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# Exploding house prices and imploding affordability in urban housing markets

## Explanations and policy solutions for the Netherlands

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## Abstract

Strong house price growth is by no means a post-crisis phenomenon but has been at the centre of economic and societal transformations in almost all advanced economies since the 1980s. More recently, however, more expensive and more unaffordable housing has become increasingly concentrated in urban housing markets, suggesting that the underlying causes of house price appreciation have shifted in a different direction. This policy paper illustrates the concrete processes and underlying mechanisms of these developments in the major cities of the Netherlands. Using these findings we then discuss specific housing and planning policies that could make urban housing markets less volatile and more equitable. These policy proposals revolve around three key themes: how to produce more and more affordable housing units; how to better allocate scarce housing resources among residents and across regions; and how to reduce the speculative element in contemporary housing markets.

## Introduction

Strong house price growth is by no means a post-crisis phenomenon but has been at the center of economic and societal transformations in almost all advanced economies since the 1980s (Aalbers, 2015; Ansell, 2014). For a given period it seemed that the global boom in house prices had finally come to a halt in and through the Global Financial Crisis (GFC) of 2008. Yet, ten years after these events, housing markets are following a strong upward trend again, making the crisis years almost look like a glitch in the data.

However, the defining forces of house price appreciation have shifted substantially in recent years. Before 2008, price growth across the globe was largely carried by the easing of finance conditions, i.e. higher LTV and LTI ratios for individual borrowers, as well as the expansion of interest-only mortgages, mortgage guarantee funds, mortgage tax deductibility, and lower capital requirements for mortgage lenders (Cerutti et al., 2017; Schwartz, 2014; Martin, 2012; Schnure, 2005). In the current boom cycle, other factors seem to have become more relevant.

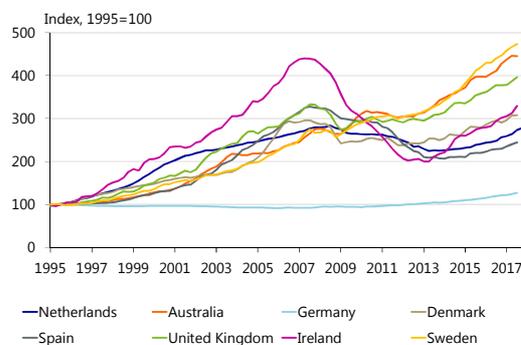
Next to the extremely low (mortgage) interest rates, house price appreciation has become increasingly defined by fundamental demographic and economic parameters: the growth in the number of households relative to sluggish new supply, catch-up growth in jobs and job-related income, and the demand of (buy-to-let) investors pursuing high returns on housing property investments (e.g. Hekwolter of Hekhuis et al., 2017; Lennartz, 2017). As a result of the rebalancing from a finance-driven towards a more fundamentals driven housing environment, market outcomes have become more regionalized, implying a growing divergence between *hot property markets* in major cities and less dynamic markets in more peripheral regions.

In this study we analyze these post-crisis developments for the Netherlands. Doing so, we establish a basis for a coherent policy discussion of how to mitigate the risks of extreme house price and excessive rent growth in urban housing markets. We propose five detailed measures to achieve this goal: [I] massively increase new housing production; [II] focus on affordable housing in the production of new homes; [III] increase turnover rate of existing homes; [IV] better integrate housing and infrastructure/mobility policies; [V] penalize speculative housing investments.

## The specifics of pre- and post-crisis housing in the Netherlands and its major cities

Generally, house prices in the Netherlands have moved in line with the bulk of Western countries in the past 40 years. Starting in the early 1980s and ending with the Global Financial Crisis the Netherlands experienced a sustained period of strong house price growth (see Figure 1). This was followed by a prolonged market downturn between 2009 and 2013. Most strikingly, the recession on the housing market had – with the exception of Spain, Ireland and Denmark – run much deeper and for much longer than in most other countries.

**Figure 1: Nominal house prices**



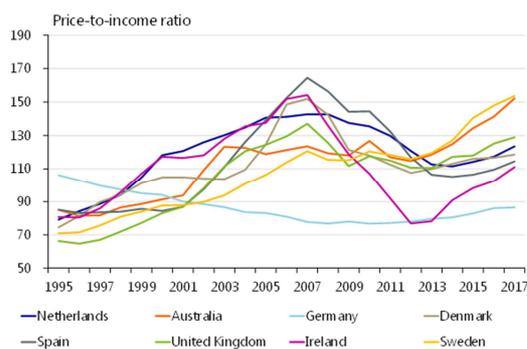
Source: Bank for International Settlements, 2018

One explanation here is that due to high average loan-to-value mortgages a large proportion of mortgaged homeowners saw the value of their home decrease below their outstanding mortgage debt.<sup>1</sup> This meant that households had become more likely to repay their mortgage and less likely to consume, which in turn had a negative impact on the wider economy, implying lower growth and higher unemployment.

In reverse, the economic recession was further aggravated through fiscal consolidation (see Heimberger, 2017), which in turn had a negative impact on housing demand. Moreover, with high private (mortgage) debt having become a wearing factor for the stability of the financial system, the Dutch government implemented pro-cyclical macroprudential policies (lowering the maximum LTV, implementing binding LTI norms) in the early crisis period, which further suppressed demand for housing (Boelhouwer, 2017; Tu et al. 2017). Meanwhile, these patterns in price developments were also followed by national-level developments in housing affordability. Figure 2 illustrates that while the house price boom in the past three years has deteriorated affordability, relatively speaking housing costs in the owner-occupied sector still fall short of their 2008 levels.

<sup>1</sup> For a good illustration of how severe the problem of underwater mortgages was, the reader is referred to Figure 1 in Hekwolter of Hekhuis et al., 2017.

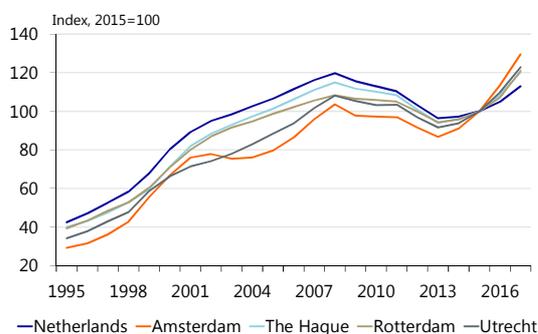
**Figure 2: Price-to-income ratio**



Note: price-to-income ratio is defined as the nominal house prices divided by nominal disposable income per head. Net household disposable income is used. The population data come from the OECD national accounts database. The long-term average is calculated over the whole period available when the indicator begins after 1980 or after 1980 if the indicator is longer. This value is used as a reference value. The ratio is calculated by dividing the indicator source on this long-term average, and indexed to a reference value equal to 100.  
Source: OECD, 2018

bottomed out in 2013. Meanwhile, house prices are still below their pre-crisis levels in more rural and less urbanized regions, particularly in those areas which are dealing with population decline and rapidly aging societies.

**Figure 3: House price indices of the four largest Dutch cities**

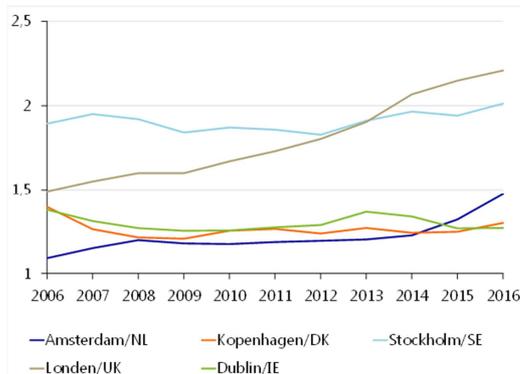


Source: Statistics Netherlands, 2018

Yet, the most noticeable feature of the post-crisis period is the way price recovery has differed across cities and regions. Even though the regulatory and institutional context is defined at the national level, local and regional housing markets have come to operate under different socio-economic and demographic conditions and with varying price dynamics. To be more precise, regional house price data reveals a sharp and growing contrast between the major cities and city regions (Amsterdam, Utrecht, Rotterdam, The Hague inside the Randstad region (see Figure 3), as well as Eindhoven, Groningen, Maastricht outside of it) and more peripheral housing markets.

Indeed, urban markets have long moved past their pre-crisis levels, with houses in Amsterdam as the most extreme case now being 30 percent more expensive than in 2008 and a whopping 55 percent since they

**Figure 4: Ratio of median house price in capital city to median house price in the whole country**



Note: for Denmark, Sweden and Ireland we have used the average house prices of apartments only, while all housing units were compared in the Netherlands and the UK. Data for Copenhagen reveal that the price differences for non-apartment units are about twice as high as in the rest of the country. We only selected countries in which price indices for both the nation as a whole and city regions are published by national statistical offices or central banks  
Source: National statistical offices, editing by Rabobank

Secondly, Figure 4 shows that in comparison to other major cities in Europe, the Dutch capital seems to be a particularly hot property market. While Amsterdam in absolute terms is on average (just like Dublin and Copenhagen) still relatively close to the national price level, the process of house price divergence since 2014 is only matched by the London/UK case<sup>2</sup>. Where in 2006 the average house in Amsterdam was only about 1.1 times more expensive than the average house in

<sup>2</sup> For more capital/country pairs see IMF, 2018.

the Netherlands as a whole<sup>3</sup>, this ratio had increased to 1.5 by the end of 2016. Meanwhile, the price gap in Dublin, Copenhagen, and Stockholm had barely changed over the same period.

Whether the growing divergence between major cities and peripheral regions is a temporary phenomenon or a permanent structural shift in the Dutch housing context is, of course, a valid question. Figure 3 reveals that Amsterdam experienced a major price correction in the mid-2000s after a period of unprecedented and unparalleled house price growth in the late 1990s. Accordingly, one could argue that in the current housing market cycle it is also a matter of time before house price developments in Amsterdam and other regions will level out again, be it through a relative fall in prices in Amsterdam (and other cities) or through faster growth in peripheral regions. In the following we will explicate why this is not the most likely outcome in the years to come.

## Explaining the emergence of hot property markets

The emergence of hot residential property markets in the Netherlands can, by and large, be explained by three factors. Firstly, following the aforementioned economic and housing market downturn, housing production had fallen to an all-time low as well. Indeed, while in the years before the GFC the housing stock in the Netherlands had grown by more than 80,000 dwellings per year, this number dropped to 45,000 units between 2011 and 2014. Most strikingly, this drop materialized more rapidly and most strongly in urban regions (CBS, 2018a). Given that building land in these areas is scarcer and thus more expensive (See Figure 2 in Hekwolter of Hekhuis et al., 2017), developers are seemingly more reluctant to keep investing in these areas, resulting in a relatively stronger backlog of new dwellings in relation to new households.

Secondly, following the restructuring towards a knowledge-based economy in the past decades, larger cities have increasingly become the economic powerhouses of the country. Even before the crisis this had led to positive (internal and external) migration rates of younger and highly-educated adults. After the crisis, this trend has accelerated considerably, also because knowledge-intensive sectors have fared better and recovered faster than more traditional and spatially less concentrated sectors as construction and retail. As a result, the demand of private households for rental and owner-occupied units in and around these cities has grown much stronger than elsewhere in the post-crisis period.

Finally, the housing landscape in the Netherlands has changed massively through the emergence of a new class of domestic<sup>4</sup> buy-to-let private investors<sup>5</sup>. Given the low borrowing costs and strong price appreciation since 2014, residential real estate has generally attracted increasing demand from small-scale (buy-to-let) landlords and more professional (and larger) investors alike. Here, investors specifically channelled their financial resources into urban housing markets such as Amsterdam, Eindhoven, and Maastricht, i.e. localities with the highest (possible) rent increases and price growth due to stronger imbalances between supply and demand (e.g. Hekwolter of Hekhuis et al., 2017). Within this process, buy-to-let investors have contributed to increasing prices in two ways. By turning owner-occupied units into rental properties they have significantly contributed to the scarcity of owner-occupied units in urban areas. Additionally, newly purchased buy-to-let properties were most often offered in the unregulated rental sector,<sup>6</sup> a sector which has seen

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<sup>3</sup> Admittedly, this does not control for differing compositions of the housing stocks.

<sup>4</sup> Although this has become a topic of interest in the Dutch media, there is no clear evidence of increased activities of foreign buyers with the exception of international pension funds buying residential complexes of housing associations (Capital Value, 2018).

<sup>5</sup> See Fields (2018) for a good overview of the forces behind this process.

<sup>6</sup> The Dutch rental market generally consists of two sectors: a regulated sector in which initial rents are stipulated by a dwelling quality and location-based

tremendous rent increases, particularly in the larger cities (CBS, 2017a)<sup>7</sup>. This in turn has allowed for higher purchase prices by investors, which then were used to justify further rent increases to meet target returns – and so the cycle continued.

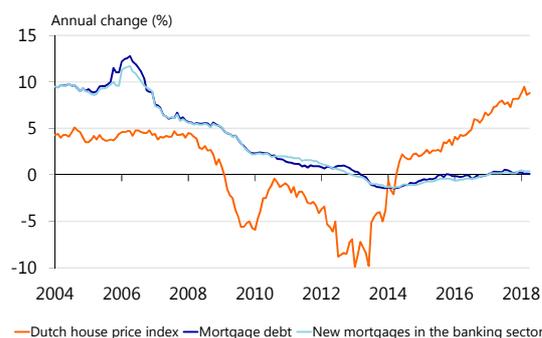
## Policy solutions for hot property markets

With house prices and rents increasing sharply in the past couple of years, and deteriorating affordability and accessibility becoming an imminent threat to the Dutch economy (see e.g. DNB, 2018), housing policy has become a central theme in local and national policy debates. In the following we seek to lay out coherent policy solutions to what were argued the underlying causes of the emerging housing crisis in the Netherlands.

### Macroprudential policy

It is necessary to first deal with the ‘elephant in the room’ that is macroprudential policy. In a country where the maximum mortgage loan still stands at 100 percent of home value, tightening mortgage lending might be the most obvious way of reducing demand of prospective house buyers, and through this lowering aggregate prices. Recent policy shifts in Sweden and Australia suggest that more restricted access to mortgage credit may indeed have a direct and measurable impact on house prices, at least in the short run (see Bloomberg, 2018a; SMH, 2018). However, we would argue that macroprudential policies are not the most useful solution to the problem in the current Dutch housing environment.

**Figure 5: Mortgage debt versus house prices**



Source: DNB, Statistics Netherlands, 2018

Firstly, tighter lending norms were already implemented several years ago. While the maximum LTV ratio has been reduced from more than 120 percent to 100 percent in 2018 – which, admittedly, is still very high by international standards – it is particularly the more stringent LTI norms, which are becoming a limiting factor to exuberant mortgage lending and, accordingly, endless house price excesses (see also Tu et al., 2017). Secondly and related to this, the primary goal of macroprudential policy is to guarantee the stability of the financial system (Galati and Moessner, 2017; and Kuttner and Shim, 2013).

Yet, in the recent boom cycle the growth in aggregate mortgage debt has lagged behind house price growth (see Figure 5).

point valuation system. Currently, the deregulation threshold stands at €710 net rent per month. Above this threshold initial rents are fully deregulated and freely negotiated between landlords and tenants. Likewise, rent increases are only regulated below the €710 threshold, where the central government determines maximum rent increases once a year. In the deregulated sector rent increases are not controlled, yet they can only be increased once per year. Furthermore, a specific trait of the Dutch rent regime is that access to regulated rental dwellings owned by non-profit housing associations is based on disposable household income (between €36,000 and €43,000 depending on household composition) and waiting time, while regulated units owned by private parties are not bound to this rule.

<sup>7</sup> Here, the specifics of the rent regime plays a key role. Since the point-based valuation system is partially based on house values, which in turn are based on current market values, rising house prices imply that rents can become deregulated much quicker.

This brings up the question whether macroprudential policies would then not be utilized for targeting a problem which they are not designed for. In a similar vein, while macroprudential policies affect all prospective homebuyers, the problem of escalating prices is, as described, concentrated in the country's major urban areas. The fact that LTV and LTI limits are by design countrywide rules means that there is a risk of making the situation worse for first-time buyers in peripheral markets. And indeed, first-time buyers do indeed borrow relatively more in these areas (average LTV is 95 percent) than first-time buyers in major cities (90 percent - see Hekwolters of Hekhuis et al., 2017).

Finally, macroprudential policies alone would do little to nothing about the problem of sharply increasing rents in the deregulated rental sector. In fact, given that buy-to-let properties are most often not purchased with high LTV ratios and do not fall under the current LTI regime, a further tightening of lending conditions would imply that first-time buyers fall further back behind the purchasing power of private investors.

## Structural urban and national housing policies

In short, although there is little doubt that macroprudential policies would lead, at least temporarily, to a fall in house prices, they are not effective in targeting the underlying causes of urban housing problems. From our viewpoint a mix of structural urban and national (housing) policies are much more suited for reaching this goal. These policies consist of five building blocks.

### *I. Massively increase housing supply in urban areas*

It was argued above that a shortage in new housing units is a key driver of the growing imbalances between supply and demand in the past four years. Yet, housing shortages are not a new phenomenon. In the second half of the 20th century, population growth and the demand for new housing was much stronger than in the current housing cycle. The solution to this specific problem at the time was a much more active role by the central government in the production of new housing through, for instance, bricks-and-mortar subsidies and a more direct role in urban and regional planning (see also Boelhouwer & Priemus, 2014).

Currently, the Dutch government has given itself a coordinating part at best. However, the problem with this is that individual municipalities often lack the means and the willingness to spur production within their municipal boundaries (see also point IV). More precisely, since selling land at maximum prices is an essential source of income for local administrations (CBS, 2017b), there is little incentive to sell many land positions simultaneously, since this would lower prices significantly. To overcome this blockade, the central government could reimburse city administrations either through direct subsidies on land sales or by rebalancing their income structure altogether, where the exploitation of land positions would receive a smaller role than it has now. Additionally, urban planners are increasingly dealing with voter backlash and Nimbyism against housing construction in inner-city areas (Hankinson, 2018). By giving the central government a stronger role in issuing new housing locations, it could function as a scapegoat for the upzoning process. This would allow for taller buildings, greater densities and higher pace in land or building conversion projects (see also Metcalf, 2018).

A final point here relates to the fact that potential building land, especially in outer-city locations, is not necessarily owned by public administrations but by private developers themselves. The underlying problem remains the same. While the willingness to build more housing appears to be high at the moment, private developers have little incentive to develop all of their locations simultaneously, as this would lead to a fall in sales prices and thus imply lower returns (Miles, 2018). Since appropriation is time-consuming and costly, governments should address this problem by increasing property taxes on inactive land holdings.

### *II. New production should match need for affordable housing*

Where most newly constructed inner-city dwellings are small-sized apartments for single-person households or multi-person units in the high-end segment, it becomes more and more apparent that just building a lot of new units is not enough. Rather, to keep urban housing markets diverse and affordable, planning authorities need to ensure that the new housing stock does not only satisfy the influx of higher-income households, but it should also cover the housing needs of (new) lower- and middle income families. Given the fact that in the two major cities of the country, Amsterdam and Rotterdam, regulated rental housing (<€710 net rent per month) already makes up more than 50 percent of the housing stock and is thus significantly larger than the share of low and lower-middle income households<sup>8</sup>, this might seem a rather unnecessary prerequisite for housing policy. However, the crucial distinction here is between existing and readily available affordable units, where the former are abundantly available and the latter extremely scarce.

The main solution that is widely proposed for creating a more affordable and accessible rental housing sector is the expansion of the 'mid-level' market segment in the rental sector, which are deregulated dwellings with a net rent of between €710 and €950 to €1,000 per month. While there certainly is growing demand for these dwellings, the discussion misses two essential points. First, rather than ensuring that these units are objectively affordable in relation to their occupiers' incomes the 'mid-rent' segment only assumes affordable rents (van Middelkoop and Schilder, 2017).

Second, there are no guarantees under the current rent regime that mid-level rental dwellings are not pushed into the high-rent segment with the arrival of a new tenant<sup>9</sup>. In our view, a more effective way of producing permanently affordable dwellings for middle-income households then is through land policies and new types of rent regulation. If municipalities sell land at reduced prices, or, alternatively, use ground lease arrangements to split the costs of land from the costs of building structures (see e.g. Kenny et al., 2018), developers should be obliged to (partially) construct new dwellings for lower- to middle-income single-person and family-households. These units should then fall under a new rent regulation regime. Initial rents should take into account both dwelling properties as well as the income of its occupier, while annual rent increases should be controlled for a time-specific period, even in the case of tenancy change.

### *III. Increase turnover rate to achieve a better allocated housing stock*

Building new (affordable) homes is the key ingredient for a better balance between housing supply and demand. Nonetheless, prices and rents are, at least in the short run, more susceptible to changes in the stock for existing homes. One of the core problems of hot property markets is that they reduce the willingness and ability to move house because the additional utility of a new rental or owner-occupied unit most often does not justify its additional costs. Particularly in the rental market this tends to be a problem. While there is little incentive to move from a regulated to an unregulated rental dwelling per se, the growing divergence between the two sectors means that even if a move to a (better) or larger unregulated dwelling was desired, it has become more

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<sup>8</sup> For most recent numbers on the distribution of the housing stock the reader is referred to the report 'Housing in the Metropolitan Region Amsterdam 2017' (Booi et al., 2018).

<sup>9</sup> Similarly, critics of the sole focus on expanding the mid-level segment have proposed the alternative idea of increasing the current deregulation threshold (to €1,000 per month). However, this proposal misses that this would further deteriorate the chances of newcomers and market outsiders to find accessible and affordable housing in cities – after all, the largest share of the deregulated housing stock is not only allocated based on household income but also on time accumulated on waiting lists. Moreover, it would, most likely, push investments by private developers further down the road, meaning that they would probably seek to establish a mid-rent segment that would start at much higher rents per month, e.g. €1,000 to €1,200 per month.

difficult to realize this wish. The solution to this problem most likely lies in a more balanced housing stock with a sufficient number of dwellings in all segments across the rental and owner-occupied spectrum, and thus will take many years to realize.

Nevertheless, governments could think about short-term solutions to achieve a more optimal allocation of the housing stock. A more penalizing approach would be the introduction of income-based rents and changing permanent into temporary contracts for tenants who, given their household income and household size, severely overconsume social rental housing<sup>10</sup>. Since, there are legal limitations to implementing such policies, incentivizing moves might then be a more effective way forward. Amongst other options, local policy makers could think about setting up funds to cover the transaction costs of house moves or by giving rent credits to tenants and discounts on property taxes to owner-occupiers if they move to a more suited dwelling. In contrast, overcrowding as a coping strategy to avoid unaffordable rental costs could be averted by extending housing allowances to the deregulated sector<sup>11</sup>. This would mean that households who move to larger and often more expensive units would not lose their full subsidy automatically.

#### *IV. Better integration of housing and infrastructure policies*

In the current housing landscape in the Netherlands lower- and lower-to-middle income households are heavily concentrated in inner-city locations<sup>12</sup>. While there is an ongoing process of a displacement of poorer households to less desirable outer-city locations – in a recent study by Hochstenbach and Musterd (2018) this was dubbed as the suburbanization of poverty – there is still a case to be made for a more equal spread of different income classes across city regions.

On the one hand, this would require the production of new housing being set at the regional level. However, to guarantee that local planners do not seek to implement policies which would welcome higher-income but fend off lower-income households, oversight and coordination should potentially be given to national authorities. On the other hand, a regional approach would require better coordination and integration of housing and public infrastructure / transport policies.

In the Netherlands, commuting distances are strongly influenced by income and educational level (CBS, 2016), meaning that the higher socio-economic stratum commutes significantly longer distances, while lower-income households tend to stay closer to their work places. If (public) transportation became cheaper, not living in inner-city locations would potentially become more attractive. From a policy point of view this would not only include infrastructural projects but could also be achieved through partially replacing housing allowances with mobility allowances.

#### *V. Penalize speculative buy-to-let investments but incentivize build-to-let*

Recent evidence shows that there is a relatively straightforward and effective way in limiting the influence of domestic and foreign investors in urban housing markets: a substantial increase of stamp duty taxes on secondary property purchases.<sup>13</sup> The rationale behind this measure is that it would make investments of speculative buy-to-let investors<sup>14</sup> and buy-to-leave buyers<sup>15</sup> much less

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<sup>10</sup> These would be regulated rental housing units that are accessed through the income- and waiting-time based allocation system.

<sup>11</sup> Under current law housing allowances can only be obtained for regulated dwellings.

<sup>12</sup> See Booi et al., (2018) for the case of Amsterdam

<sup>13</sup> Indeed, right after such a measure was introduced in London, prices started to fall relatively to the rest of the country (Bloomberg, 2018b).

<sup>14</sup> That is private investors who purchase properties, refurbish and split them into smaller units, only to rent them out for high prices in the deregulated sector.

attractive and would also tilt the level playing field back towards younger first-time buyers. However, long-term private investors who turn owner-occupied units into affordable rental units may be exempted from this rule. As it is often the first destination of younger newcomers in urban housing markets, affordable private rental dwellings serve a crucial function. This means that turning away private investors should not be a goal in itself; rather, policy makers should devise a system in which private investors do not solely seek to invest in the higher segment of the free rental market. As argued above this could be achieved through a system of balanced rent regulation (i.e. serving the interests of both landlords and tenants) and targeted subsidies for new (affordable) housing.

## Conclusions

Extreme house price growth and increasing unaffordability in the owner-occupied and private rental sector pose some of the greatest challenges in contemporary urban housing markets. While it has been argued elsewhere that hot property markets will cool off – to put it mildly – once interest rates rise to higher levels again, this contribution has argued that more coordinated policy interventions at both the local and national level are required. The potential problem with not acting quickly and decisively is multifold: It increases the risk of bubble formations and severe housing market busts, it undermines the stability of the financial system and economic growth, it increases wealth inequality, and it weakens social cohesion within cities and across countries.

We argued that a coherent housing and planning policy approach would entail five key components. A massive increase of housing supply; the production and preservation of affordable housing; higher turnover rates to reach a better allocation of the housing stock; a better integration of housing and mobility/infrastructure policies; and finally, a significant reduction of speculative buy-to-let and buy-to-leave transactions.

We end this contribution on one specific qualification: While the policy details described in this contribution are specific to urban housing markets in the Netherlands, we would argue that the broader strokes also apply to hot property markets elsewhere. Recent studies have suggested that housing markets in major cities have become globally connected and thus increasingly function along the same basic premises (Aalbers, 2015; IMF, 2018). This then does not only suggest that policy solutions might even be sought at the supranational level, but it also means that international policy learning has become more meaningful in making national and local housing policies more robust and effective. This contribution hopes to be a testimony to this claim.

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<sup>15</sup> That is buyers who do not seek to rent out the dwelling in the first place, but just use it to store their wealth.

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