

What We Know (and Don't Know) About the Links between Planning and Economic Performance

Max Nathan (SERC and LSE)
Henry G. Overman (SERC and LSE)

November 2011

This work is part of the research programme of the independent UK Spatial Economics Research Centre funded by the Economic and Social Research Council (ESRC), Department for Business, Innovation and Skills (BIS), the Department for Communities and Local Government (CLG), and the Welsh Assembly Government. The support of the funders is acknowledged. The views expressed are those of the authors and do not represent the views of the funders.

© M. Nathan and H. G. Overman, submitted 2011

SERC Policy Paper 10

What we Know (and Don't Know) About the Links between Planning and Economic Performance

Max Nathan* and Prof. Henry G. Overman**

November 2011

*SERC, Department of Geography & Environment, LSE Cities, London School of Economics

**SERC, Department of Geography & Environment, London School of Economics

This note summarises evidence emerging from SERC research (www.spatial-economics.ac.uk) as well as from the wider urban economics literature. SERC regularly publishes policy papers which are freely available from our website. SERC blog: <http://spatial-economics.blogspot.com/>. Follow us on twitter: @lse_serc

Abstract

This note considers the impact of land use planning on economic performance. Specifically, we discuss some of the economic and social costs of the current English system, some of which have been underplayed in public debate. Our aim is to provide evidence to better inform discussions of the National Planning Policy Framework (NPPF). A companion paper ('Assessing the Government's Proposals to Reform the Planning System', SERC Policy Paper No.11, November 2011) specifically addresses the NPPF and makes recommendations for improving it.

1. Introduction

This note is about the impact of land use planning on economic performance. Specifically we discuss some of the economic and social costs of the current English system. Our aim is to provide evidence to better inform discussions of the National Planning Policy Framework.

This paper specifically focuses on the *costs* of the status quo. While the benefits of the current system are widely asserted, the costs have received little, if any, attention.

Planning systems set rules and guidelines that influence the level, location and pattern of activity. The ultimate role of planning is to promote a balance of environmental, social and economic welfare that meets the needs of current and future generations. Doing so inevitably involves trade-offs, so any planning system has both benefits and costs. The supposed benefits of our current system have been well-discussed in the current debate.¹ In this paper we do not rehearse these arguments. Rather, we have a different focus. An important issue for policymakers and the public is whether the current system imposes costs which reforms could avoid. The transaction and administrative costs imposed by an increasingly complicated system have been documented elsewhere. We highlight broader economic costs here both in the interests of informing debate, and because opponents of the reforms have sometimes suggested that evidence on costs (e.g. the negative effect of planning on productivity or house building) does not exist.² This is incorrect. Indeed the available evidence suggests these costs are substantial.

We are also clear that the proposed reforms could be improved, an issue addressed in a companion paper which makes specific suggestions for change (Nathan and Overman 2011).

2. Context

The Government is seeking to reform England's planning rules. The current system involves:

- A hierarchy of planning policies – national planning policy statements; until recently regional strategies; and local development frameworks.
- Development control as the main mechanism for regulating local development.
- Section 106 (S106) as the main means of local value capture, complemented in 2010 by the Community Infrastructure Levy.
- Some national restrictions (e.g. Town Centre First Green Belts, Sites of Special Scientific Interest (SSSIs) and Areas of Outstanding Natural Beauty (AONBs)).

The Government's draft National Planning Policy Framework (NPPF) was unveiled over the summer of 2011. The main elements of the NPPF and associated reforms are:

- Significantly simplified national planning guidance.
- Devolved decision-making, with local authorities drawing up local plans via community consultation, subject to consistency with NPPF and fiscal incentives to encourage development.

¹ See for example CPRE 2011, Monbiot 2011, National Trust 2011, Strong 2011.

² See, for example, the CPRE quoted in <http://www.thetimes.co.uk/tto/business/article3168127.ece>.

- A presumption in favour of sustainable development, where this accords with local plans. If no up-to-date plan exists, the default answer to sustainable development should be ‘yes’.
- Maintain all existing protected status – that is Green Belt, SSSIs, AONBs and also retain town centre first restrictions for retail development.

In parallel with the NPPF, the government are also introducing:

- A reformed Community Infrastructure Levy as the main means of value capture, while limiting use of S106.
- Financial incentives for new housing through the New Homes Bonus, and for commercial development via the Business Increase Bonus.
- A Localism Bill and wider proposals for reforming local government finance.³

Together, these reforms aim to localise the planning system at the same time as increasing rates of commercial and residential development. As we discuss below there are tensions between these two objectives.

3. Economic and Social Costs of the Current Planning System

Housing markets and house prices

The UK suffers from a problem of housing market affordability. This problem is particularly acute for families with low to modest incomes, although in many parts of the UK high house prices are a problem more generally (Barker, 2004).

SERC research suggests that planning restrictions *substantially raise house prices*, especially in popular areas. House prices react much more strongly to increased demand in communities where supply is more restricted. Specifically, SERC’s analysis suggests that an area moving from an average level of restrictiveness to having the lowest level of housing restrictiveness would see house prices fall by around 30% (Hilber and Vermeulen 2011). This is a considerable underestimate of the true costs because it *ignores* the effect on UK house prices overall, as well as any effects on the composition of housing (e.g. the fact that planning restricts the supply of land so that new houses are smaller, see Cheshire (2009).

Of course, physical constraints on land availability – scarcity of land, the presence of steep slopes or flood plains – have an effect on house prices, but in England the effect is generally very small. Land scarcity does raise prices in the most urbanised places, particularly Greater London. Even in London’s case, however, the evidence suggests that planning plays a much larger role (e.g. through height restrictions). Outside London, very few English local authorities actually face physical constraints on land supply (Hilber and Vermoulen 2011).

SERC research also shows that planning restrictions *increase housing market volatility*. At least until the recession, average house price volatility in the UK was higher than the most volatile single market in the US (Los Angeles). When house prices fall, supply is fixed in both the UK and US (unless you destroy houses). However when, as in the UK, housing supply is very unresponsive to increased demand, booms drive up prices rather than leading

³ See DCLG (2011a, 2011b, 2011c and 2011d).

to more building. That means the UK sees more volatility on the up-side of the market and this leads to more volatility overall (Cheshire, 2009; Hilber and Vermeulen 2011).

Business activity

City size and diversity provide an economic payoff: a critical mass of people, resources and ideas help produce agglomeration economies (Glaeser, 2011). Increasing that critical mass helps raise productivity, therefore: the consensus from recent studies is that doubling employment in a city raises average labour productivity by around six percent, although these effects are much more important for some types of economic activity (Melo et al 2009).

While some have argued strongly that the link between size and productivity relies on density, the exact nature of the relationship remains contested (to be precise, the *functional size* of cities matters but it is not clear if *density* matters over and above that). There is more agreement that overly tight planning frameworks for cities also have costs. For example, restrictions which have historically prevented sprawl and maintained urban sightlines are likely to place constraints on urban growth in popular cities today – both outwards (via Green Belts) and upwards (via height restrictions). By raising development costs, especially in urban areas, planning restrictions *lower levels of business investment* in these areas. SERC evidence shows that these costs can be high in both the commercial office and retail sectors.

Cheshire and Hilber (2008) carefully document how *planning restrictions in England impose a 'tax' on office developments* that varies from around 250% (of development costs) in Birmingham, to 400-800% in London. In contrast, New York imposes a 'tax' of around 0-50%, Amsterdam around 200% and central Paris around 300%. Such substantial implicit taxes on development should clearly affect investment in these cities. Koster et al (2011) show that in Holland, height restrictions specifically act as constraints on agglomeration economies from tall buildings, echoing analysis by Glaeser (2011).

We do not know of comparable evidence for manufacturing or wholesale distribution, but to the extent that factories and logistics centres tend to use *more* land than offices, we would expect the effects to be larger for these sectors.

Current *planning rules also negatively affect productivity in parts of the retail sector*. In a recent SERC report, Cheshire et al (2011) demonstrate that planning rules reduced productivity in a leading supermarket chain by at least 20%. This is one study, for a single operator (albeit a large retailer represented across the UK). But it does provide a measure of costs – and they are large. Opponents of planning reform have suggested such evidence does not exist. This is incorrect. *There is evidence that planning negatively affects productivity*.

Since the introduction of town centre first planning in the mid-1990s, the share of new retail development in urban areas rose from 14% (in 1994) to 33% in 2009 (BCSC 2006). While the policy may have increased the quantum of retail activity in cities – thus raising vitality – it also appears to have helped change the character of urban high streets. Specifically, evidence suggests that *small and independent shops have been hurt by town centre first policies*. Sadun (2008) and Haskel and Sadun (2008) find that town centre first rules have directly caused a reduction in smaller shops' employment – mainly because big supermarkets developed smaller formats and moved into high streets. Thus, by restricting space and raising rents, town centre first rules may also have contributed to high street 'cloning'. Again,

planning has both benefits and costs and, despite claims to the contrary, there is evidence available on the costs of planning policies on independent retailers.

Benefits and costs of Brownfield development

Many opponents of the planning reforms think that development should be heavily focused on brownfield – i.e. previously developed – land. This policy protects previously undeveloped land, *but is not costless*.

During the 1990s and mid-2000s, the combination of a national brownfield land target and a minimum density floor for development helped concentrate new development in urban areas – particularly core cities such as Manchester and Liverpool. These cities also benefited from a number of other important supporting factors – a benign macro environment, rising public spending, an expanding higher education sector, a growing consumer interest in city living, and readily available finance for building and buying (Nathan and Urwin 2006).

The national target ensured these trends played out more broadly. In 1998, approximately 50% of development occurred on brownfield land (a figure that had been remarkably stable for long periods of time). The Labour government committed itself to a target of 60% of new development on brownfield land by 2008. The target had been met by the early 2000s. In 2005, 70% of new development was on brownfield land (Urban Task Force 2005).

From the point of view of the opponents of the NPPF, meeting the national target sounds like success. Qualitative research suggests that in cities like Manchester and Liverpool, brownfield policies that targeted the urban core may have helped repopulate city centres, and encouraged commercial activity to return. These policies also may have helped local leaders reposition their cities' public image (Nathan and Urwin 2006, Unsworth and Nathan 2006).

However, somewhat surprisingly, we know of no evidence that rigorously assesses the *causal* impact of the brownfield target on the pattern of development within cities, or on the overall effects for the city as a whole. We can speculate that in cities like Manchester, the brownfield target may have led to more development across the city than previously. However, an alternative strategy of focusing on (say) South Manchester might have brought higher overall development to the city, but with a different spatial pattern. That is, *skewing development towards city centres may have come at the expense of less growth for the city as a whole*.

Brownfield land is expensive to build on suggesting that there could be an effect on overall levels of development from the decision to prioritise brownfield land. Findings on the negative effect of town centre first on retail productivity are consistent with this (Cheshire et al 2011). Further from the point of view of England as whole, lots of brownfield land is in ex-industrial cities where - unlike parts of, say, London and Manchester – demand for housing and commercial development is low.

In terms of the spatial pattern of development, large pieces of land that become available (for example, former MOD or NHS sites) are often some way from existing settlements (working against other stated objectives on densification). Worse, as highlighted by the coalition government, *a small but increasing share of building on 'brownfield' land has been building*

on private residential gardens – the share of new homes built on previously residential land rose from 11 percent to 23 percent between 1997 and 2008.⁴

In short, top down targets for brownfield land haven't always delivered the kind of development people want in the places where they want it. The combination of brownfield targets and density standards has also tended to produce large numbers of small flats in urban areas – although there is a clear need for larger, family homes in these places (Unsworth and Nathan 2006, Silverman et al 2006). These costs need to be offset against the benefits of preserving undeveloped land. Undeveloped land does deliver benefits, but SERC research suggests that these are often not as large as claimed (Gibbons et al 2011).

Sustainable development?

Paradoxically, the restrictiveness of the current system also results in some clearly *unsustainable* development. In popular areas of the country, demand for land is high but supply tends to be highly restricted. This means large financial gains to landowners in popular areas when land is made available for development. Often, it is local authorities who realise these gains by selling off their own land – in particular allotments, parks and school playing fields (according to the Guardian, the waiting list for allotments currently stands at 86,000 people).⁵

As Cheshire and Sheppard (2005) argue, the social and environmental case for not building on school playing fields or allotments is very strong. One of the primary functions of the planning system should be to protect such areas from development. But by causing land in desirable locations to be in such short supply the system has created strong incentives - sadly often too alluring to resist - which result in development going onto exactly the most socially and environmentally valuable land.

As discussed above, there is good evidence that Green Belt policies impose a development 'tax' on urban businesses (Cheshire and Hilber 2008). These costs might well be an acceptable part of a planning trade-off if the environmental gains are substantial. However, as Kate Barker pointed out, in fast-growing cities like Oxford and Cambridge, development has leap-frogged green belts into the countryside proper. The result is more commuting, congestion and pollution than relaxing restrictions might have achieved (Barker 2007).

Understanding approval rates

Defenders of the status quo suggest that because 80% of current planning applications get through, no reform is needed. But this is to misunderstand the data. Planning applications costs time and money, so developers only tend to put in applications if they think they have a reasonable chance of succeeding. If relaxing the rules led to more applications then overall development might increase even if there was *no* change in the approval rate. Approval rates do matter (because failed applications 'cost' developers and local authorities) – but with approval rates so high (they are 87-94% for commercial development) it is the effect of the rules on *submission* rates that matters most for understanding the impact of planning on

⁴ DCLG (2010) 'Clark - new powers to prevent unwanted 'garden grabbing'', accessed 5 October 2011.

⁵ Harrison (2011) 'Garden sharing: growing your own vegetables on someone else's patch', Guardian, 2 September, <http://bit.ly/n9dsBp> (accessed 5 October 2011).

development. Research by SERC (Hilber and Vermeulen 2011) shows stricter planning *cause* reductions in submission rates and hence housing supply.

6. Conclusions

To summarise, there is evidence that the UK planning system:

- Increases house prices (with a regressive impact on low to middle income families)
- Increases housing market volatility
- Increases office rents
- Lowers retail productivity
- Lowers employment in small independent retailers
- May not properly assess the true social costs of brownfield versus greenfield development.

Other possible costs of the system are not well documented (e.g. the negative impact on land intensive manufacturing and wholesale distribution) but might be expected to be large. The government's proposed reforms attempt to address these problems by increasing the supply of land for development. It is perfectly valid to question the extent to which these reforms will be successful. (We do this in a companion paper, which should be read alongside this one. See Nathan and Overman, 2011.) Campaigners are also perfectly entitled to argue that these are prices worth paying to 'protect the countryside' or achieve other policy objectives. However, it is not helpful for public debate to pretend that these costs do not exist and that there is no evidence to suggest otherwise. Existing research, documented here, shows that this is simply not the case. There are multiple links from planning to the economy and any sensible debate on planning reform must recognise this.

References

- Barker Review of Housing Supply (2004). *Delivering Stability: Securing our Future Housing Needs*. London, HM Government.
- Barker Review of Land Use Planning (2006). *Final Report - Recommendations*. London HM Government.
- British Council of Shopping Centres (2006). *In Town or Out of Town: Where will New Retail Development Go?* London, BCSC.
- Cheshire, P. (2009). 'Urban Containment, Housing Affordability and Price Stability - Irreconcilable Goals'. SERC Policy Paper No.4. London, SERC.
- Cheshire, P., C. A. L. Hilber and I. Kaplanis (2011). 'Evaluating the Effects of Planning Policies on the Retail Sector: Or Do Town Centre First Policies Deliver the Goods?', SERC Discussion Paper No.66. London, SERC.
- Cheshire, P. and S. Sheppard (2004). 'Land Markets and Land Market Regulation: Progress Towards Understanding', *Regional Science and Urban Economics*, 34, 6, 619-637.
- Cheshire, P. and S. Sheppard (2005). 'The Introduction of Price Signals into Land Use Planning Decision-making: A Proposal'. *Urban Studies* 42(4): 647-663.
- Cheshire, P. C. and C. A. L. Hilber (2008). 'Office Space Supply Restrictions in Britain: The Political Economy of Market Revenge*', *The Economic Journal* 118(529): F185-F221.
- Council for the Protection of Rural England (2011). *What We Want to See in the National Planning Policy Framework*. London, CPRE.
- Department of Communities and Local Government (2011). *Community Infrastructure Levy: An Overview*. Department of Communities and Local Government. London.
- Department of Communities and Local Government (2011). *Draft National Planning Policy Framework*. Department of Communities and Local Government. London.
- Department of Communities and Local Government (2011). *Local Government Resource Review: Proposals for Business Rates Retention - Consultation*. Department of Communities and Local Government. London.
- Department of Communities and Local Government (2011). *A Plain English Guide to the Localism Bill*. Department of Communities and Local Government. London.
- Gibbons, S., S. Mourato and G. Resende (2011). 'The Amenity Value of English Nature: A Hedonic Price Approach'. SERC Discussion Paper No.74. London, SERC.
- Glaeser, E. (2011). *The Triumph of the City*. London, Pan Macmillan.
- Haskel, J. and R. Sadun (2009). 'Regulation and UK Retailing Productivity: Evidence from Micro Data'. CEPR Discussion Paper No.7140. London, CEPR.

- Hilber, C. A. L. and W. Vermoulen (2011). *The Impact of Restricting Housing Supply on House Prices and Affordability: Report for NHPAU*. London, Department of Communities and Local Government.
- Koster, H. R. A., P. Rietveld and J. N. van Ommeren (2011). 'Is the Sky the Limit? An Analysis of High-Rise Office Buildings'. SERC Discussion Paper No.86. London, SERC.
- Melo, P., D. Graham and R. B. Noland (2009). 'A Meta-Analysis of Estimates of Urban Agglomeration Economies'. Regional Science and Urban Economics 39: 332-342.
- Monbiot, G. (2011). This Wrecking Ball is Osborne's Version of Sustainable Development. The Guardian, 5 September.
- Nathan, M. and H. G. Overman (2011). 'Assessing the Government's Proposals to Reform the Planning System'. SERC Policy Paper No.11. London, SERC.
- Nathan, M. and C. Urwin (2006). *City People: City Centre Living in the UK*. London, Centre for Cities.
- National Trust (2011). *Planning for People*. Swindon, National Trust.
- Sadun, R. (2008). 'Does Planning Regulation Protect Independent Retailers?'. Article in *CentrePiece*, Volume 13, Issue 2, Autumn (<http://cep.lse.ac.uk/pubs/download/cp258.pdf>), Centre for Economic Performance.
- Silverman, E., R. Lupton and A. Fenton (2006). 'A Good Place for Children? Attracting and Retaining Families in Inner Urban Mixed Communities'. London, Chartered Institute of Housing / Joseph Rowntree Foundation.
- Strong, R. (2011). 'The Eden that is England's Countryside'. Daily Telegraph, 2 September.
- Unsworth, R. and M. Nathan (2006). 'Beyond City Living: Remaking the Inner Suburbs'. Built Environment 32(3): 235-249.
- Urban Task Force (2005). *Towards A Strong Urban Renaissance*. London Urban Task Force.

Spatial Economics Research Centre (SERC)

London School of Economics
Houghton Street
London WC2A 2AE

Tel: 020 7852 3565

Fax: 020 7955 6848

Web: www.spatial-economics.ac.uk

SERC is an independent research centre funded by the Economic and Social Research Council (ESRC), Department for Business Innovation and Skills (BIS), the Department for Communities and Local Government (CLG) and the Welsh Assembly Government