17949           R-squared     =  0.5306
-------------+------------------------------           Adj R-squared =  0.4532
       Total |  1425047.54    99  14394.4196           Root MSE      =  88.714

------------------------------------------------------------------------------
  rentpersqm |      Coef.   Std. Err.      t    P>|t|     [95% Conf. Interval]
-------------+----------------------------------------------------------------
   lengthyrs |   6.280699   1.974835     3.18   0.002     2.354198     10.2072
 breakclause |   71.94601    26.2679     2.74   0.008     19.71839    124.1736
    rentfree |   16.29106   6.220749     2.62   0.010      3.92255    28.65958
   norentrev |  -38.40264   26.56993    -1.45   0.152    -91.23077    14.42549
    revcycle |   .9606047   46.32426     0.02   0.984    -91.14443    93.06564
 floorunitln |  -50.94785   12.28654    -4.15   0.000    -75.37677   -26.51892
       ageln |  -5.214803   16.35426    -0.32   0.751    -37.73144    27.30184
         new |   -49.4678   74.71206    -0.66   0.510    -198.0154    99.07978
         old |  -73.49211   49.11476    -1.50   0.138    -171.1454    24.16119
  cappropadj |  -1.642256    2.93934    -0.56   0.578     -7.48645    4.201939
   singlelet |   118.9956   34.61085     3.44   0.001     50.18001    187.8113
  hierarchy1 |   10.45841   31.24565     0.33   0.739    -51.66631    72.58314
  hierarchy2 |  -27.34046   30.49232    -0.90   0.372    -87.96737    33.28645
   retailloc |   15.39784   19.37435     0.79   0.429    -23.12357    53.91924
       _cons |   445.1801   76.02972     5.86   0.000     294.0127    596.3476
------------------------------------------------------------------------------


Model Selection Scores
. di aic, fpe, sbc
```

```
9030.0864 9050.7064 13347.612


Diagnostic Tests

Cook-Weisberg test for heteroskedasticity using fitted values of rentpersqm
     Ho: Constant variance
         chi2(1)      =      1.95
         Prob > chi2  =      0.1623


                  Shapiro-Wilk W test for normal data
    Variable |    Obs        W          V          z     Prob>z
-------------+--------------------------------------------------
           e |    100    0.97572      2.005      1.543  0.06142
```

In this model, both the breakclause and rentfree variables are significant and both show a rent premium, which would be expected. Length is also significant, but the rent review variables are not.

The first stage in simplifying the model was to identify redundant dummy variables. After the filtering and removal of outliers, it was found that only 5 leases had abnormal rent reviews and just 3 were in properties classed as "new". This latter finding raised the question as to whether the old and new dummies used for other sectors were actually appropriate to retail given the different characteristics of the sector's property stock. Alternative definitions for new and old were therefore tried. However, these generally made little improvement, with just one finding favour as a replacement for "old" when it came to modelling the 2002 data (see Table 3, above, on p10).

The simplification process then proceeded in a similar manner to that outlined above for the industrial segment. At the end of the process, the following model was found:

Final model:

```
. reg rentpersqm lengthyrs breakclause rentfree floorunitln old singlelet  hierarchy2

      Source |       SS       df       MS              Number of obs =     100
-------------+------------------------------           F(  7,    92) =   13.47
       Model |  721210.356     7  103030.051           Prob > F      =  0.0000
    Residual |   703837.18    92  7650.40414           R-squared     =  0.5061
-------------+------------------------------           Adj R-squared =  0.4685
       Total |  1425047.54    99  14394.4196           Root MSE      =  87.467

------------------------------------------------------------------------------
  rentpersqm |      Coef.   Std. Err.      t    P>|t|     [95% Conf. Interval]
-------------+----------------------------------------------------------------
   lengthyrs |   7.495556   1.637241     4.58   0.000     4.243853    10.74726
 breakclause |   65.18739   25.14229     2.59   0.011     15.25263    115.1222
    rentfree |   16.13688   5.736775     2.81   0.006     4.743153    27.53061
 floorunitln |  -54.05598   11.37932    -4.75   0.000    -76.65628   -31.45568
         old |  -85.62703   29.02709    -2.95   0.004    -143.2773   -27.97673
   singlelet |   116.1449   29.86755     3.89   0.000     56.82535    175.4644
  hierarchy2 |  -38.10882   18.23677    -2.09   0.039    -74.32863   -1.889021
       _cons |   442.3238   55.78935     7.93   0.000     331.5213    553.1262
------------------------------------------------------------------------------


Model Selection Scores
. di aic, fpe, sbc
8259.6058 8262.4365 10173.543
```

```
Diagnostic Tests

Cook-Weisberg test for heteroskedasticity using fitted values of rentpersqm
     Ho: Constant variance
         chi2(1)      =      1.78
         Prob > chi2  =      0.1818


                  Shapiro-Wilk W test for normal data
    Variable |    Obs        W          V          z     Prob>z
-------------+--------------------------------------------------
           e |    100    0.98056      1.605      1.050  0.14689
```

This model shows improved adjusted r^2, F-statistic and model selection scores to the one on the previous page. Break clause and rent free period continued to be important factors and still show positive coefficients, indicating rent premiums. The coefficients of the control variables all appear reasonable. Meanwhile, the correlations between the estimators showed possible multicollinearity between length and floorspace. However, dropping floorspace from the model badly affected both explanation and diagnostic results. The model was rerun with shorter leases (less than 5 years) excluded, but this made little difference to the results, except to send break clauses insignificant. Modelling with length to expiry or break did not produce results that were very different either.

A5.3.4 Southern Shops 2002

Modelling the 2002 data for Southern Shops proved to be more difficult than modelling the 1998 data, just as it did for the industrial segment. However, in this case, the main problem was sample size. After filtering, there were only 118 new leases in the sample. Then in the models, sample size was further reduced by the need to have values for the age variables. By the final stages, only 68 leases were in the model. The small sample meant that less dummies could be used, with revcycle and singlelet dropped very early on and "new" having to be left out altogether. It also made it difficult to extend the analysis to include tenant variables, as this involved further inevitable data loss. The issue may have affected the time dummies and so the first model presented below is the initial model with month variables. The results of the test for time issues are then discussed further.

```
. reg rentpersqm lengthyrs breakclause rentfree norentrev revcycle floorunitln ageln
retailold cappropadj singlelet  hierarchy1 hierarchy2 retailloc month2-month12

      Source |       SS       df       MS              Number of obs =      68
-------------+------------------------------           F( 24,    43) =    5.16
       Model |  1582645.01    24  65943.5422           Prob > F      =  0.0000
    Residual |  549326.129    43  12775.0263           R-squared     =  0.7423
-------------+------------------------------           Adj R-squared =  0.5985
       Total |  2131971.14    67  31820.4648           Root MSE      =  113.03

------------------------------------------------------------------------------
  rentpersqm |      Coef.   Std. Err.      t    P>|t|     [95% Conf. Interval]
-------------+----------------------------------------------------------------
   lengthyrs |   4.230789    3.82661     1.11   0.275    -3.486305    11.94788
 breakclause |   -144.962   39.23565    -3.69   0.001    -224.0882   -65.83578
    rentfree |   16.85051   9.395173     1.79   0.080    -2.096665    35.79768
   norentrev |  -14.77652   55.89598    -0.26   0.793    -127.5015    97.94846
    revcycle |  -128.2854   78.69368    -1.63   0.110    -286.9863    30.41552
 floorunitln |  -95.33286   20.92187    -4.56   0.000    -137.5258    -53.1399
       ageln |  -13.82762    31.6914    -0.44   0.665    -77.73942    50.08418
   retailold |    -39.973   45.83706    -0.87   0.388    -132.4122    52.46624
  cappropadj |   23.23726   9.506107     2.44   0.019     4.066373    42.40816
   singlelet |   103.9772    70.9182     1.47   0.150    -39.04295    246.9974
```

```
  hierarchy1 |   252.0849   58.16052     4.33   0.000     134.7931    369.3768
  hierarchy2 |   194.6776   56.89092     3.42   0.001     79.94615    309.4091
   retailloc |  -84.58526   32.89571    -2.57   0.014    -150.9258   -18.24473
      month2 |   102.9432    81.5988     1.26   0.214    -61.61645    267.5029
      month3 |    196.943   75.52788     2.61   0.012     44.62657    349.2595
      month4 |  -106.2061   102.9132    -1.03   0.308    -313.7504    101.3381
      month5 |   161.2032   83.00817     1.94   0.059    -6.198722    328.6051
      month6 |    45.7939   76.68118     0.60   0.554    -108.8484    200.4362
      month7 |   159.8215   114.1345     1.40   0.169    -70.35253    389.9956
      month8 |   193.3056   77.89668     2.48   0.017     36.21195    350.3992
      month9 |   138.5848   78.83211     1.76   0.086     -20.3953    297.5649
     month10 |  -61.29144   101.6566    -0.60   0.550    -266.3015    143.7186
     month11 |    10.2316   134.6194     0.08   0.940    -261.2543    281.7175
     month12 |   92.26828   86.33687     1.07   0.291    -81.84661    266.3832
       _cons |   551.2966    160.838     3.43   0.001     226.9359    875.6573
------------------------------------------------------------------------------


Model Selection Criteria
. di aic, fpe, sbc
16852.158 17471.727 38109.904


Diagnostic tests

Cook-Weisberg test for heteroskedasticity using fitted values of rentpersqm
     Ho: Constant variance
         chi2(1)      =      1.70
         Prob > chi2  =      0.1924


                  Shapiro-Wilk W test for normal data
    Variable |    Obs        W          V          z     Prob>z
-------------+-------------------------------------------------
           e |     68    0.98456      0.929     -0.161  0.56397
```

The aim of including monthly dummies is to assess whether it is safe to assume that we are dealing with a homogeneous period. The Wald test initially indicated that this assumption was not safe, as the hypothesis that the dummies equalled zero was rejected at the 5% level. However, rental growth in the segment during the year was only 0.4% (see Appendix A). Therefore, time problems in this case were unexpected. So the transactions in each month were subjected to individual scrutiny. Two months in particular were the source of the test failure and in those months, the average rent per m² was much higher than usual, as shown in the table below.

Table A5.4: Average rent per m² in sample – selected months only

Month	*Freq.*	*Mean rent per sq m*
March	9	351.22
August	6	366.32
Total	68	277.86

As the sample of leases in each month is so small, it could be that the problem shown by the test is a sample feature rather than a genuine time problem. If this is so, the monthly dummies would be proxying for specific features in the sample and not market movements. It was assumed that this was indeed the case, so the monthly dummies were dropped to produce the model below. As can be seen, though, the

omission of the months had a big effect on the adjusted r^2 of the new model and it caused two of the model selection criteria to deteriorate.

```
. reg rentpersqm lengthyrs breakclause rentfree norentrev revcycle floorunitln ageln
retailold cappropadj singlelet  hierarchy1 hierarchy2 retailloc

      Source |       SS       df       MS              Number of obs =      68
-------------+------------------------------           F( 13,    54) =    5.78
       Model |  1240474.82    13  95421.1403           Prob > F      =  0.0000
    Residual |  891496.319    54  16509.1911           R-squared     =  0.5818
-------------+------------------------------           Adj R-squared =  0.4812
       Total |  2131971.14    67  31820.4648           Root MSE      =  128.49

------------------------------------------------------------------------------
  rentpersqm |      Coef.   Std. Err.      t    P>|t|     [95% Conf. Interval]
-------------+----------------------------------------------------------------
   lengthyrs |   6.101015   3.990649     1.53   0.132    -1.899754    14.10178
 breakclause |  -103.6436   41.61521    -2.49   0.016     -187.077    -20.2101
    rentfree |   3.649802   8.075496     0.45   0.653    -12.54059     19.8402
   norentrev |  -46.59255   55.02397    -0.85   0.401     -156.909    63.72386
    revcycle |  -57.47566   83.05165    -0.69   0.492    -223.9842    109.0329
 floorunitln |  -94.05306   18.28314    -5.14   0.000    -130.7085   -57.39757
       ageln |  -16.62937    31.1369    -0.53   0.595    -79.05509    45.79634
   retailold |  -1.326082   45.77142    -0.03   0.977    -93.09226     90.4401
  cappropadj |   26.16452   9.044786     2.89   0.005     8.030814    44.29822
   singlelet |   75.50677   75.25387     1.00   0.320    -75.36815    226.3817
  hierarchy1 |   182.4633   52.32322     3.49   0.001      77.5616    287.3651
  hierarchy2 |   165.2424   54.06088     3.06   0.003     56.85688     273.628
   retailloc |  -59.55622   33.90204    -1.76   0.085    -127.5257    8.413281
       _cons |   655.0022   150.3588     4.36   0.000      353.551    956.4534
------------------------------------------------------------------------------


Model Selection Scores
. di aic, fpe, sbc
19789.635 19908.142 31253.013


Diagnostic Tests

Cook-Weisberg test for heteroskedasticity using fitted values of rentpersqm
     Ho: Constant variance
         chi2(1)      =      2.21
         Prob > chi2  =      0.1374


                  Shapiro-Wilk W test for normal data
    Variable |    Obs        W          V          z     Prob>z
-------------+-------------------------------------------------
           e |     68    0.98059      1.167      0.335  0.36880
```

In this model, length is insignificant and, in contrast to the 1998 models, so is rent free period. Meanwhile, break clauses are highly significant, but show the opposite sign to that expected. This was investigated further during the modelling process and it was found that most breaks in the sample had been granted on short leases at low rents per m^2. Therefore, the coefficient on breakclause is probably not really showing a true break clause price effect, but proxying for some feature of those particular leases. As it did not become insignificant at any point, though, it could not be removed without damaging the model. Hence, it was retained, but it was regarded more as a control variable than a lease variable.

The modelling process then went through the usual stages – checking for and removing non-meaningful dummies, dropping insignificant variables in stages and monitoring diagnostic and model selection scores. From this process, the following final model was found:

Final model:

```
. reg rentpersqm lengthyrs breakclause floorunitln cappropadj hierarchy1 hierarchy2
retailloc

      Source |       SS       df       MS              Number of obs =      68
-------------+------------------------------           F(  7,    60) =   11.06
       Model |  1201043.61     7  171577.659           Prob > F      =  0.0000
    Residual |  930927.527    60  15515.4588           R-squared     =  0.5633
-------------+------------------------------           Adj R-squared =  0.5124
       Total |  2131971.14    67  31820.4648           Root MSE      =  124.56

------------------------------------------------------------------------------
  rentpersqm |      Coef.   Std. Err.      t    P>|t|     [95% Conf. Interval]
-------------+----------------------------------------------------------------
   lengthyrs |    7.20843   3.720169     1.94   0.057    -.2330155    14.64988
 breakclause |  -107.9857   39.72364    -2.72   0.009    -187.4448   -28.52658
 floorunitln |  -86.94961   16.39698    -5.30   0.000    -119.7485   -54.15078
  cappropadj |    24.4491   7.546848     3.24   0.002     9.353155    39.54504
  hierarchy1 |    179.492   50.05876     3.59   0.001     79.35957    279.6244
  hierarchy2 |   182.1987   50.08289     3.64   0.001     82.01798    282.3794
   retailloc |  -64.08855   32.14151    -1.99   0.051    -128.3811    .2040445
       _cons |   542.1127   81.99739     6.61   0.000     378.0935    706.1319
------------------------------------------------------------------------------


Model Selection Scores
. di aic, fpe, sbc
17321.835 17340.807 22490.352


Diagnostic Tests

Cook-Weisberg test for heteroskedasticity using fitted values of rentpersqm
     Ho: Constant variance
         chi2(1)      =      1.99
         Prob > chi2  =      0.1588

. swilk e

                  Shapiro-Wilk W test for normal data
    Variable |    Obs        W          V          z     Prob>z
-------------+-------------------------------------------------
           e |     68    0.97171      1.701      1.153  0.12451
```

Here, length is significant at the 10% level, but not at the 5% level, which would have made it the next candidate for removal. However, dropping it caused the model to deteriorate quite badly, so it was retained. The coefficient on lengthyrs was stable, having a similar value even when short leases (less than 5 years) were left out. No other lease variables remain, except for breakclause which is being treated as a control variable. As noted above, modelling this segment proved extremely problematic and even here, after outliers and extraneous variables have been removed, the model is not satisfactory, with no age variables remaining (though the effect of age may be less in retail than other sectors) and with wrong coefficients for the poor locations (hierarchy1 and 2, which were expected to show a discount to the base location). Results using length to expiry or break were again similar to those shown above.

Models were then attempted using the tenant variables in addition to the existing explanatory factors. The need for observations to have values for the tenant variables, in addition to all the other factors, meant that even fewer leases could be used in this analysis. However, despite this, good results were obtained with surprisingly high adjusted r^2 scores. The initial model without time dummies is presented first for comment:

```
. reg rentp lengthy breakcl rentfr noren revcy floorunitln ageln retailold capprop
single score internat rettype1 rettype2 hierarchy1 hierarchy2 retailloc

      Source |       SS       df       MS              Number of obs =      45
-------------+------------------------------           F( 17,    27) =    4.54
       Model |  1360988.59    17  80058.1522           Prob > F      =  0.0002
    Residual |   475593.82    27  17614.5859           R-squared     =  0.7410
-------------+------------------------------           Adj R-squared =  0.5780
       Total |  1836582.41    44  41740.5093           Root MSE      =  132.72

------------------------------------------------------------------------------
  rentpersqm |      Coef.   Std. Err.      t    P>|t|     [95% Conf. Interval]
-------------+----------------------------------------------------------------
   lengthyrs |   6.034776   5.158061     1.17   0.252     -4.54869    16.61824
 breakclause |  -59.91004    74.0883    -0.81   0.426    -211.9267     92.1066
    rentfree |  -13.79828   12.06278    -1.14   0.263    -38.54907     10.9525
   norentrev |  -32.54335   91.75719    -0.35   0.726    -220.8136    155.7269
    revcycle |   46.24541   126.3582     0.37   0.717    -213.0201     305.511
 floorunitln |  -106.7788   28.83687    -3.70   0.001    -165.9472   -47.61046
       ageln |  -45.29151   36.82514    -1.23   0.229    -120.8505    30.26744
   retailold |   59.69763   73.02275     0.82   0.421    -90.13267    209.5279
  cappropadj |   40.14045   11.49681     3.49   0.002     16.55094    63.72996
   singlelet |   49.10482   113.4789     0.43   0.669    -183.7347    281.9444
       score |   .2567562   1.009812     0.25   0.801    -1.815207     2.32872
    internat |  -72.33276   110.4968    -0.65   0.518    -299.0535     154.388
    rettype1 |   120.8056    62.0352     1.95   0.062    -6.480073    248.0914
    rettype2 |   333.7064   102.3808     3.26   0.003     123.6385    543.7744
  hierarchy1 |   111.3098   117.7344     0.95   0.353    -130.2613    352.8809
  hierarchy2 |   102.4739   114.6059     0.89   0.379    -132.6779    337.6257
   retailloc |  -40.54186   54.83313    -0.74   0.466    -153.0502    71.96644
       _cons |   826.1584   222.1412     3.72   0.001     370.3622    1281.955
------------------------------------------------------------------------------


Model Selection Scores
. di aic, fpe, sbc
23521.189 24660.42 48451.664


Diagnostic Tests

Cook-Weisberg test for heteroskedasticity using fitted values of rentpersqm
     Ho: Constant variance
         chi2(1)      =      4.62
         Prob > chi2  =      0.0317

                    Shapiro-Wilk W test for normal data
    Variable |    Obs        W          V          z     Prob>z
-------------+-------------------------------------------------
           e |     45    0.99040      0.416     -1.860  0.96852
```

There are several interesting features of the model at this stage. However, its inclusion here is primarily to illustrate the increased problem of multicollinearity when the tenant variables are added. That it is present can be inferred from the fact that there is a reasonably high adjusted r^2 (58% - good for a cross-section), but very few variables that are individually significant. Examination of the correlation matrix of the estimators revealed several potential sources – many involving revcycle, so this was dropped out first. Of the variables that are significant, the tenant type variables, rettype1 and rettype2, both show large rental premiums (being clothing/footware and mobile phone retailers respectively). The dummy for international tenants has a negative sign, just as it did in the industrial segment, but is insignificant.

The model simplification process then took place. However, rather than always dropping the least significant variables, at a couple of points, variables were dropped for multicollinearity reasons. The final model from the process was as follows:

```
. reg rentp lengthy floorunitln capprop rettype1 rettype2

      Source |       SS       df       MS              Number of obs =      45
-------------+------------------------------           F(  5,    39) =   14.94
       Model |  1206574.16     5  241314.832           Prob > F      =  0.0000
    Residual |  630008.248    39  16154.0576           R-squared     =  0.6570
-------------+------------------------------           Adj R-squared =  0.6130
       Total |  1836582.41    44  41740.5093           Root MSE      =  127.10

------------------------------------------------------------------------------
  rentpersqm |      Coef.   Std. Err.      t    P>|t|     [95% Conf. Interval]
-------------+----------------------------------------------------------------
   lengthyrs |   8.539635   4.187844     2.04   0.048     .0689206    17.01035
 floorunitln |   -94.0454   23.29918    -4.04   0.000    -141.1724   -46.91836
  cappropadj |   31.08989   7.949864     3.91   0.000     15.00977    47.17001
    rettype1 |   143.1357   52.21818     2.74   0.009     37.51452     248.757
    rettype2 |   275.2022   61.72759     4.46   0.000     150.3464     400.058
       _cons |   679.6568   119.5172     5.69   0.000     437.9104    921.4032
------------------------------------------------------------------------------


Model Selection Scores
. di aic, fpe, sbc
18278.712 18307.932 23257.448


Diagnostic Tests

Cook-Weisberg test for heteroskedasticity using fitted values of rentpersqm
     Ho: Constant variance
         chi2(1)      =      3.02
         Prob > chi2  =      0.0821


                  Shapiro-Wilk W test for normal data
    Variable |    Obs        W          V          z     Prob>z
-------------+-------------------------------------------------
           e |     45    0.96538      1.499      0.858  0.19544
```

Once again, as for the main retail models, only length survives from the lease variables and there is no age variable in the final model. In contrast to the main model, though, there are no location variables. These appear to have been superseded by the tenant type variables in the analysis, although with such a small number of observations, it is hard to know whether this would be true more generally. Nevertheless, the use of tenant variables seems promising, with a better goodness of fit compared to the main model (61% vs 51%). It is also interesting that in all the retail models, capital expenditure by the landlord has come through as a significant variable whereas age has not.

Overall, though, the results for the 2002 new standard shop leases are disappointing. There is little evidence of any lease pricing, with rent free period and rent review variables often being insignificant and break clauses showing the wrong sign, probably due to being granted on certain types of shop and so partly picking up on property characteristics. It is particularly disappointing given that in the same segment for 1998, there seemed to be good evidence that the different elements of leases were being priced. The poor results may in part be due to the small sample after filtering and other processes though and this is something that will have to be addressed for any future investigation of this segment before anything else.

A5.3.5 West End Offices 1998

The final segment chosen for modelling was West End Offices. The segment has some unique features that differentiate it from the segments so far examined and, indeed, from the office market in general. The West End is a small geographical area within London, but it is a very large segment within the IPD Universe both by number and value of properties, with many high value offices in the district being held by large institutions. This makes for a reasonable sample of new leases in any one year. No macro-location variables were required, but one micro-location variable was used to distinguish the central office areas from more peripheral locations. Log versions of both age and floorspace were used.

The general model with all variables and time dummies is the first presented below. It can be seen from the output that several month variables are significant. The Wald Test for dropping the months was initially failed at the 5% level. This could well be indicating time aggregation problems, as there was strong rental growth in the segment throughout the period in question. However, more detailed examination of the data revealed that the month 11 dummy only related to 3 leases. With this excluded, the hypothesis that the remaining month coefficients equalled zero could not be rejected at the 5% level, although it could at the 10% level. So the sample may have some time issues, though the worst month may be picking up on something specific to those leases.

```
. reg rentpersqm lengthyrs breakclause rentfree norentrev floorunitln ageln new old
cappropadj singlelet officeloc month2-month12

      Source |       SS       df       MS              Number of obs =      97
-------------+------------------------------           F( 22,    74) =    6.29
       Model |  1192914.86    22  54223.4026           Prob > F      =  0.0000
    Residual |  638314.175    74  8625.86724           R-squared     =  0.6514
-------------+------------------------------           Adj R-squared =  0.5478
       Total |  1831229.03    96  19075.3024           Root MSE      =  92.876

------------------------------------------------------------------------------
  rentpersqm |      Coef.   Std. Err.      t    P>|t|     [95% Conf. Interval]
-------------+----------------------------------------------------------------
   lengthyrs |   7.083798   2.945695     2.40   0.019     1.214372    12.95322
 breakclause |  -5.746856   38.65756    -0.15   0.882    -82.77372       71.28
    rentfree |  -3.570423   5.688998    -0.63   0.532      -14.906    7.765153
   norentrev |  -87.27989   27.92512    -3.13   0.003    -142.9219   -31.63787
 floorunitln |  -46.09409   11.55255    -3.99   0.000    -69.11305   -23.07513
       ageln |   -34.4211   18.66956    -1.84   0.069    -71.62102    2.778814
         new |   7.589081   62.44661     0.12   0.904    -116.8385    132.0167
         old |   103.6565    53.4757     1.94   0.056     -2.89621    210.2091
  cappropadj |   -9.44301   6.519319    -1.45   0.152    -22.43304    3.547016
   singlelet |  -106.4304   51.37985    -2.07   0.042    -208.8069   -4.053781
   officeloc |   42.25476   26.42807     1.60   0.114    -10.40432    94.91383
      month2 |   66.01156   58.65112     1.13   0.264    -50.85334    182.8765
      month3 |   82.71511   41.84161     1.98   0.052    -.6561134    166.0863
      month4 |   164.8567   49.56965     3.33   0.001     66.08698    263.6263
      month5 |   134.2721   47.16606     2.85   0.006     40.29172    228.2526
      month6 |    111.026   43.93283     2.53   0.014     23.48797    198.5641
      month7 |    68.1061   52.82725     1.29   0.201    -37.15449    173.3667
      month8 |   115.1101   80.61558     1.43   0.158    -45.51991    275.7402
      month9 |   68.08247   45.43656     1.50   0.138    -22.45186    158.6168
     month10 |   149.2863   77.06485     1.94   0.057    -4.268739    302.8414
     month11 |   274.9187   69.02476     3.98   0.000     137.3838    412.4535
     month12 |   81.19286   53.21143     1.53   0.131    -24.83321    187.2189
       _cons |   385.1831    95.5776     4.03   0.000     194.7406    575.6256
------------------------------------------------------------------------------
```

```
Model Selection Criteria
. di aic, fpe, sbc
10573.453 10671.176 19469.418


Diagnostic Tests

Cook-Weisberg test for heteroskedasticity using fitted values of rentpersqm
     Ho: Constant variance
         chi2(1)      =      5.97
         Prob > chi2  =      0.0146


                  Shapiro-Wilk W test for normal data
    Variable |    Obs        W          V          z     Prob>z
-------------+--------------------------------------------------
           e |     97    0.98322      1.351      0.666  0.25274
```

The adjusted r^2 of this first model is reasonable at 55%. However, when the month dummies were dropped, model performance suffered, with the adjusted r^2 falling to 47%. Two of the three model selection criteria also declined and the diagnostic tests were failed. Some work was then done to remove outliers, dropping 3 leases from the sample. After this, the general model without time dummies was as follows:

```
. reg rentpersqm lengthyrs breakclause rentfree norentrev floorunitln ageln new old
cappropadj singlelet officeloc

      Source |       SS       df       MS              Number of obs =      94
-------------+------------------------------           F( 11,    82) =   12.38
       Model |  882188.275    11  80198.9341           Prob > F      =  0.0000
    Residual |  531168.951    82  6477.67013           R-squared     =  0.6242
-------------+------------------------------           Adj R-squared =  0.5738
       Total |  1413357.23    93  15197.3895           Root MSE      =  80.484

------------------------------------------------------------------------------
  rentpersqm |      Coef.   Std. Err.      t    P>|t|     [95% Conf. Interval]
-------------+----------------------------------------------------------------
   lengthyrs |   4.690008      2.408     1.95   0.055    -.1002714    9.480287
 breakclause |   24.96002   27.88107     0.90   0.373    -30.50431    80.42435
    rentfree |  -1.245231   4.552795    -0.27   0.785    -10.30219    7.811729
   norentrev |  -74.85118   22.11943    -3.38   0.001    -118.8538   -30.84858
 floorunitln |  -46.62727    9.47887    -4.92   0.000    -65.48376   -27.77078
       ageln |  -51.11661   15.07963    -3.39   0.001     -81.1148   -21.11842
         new |   87.86561   54.86109     1.60   0.113    -21.27056    197.0018
         old |   152.2724    43.2807     3.52   0.001     66.17327    238.3715
  cappropadj |  -10.64618   4.964556    -2.14   0.035    -20.52226   -.7700974
   singlelet |   31.32717   49.66988     0.63   0.530    -67.48203    130.1364
   officeloc |   37.63687   22.01652     1.71   0.091    -6.160998    81.43474
       _cons |   516.3224   70.74333     7.30   0.000     375.5914    657.0535
------------------------------------------------------------------------------


Model Selection Scores
. di aic, fpe, sbc
7294.3824 7304.6067 10092.378
```

```
Diagnostic Tests

Cook-Weisberg test for heteroskedasticity using fitted values of rentpersqm
     Ho: Constant variance
         chi2(1)      =      2.32
         Prob > chi2  =      0.1277


                   Shapiro-Wilk W test for normal data
    Variable |    Obs        W          V          z     Prob>z
-------------+--------------------------------------------------
           e |     94    0.97209      2.188      1.731  0.04169
```

This model passes the diagnostic tests, although only at the 1% level in the case of normality of the residuals. The adjusted r^2 and model selection scores are also much healthier. However, neither the break clause nor rent free period variables are significant and only breakclause shows the right coefficient sign. So, at this stage, the existence of lease pricing does not look likely. Model simplification was then conducted, with rentfree and singlelet being the first variables to drop out, followed by breakclause and the "new" dummy, to leave the following final model:

Final model:

```
. reg rentpersqm lengthyrs norentrev floorunitln ageln old cappropadj officeloc

      Source |       SS       df       MS              Number of obs =      94
-------------+------------------------------           F(  7,    86) =   19.01
       Model |  858463.696     7  122637.671           Prob > F      =  0.0000
    Residual |   554893.53    86  6452.25035           R-squared     =  0.6074
-------------+------------------------------           Adj R-squared =  0.5754
       Total |  1413357.23    93  15197.3895           Root MSE      =  80.326

------------------------------------------------------------------------------
  rentpersqm |      Coef.   Std. Err.      t    P>|t|     [95% Conf. Interval]
-------------+----------------------------------------------------------------
   lengthyrs |   5.946485   2.215066     2.68   0.009      1.54308    10.34989
   norentrev |  -74.40888   21.85012    -3.41   0.001    -117.8455   -30.97227
 floorunitln |  -51.14965   8.750693    -5.85   0.000    -68.54546   -33.75385
       ageln |  -57.96502   13.66853    -4.24   0.000    -85.13716   -30.79287
         old |   148.6425   42.25507     3.52   0.001     64.64225    232.6429
  cappropadj |  -10.65022   4.859828    -2.19   0.031    -20.31124   -.9891982
   officeloc |   46.01886    19.4915     2.36   0.020      7.27105    84.76667
       _cons |   559.7955   63.05516     8.88   0.000      434.446     685.145
------------------------------------------------------------------------------


Model Selection Scores
. di aic, fpe, sbc
6998.4888 7001.378 8689.756


Diagnostic Tests

Cook-Weisberg test for heteroskedasticity using fitted values of rentpersqm
     Ho: Constant variance
         chi2(1)      =      3.53
         Prob > chi2  =      0.0604

                   Shapiro-Wilk W test for normal data
    Variable |    Obs        W          V          z     Prob>z
-------------+--------------------------------------------------
           e |     94    0.97836      1.697      1.169  0.12121
```

All variables in this final model are significant at 5% and two lease variables remain, length and norentrev. However, as for the other segments, it might be expected that the coefficient on length should be negative, with shorter leases attracting a premium.

It might also be expected that no rent review should mean a premium to account for the lack of rental growth in the lease. Inspection of the correlation matrix for the estimators revealed that length and norentrev were highly correlated, though. However, dropping either caused model problems and increased the size of their coefficients. The model also has an unexpected sign for "old", although a very large proportion of the sample fell into the old category, so ageln probably reflects the age effect much better.

As in other cases, the analysis was also run using length to expiry or break. There was one main difference between this run and the one above, with breakclause remaining in the model until the end. The final model from this run is shown below:

```
. reg rentpersqm length2yrs breakclause norentrev floorunitln ageln old cappropadj
officeloc

      Source |       SS       df       MS              Number of obs =      94
-------------+------------------------------           F(  8,    85) =   16.47
       Model |  859094.285     8  107386.786           Prob > F      =  0.0000
    Residual |  554262.941    85  6520.74048           R-squared     =  0.6078
-------------+------------------------------           Adj R-squared =  0.5709
       Total |  1413357.23    93  15197.3895           Root MSE      =  80.751


------------------------------------------------------------------------------
  rentpersqm |      Coef.   Std. Err.      t    P>|t|     [95% Conf. Interval]
-------------+----------------------------------------------------------------
  length2yrs |   5.280282    2.38972     2.21   0.030     .5288788    10.03168
 breakclause |   56.59991    27.4944     2.06   0.043     1.933669    111.2662
   norentrev |  -79.66206   21.74296    -3.66   0.000    -122.8929   -36.43124
 floorunitln |  -49.05435   8.858327    -5.54   0.000    -66.66708   -31.44162
       ageln |  -58.63794   13.86476    -4.23   0.000    -86.20479   -31.07109
         old |   148.2122   42.73072     3.47   0.001     63.25213    233.1724
  cappropadj |  -10.11585   4.927829    -2.05   0.043    -19.91369   -.3180057
   officeloc |   53.33593   19.93436     2.68   0.009     13.70107    92.97078
       _cons |   550.2346   64.05643     8.59   0.000     422.8732    677.5959
------------------------------------------------------------------------------


Model Selection Scores
. di aic, fpe, sbc
7140.864 7145.0667 9109.7086


Diagnostic Tests

Cook-Weisberg test for heteroskedasticity using fitted values of rentpersqm
     Ho: Constant variance
         chi2(1)      =      3.08
         Prob > chi2  =      0.0792


                  Shapiro-Wilk W test for normal data
    Variable |    Obs        W          V          z     Prob>z
-------------+-------------------------------------------------
           e |     94    0.97950      1.608      1.050  0.14693
```

Here, the length variable has a similar coefficient to its counterpart (full term lengths) from the first modelling run. The break clause dummy is significant at the 5% level and shows the expected rent premium. Once again, the coefficients on norentrev and "old" are problematic.

Apart from the findings for breakclause in the model above, there seems to be little evidence in this sample of lease pricing taking place. There are also some unusual coefficients for some of the control variables, which suggests that the characteristics

of the leases in the sample need to be more fully explored and described. The coefficients for the key control variables of floorunitln and ageln are as expected, though, and give reassurance that the method is broadly working correctly.

A5.3.6 West End Offices 2002

The sample of new leases for the 2002 analysis was smaller than that for 1998. This caused significant problems when trying to carry out analysis with the tenant variables, as the number of leases with values in all fields fell below 40 and the models became skewed by individual observations. Therefore, no tenant analysis is presented for this segment, though such analysis was attempted. In general, there were not many problems with the data for the main models, but the explanatory power of the models was quite low. It was also thought that time might be an issue, as during the period, there was a sharp fall in rental values (-9.9%). However, the test on the time dummies indicated no problems in removing them. The first model shown is therefore the general model using full term lengths and without month dummies.

```
. reg rentpersqm lengthyrs breakclause rentfree norentrev floorunitln ageln new old
cappropadj singlelet officeloc

      Source |       SS       df       MS              Number of obs =      66
-------------+------------------------------           F( 11,    54) =    3.83
       Model |  744987.045    11   67726.095           Prob > F      =  0.0004
    Residual |  954019.588    54  17667.0294           R-squared     =  0.4385
-------------+------------------------------           Adj R-squared =  0.3241
       Total |  1699006.63    65  26138.5636           Root MSE      =  132.92

------------------------------------------------------------------------------
  rentpersqm |      Coef.   Std. Err.      t    P>|t|     [95% Conf. Interval]
-------------+----------------------------------------------------------------
   lengthyrs |   8.852803   3.881234     2.28   0.027     1.071398    16.63421
 breakclause |  -13.02728   49.37484    -0.26   0.793    -112.0179    85.96331
    rentfree |   25.06986   9.957801     2.52   0.015     5.105671    45.03405
   norentrev |  -3.037044   48.86004    -0.06   0.951    -100.9955    94.92144
 floorunitln |  -73.30465   15.96717    -4.59   0.000    -105.3169    -41.2924
       ageln |   16.58468    40.0432     0.41   0.680     -63.6971    96.86646
         new |   98.50881   101.9433     0.97   0.338    -105.8752    302.8928
         old |  -110.3034   93.25149    -1.18   0.242    -297.2614    76.65454
  cappropadj |   -2.21886    2.98648    -0.74   0.461    -8.206393    3.768672
   singlelet |  -39.60032    106.884    -0.37   0.712    -253.8899    174.6893
   officeloc |   14.25863   46.31175     0.31   0.759    -78.59085    107.1081
       _cons |   672.1146   142.0954     4.73   0.000     387.2306    956.9987
------------------------------------------------------------------------------


Model Selection Scores
. di aic, fpe, sbc
20794.028 20879.217 30962.75


Diagnostic Tests

Cook-Weisberg test for heteroskedasticity using fitted values of rentpersqm
     Ho: Constant variance
         chi2(1)      =      0.71
         Prob > chi2  =      0.3988


                  Shapiro-Wilk W test for normal data
    Variable |    Obs        W          V          z     Prob>z
-------------+-------------------------------------------------
           e |     66    0.98735      0.742     -0.646  0.74092
```

This model comfortably passes the diagnostic tests, but, as mentioned, the adjusted r^2 is quite low at only 32%. This did improve, though, during the course of the modelling process. Rent free periods are significant in this first model and show the expected sign – a rental premium the longer the period granted. However, break clauses and the absence of a rent review were both insignificant factors, while leases with abnormal review cycles were omitted from the analysis altogether, as within this segment, there were very few. Finally, most of the control variables had coefficients as expected.

The model simplification process then took place, with breakclause and norentrev both lost early in the process. The final model actually had very few explanatory variables and was as follows:

Final model:

```
. reg rentpersqm lengthyrs rentfree floorunitln old

      Source |       SS       df       MS              Number of obs =      65
-------------+------------------------------           F(  4,    60) =   11.77
       Model |  697164.305     4  174291.076           Prob > F      =  0.0000
    Residual |  888161.731    60  14802.6955           R-squared     =  0.4398
-------------+------------------------------           Adj R-squared =  0.4024
       Total |  1585326.04    64  24770.7193           Root MSE      =  121.67

------------------------------------------------------------------------------
  rentpersqm |      Coef.   Std. Err.      t    P>|t|     [95% Conf. Interval]
-------------+----------------------------------------------------------------
   lengthyrs |   8.646522   3.163895     2.73   0.008      2.31779    14.97525
    rentfree |   26.08661   8.805094     2.96   0.004     8.473801    43.69942
 floorunitln |  -71.54429   13.30391    -5.38   0.000    -98.15608   -44.93251
         old |  -124.0152   31.68635    -3.91   0.000    -187.3973   -60.63305
       _cons |   741.6657   75.47276     9.83   0.000     590.6977    892.6337
------------------------------------------------------------------------------


Model Selection Scores
. di aic, fpe, sbc
15936.511 15941.364 18837.947


Diagnostic Tests

Cook-Weisberg test for heteroskedasticity using fitted values of rentpersqm
     Ho: Constant variance
         chi2(1)      =      0.41
         Prob > chi2  =      0.5224


                  Shapiro-Wilk W test for normal data
    Variable |    Obs        W          V          z     Prob>z
-------------+-------------------------------------------------
           e |     65    0.98181      1.054      0.115  0.45436
```

The most important feature of this model is the presence of rent free periods, which are still significant and show the expected coefficient sign. The only control variables remaining are floorunitln and "old", this time taking the expected sign in contrast to the 1998 analysis. The adjusted r^2 of the model is not overwhelming at 40%, but is an improvement on the general model. Length, though, like in all other models, continues to show a positive coefficient, with longer leases seemingly driving higher rents per m^2. However, unlike in previous cases, when very short leases (less than 5 years in length) were removed, the length coefficient did show a big shift.

```
. reg rentpersqm lengthyrs rentfree floorunitln old if lengthyrs >= 5

      Source |       SS       df       MS              Number of obs =      45
-------------+------------------------------           F(  4,    40) =    5.80
       Model |   391016.69     4  97754.1725           Prob > F      =  0.0009
    Residual |  673846.381    40  16846.1595           R-squared     =  0.3672
-------------+------------------------------           Adj R-squared =  0.3039
       Total |  1064863.07    44  24201.4334           Root MSE      =  129.79

------------------------------------------------------------------------------
  rentpersqm |      Coef.   Std. Err.      t    P>|t|     [95% Conf. Interval]
-------------+----------------------------------------------------------------
   lengthyrs |   .9003269   4.955952     0.18   0.857    -9.116026    10.91668
    rentfree |   23.98104   11.31713     2.12   0.040     1.108274    46.85381
 floorunitln |   -67.5454   20.19317    -3.34   0.002    -108.3573   -26.73348
         old |   -141.389   44.93829    -3.15   0.003    -232.2127   -50.56536
       _cons |    839.661   114.3082     7.35   0.000     608.6356    1070.686
------------------------------------------------------------------------------
```

The sample was reduced by this step to only 45 observations, but on those 45, length was insignificant and so the hypothesis of no difference from zero could not be rejected. This may indicate a more neutral effect of length on leases, which still does not show the speculated premium as lengths get shorter, but at least does not completely contradict it. However, the overall explanatory power of this model is low at 30% and so the importance of this result should not be overstated.

The analysis using lengths to expiry or break followed a similar pattern to that above and the final model was also very similar. Hence, this analysis is not presented, but is available on request.

In the positive finding for rent free periods, the 2002 results show a little evidence for lease pricing, just as the 1998 results did by finding some effect with break clauses. That the break clause effect did not persist from 1998 is a little disappointing, though. However, the sample size in 2002 is small – partly because of the effect of long rent free periods in this segment, which meant several new lease observations could not be included due to the lack of a rent figure. So identification of the next year's rent, as discussed on page 9, could have a major benefit in this case, increasing the pool of leases available for analysis.

A5.4. Conclusions

In this report, several segments of the property market were examined for evidence of lease pricing. In particular, the aim was to identify whether different elements of the lease package, such as length, rent free period and existence of a break clause, had a significant effect on the rent agreed between landlords and tenants on new leases. Both preparing the test sample and the modelling were not straightforward, though. Location and time influences on rent had to be controlled for, but the more tightly the samples were defined, the less lease evidence there was available to use. The models were constructed using a combination of building, location and lease variables. Of the lease variables, length was usually most important, but in almost all cases, the coefficient on length was positive, which seems to indicate that higher rents per m² are paid for longer, not shorter, lease terms. This may be because the spread of potential lease terms for more valuable premises differs from that for less valuable space – with short leases much less likely to occur. This would make pricing a pure length effect very difficult. Future work will need to investigate this in more detail,

with further splitting of the samples by length bands or rent bands being one possible route.

The first segment to be examined was Southern Industrials. In both periods, 1998 and 2002, this segment had the most lease records available for analysis. However, little evidence for the pricing of lease terms was found. Lease length was found to be a significant factor, but, in both years, it showed a positive rent effect. A subset of the 2002 data, which had additional information on tenant characteristics was then further analysed. In this subset, rent free periods were also significant, with longer rent free periods generating a rent premium, all else being equal. In general, though, the evidence for lease pricing in this segment was slight.

Southern Shops was the next segment to be analysed. Here, the evidence for lease pricing was much stronger. In the 1998 sample, both break clauses and rent free period were found to be important variables for explaining rent per m^2. Both had a positive coefficient, indicating that where they were in place, a rent premium was being paid. However, the same result was not found in the 2002 data, with rent free period being insignificant and break clauses significant but having the opposite sign, this being due to the particular nature of the units on which they were granted. Length was significant in both years, but again had positive coefficients.

The final segment to be tested was West End Offices. Modelling this segment proved to be difficult, partly because of the unique features of some of the properties and partly because of strong segment rental growth. However, some evidence for the pricing of break clauses was found in the 1998 sample and some evidence for rent free periods was found in the 2002 sample. Length showed the usual positive coefficients, but interestingly, for the 2002 sample, it became insignificant when short leases were excluded and this may indicate a change in the length-rent relationship. This finding is not certain, though, due to the small sample of leases and low explanatory power of the model involved.

In summary, only limited evidence could be found from the IPD data for the pricing of lease terms. This may be due to an absence of such pricing, but it may also be that pricing exists, but is difficult to distinguish from other influences. The latter may be true where one whole lease package is judged against a standard market package without the individual elements being explicitly priced by the parties. However, there were important data limitations (discussed earlier in the report) that restricted the samples and it may be that once these are addressed, stronger conclusions can be made on pricing mechanisms.

Annex A : Rental Growth Figures for the Segments

1998	Southern Shops	West End Offices	Southern Industrials
Jan-98	0.05	0.67	0.11
Feb-98	0.14	1.09	0.23
Mar-98	0.45	1.11	0.94
Apr-98	0.08	1.05	0.13
May-98	0.27	1.46	0.13
Jun-98	0.62	1.02	0.95
Jul-98	0.33	0.95	0.53
Aug-98	0.47	0.78	0.30
Sep-98	0.43	1.35	0.21
Oct-98	0.47	1.19	0.10
Nov-98	0.31	0.07	0.11
Dec-98	0.58	1.31	0.51
Annual	4.28	12.72	4.32
2002			
Jan-02	0.06	-0.52	0.03
Feb-02	0.14	-0.67	0.11
Mar-02	-0.04	-0.72	0.05
Apr-02	-0.03	-0.09	0.07
May-02	0.06	-0.51	0.15
Jun-02	0.06	-1.09	0.07
Jul-02	-0.04	-0.89	0.13
Aug-02	0.00	-0.25	-0.07
Sep-02	0.04	-0.70	-0.03
Oct-02	-0.10	-0.85	-0.03
Nov-02	0.04	-1.07	-0.04
Dec-02	0.20	-2.97	-0.28
Annual	0.40	-9.89	0.17

Annex B: Summary Statistics For Observations Used In The Final Models

Below are summary statistics for the variables. They have been calculated on the observations used in the final models for each segment that use full term lengths.

Southern Industrials 1998

Variable	Obs	Mean	Std. Dev.	Min	Max
rentpersqm	104	57.41483	23.89709	4.623935	110.4167
lengthyrs	104	9.298077	4.918589	.9166667	25
length2yrs	104	8.172276	5.076336	.5	25
breakclause	104	.2307692	.4233654	0	1
rentfree	104	1.346154	2.175634	0	10
norrentrev	104	.1634615	.371577	0	1
revcycle	104	.1346154	.3429651	0	1
floorunitln	104	6.43799	1.11557	3.871201	10.86586
age	104	17.04808	8.83987	0	43
new	104	.0673077	.2517675	0	1
old	104	.3076923	.4637735	0	1
cappropadj	104	.8113462	3.447105	0	25.7
singlelet	104	.0769231	.2677598	0	1
hierarchy1	104	.1346154	.3429651	0	1
hierarchy2	104	.6442308	.4810641	0	1
hierarchy3	104	.1153846	.3210327	0	1
industryloc1	104	.5961538	.4930435	0	1
industryloc2	104	.3461538	.4780468	0	1

Southern Industrials 2002

Variable	Obs	Mean	Std. Dev.	Min	Max
rentpersqm	187	58.52348	26.99873	3.49	129.75
lengthyrs	187	7.337344	4.631115	.5	25
length2yrs	187	6.143048	4.148068	.5	20
breakclause	187	.2299465	.4219279	0	1
rentfree	187	.6203209	1.586304	0	8
norentrev	187	.1764706	.3822435	0	1
revcycle	187	.144385	.3524233	0	1
floorunitln	187	6.331644	1.32441	2.944439	9.463353
ageln	187	2.647913	1.014871	0	4.521789
new	187	.171123	.3776275	0	1
old	187	.4064171	.4924827	0	1
cappropadj	187	1.177005	3.875817	0	46
singlelet	187	.026738	.1617497	0	1
hierarchy1	187	.171123	.3776275	0	1
hierarchy2	187	.6363636	.4823371	0	1
hierarchy3	187	.1657754	.3728772	0	1
industryloc1	187	.6363636	.4823371	0	1
industryloc2	187	.4705882	.5004742	0	1

Southern Shops 1998

Variable	Obs	Mean	Std. Dev.	Min	Max
rentpersqm	100	187.1681	119.9767	6.82	500
lengthyrs	100	9.844167	6.518564	.5	35
length2yrs	100	9.0075	6.564442	.5	35
breakclause	100	.16	.3684529	0	1
rentfree	100	.66	1.628161	0	8
norentrev	100	.27	.446196	0	1
revcycle	100	.05	.2190429	0	1
floorunitln	100	4.965098	.949425	2.944439	7.835184
ageln	100	3.871574	1.096954	0	6.190315
new	100	.03	.1714466	0	1
old	100	.88	.3265986	0	1
cappropadj	100	1.2349	3.324542	0	23.96
singlelet	100	.11	.314466	0	1
hierarchy1	100	.38	.4878317	0	1
hierarchy2	100	.5	.5025189	0	1
retailloc	100	.4	.492366	0	1

Southern Shops 2002

Variable	Obs	Mean	Std. Dev.	Min	Max
rentpersqm	68	277.8632	178.3829	8	964.3
lengthyrs	68	8.894608	4.617402	.5833333	20
length2yrs	68	8.321078	4.953835	.5	20
breakclause	68	.2205882	.4177262	0	1
rentfree	68	1.264706	2.428793	0	11
norentrev	68	.1176471	.3245852	0	1
revcycle	68	.0441176	.2068833	0	1
floorunitln	68	5.158606	1.059787	2.995732	7.862882
ageln	68	3.889811	.7143355	0	5.529429
retailold	68	.7058824	.4590328	0	1
cappropadj	68	.5474521	2.12948	0	16.94225
singlelet	68	.0588235	.2370435	0	1
hierarchy1	68	.4558824	.5017529	0	1
hierarchy2	68	.3970588	.4929263	0	1
retailloc	68	.3676471	.4857495	0	1

West End Offices 1998

Variable	Obs	Mean	Std. Dev.	Min	Max
rentpersqm	94	226.6738	123.2777	17.47634	515.6951
lengthyrs	94	7.778369	4.924089	.5	23
length2yrs	94	7.039894	4.753524	.5	22.66667
breakclause	94	.1170213	.3231692	0	1
rentfree	94	1.106383	2.029185	0	8
norentrev	94	.2659574	.4442108	0	1
floorunitln	94	5.330426	1.137091	2.64	8.63
ageln	94	3.746645	1.336904	0	5.986452
new	94	.0425532	.2029298	0	1
old	94	.7340426	.4442108	0	1
cappropadj	94	.7742553	1.88292	0	8.65
singlelet	94	.0319149	.176716	0	1
officeloc	94	.6382979	.4830696	0	1

West End Offices 2002

Variable	Obs	Mean	Std. Dev.	Min	Max
rentpersqm	65	352.0158	157.3872	7.535	726.711
lengthyrs	65	7.515385	5.402323	.9166667	24.91667
length2yrs	65	6.692308	5.486527	.25	24.91667
breakclause	65	.1692308	.3778736	0	1
rentfree	65	.8923077	1.733161	0	6
norentrev	65	.1692308	.3778736	0	1
floorunitln	65	5.613195	1.290227	2.995732	11.16746
ageln	65	3.343216	1.710472	0	5.627621
new	65	.2	.4031129	0	1
old	65	.6153846	.4902903	0	1
cappropadj	65	3.033955	5.976178	0	32.04115
singlelet	65	.0307692	.1740358	0	1
officeloc	65	.7692308	.4246039	0	1