The housing finance market: recent growth in perspective

This article[1] *updates the analysis contained in the article 'Mortgage lending and the housing market', in the September 1982* Bulletin. *Among recent developments:*

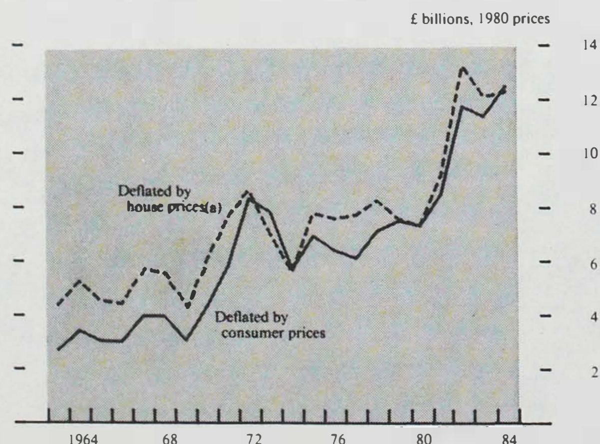
- *Housing finance has grown rapidly in real terms during the last four years.*
- *After the large-scale re-entry of the banks into the mortgage market in 1981–82, the building societies regained market share, and have increasingly shifted towards meeting mortgage demand using variations in interest rates rather than rationing.*
- *There has been a modest recovery in private sector housebuilding and over 600,000 dwellings have been transferred from the public to the private sector since 1980. House prices have recovered but have not risen as fast as in the 1970s.*
- *The increase in lending has nevertheless been more than sufficient to finance the total value of new private sector housing. The excess lending must have been used, directly or indirectly, for other purposes.*

Developments in the mortgage market

Net mortgage lending has grown at an unprecedentedly rapid rate in real terms during the last four years. In 1981, real flows of loans for house purchase[2] exceeded those recorded in the previous peak year (1972). In 1984, such flows were up by nearly half if consumer prices are used as a deflator, or by about a third if house prices are used as a deflator (Chart 1). The real stock of loans for house purchase outstanding has risen continuously to new heights during the last four years (Chart 2).

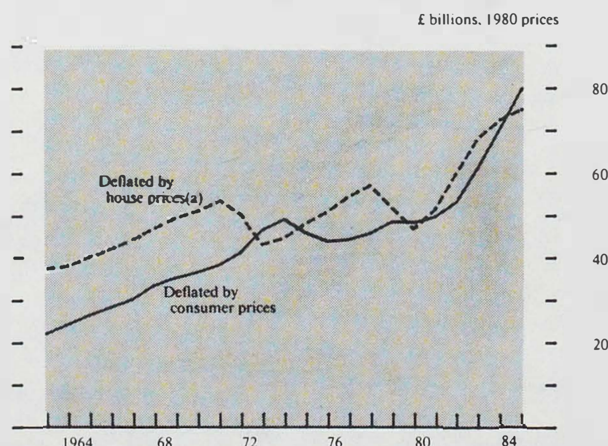
A feature of the early stages of this growth was the large scale re-entry of the banks into the housing finance market after the abolition in mid-1980 of 'corset' controls[3] on their balance sheet growth. Net new lending by banks grew rapidly from the beginning of 1981, and by mid-1982 was running at an annual rate well in excess of £5 billion, or nearly 40% of the total net new housing finance provided that year. By 1984, however, it had declined to about £2¼ billion, or less than 15% of the market (Chart 3).

Chart 1
Real flow of net new loans for house purchase



(a) Nationwide Building Society house price deflator.

Chart 2
Real stock of loans for house purchase



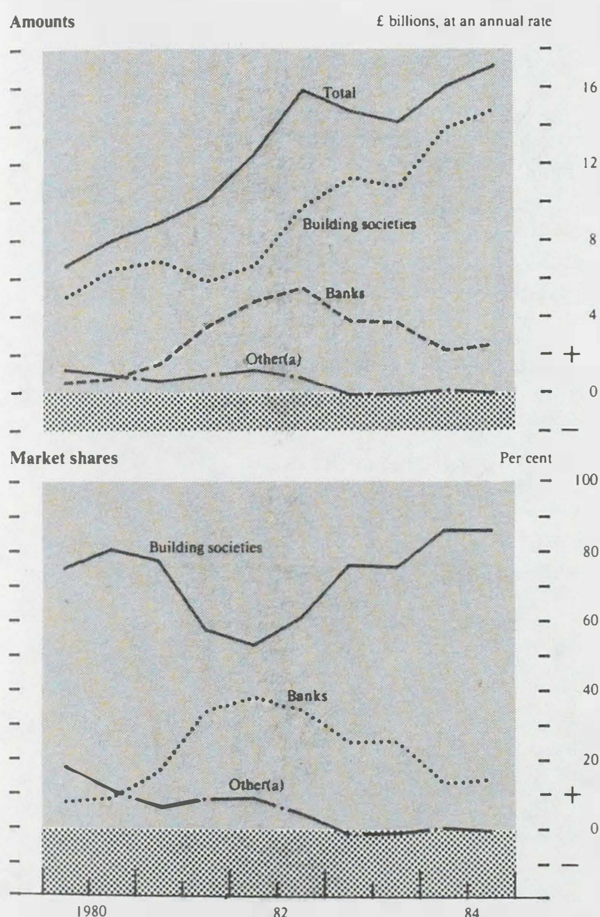
(a) Nationwide Building Society house price deflator.

Several factors account for this slowdown in bank lending:

- The period of rapid lending growth in 1981–82 was partly one of stock adjustment in banks' loan portfolios following a lengthy period when they felt inhibited from entering the mortgage market. Some deceleration in the rate of net new lending was

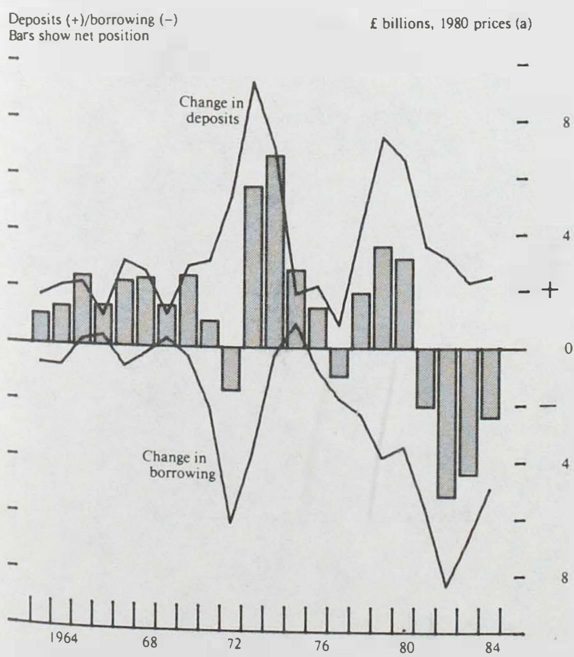
(1) Primarily the work of S J Drayson of the Bank's Economics Division.
(2) Ie all mortgage loans secured on housing, plus unsecured loans for the purpose of home improvements.
(3) See 'The supplementary special deposits scheme', March 1982 *Bulletin*, pages 74–85.

Chart 3
Net new loans for house purchase



(a) Local authorities, other public sector, life insurance companies and pension funds.

Chart 4
Personal sector financial position with the monetary sector



(a) Deflated by consumer prices.

therefore to be expected, especially as some banks were aiming to achieve a target percentage of their total loan portfolios in the form of mortgage loans.

- The outstanding stock of bank loans for house purchase has grown nearly sixfold in nominal terms since the end of 1980. Capital repayments by existing borrowers have therefore increasingly tended to depress net new lending for given amounts of gross new lending.

- Some banks may have felt inhibited from lending more in the mortgage market, because of pressure on capital ratios.

- While their lending to the personal sector—not just on mortgages, but more generally—was expanding rapidly, the banks began to lose competitiveness in the market for retail deposits as market interest rates began to fall. From being almost invariably net takers of deposits from the personal sector, the banks quickly became net lenders to that sector on a major scale (Chart 4). Funding this net lending position implied increased reliance on wholesale deposits of various types. Some banks may have felt it unwise to rely so heavily on short-term wholesale funding and restrained their (long-term) mortgage lending in consequence.

The banks introduced several devices to cut back demand for their mortgage loans. Potential borrowers often had to serve a qualifying period as an account-holder before being considered for a loan. Maximum loans, expressed either as percentages of the property value or as multiples of the borrower's income, were reduced. Mortgage queues at banks reappeared and, at some of them, mortgage applications ceased to be considered altogether. The measures taken particularly affected first-time housebuyers, and the percentage of bank loans made to this category of borrower fell steadily from about 40% at the end of 1982 to about 25% by mid-1984.

Currently, there are signs that the decline in their mortgage lending has gone further than the banks would like. Some have recently taken positive steps to encourage mortgage applications. Bank mortgage rates are also now more competitive, compared with building society rates, than they were when banks tried to scale down their new mortgage business. Furthermore, interest in the UK mortgage market has spread beyond the clearing and other domestically-based banks. Lending by foreign—notably American—banks has picked up. There have also been innovations aimed at separating the functions of originating, servicing and financing mortgage loans (traditionally in this country, institutions undertaking mortgage lending have performed all three functions).[1] For example, a Scottish clearing bank has sold

(1) Under current legislation it is probably *ultra vires* for building societies, the most important group of mortgage lenders in the United Kingdom, to originate or service loans on behalf of other lenders. This prohibition may be relaxed under forthcoming legislation. See *Building Societies: A New Framework* HM Stationery Office Cmnd 9316, July 1984, especially paragraph 4.13.

to several syndicates of banks mortgage loans which it has originated. It has also undertaken to continue servicing these loans. One advantage of such an arrangement is that it enables banks which would otherwise find it difficult or uneconomic to originate mortgage loans (principally because of the lack of a branch network) to acquire such loans for their portfolios.

Taken together, these developments suggest that net new mortgage lending by banks may pick up from the current rate of a little over £2 billion a year. Any recovery may, however, be modest, and the banks are perhaps unlikely to regain quickly the peak market share achieved in 1982.

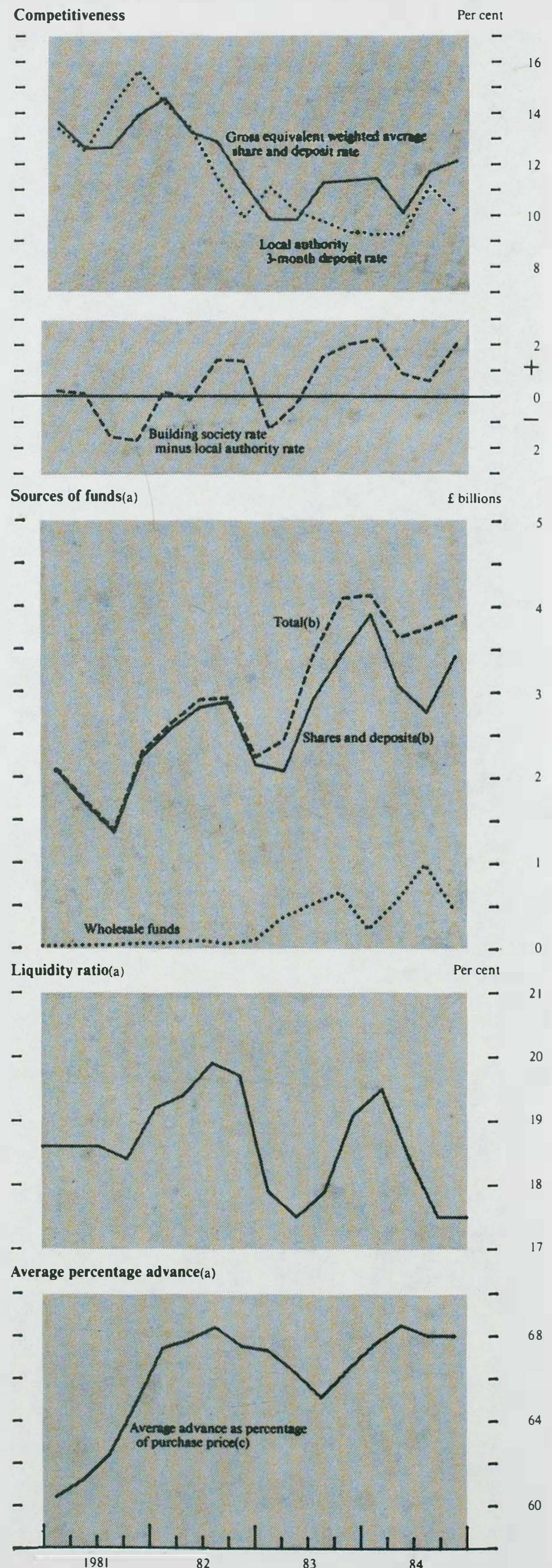
During the initial stages of the banks' re-entry into the mortgage market, the building societies suffered in both absolute and proportionate terms. In the first half of 1982, their share of net new loans for house purchase dipped to about 50% (Chart 3). Their share began to recover as the general level of interest rates in the economy began to decline from the end of 1981. The societies adopted the traditional course of reducing interest rates more slowly and to a lesser extent than the fall in market rates. Their shares and deposits became more competitive as a result (Chart 5), and inflows recovered.

The experience of the banks' re-entry into the mortgage market—and greater competition for retail funds, including from national savings—has contributed to a more fundamental shift in building society behaviour. Increasingly the societies have aimed at meeting the demand for mortgage funds, rather than trying to protect existing borrowers from the full effect of high interest rates and accepting the resultant degree of mortgage rationing. This has involved both an acceptance of higher interest rates on occasions than would formerly have been the case, and a greater sensitivity to changes in market interest rates. Competition between societies for retail funds has also intensified.

In the mortgage market many building societies initially responded to bank competition by reducing or eliminating differential (ie higher) mortgage rates on large loans. In the retail savings market the societies, as well as keeping the general level of their interest rates competitive, began to introduce a large number of new investment products. Until the early 1980s they had offered only a limited range. By far the most important—accounting for over three quarters of share and deposit balances outstanding at the end of 1980—was the ordinary share, from which money could usually be withdrawn without penalty at little or no notice. Higher rates of interest could generally be obtained only from investment in term shares, and money could not be withdrawn from these before the expiry of the original term (generally between two and five years).

From 1980 onwards, societies increasingly began to offer investment products which were less liquid than ordinary shares but more liquid than term shares. This was achieved partly by extending limited early withdrawal

Chart 5
Building society activity



(a) Seasonally adjusted.
(b) Including interest credited to accounts.
(c) At the mortgage approval stage.

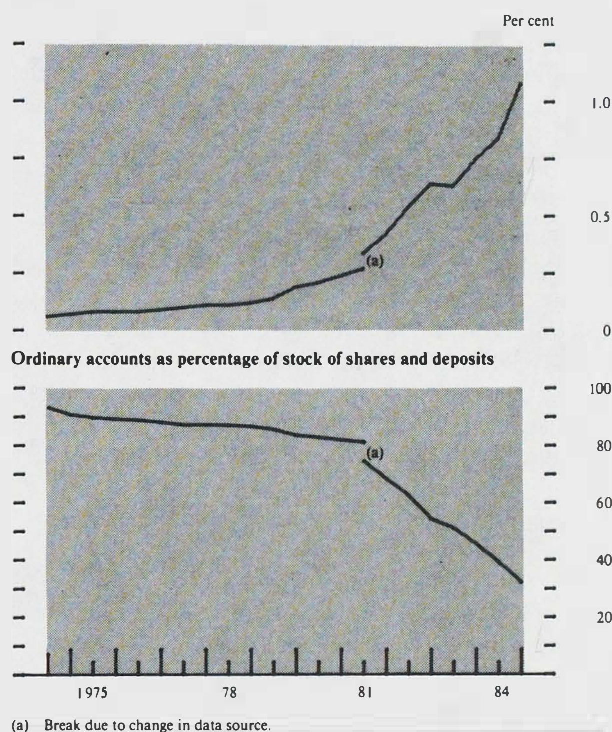
facilities (generally involving a significant interest penalty) to many new and existing term shares. In addition, various new accounts were introduced. These generally paid a premium over the ordinary share rate in return for a sizable minimum balance and a short period of notice for withdrawals (typically 7, 28 or 90 days). Immediate withdrawals were often allowed, usually in return for a modest interest penalty. More recently, the trend has been for higher rates to be paid on accounts withdrawable either at call or at very short notice, and with a very small minimum deposit.

These developments have placed great strain on the building societies' interest rate cartel. In October 1981, the Building Societies Association (BSA) limited its interest rate recommendations on building society investments to the ordinary share rate alone. Previously, the BSA had recommended the interest rates to be paid on many types of account (in particular, term shares of various maturities), but this arrangement broke down because of the more widespread differentiation of investment products. In October 1983, new arrangements were announced. Under these, the requirement that societies give 28 days' notice to the BSA of any changes to basic interest rates (including rates on investments which could be withdrawn in whole or in part within 28 days without loss of interest) was dropped. This gave societies greater freedom to set interest rates on the newly-popular short notice/penalty accounts. The largest societies did, however, indicate a willingness to discuss changes in their basic rates with other BSA members, implying that they would give some notice of their intentions.

Although most societies have continued to adhere to the BSA's recommended or advised ordinary share rate, the process of differentiating investment products has made it progressively less meaningful, both as a 'base' rate for building society interest rate structures and as an indicator of building society competitiveness *vis-à-vis* other financial institutions. The average rate paid on all shares and deposits has come to exceed by far that on ordinary shares, while ordinary shares themselves have accounted for a diminishing proportion of total retail balances. These processes have greatly speeded up since the 1970s (Chart 6), reflecting the intensified competition for retail funds both between individual building societies, and between building societies as a whole and other financial institutions.

When the BSA Council advised new share and mortgage rates in July 1984, some societies decided to charge slightly higher mortgage rates in order to protect their margins. A further round of interest rate competition and investment product innovation in September led to sharp increases in average investment rates, and by October almost all societies had raised their base annuity mortgage rates above the (unaltered) BSA advised rate.

Chart 6
Building society ordinary accounts



(a) Break due to change in data source.

The November BSA Council meeting decided that the BSA should cease to recommend or advise any specific interest rates to its members. Collective discussion of interest rates has continued, with the BSA co-ordinating a reduction in rates in November 1984 and an increase in January 1985, but the Association's influence over interest rate decisions has lessened during the last few years of rapid change. There has been a shift towards the boards of individual building societies making independent and competitive decisions about the timing and extent of interest rate changes.[1]

The increasing tendency of societies to follow market interest rates more closely has not, however, been an entirely smooth process. Shortly after they decided to cut interest rates in November 1982, market rates quickly moved up again. The societies did not decide to raise rates until after the general election in June 1983, and retail inflows during the first half of 1983 were depressed as a result (Chart 5). This occurred at a time when the banks were cutting back their lending, and signs of mortgage rationing reappeared. Despite a sharp rundown in liquidity ratios, mortgage queues developed, there were modest cutbacks in average loan-to-value ratios and, in the autumn of 1983, a widespread reintroduction of differential mortgage rates by the societies.

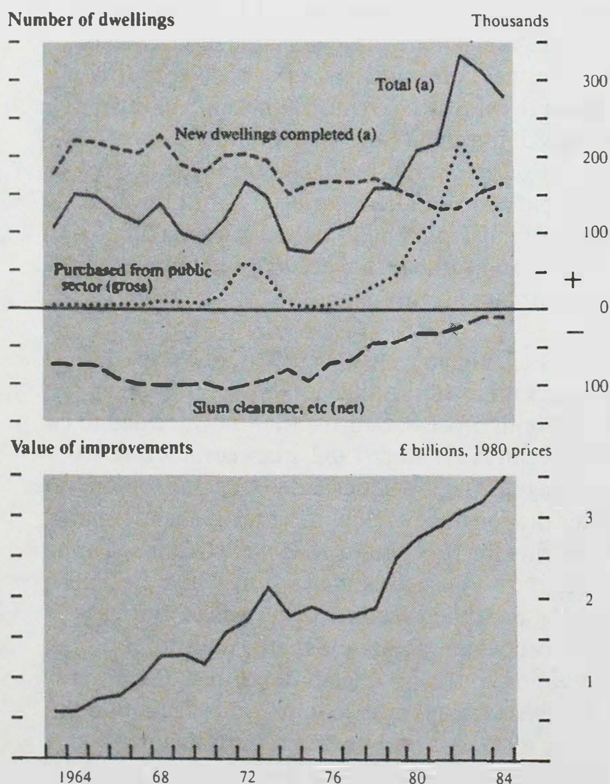
Since then the societies have increased their lending on a large scale. This was partly facilitated by the entry of the

(1) In its Green Paper outlining a possible new legislative framework for building societies, the government has proposed that the societies' current exemption from restrictive trades practices legislation should be withdrawn. This would not by itself end agreements between building societies on interest rates, but such agreements could then be open to legal challenge by the Director General of Fair Trading as being contrary to the public interest. If such an action was successfully brought, building societies would have to settle their own rates independently, without central guidance from the BSA. See *Building Societies: A New Framework*, especially paragraphs 6.08–6.11.

building societies into the wholesale CD and time deposit markets, in May and October 1983, respectively.[1] In all £1.6 billion (net) was raised from wholesale sources during 1983, and a further £2.2 billion in 1984 (equivalent in the latter year to 15% of funding from all sources). Besides being an additional source of funds, the wholesale markets have provided extra flexibility for the societies' funding operations. Traditionally, the societies have been asset managers in the short term, using their holdings of liquid assets as a 'cushion' to stabilise the flow of mortgage lending, against the background of the fluctuations in retail receipts which have resulted from their stickier interest rate structure. By using the wholesale markets to help iron out fluctuations in retail receipts (Chart 5), the societies have also adopted the techniques of liability management. In the longer term, this may enable them to maintain a higher proportion of their total assets in the form of mortgages, and a lower proportion in the form of liquid assets. Prudential considerations will, however, limit the extent to which the societies can switch towards reliance on wholesale funding.

Another important influence on societies' liquidity ratios was the decision, announced by the Inland Revenue on 23 February 1984, that building societies' profits on the sale of gilt-edged securities would henceforth be subject to corporation tax rather than capital gains tax. In the past societies had made substantial profits on such securities, but in general no capital gains tax liability had accrued because the securities had mostly been held for more than one year. The lowering of the post-tax rate of return on holding liquid assets, which the decision implied, may have encouraged some societies to switch into higher-yielding mortgage assets. This was probably one factor behind the fall in the liquidity ratio from 19.6% at end-February to 17.5% by end-December.

Chart 7
Changes in the private sector housing stock



(a) Including housing associations.

The contribution of the traditional retail share and deposit market has been quantitatively the most important factor behind the expansion of building society mortgage lending. Retail savings rates have been kept at highly competitive levels since mid-1983 and the societies have reacted promptly to increases in competing rates (notably in July 1984 and January 1985). Currently, there are few signs of mortgage rationing (some lending institutions are even advertising the availability of mortgage funds), and building society differential mortgage rates have once more begun to disappear. In view of the already substantial erosion of the building societies' interest rate cartel, it is difficult to envisage the societies becoming any less responsive to movements in market interest rates in the future.

The supply of housing

New housebuilding is generally the principal source of additional private sector dwellings. Recent increases in real lending may have had some influence on the rate of new housebuilding, as private sector starts (including those by housing associations) recovered from the low level of 113,000 in 1980, to 180,000 in 1983 (the highest annual figure since 1976, though still well below almost every year in the 1960s). In 1984, starts were at the slightly lower rate of 165,000. Completions, which lag behind starts by approximately eighteen months, have risen more slowly and in 1984 were running at an annual rate of 166,000 (Chart 7).

A further source of supply of private housing is the conversion and improvement of existing dwellings.[2] During the last twenty years, expenditure on such improvements has increased roughly fivefold in real terms. An attraction of this source of supply is that it does not involve the high transactions costs associated with a move to a different dwelling. Furthermore, lenders have become increasingly willing to provide finance for home improvements in recent years and interest on such borrowing attracts income tax relief, subject to the overall limit on qualifying loans.[3]

(1) They had previously been effectively excluded from these markets because they could pay interest gross only to a limited range of financial institutions. From May and October 1983, respectively, they were allowed to pay interest gross to any holder of a CD or time deposit, subject to a minimum denomination of £50,000.

(2) But not the maintenance and repairs required to keep existing dwellings in good order. In the national accounts, both types of expenditure, apart from grant-aided expenditure on conversions and improvements, were until recently excluded from fixed capital formation and included in consumers' expenditure. In the 1984 Blue Book the CSO reclassified all expenditure on home improvements (but not repairs and maintenance) as capital expenditure. Separate estimates of such expenditure have been produced though they are subject to wide margins of error: see 'A note on the personal sector saving ratio' by Tim Jones, *Economic Trends*, September 1984.

(3) This limit was first fixed in 1974 at £25,000: it was raised to £30,000 in 1983.

Transfers of dwellings from the public sector to the private sector have taken place on an unprecedentedly large scale during the last four years (Chart 7) reflecting government policy to encourage owner-occupation. The Housing Act 1980 extended the provisions under which local authorities were required to dispose of dwellings particularly through the right to buy, established in Part I of the Act, which came into force on 3 October 1980. In the four years 1981–84, approximately 630,000 dwellings in Great Britain have been transferred to private hands, the majority under the right to buy scheme, though there has been a decline in the rate of transfer since 1982. For comparison, about 580,000 new private sector dwellings were completed in Great Britain during the same period (including dwellings completed by housing associations).

The impact of these transfers on the private sector housing market is difficult to assess. The discounts (averaging over 40%) offered on sales of public sector dwellings have probably been sufficiently high to attract substantial numbers of tenant purchasers who would not otherwise have contemplated a switch to owner-occupation. On the other hand, some tenants who would have been willing to move to the owner-occupied sector, paying a free market price, have been able to buy their existing public sector dwellings at a discount. This may have reduced demand in the private sector housing market. Recent policy towards public sector housebuilding, and particularly towards local authority rents, may also have encouraged larger numbers of public sector tenants to move to the private sector (Chart 8). It seems likely that transfers on the scale that has occurred have had some restraining effect both on house prices and private sector housebuilding.

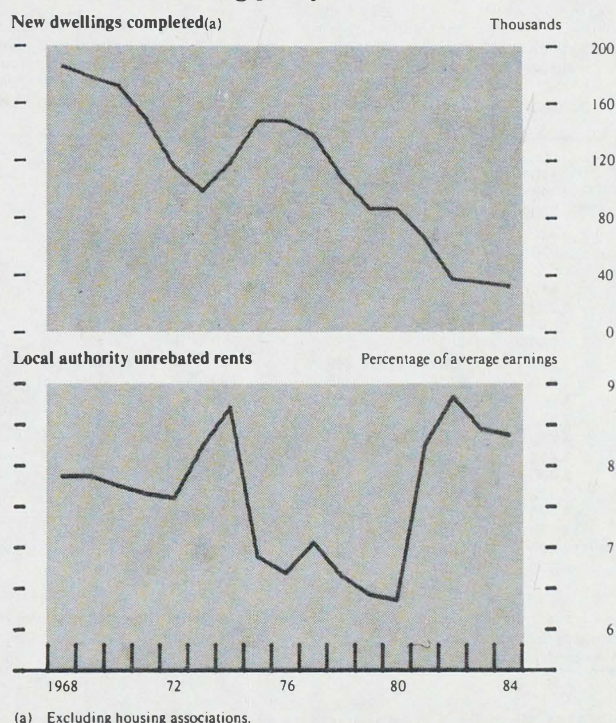
The major source of loss to the stock of privately-owned dwellings since the war is slum clearance. This has diminished greatly in importance since the late 1960s and the early 1970s (Chart 7) and probably now affects less than 20,000 dwellings a year.

The demand for housing and house prices

The long-lived nature of the housing stock, and the slowness with which it can change,[1] suggest that any increase in the demand for housing will be reflected, initially at least, principally in higher house prices. Since the trough in 1981–82 house price inflation has risen more rapidly but, by the standards of the two house price booms of the 1970s, the recovery has so far been fairly modest (Chart 9).

Some econometric models which attempt to explain house prices with parameters based on the experience of the 1970s assign an important role to the real stock of mortgages, principally as an indicator of whether underlying demand is allowed to become effective. These

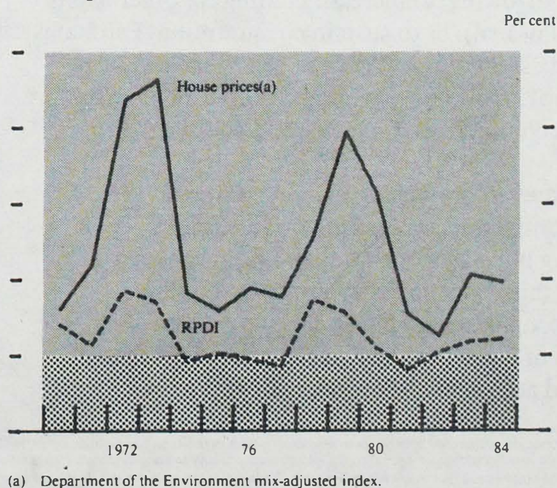
Chart 8
Public sector housing policy



(a) Excluding housing associations.

models have greatly overpredicted the price rises that have actually occurred during the last few years, and it is now clear that this failure is not due to some temporary phenomenon such as clearing a backlog of houses remaining unsold from the previous downturn in house prices. It may instead reflect the difficulty of separating adequately the effects of real lending and other variables, notably real personal disposable incomes (RPDI), from 1970s data alone. Both the 1970s house price booms, for example, were accompanied by substantial increases in RPDI and real lending. By contrast, the current recovery in house prices has so far been accompanied by a large increase in real lending and only a modest recovery

Chart 9
Year-on-year percentage changes in nominal house prices and RPDI



(a) Department of the Environment mix-adjusted index.

(1) In 1982, for example, when sales of public sector dwellings were at their peak, the number of privately-owned (ie owner-occupied plus private rented) dwellings in Great Britain increased by less than 2½%.

Table A
Estimates of net cash withdrawal from the private sector housing market

£ millions

	Net new loans for house purchase	Value of new private sector dwellings completed	Value of dwellings purchased from public sector (gross)	Value of private sector slum clearance etc (net)	Value of improvements to private sector dwelling stock	Government capital grants to the private sector for housing purposes(a)	Net private sector expenditure on housing (columns 2+3 −4+5−6)	Net cash withdrawal (column 1− column 7)	Net cash withdrawal (1980 prices(b))
	1	*2*	*3*	*4*	*5*	*6*	*7*	*8*	*9*
1963	570	560	10	80	100	10	570	—	—
1964	750	740	10	80	100	20	750	—	− 10
1965	700	800	10	90	140	20	840	− 140	− 590
1966	720	820	10	120	150	20	850	− 130	− 550
1967	980	850	10	130	200	20	910	70	290
1968	1,020	990	20	150	270	20	1,120	− 100	− 390
1969	840	890	20	160	290	20	1,030	− 190	− 700
1970	1,250	890	20	160	280	20	1,010	240	840
1971	1,830	1,120	60	200	410	40	1,350	480	1,540
1972	2,780	1,410	250	250	470	80	1,800	980	2,940
1973	2,830	1,880	240	320	710	150	2,370	460	1,280
1974	2,420	1,680	40	290	710	190	1,940	480	1,130
1975	3,630	2,020	20	380	940	150	2,460	1,170	2,240
1976	3,870	2,210	40	300	1,110	430	2,640	1,230	2,040
1977	4,250	2,380	100	300	1,230	580	2,830	1,420	2,040
1978	5,410	2,890	260	230	1,380	730	3,570	1,840	2,430
1979	6,460	3,400	420	290	2,080	690	4,920	1,540	1,790
1980	7,330	3,860	870	240	2,750	800	6,450	880	880
1981	9,490	3,680	1,130	250	3,300	730	7,130	2,360	2,120
1982	14,150	3,730	2,140	180	3,840	1,090	8,430	5,720	4,750
1983	14,410	4,780	1,730	90	4,130	1,870	8,680	5,740	4,530
1984(c)	16,570	5,540	1,440	100	4,650	2,170	9,360	7,210	5,440

(a) Consists principally of local authority home improvement grants and the Housing Corporation grant.
(b) Deflated by consumer prices.
(c) Figures partly projected.

in RPDI (Chart 9). Changes in the stock of real lending may have become less reliable as an indicator of changes in the effective demand for housing, perhaps because part of such lending may have been used for purposes unrelated to the housing market.

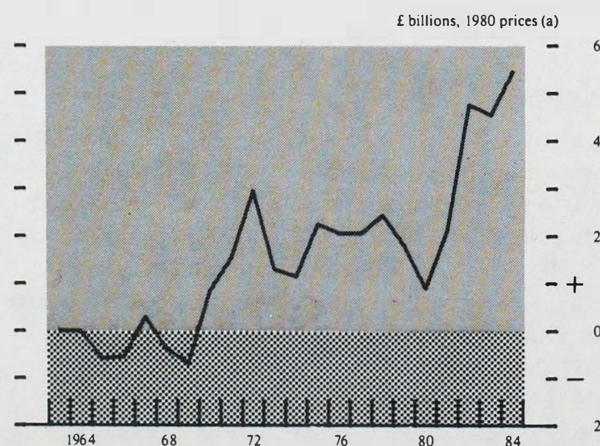
Net cash withdrawal from the private sector housing market

During the last four years, the net increase in the stock of house purchase loans has greatly exceeded the private sector's net expenditure on the sources of supply of housing. This has occurred despite modest recoveries in both private sector housebuilding and house prices; and despite large-scale transfers of dwellings from the public to the private sector. It follows that the excess lending has, directly or indirectly, been used for other purposes—to repay other borrowing, to finance interest payments on existing borrowing, to increase holdings of other assets (financial or real), or to sustain consumption. Estimates of this excess lending, which can be termed net cash withdrawal[1] from the private sector housing market, are shown in column 8 of Table A (see also Chart 10).[2]

The private sector housing market comprises the owner-occupied sector and the private rented sector (including housing associations). For purposes of analysis, this wider concept is preferred to the owner-occupied sector alone, for two reasons. First, the numbers of houses in the two sub-sectors cannot be identified accurately.[3] Second, cash withdrawn by the owners of privately rented dwellings is just as relevant to an assessment of private sector economic behaviour as cash withdrawn by owner-occupiers. The private sector's net expenditure on housing (column 7) includes expenditure of a capital nature[4] but excludes current expenditure (for example, on repair and maintenance of dwellings).

As a first step towards understanding how and why net cash withdrawal from the private sector housing market has recently been occurring on such a large scale—in 1982–84, for example, the amount withdrawn was roughly

Chart 10
Net cash withdrawal from the private sector housing market



(a) Deflated by consumer prices.

(1) This comprises the difference between cash injections—both deposits and regular repayments of capital—and withdrawals. It is therefore affected by a number of factors, including the switch from annuity to endowment mortgages described later.
(2) It should be emphasised that many of the figures in Table A (including those in column 8) should be regarded as rough estimates only. All the figures have therefore been rounded to the nearest £10 million in order to avoid any spurious impression of accuracy.
(3) See Department of the Environment *Housing Policy. Technical Volume. Part I*, HM Stationery Office 1977, page 121.
(4) No account has been taken of the transactions costs associated with purchases and sales of private sector dwellings, because of difficulties of estimation. By national accounts convention, such costs should, in principle, be included within gross domestic fixed capital formation.

equivalent to $3\frac{1}{2}\%$ of total consumers' expenditure—it is helpful to try to disaggregate the transactions in the housing and mortgage markets which lie behind the calculations in Table A. This can be done by classifying all the transactors in the housing and mortgage markets into five categories, as follows:

- owners of privately rented dwellings;
- households entering the owner-occupied sector for the first time;
- households leaving the owner-occupied sector;
- households within the owner-occupied sector and not moving house;
- households moving house within the owner-occupied sector.

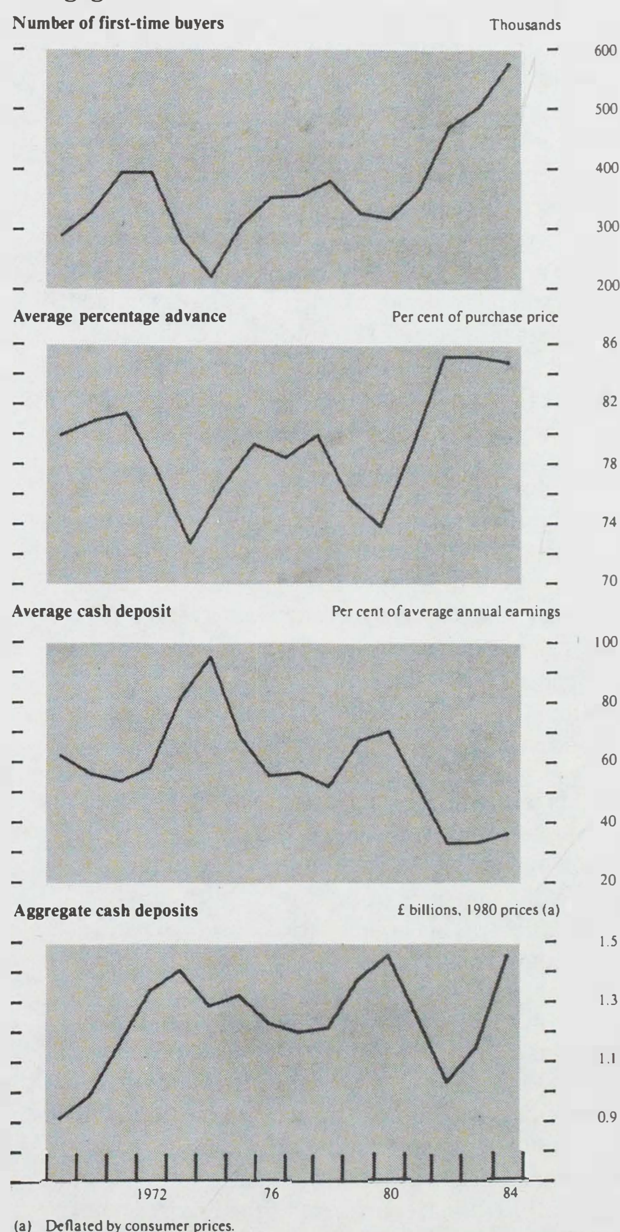
Each of the five categories of transactor is considered in turn.

Owners of privately rented dwellings

The private rented sector has been in continuous decline for many years, with the number of dwellings falling by about half over the last two decades to approximately 2.4 million. This has occurred partly because successive rent acts have made the offering of such accommodation an unattractive economic proposition to many private landlords. Many houses in this sector have been sold to the owner-occupied sector, either to sitting tenants or by open-market sales with vacant possession. Although comprehensive information about sales of private rented houses is not available, the Department of the Environment estimated that there were approximately 60,000 such sales in 1971. Since then, sales are likely to have gradually diminished as the stock has contracted. It may also be the case that sales are only weakly related to the level of activity in the owner-occupied housing market—landlords may be keen to sell their properties when prices are rising rapidly, but this is the time when their tenants may least be able to afford to buy them or move elsewhere. Dwellings have also been lost from the private rented sector through slum clearance, the bulk of which is thought to be from this sector. The pace of slum clearance has also declined over the last ten to fifteen years (Chart 7).

Very little mortgage debt is secured on private rented property even though such property comprises approximately 16%, by number, of the privately owned stock of dwellings. In recent years, for example, less than 0.3% of new building society lending has been secured on dwellings to be partly or wholly let by the borrower, or on dwellings owned by housing associations. The gradual decline of the private rented sector therefore helps explain the phenomenon of net cash withdrawal. Typically, sellers of rented property have had little mortgage debt, while the purchasers will often have been first-time buyers with

Chart 11
First-time buyers securing a building society mortgage



(a) Deflated by consumer prices.

larger mortgages. To the extent that sales have been made to the owner-occupied sector, then the amount of mortgage debt secured on the properties concerned has probably increased sharply. The contraction of the sector has probably slowed in recent years, and cannot therefore contribute to an explanation of the recent upsurge in net cash withdrawal.

Households entering the owner-occupied sector for the first time

By definition, first-time buyers do not have an existing equity stake against which they can borrow, and in almost all cases they contribute a cash deposit towards their house purchase.

There have been large fluctuations in the number of first-time buyers entering the housing market with the assistance of building societies in recent years (Chart 11).

Their numbers have, however, been strongly correlated with the average percentage of the property purchase price which has been advanced. This may be because the timing of some purchases is partly dependent on the size of deposit required by lenders. In the past, the most important group of lenders, building societies, have frequently rationed mortgage funds, and, although preference has usually been given to first-time buyers, more stringent deposit requirements may at times have deterred potential purchasers. Thus when funds have been freely available a large number of borrowers have tended to contribute small deposits, while in periods of rationing a smaller number of borrowers have tended to contribute larger deposits. The amount of cash injected into the housing market by way of first-time buyers' deposits has therefore been more stable than the number of buyers alone might suggest.

Since 1980, for example, the number of first-time buyers securing a building society mortgage has risen to a new peak. As the average percentage advance granted to such buyers has risen sharply, so the average deposit contributed, expressed as a percentage of average earnings, has reached a new low. The aggregate real value of such deposits fell but has since recovered (Chart 11). Overall therefore the real value of deposits explains little of the trend increase in net cash withdrawal.

Households leaving the owner-occupied sector

When households leave the owner-occupied sector, they will usually realise for cash the equity stake in their dwelling (ie the sale price of the dwelling, less any outstanding debt). This process also helps to explain net cash withdrawal.

Households leave the owner-occupied sector for a variety of reasons. The number of emigrant households is small (perhaps 25,000 a year) and probably fluctuates little. Households moving to the private rented sector have probably fallen in number as that sector has declined. Moves to public sector tenancies are more difficult to evaluate. In 1977 the Department of the Environment forecast that owner-occupier moves to local authority tenancies might slowly increase, principally because of a lessening of pressure on local authorities from people who are ill-housed.[1] Since then, public sector dwelling sales have risen sharply in number and have probably increased the reluctance of local authorities to offer tenancies to those households which are already (comparatively) well-provided for in the owner-occupied sector.

The impact of the increasing number of divorces is also hard to assess. Among owner-occupier households, divorce will sometimes lead to the marital home being sold. Cash withdrawn in this way may subsequently be reinvested in the housing market, for example if the original partners separately purchase dwellings for their own occupation, though as in other cases of moving house the opportunity may be taken to restore gearing levels.

By far the most important type of household dissolution affecting cash withdrawal is the death of existing owner-occupiers. In such cases the house will often be sold to a purchaser using borrowed funds, loans secured on the house (if any) will be repaid, and the proceeds distributed to the former owner's heirs. Debts outstanding are usually minimal as approximately 95% of all owner-occupier households headed by a person aged 65 or more own their homes outright. This process has almost certainly become more important because of the past growth in home-ownership. In Great Britain, for example, the number of owner-occupied dwellings has increased by more than 50% during the last twenty years.

A higher proportion of people dying could therefore be expected to leave a house as part of their estate. The spread of owner-occupation has also meant that heirs may have become less likely to invest the proceeds of an estate in the housing market because they are likely to be home owners already.

It should, however, be stressed that the increase in (gross) cash withdrawal caused by the deaths of former owner-occupiers is very much a long-term trend and is probably of little use in explaining the observed short-term fluctuations in net cash withdrawal from the housing market (Chart 10). In particular, no more than a small part of the upsurge in net cash withdrawal since 1980 could be attributed to an increasing number of deaths among owner-occupiers.

Owner-occupied households not moving house

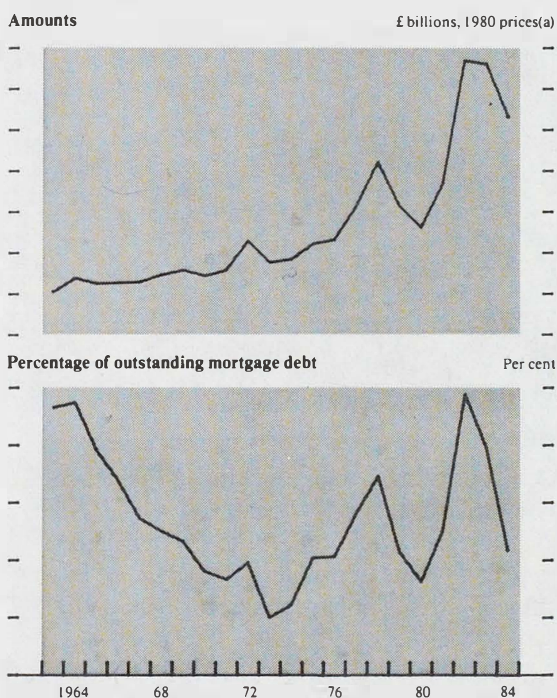
The many existing owner-occupiers who have financed their house purchases with conventional annuity (repayment) mortgages will be making regular repayments of capital to their lenders. Such repayments (Chart 12) tend to reduce net cash withdrawal from the housing market because they reduce the increase in net new loans for house purchase for a given amount of new (gross) lending. Regular capital repayments are affected by many factors:[2]

- Regular repayments tend to be inversely related to the level of interest rates. A reduction in interest rates, for example, leads to an increase in that part of a monthly payment on an annuity mortgage which represents a capital repayment, even when the borrower adjusts his monthly payment to reflect the decline in interest rates. The reduction in the level of mortgage rates from an average of approximately 15% in 1981 to 11% in 1983 has been an important factor behind the recent rapid rise in regular capital repayments.

- When mortgage interest relief at source (MIRAS) was introduced in 1983 some lenders—notably building societies—switched borrowers' payments on annuity mortgages from a constant gross

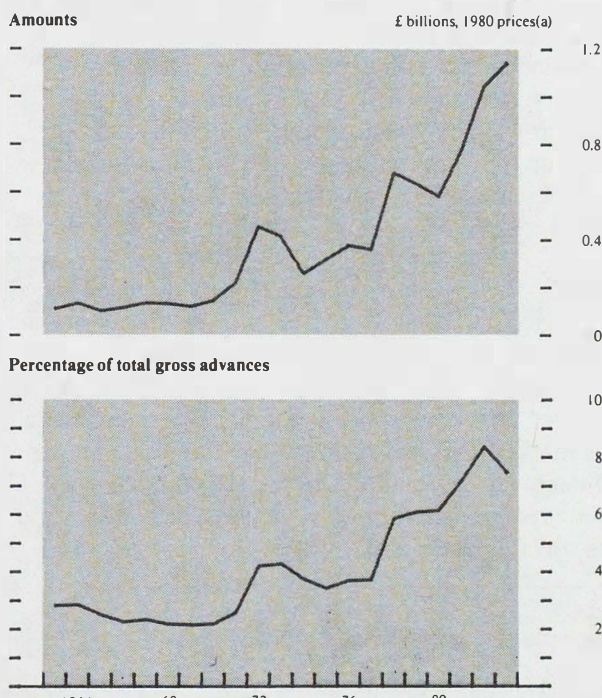
(1) Department of the Environment, *Housing Policy, Technical Volume, Part I*. HM Stationery Office 1977, page 133.
(2) For a fuller discussion, see 'Mortgage Repayments', *BSA Bulletin* No 40, October 1984.

Chart 12
Regular repayments of capital by building society borrowers



(a) Deflated by consumer prices.

Chart 13
Building societies: further advances on existing mortgages



(a) Deflated by consumer prices.

repayment to a constant net repayment basis. With constant gross repayments the interest element in successive payments tends to decline as the capital sum outstanding declines. Thus the borrower's tax relief also declines and, taking this into account, his net payments actually rise. With a constant net repayment schedule, however, payments are initially made at a higher rate than the net cost of a constant gross repayment schedule. Since the surplus reduces the capital sum outstanding, the introduction of MIRAS was accompanied by accelerated repayments of capital on some mortgages.

- There has been an increasing trend away from annuity mortgages towards endowment mortgages. In 1970 only 6.7% of new building society mortgages were endowment mortgages; by 1979 the figure was 26.7%. The introduction of MIRAS gave this trend a further boost. In 1983 54.5% of new building society loans were of the endowment type and many existing annuity loans were converted to endowment loans. By the end of 1983 over 45% of the stock of building society mortgages was of the endowment type. The withdrawal of life assurance premium relief in the 1984 Budget may, however, dampen the trend somewhat. Because endowment mortgages involve the regular payment of interest only to the original lender (separate payments are made into an insurance policy so that the capital sum borrowed can eventually be repaid), a trend towards such mortgages tends to reduce regular repayments of capital. In the longer term this may have an important impact on both the cash flow of mortgage lending institutions and net cash withdrawal from the private sector housing market as measured in Table A. The counterpart to any resultant rise in measured cash withdrawal will be increased claims on insurance companies by mortgagors.

For much of the period since 1980 regular repayments have greatly increased in real terms, principally because interest rates have declined and the outstanding real stock of mortgages has grown rapidly. Because repayments of capital tend to reduce net cash withdrawal, gross withdrawals of cash by other transactors in the mortgage and housing markets must have risen even faster since 1980 than the net measure shown in column 8 of Table A.

It is possible for owner-occupiers to withdraw cash from the housing market, without moving, simply by increasing the debt secured on their present property. There are indications that lending of this type may have increased in recent years. Further advances on existing mortgages by building societies, for example, have quadrupled as a percentage of total gross advances since the late 1960s.[1] Deflated by the consumer price index, such advances have increased approximately tenfold (Chart 13).

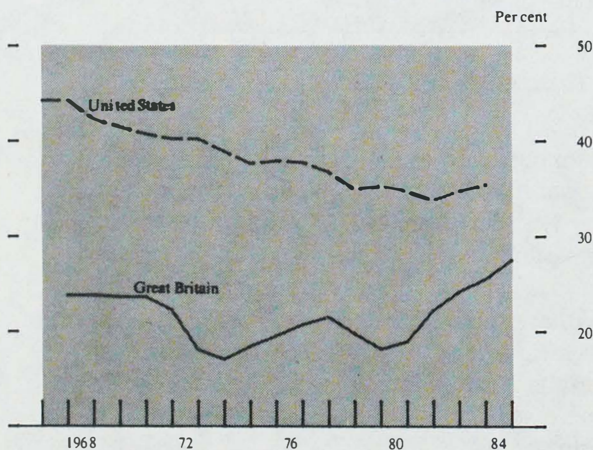
(1) There are currently no legal restrictions on the purpose for which building society advances can be made. The principal restriction is that building society advances have to be 'made upon security by way of mortgage of freehold or leasehold estate'. This restriction may be relaxed when the legislative framework governing building societies is revised: in particular, societies will probably be able to grant unsecured personal loans within certain balance sheet limits. See *Building Societies: A New Framework*, especially paragraphs 3.11 to 3.13.

Probably the major part of this growth has been connected with increased real expenditure on home improvements (in which case net cash withdrawal is unaffected). But it seems reasonable to assume that some lending has not been directed towards expenditure on home improvements. From the borrower's point of view this type of borrowing may be attractive, even if the interest payments on it do not legitimately qualify for income tax relief, because the interest rate is generally lower than on alternative sources of credit.

Households moving house within the owner-occupied sector

The four broad categories of transaction, already analysed, can provide at best only a partial explanation of the observed fluctuations in net cash withdrawal from the housing market. This leaves the explanation that they are caused mainly by fluctuations in the cash withdrawn by owner-occupiers when they move house. There are several reasons why fluctuations of this type may have occurred.

Chart 14
Gearing ratios for owner-occupied housing[a]

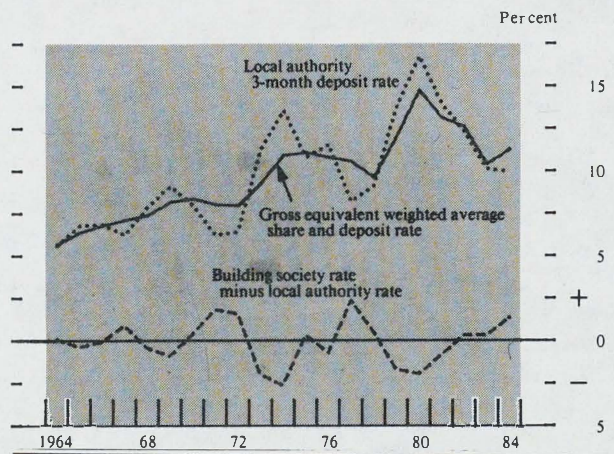


(a) Stock of all loans for house purchase as a percentage of the value of the housing stock.

One of the effects of the high average rate of inflation in the 1970s was that those borrowing on mortgage saw their gearing ratios in the housing market quickly eroded. For example, someone purchasing an average-price secondhand dwelling at the beginning of 1960 with an 80% annuity mortgage from a building society, had, by the beginning of 1970, outstanding mortgage debt equivalent to 30% of the dwelling's current value. A similar buyer at the beginning of 1970 would, ten years later, have had a debt/value ratio of under 15%. The two major house price booms in the 1970s had a particularly marked effect in lowering average gearing ratios in the housing market (Chart 14).

The lending behaviour of building societies may have exaggerated the impact of the house price booms on gearing ratios. At least in the later stages of these booms,

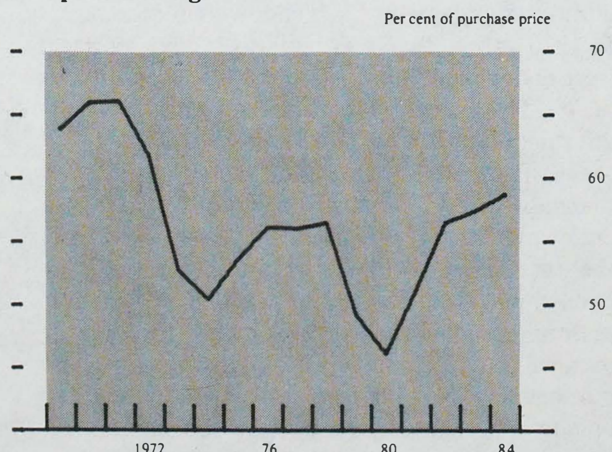
Chart 15
Building society competitiveness



interest rates rose strongly, without being fully matched by rises in building society rates (Chart 15). This led the societies to ration mortgage funds quite severely and the average loan to value of property ratio secured by owner-occupiers moving house fell sharply (Chart 16).[1]

Owner-occupiers may have wished to restore gearing ratios and withdraw cash from the housing market for several reasons. In the short-term, the impact of inflation upon mortgagors' cash flow was often adverse. Although the real value of mortgage debt was continuously falling, it was not usually possible for an individual mortgagor to make short-term upward adjustments in the volume of his outstanding nominal mortgage debt. Such adjustments could usually be made only at intervals of time, often of several years and typically on the occasion of a house move. But in the shorter term, to the extent that interest rates adjusted to higher inflation, mortgagors faced higher cash outflows to service their debt. Subsequent cash withdrawal from the housing market may partly represent an attempt by mortgagors to compensate for higher

Chart 16
Average building society mortgage to owner-occupiers moving house



(1) It has been suggested that the sharp falls in loan/value ratios during the two house price booms occurred principally because borrowers voluntarily reinvested in the housing market their existing equity stakes (which were proportionately swollen because of the inflation) when moving house. This was undoubtedly an influence tending to depress loan/value ratios for owner-occupiers moving. However, the simultaneous sharp falls in the loan/value ratios of first-time buyers (Chart 11), who had no such equity stakes to reinvest, strongly suggest that rationing by lenders was also an important factor.

expenditure on interest payments. On more general grounds, owner-occupiers whose gearing ratios were sharply reduced by inflation may have wished to diversify into some asset other than housing, or to increase consumption.

Another way in which owner-occupiers moving house can influence net cash withdrawal is through trading up and trading down. Demographic trends, together with past growth in the owner-occupied housing stock, could be expected to be an important influence here. For example, a household's demand for housing may decline once any children have left the family home. Cash released on the sale of a home may also be used to supplement an income which, in retirement, is often reduced. The timing of a decision to trade up or down may be varied (for example, because finance is not readily available, or because the prices of different types of houses are unattractive) so the impact on net cash withdrawal through time may be uneven. Unfortunately there is little empirical evidence to suggest what that impact has been at different times.

Table B
Cost of personal credit(a)

Credit instrument	Interest rate per cent per annum
Building society annuity mortgage (net of tax relief at the basic rate)	10.8(b)
Building society annuity mortgage (gross)	15.5(b)
Clearing bank overdraft	16.5 to 17.5
Clearing bank personal loan	21.0 to 23.9
Credit card	26.8

(a) Interest rates prevailing on 22 March 1985.
(b) Based on a quoted annuity mortgage rate of 14.0%.

A further factor which influences all transactors in the mortgage market, not just owner-occupiers moving, is the cost of mortgage credit. Even without income tax relief on mortgage interest payments, borrowing on mortgage is usually the cheapest form of credit available to individual borrowers: income tax relief makes it by far the cheapest (Table B). It was noticeable that when, in 1969, personal income tax relief on interest payments was first confined to loans for the purpose of house purchase or improvement, a sharply increased trend towards net cash withdrawal from the housing market appeared almost immediately (Chart 10).

Conclusion

The phenomenon of net cash withdrawal from the private sector housing market is complex. The sharp fluctuations which have been observed over the last fifteen years or so probably owe much to the interaction of inflation (particularly house price inflation), the long-lived nature of most mortgages, the infrequency of house moves, and the policies of lending institutions. Inflation may have created an incentive for owner-occupiers to withdraw cash from the housing market, but the process of adjustment is inherently a long one. The majority of borrowers cannot quickly adjust to their desired levels of mortgage debt because such adjustments are usually made at the time of a house move. Those borrowers who have moved house may not always have been able to adjust to their desired levels of mortgage debt because of credit rationing. The periods of adjustment (and hence higher net cash withdrawal) in the housing market have usually been those when interest rates have been falling. In these circumstances building society competitiveness has improved and loan/value ratios have increased as rationing has become less important.

There have also been longer-run factors at work. Of these, probably the most important are the past (and continuing) growth of the owner-occupied housing sector and the availability of income tax relief on loans for house purchase or improvement. The former tends to increase over time the amount of cash withdrawn from the housing market as owner-occupiers die. The latter suggests that there may be a substantial demand for mortgages as a general source of credit. To some extent this may be at the expense of other types of credit, but the freer availability of cheaper (and especially tax-deductible) credit may also be expected to increase the total volume. International comparisons are always difficult to make, but experience in the United States, where the gearing ratio in the owner-occupied housing market has been consistently higher than in this country (Chart 14), suggests that there may still be scope for a considerable expansion of mortgage lending. It is in this context that the changing behaviour of building societies, noted in the first section of this article, acquires its importance.

The housing and mortgage markets

Note of a meeting of the Bank's Panel of Academic Consultants

An earlier version of the preceding paper was presented at the 25th meeting of the Bank's Panel of Academic Consultants, held on 1 March 1985. A second paper, by J B Wilcox of the Bank's Economics Division, describing his work on an econometric model of the building society sector, was also considered at the meeting. On this occasion, the members of the Panel (excluding Bank participants) were as follows:

Professor Robin Matthews *Chairman*	Clare College, Cambridge
Mark Boléat	Building Societies Association
Michael Bridgeman	Registry of Friendly Societies
David Peretz	HM Treasury
John Ermisch	Policy Studies Institute
Professor David Hendry	Nuffield College, Oxford
Gordon Hughes	Christ's College, Cambridge
Christopher Johnson	Lloyds Bank
Professor David Llewellyn	Loughborough University
Professor Richard Portes	Centre for Economic Policy Research
Professor Harold Rose	Barclays Bank
Dr Christine Whitehead	London School of Economics