an introduction to urban housing design

AT HOME IN THE CITY

GRAHAM TOWERS

Architectural Press

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In memory of my mother

Madge

1920–2004

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Graham Towers

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FOREWORD

TONY MONK

Housing of course means homes. To most people this is their most treasured possession. It is not just bricks and mortar or a financial investment; it is a vital part of their life. 'You mould the building and the building moulds you' as Winston Churchill is said to have put it. Home is crucial to everybody's daily well-being. As such it is normally treated with pride, and its character and contents are an extension of their personality. The creation of a home is not therefore just an intellectual design exercise detached from the occupant. It should be their design. It is their castle. The user of the home's personal needs and likes should be paramount. You would think this is stating the obvious. Yet it is a strange anomaly that, apart from a few individual houses, the vast majority of dwellings are designed without the tenants or purchasers ever seeing their new home until after it had been built. Almost everybody else, it seems, is involved in the process except the very people who will live in the accommodation. Instead, the developer, the housing association, the volume house builder, the estate agent, the local planning authority, the architect, and the design and build teams all take vital decisions about the content, quality, production and appearance of these properties without any of them actually living in the homes. The future occupants are barely consulted in spite of the decisions having a profound influence on them. The need to involve the users and the existing community in the housing procurement process is indeed obvious.

'The problem of the homeless' has been reducing since the days of Charles Dickens. It is and will always be in the political spot-light and the balance between private ownership and rented accommodation will continually change. Volume house builders are now producing the majority of homes for commercial sales. They are also required with their developments to carrying various direct housing taxes, the largest imposes on them the responsibility of producing 30% or more of the accommodation for a housing association to buy at cost; who then manages and rents out the properties to various types of subsidised tenants or key workers. This novel solution combines the two types of housing,

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both public and private. It uses private finance while it is viable, but it is only a solution while the market economy permits it. This current method of housing provision relies on a vibrant private housing sector. There is, however, a limit to the type and quantity of housing that this commercial funding and its construction process can produce. It concentrates on reliable repetitive market-driven solutions, usually two bed-roomed flats in viable locations. It therefore tends to neglect the larger family accommodation and smaller units in poorer areas.

The main problem with relying solely on this production route is that insufficient homes are being built in this country in response to local needs, as it only satisfies commercial demands. Only 175 000 homes are being built each year. This is against the projected requirement in the Barker Report of over 200 000 and the minimum target of 189 000 per year until 2021 set by the Office of the Deputy Prime Minister. This volume does not compare at all with the annual production of homes in the years following the Second World War which peaked at nearly 500 000 units. This was a period of housing priority when local authorities were compelled to meet their own housing needs and were directly funded by the Government. Without any expectation of a return to that system, Housing Associations could still expand their activities using more of the security of the equity in their accumulated housing stock. Private Funding initiatives could also be expanded to deliver more of the local requirements if they were controlled and followed housing briefs structured by the local authorities. The lethargic planning could also be improved to avoid inhibiting housing production unnecessarily. Unless there are significant improvements, public housing will continue to languish behind need and at the behest of the fickle market forces.

As an experienced architectural practitioner who was also a founder member of a well-established London Housing Association, it seems to me that the current procurement methods are inadequate to meet these targets. The volume house builders, of course, concentrate on producing developments with a narrow range of house types in viable and affluent areas and understandably neglect the low income first-time buyers or larger family accommodation in less well-off regions. While there are inadequate incentives there will always be gaps in the broad spectrum of housing need. There is insufficient research undertaken on a regular basis to identify the specific regional requirements and local needs vary so much it is always difficult to achieve a balanced urban housing environment. The Urban Task Force Report 1999 is still the most significant document produced, setting out a strategic analysis of housing objectives for urban renewal. There is much still left to be done to implement

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its recommendations. The improvement of the housing stock is, of course, the key factor to achieving regeneration in the urban areas.

The importance of this new publication '*At Home in the City*' makes us re-examine on the issues of providing housing in its wider strategic context.

1 It encourages us to question why so many of the better parts of our historic cities here and in Europe generally, with high-density housing, still retain a charm, character, human scale, open spaces, views and a vibrant community environment that has been lost in most of our modern cities and housing by the ridged application of Planning and Building Regulations and current design.

2 It shows there is a need to look at the provision of the overall supporting community and the social facilities, as well as physical infrastructure, to ensure that there is a balanced neighbourhood in the form of a human scale urban village to integrate these new homes and their inhabitants. There is scope for these laudable ambitions to be incorporated in Special Planning Briefs initiated by the Local authority and the existing residents, by the supporting planning statements and by the expansion of 106 Agreements.

3 Local authorities assisted by the local community could therefore prepare a coordinated structure of social and commercial housing requirements. This could give guidance to housing developers to make sure that they encompass the wider spectrum of local needs.

4 Planning Policy Guidance Note No. 3 is valuable in ensuring higher densities in urban areas, but this is really too low in many central areas and too high in others.

5 Sustainability and energy conservation issues encourage higher densities in urban areas with good communication links that could be consolidated again by positive planning guidelines.

6 The local planning system is a perennial problem. It is often an obstacle, not a positive assistance, in progressing housing schemes. It sometimes takes longer to obtain the planning permission than to build and occupy the development itself. House builders would be prepared to pay extra fees if this would speed up their applications. This funding could be directed towards the production of planning briefs. It is very rewarding to work with proactive local authorities and community groups within a predetermined planning framework that has been initiated by them on appropriate sites.

7 After such pre-application work, the radical idea that planning applications would be approved automatically after, say, 4 months if they were not determined within that time scale, would dramatically improve results and galvanise the process.

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There will be lasting benefits gained from Graham Towers' thoughtful housing book that has been written as a result of his own experience in the housing field. The illustrated case studies of live examples of completed housing developments are particularly interesting. These in-use studies are the real test of the success of a housing development. These enable the future residential providers, the clients, the designers or the builders to understand the merits and disadvantages from the analysis of these occupied living communities. This publication has the laudable objective of stimulating the provider to improve the quality of our housing designs, their construction and their occupation, so that the owners can truly feel happy in their homes in the city.

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PREFACE

I have long been an advocate of high-density housing. During my architectural career I have worked on a variety of urban housing types. These have included new-build flats and maisonettes; the conversion and rehabilitation of Victorian terraced houses; and the modernisation and adaptation of multi-storey social housing estates. During much of the past 30 years high-density housing has been held in bad odour. This was largely due to the problems associated with high-rise housing estates which were, wrongly, regarded as the epitome of high density. The degeneration and social stigma associated with urban public housing did much to tarnish the idea of living in flats. So deep was this disaffection that during the 1970s and 1980s there was a general drive to reduce housing densities and a number of prominent and progressive housing specialists advocated the redevelopment of the inner cites with low-density houses with gardens.

That this did not happen was partly due to the alienation that redevelopment had caused during the 1960s when swathes of old urban houses were demolished to make way for unsympathetic and unsuitable new blocks of flats. Community action was the response to this – seeking to promote and protect the interests of those who lived in the inner cities. It was through working with community organisations that I gained an understanding of, and a commitment to, the engagement of building users in the processes of housing design and development. Participation in design remains as relevant as ever as a key to creating buildings that work well, and is an essential component in producing sustainable housing in the coming years. Choice and democracy are critical inputs to create housing that is pleasing to its occupants, meets their needs, and stands the test of time.

Despite my interest in housing my first foray into community politics was in transport – opposition to the building of an elevated urban motorway, the London 'motorway box'. As early as 1972 we argued that new roads would generate new traffic and that, instead, investment should be put into improved public transport. These arguments languished for more

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than 20 years as new roads proliferated, the railways were run down and traffic congestion increased relentlessly. At long last the traffic engineers' solution has been found wanting. Traffic restraint and the promotion of public transport are now high on the public policy agenda.

For a long time there was no obvious connection between housing and transport; or, more specifically, between the advocacy of high-density housing and opposition to urban motorways. Now, though, these two issues have come together. The two imperatives of urban policy are to meet the growing demand for additional housing and to address climate change by reducing greenhouse gas emission. It is recognised that these cannot be achieved through the continued development of low-density housing sprawl. This not only makes poor use of land – an increasingly scarce resource – it separates people from their work, from social facilities and from personal contacts. They become increasingly depended on the motorcar and increasingly embroiled in congestion. High-density urban housing provides efficient use of land, the delivery of services at low cost, and the development of effective and energy efficient transport systems.

For its occupants it also provides a good quality of life with a wide range of services, entertainment and opportunities for social interaction within easy reach. The increasing popularity of urban living is testament to this. High-density housing, properly planned, can provide good quality homes. But, equally important, it can provide a high-quality public environment. The older cities of Britain and Europe offer abundant examples of such high-quality residential areas. In providing the many new homes which will be needed in the relatively near future we need to draw on the lessons of the past. These need to be combined with new technical and social needs to create successful urban housing for the future.

* * *

A lot of people have helped in the preparation of this book. Special thanks are due to Tony Monk. After a successful career as a principal of a large architectural practice – Hutchison, Locke and Monk – which produced many high-quality housing projects, he became Professor of Architecture at the University of Luton. While there he sponsored and encouraged my research on housing. For this, much appreciation, and many thanks for agreeing to write the Foreword. Thanks are also due to friends and colleagues who have offered advice, information and material for the text – Norman Beddington, John Bussy, Suzy Nelson, Harley Sherlock and Stelios Voutsadakis.

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Finally, this book has been produced without commercial or institutional sponsorship. While this has had financial disadvantages it has allowed me to reach conclusions unencumbered by external influences.

Graham Towers

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INTRODUCTION

WHAT IS URBAN HOUSING?

The design of the house has acquired a prominent place in architectural history. But 'house' and 'housing' areas are not the same thing. While the historians of design lavished attention on the mansions and palaces of the rich they paid little heed to the everyday architecture which surrounded them – the mass of domestic buildings that were home to everyone else and which together constituted housing. Even in more recent times the architect-designed house has attracted a great deal of attention. At their most authoritative, such houses have had a seminal influence on a whole movement. Philip Webb's *Red House* became the lodestone for Arts and Crafts architecture. Frank Lloyd Wright's *Prairie Houses* set the agenda for one branch of Modernism; the early houses of Le Corbusier set it for another.

Ever since, the architect-designed house has remained a distinctive building type. Such houses are, almost exclusively, built for wealthy clients. Being rich they can afford large and often spectacular sites. Some of the most famous houses have exploited such opportunities. Wright's *Falling Water* made much of a woodland stream on a steep hillside. Philip Johnson's *Glass House* enjoyed a site so large that all the walls could be made transparent without risk of overlooking from prying eyes. Being rich, such clients set lavish briefs with large and multiple spaces and expensive materials. These factors make the individual house a challenging design problem. The interaction of many spaces of different functions is a complex problem of spatial geometry and planning. The procurement of rare or expensive materials and components is a time-consuming process. Externally the house has to address all directions, making the most of relationships between indoors and outdoors while at the same time creating a visual impact that reflects the prestige of its owner and the aspirations of its designer. What it does not have to do is to pay much attention to the neighbours.

In the design of housing, on the other hand, neighbourliness is the first principle. All housing schemes involve the design and development of a

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number of homes together – often a large number. These homes have to relate to each other. As a minimum they will have neighbours on either side often joined on but invariably close by. In multi-storey housing there may be neighbours above and below as well. The homes can only face in two directions and sometimes only in one, giving critical importance to orientation. The homes must be planned to avoid negative interaction such as overlooking and noise nuisance. While housing can be for the rich – the Georgian terrace of the past, the urban penthouse of today – most often it is not. Housing is for everyone. It has to be affordable and, for the most part, that means modest. Spaces are small-scale and limited in number. They are divided into well-understood functions. Materials and components have to be relatively cheap. This means that plans can be standardised and components mass produced.

The critical aspects of housing design lie outside the individual homes. Housing developments must share a common access system. This must be secure and easily maintained. There must be a shared system of service delivery and waste removal. Most importantly, the individual homes will collectively define form and space. The complexity of housing design lies not in the planning of individual houses, flats and maisonettes but in the way they interact. It is this interaction that determines the nature of our towns and cities in terms of their vitality, security, community and, not least, in the quality of the external spaces where we lead the public parts of our lives. Because housing is, by far, the predominant building type it is the quality of its design and the nature of the spaces it creates which defines urbanity in its various forms.

URBS VERSUS SUBURBS

It is often said that Britain is a predominantly urban country. Statements such as 'over 80 per cent of the English population live in towns and cities of over 10 000 people'[1] lend support to this view. But they mask a significant cultural and social divide between the old cities and the suburbs and satellite towns. By the end of the eighteenth century Britain had established a strong urban tradition. These towns and cities are now part of our heritage and are widely admired. What makes them so commendable is not so much the architecture of individual buildings – though some are of key significance. Rather it is the quality of the environment they created.

These old cities were predominantly made up of houses or commercial premises with housing over. The buildings had a harmonious quality. This derived partly from their scale – building height was limited both by

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▲ **0.1** Stamford, Lincolnshire

technology and by the number of stairs that could usefully be climbed; and partly from their design. In the older cities this was determined by vernacular construction methods and the use of local materials; in the later ones by the application of classical principles and the development of the Georgian style, which quickly became an urban tradition. These buildings were joined together partly as a result of the clamour for town centre frontage. The joined-up buildings created coherent spaces – streets, squares, greens and marketplaces. It is these qualities – recognisable and pleasant spaces lined by buildings of consistent visual design – which define what we now regard as traditional urban character.

Even so, only a small population lived in these towns, which had developed incrementally over a long period. In 1801 over 80 per cent of the population of England and Wales lived in the countryside, with only 1.7 million living in towns and cities larger than 5000 people.[2] Urban living, which had been a slowly built tradition, suddenly accelerated out of control. Over little more than a century the population as a whole increased more than fourfold and by 1911 the urban population had reached 28.5 million.[3] This population explosion was fuelled by and, in turn, served to promote the growth of industry, some of which attached to established ports such as London, Liverpool and Glasgow. Most were smokestack industries, which clustered around the coalfields of the North and the Midlands. Rapid population growth meant rapidly built housing. Most of it was poorly constructed and appallingly overcrowded. Worse, it was built cheek by jowl with the noxious factories.

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▲ **0.2** Back-to-back housing in Leeds

By the 1840s, conditions in the industrial cities were a serious cause for concern. To some this was a concern for social welfare[4] but for the most part it was a concern about health.[5] The polluted atmosphere, the damp and overcrowded buildings, were all a breeding ground for disease. A series of reforms were introduced culminating in the 1875 Public Health Act. This legislation set standards for the construction of buildings, for the provision of light and air, and better sanitation. It laid the basis for building regulation to the present day. By the end of the century the problems in the cities had eased. Population growth had slowed. New housing for the wealthier classes had been developed, usually on the south-west of the city centres where the prevailing wind would protect them from the industrial smoke – Kensington and Belgravis in London; Edgbaston and Moseley in Birmingham. New and better housing had also been developed for the less wealthy – the terraces built under the new regulations which have now become the epitome of the Victorian city. A start had been made on clearing the worst of the slums. But most remained and for many the changes were too little too late.

Conditions in the industrial cities were widely regarded as intolerable. This had long since generated a rejection, which affected all classes and all political persuasions. Marx and Engels railed against the oppression of

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▲ **0.3** 'By-law' terraces in Birmingham

the enormous capitalist cities.[6] The reformist Chartist movement sought to establish new village settlements in the countryside for urban industrial workers.[7] Philanthropic industrialists created new model settlements away from the grim industrial cities.[8] The Arts and Crafts movement sought a return to a past idyll, extolling the virtues not just of rural life but of pre-industrial architecture and the techniques of craft production. From the middle of the nineteenth century, wealthy individuals sought to escape the cities, building their homes in the pleasant countryside outside. Many of these houses were designed by leading Arts and Crafts architects such as Lethaby, Norman Shaw and Voysey.[9] The growth of the suburbs had begun and was to gather pace.

The philosophy and aspirations of the Arts and Crafts designers spawned the Garden City Movement.[10] This sought to create new settlements where housing would be light, airy and open, surrounded by green spaces. Two such settlements were built – at Letchworth and Welwyn – but the movement's main influence was on the new developments which were to take place in the wake of the First World War. Change was in the air and the government promised 'homes fit for heroes'. The Tudor Walter Report written by the leading Garden City exponent Raymond Unwin set new standards for housing with minimum room sizes, more open cul-de-sac layouts, and much lower densities all in stark contrast to the derided urban housing.[11] These were to set the pattern for a massive programme of new council housing estates in the periphery of large cities. While these

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