Councils Response to Stage 1 Matters, Issues, Questions - Thursday 12 December 2019.

Matter 7 – The Broad Locations for Development – Specific Matters (Policy S6 (i) to (xi)

Main Issue

Whether the detailed policy for each broad location for development is justified, effective and consistent with national policy.

East Hemel Hempstead (South) S6 (iii)

1. Question 1

Is the site suitable for housing and are there any specific constraints or requirements associated with it, or the need for mitigation measures?

1.1 Yes, as demonstrated in the Councils strategic site evaluations work, the site is considered suitable for housing. Potential significant constraints, requirements and mitigations were directly considered in the Draft Strategic Site Selection Evaluation Outcomes methodology as set out Planning Policy Committee March 2018.

The evaluation uses the criteria below, based on the approach in PPC reports mentioned above (and as similarly set out in the Call for sites and Local Plan regulation 18 consultation background materials).

Stage 1

1. *Green Belt Review evaluation will be undertaken on the basis of a judgement of impact on (i.e. 'damage' to) Green Belt purposes (taking account of the purposes defined in and considered in the relevant parcel assessment in the GBR). Sites are rated as 'higher impact', 'medium impact' or 'lower impact' (set out as Red Amber Green (RAG)). It is important to remember that the independent Green Belt Review set out that "All strategic parcels in the Green Belt, at least in part, clearly perform a key role". The assessment is a comparative one in the context of understanding relative impacts on the Green Belt. To achieve 'further consideration for development' the site must be evaluated as lower or medium impact (Green or Amber). Any Red rating (higher impact) will rule a site out for further consideration.*

Stage 2

2. *Suitability will set out as (Red Amber Green) if there are any issues which are overriding constraints to development – eg Access, Transport, Heritage, Biodiversity, Flood Risk. Any Red rating will rule a site out for further consideration.*

3. *Availability will set out as (Red Amber Green) if there are any issues which are overriding constraints to development in terms of land ownership, restrictive covenants etc. Any Red rating will rule a site out for further consideration.*

Stage 3

4. *Unique contribution to improve public services and facilities, e.g. public transport - (set out as Red Amber Green). Any Green rating is considered to be potentially significantly positive at a District wide (or even wider) scale.*

5. *Unique contribution to enhancing local high quality job opportunities and the aspirations of the Hertfordshire Local Economic Partnership / Hertfordshire EnviroTech Enterprise Zone - (set out as Green Amber Red). Any Green rating is considered to be potentially significantly positive at a District wide (or even wider) scale.*

6. *Unique contribution to other infrastructure provision or community benefits - (set out as Red Amber Green). Any Green rating is considered to be potentially significantly positive at a District wide (or even wider) scale*

7. *Deliverable / Achievable is there is a reasonable prospect that the development, including all key aspects (including viability) being assessed as part of the overall 'package' proposed, is viable and deliverable (set out as Red Amber Green). Any Red rating will rule a site out for further consideration. 8. An overall evaluation judgement will be recorded (set out as Red Amber Green) as how the site is evaluated for further consideration for development in the Plan."*

1.2 This methodology identified two potential levels of constraints in the site assessment;

- Level 1: Overriding Constrains that would rule out sites as potentially 'suitable'.
- Level 2: Constraints that would need specific requirements and mitigations.

1.3 No Level 1 'Overriding Constraints' were identified for East Hemel Hempstead (South). The following Level 2 specific constraints were identified as part of the strategic site evaluations;

- M1 Motorway
- Grade 2 and 2* Listed Buildings.

1.4 Some of the specific constraints, requirements and mitigations were directly taken into account in Policy S6 (iii) requirements 21, which set out;

- Design to mitigate adverse impacts from motorway noise and air pollution

1.5 All of these specific constraints, requirements and mitigations are also being taken account of and where appropriate mitigated through the Masterplanning Process.

1.6 The specific constraints, requirements and mitigations are also being taken into account as part of the Masterplanning process, including the mitigation of impacts from noise / pollution of roads.

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2. Question 2

What evidence is there to demonstrate that the proposed broad location is capable of delivering 2,400 dwellings? (200 of which are after the plan period)

2.1 The primary evidence is set out in Annex 1 of the draft Local Plan at page 98. This sets out all of the Broad Location area and Base Capacity Calculations in Hectares. For East Hemel Hempstead (South) this sets out;

Broad Location (BL)	***BL Wider Area (Ha) (Purple on Policies Map)***	***Broad Location Non-Green Belt Area (Ha) i.e. Area to be removed from GB***	***60/40 resi / non-resi split on BL Wider Area***	***60/40 resi / non-resi split on non-GB Area***	***New Education Site in GB up to (Ha)***	***Net developable area when education sites are in Green Belt - 80% of Non-Green Belt area***	***SADC net developable area for capacity calculations x 40 dwellings per hectare =***
East Hemel South	*138.8*	*115 (98 for calcs*)*	*76.3/50.9*	*59/39* see note below*			*59x40 = 2360*

**** For East Hemel South, significant motorway bund circa 17.5 hectares – excluded from net area calculation so 59 Ha used for calculation.***

2.2 In this instance, 60% of the area to be removed from the GB is used as a basis for the capacity. There is the accompanying assumption that 40% of the area to be removed from the Green Belt is infrastructure and open space. The reasoning for this has been set out as Strategic Local Plan Background Note: Residential Density October 2014 (HOU 015);

Gross density calculations can be used to estimate and illustrate the potential development capacity of a site. The Green Belt Review Part 2 (SKM Enviros Consultancy Study) used the approach that up to 60% of the Gross Development Area (GDA) would be developed (termed Net Development Area) and the remaining 40% would be required to provide infrastructure, main roads, open space and public facilities.

Therefore 59 (developable area) x 40 (dwelling per hectare) = 2360 dwellings. A small rounding up has then been applied to 2400

2.3 The appropriate densities to use and areas to which they would be applied was addressed on several occasions at PPC, including in particular PPC report January 2014, which sets out;

It is considered that 40dph is a relatively 'safe', robust assumption which can be readily achieved in suburban location housing developments in the District, particularly with a dwelling mix similar to that indicated in the recent Strategic Housing Market Assessment (SHMA). This simple calculation makes no specific allowance for infrastructure and major open space in larger development areas…

Appendix 1 provides a summary of the "Strategic" Green Belt land releases as recommended by SKM. For these areas SKM identified potential development parcels and calculated a dwelling capacity range based on net densities of 30 – 50dph. It is recommended that Plan policies are developed on the basis of achieving a mid-range overall target minimum density of 40dph. This will necessitate some higher suburban density forms of development in some locations.

2.4 Furthermore, as set out in Strategic Local Plan Background Note: Residential Density October 2014 (HOU 015), a draft of which was presented to PPC July 2014. This is includes as M7iiiQ2 Appendix 1.

Work on density assumptions in the draft Strategic Local Plan (SLP) is based on HCA research, in the form of a density matrix (Table 3.3 from the Homes and Communities Agency Urban Design Compendium – reference below). The matrix links typical residential densities to urban form ('creating urban structure'). It draws on examples of development across the UK and Europe. Average densities are based on case studies analysed as part of the Sustainable Residential Quality: Exploring the housing potential of large sites research. The matrix recommends that residential densities of 30 to 50 DPH (alongside related services) should be applied in suburban locations. This is considered to be relevant to the SKM identified sub areas assessed for the draft SLP, as they are located on the edges of existing settlements and exhibit suburban characteristics.

2.5 The landowner / developer team confirmed the capacity was appropriate, deliverable and supported as part of landowner / developer submissions summer 2018.

2.6 The landowner / developer team have also confirmed that the capacity was appropriate, deliverable and supported as part of their landowner / developer Local Plan Regulation 19 Publication formal representations in October 2018.

2.7 The significant amounts of Masterplanning work with relevant stakeholders demonstrates that this Broad Location is capable of delivering 2,400 homes. As set out in the Councils response to question M6 Q5, a PPA has been signed and much work undertaken, as quoted below;

"5.3 In more detail, significant progress has been made in particular with regard to the East Hemel Hempstead (North, Central and South), North St Albans and North West Harpenden Masterplans. PPAs have been signed covering all 5 of these Broad Locations, comprising the 'first tranche' of Masterplans. Parties to the PPA for East Hemel are SADC, DBC, HCC and the landowner/ developer team (Crown Estate)."

2.8 As addressed in response to other MIQs, it can also be noted that the Broad Location landowner/developer team (the Crown Estate) have agreed a Statement of Common Ground. This includes their confirmation that they agree that the 2,400 figure is deliverable.

3. Question 3

What arrangements have been made for joint working between the Council and Dacorum Borough Council to deliver the proposed broad location?

3.1 The Council has responded in detail as set out at question M7iQ7.

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4. Question 4

Should the policy refer specifically to the provision of sports facilities?

4.1 No, as set out in response to M7i Q11, the Council considers that there is no requirement to set out specifically the provision of sports facilities in the policy here. Appropriate sports facilities will be required, but will most appropriately be identified in detail and secured through the mechanisms that the draft Plan already contains. This includes at S6 (iii):

S6(iii) – Requirement 1 - *Masterplanned development led by the Council in collaboration with Dacorum Borough Council, local communities, landowners and other stakeholders*

S6 (iii) Requirement 10 - *A substantial new Country Park providing facilities for new and existing communities and a permanent green buffer to the south east*

S6 (iii) Requirement 16 - *Recreation space and other community facilities, including health provision*

4.2 This also includes at L22 'Community, Leisure and Sports Facilities'

"the provision of new community, leisure and sports facilities will be concentrated in the following locations;

…

- *As part of new Local Centres within Broad Locations for development and in other major developments*

- *As part of new educational development, where joint use facilities should be provided*

…

The council will encourage new and enhanced sport and recreational facilities in appropriate and sustainable locations, including in particular:

- *"New local provision as part of major residential development at Broad Locations, including possible joint use of education and multi-purpose community buildings / halls or improvements to existing parish halls / centres near to the new housing areas"*

4.3 This also includes at policy L28 'Green Space Standards and New Green Space Provision':

Creation of new green space through development or other opportunities will be directed at meeting needs for the new development and also addressing identified needs and deficiencies in the host settlement.

Priority provision at the Broad Locations (excluding provision of country parks / wildlife habitat creation areas – Policy S6) is set out in the Table below:

Broad location	***Priority provision***
East / North Hemel Hempstead	*Playing pitches for adult and junior football, junior rugby and cricket*

	Hemel Hempstead related needs to be confirmed through Masterplanning process *Strategic play* *Teenage areas* *Parks and gardens* *Playing pitches: adult and junior football* *Allotments*

4.4 It is noted that there has been an objection received by Sports England in relation to a lack of specific sports provisions identified in the draft Local Plan, as well as concerns with the robustness of the Playing Pitch Strategy Update 2019 (LCRT 002). The Council has been working closely with Sports England in recent months and is in the process of developing a new Playing Pitch Strategy for the District that will meet Sport England's concerns about the current version. This new document will include identifying more directly in line with current guidance and best practice the current shortfall in existing sports facilities, as well as additional requirements from projected population growth from the Broad Locations.

4.5 The new Playing Pitch Strategy will, through the Masterplanning and subsequent Planning Application processes be used to secure on site provision and appropriate contributions from S106 agreements. This new work has included working with other bodies, such as Herts FA and services within the Council to identify areas for potential improvement.

4.6 All of the above is being incorporated into the iterative collaborative work on Masterplanning for East Hemel South. This includes the work under the arrangements of the East Hemel PPA in conjunction with key partners - DBC, HCC and the landowners.

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5. Question 5

What are the timescales and funding sources for the necessary improvements to junction 8 of the M1?

5.1 As also set out in response to M7iiQ5, Hertfordshire County Council is the Transport Authority for this area. The M1 J8 scheme is identified in the Hertfordshire's Local Transport Plan 2018 – 2031 (LTP4) as a Transport Improvement to support new development. A copy of LTP4 can be found in INFR 001 2018-2019 Infrastructure Delivery Plan reference 74 link on page 168. Please see extract below.

Scheme Table					
Categories		***Lead Authority/ Promoter***	***Status***	***Time Frame***	***Information***
	…	…	…	…	…
Transport Improvements to support new development *(Specific junctions known to be affected)*	*6) East Hemel Hempstead*	*Developer*	*Subject to Planning Consent*	*Medium*	*Includes upgraded A414/Green Lanes junction, M1 Junction 8 enhancements and new spine road linking the A414 and B487.*

5.2 The scheme is also identified in the HCC South West Herts GTP which is a daughter document to LTP4. A copy of the GTP can be found in INFR 001 2018-2019 Infrastructure Delivery Plan reference 77 link on page 169. Please see extract below.

Reference	***Scheme or Project Name***	***Concept description***
…	*…*	*…*
SM7c	*M1 Junction 8 enhancement*	*Enhancement to M1 Junction 8 and the adjacent junction at Breakspear Way/Green Lane to provide additional vehicle capacity and connectivity to Maylands, and relieve congestion on the A414.*

Intervention Qualitative Assessment

Intervention ID	***Scheme Approach ID / Project***	***Intervention Name***	***District(s)***	***Cost Range***	***Timescale if delivered in isolation***	***Level of Risk***	***Likelihood of Funding (internal or external)***
…	***…***	***…***	***…***	***…***	***…***	***…***	***…***
SM7	***…***	*…*	*…*	*…*	*…*	*…*	*…*
	c	*M1 Junction 8 enhancement*	*St Albans, Dacorum*	*£10m-£50m*	*5-10 years*	*Medium Risk*	*High Likelihood*

Reference	***Scheme or Project Name***	***Concept description***
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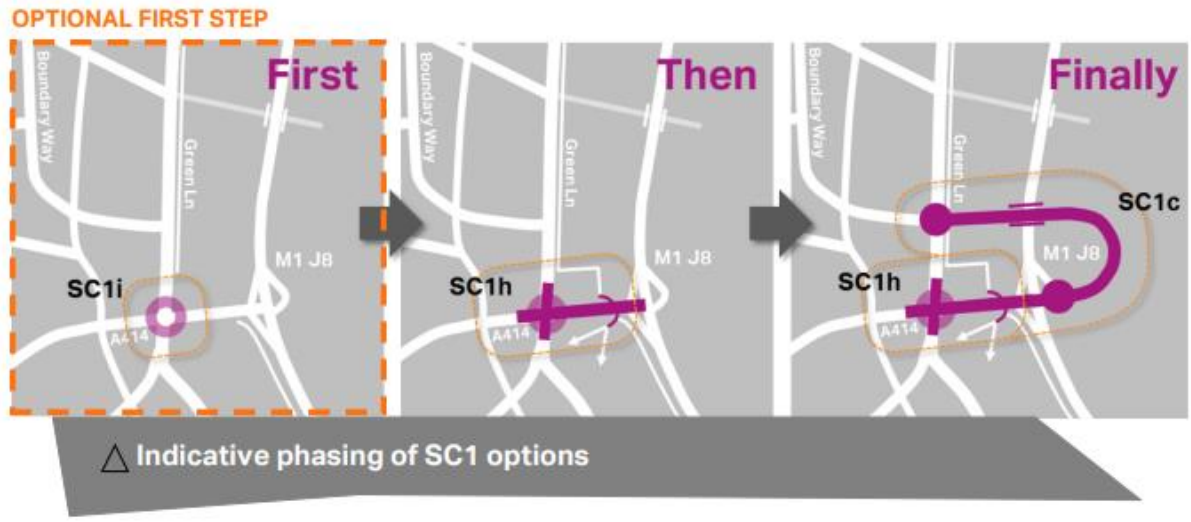
…	*…*	*…*	*…*	*…*	*…*	*…*	*…*
SM7	*…*	*…*	*…*	*…*	*…*	*…*	*…*
	c	*M1 Junction 8 enhancement*	*St Albans, Dacorum*	*£10m-£50m*	*5-10 years*	*Medium Risk*	*High Likelihood*

5.3 The Maylands Growth Corridor Study Hemel Hempstead: Investment Prospectus (January 2018) (please see IDP Appendix 3 at INFR 002b) is the key document which was prepared in a collaborative process which included key stakeholders such as HCC, HE, LEP, SADC, DBC and TCE. It outlines a schedule of interventions, including M1 J8. It explains that M1 J8 forms part of the 'Scheme *Concept 1 (SC1) Eastern Gateway Improvements to M1 Junction 8 and A414 Breakspear Way-Green Lane Junction'*

5.4 In terms of what is proposed, the document sets out:

What is proposed? *A range of highway-focused options have been considered, each varying in terms of scale and impact. It is important not to view each Scheme Concept in isolation, and that as a package the interventions will complement each other. Whilst Scheme Concept 1 will deliver increased highway capacity which will reduce queues and delays to motorists, it will also take pressure off other parts of the transport network so that they can facilitate movements by bike or on foot and free up capacity for buses.*
A phased approach has been devised. As shown below.



5.5 In terms of timescales and funding sources the Maylands Growth Corridor Study Hemel Hempstead: Investment Prospectus sets out the following on page 16:

When will it happen?

SC1i could come forward within 2 years. Its delivery will be strongly tied to the Maylands Gateway development.

SC1h could come forward within 2-5 years during the early phases of East Hemel Hempstead urban extension development, depending on when or if SC1i is implemented.

SC1c is a more complex intervention which could be delivered within 5-10 years, before the completion of East Hemel Hempstead urban extension development.

Who will be responsible for delivering it?
SC1i can be delivered within the existing highway boundary and will be funded by local developers and delivered by Hertfordshire County Council.

SC1h will require land outside of the existing highway boundary but within the control of The Crown Estate and will be funded entirely by local developers including The Crown Estate. It will be delivered by Hertfordshire County Council or by the developer themselves.

SC1c will require land outside of the existing highway boundary but within the control of The Crown Estate and will require funding from a mixture of sources including local developers and central Government. It will be delivered by Hertfordshire County Council. Or the developer themselves. As it will interact with the strategic road network, Highways England will need to be heavily involved in the development and delivery of SC1c.

How much will it cost?

SC1i - < £250k
SC1h - £2m - £5m (depending on whether dualling of Green Lane is included or not)
SC1c - £15m - £25m (depending on composition of scheme)

5.6 As stated above, M1 J8 is part of a package of interventions for the eastern gateway area which complement each other and with phasing planned over a 2-10 year period. Together they are known as SC1 and an outline of the proposals is included at paragraph 8.4 above. The M1 J8 element of SC1 could be delivered within 5-10 years and will require funding from a mixture of sources including local developers and central government. The other SC1 interventions are funded by local developers and are scheduled to be delivered sooner and therefore will provide transport benefits to the eastern gateway at an earlier stage.

5.7 In terms of funding sources, the work to secure funding for M1 J8 is ongoing. A key example of progress can be seen in the The Herts Enterprise Zone Board Meeting in October 2018 which considered a report regarding EZ Accelerator Funding for Breakspear and J8 Improvement Works. It was proposed that the EZ project and TCE co-fund a package of work to undertake the design and preparatory works for the Breakspear Way and M1 Junction 8 improvements ahead of securing planning permission, in order to accelerate delivery of this critical infrastructure. The estimated costs for preparatory highways and utilities works is £6m, which could be funded £3m by the EZ, forward funded by a LEP repayable grant, and £3m by TCE. It is understood that the funding has been secured and the project for the design and preparatory works has commenced. This is considered to be an important piece of work, and once completed, it will form the foundation which will allow funding to be secured. This investment represents a significant commitment by the LEP and landowner to progress the M1 J8 scheme.

5.8 Furthermore, Herts EZ advise:

The upgrade of M1 Junction 8 is a critical infrastructure improvement needed to support both employment and residential growth in the Hemel Hempstead and St Albans area. This upgrade will support delivery of the Hemel Garden Community programme, the East Hemel Hempstead development and the Hertfordshire IQ Enterprise Zone (EZ), all of which are connected with the wider growth and transformation of Hemel Hempstead, expected to deliver circa 10,000 new jobs and circa 11,000 new homes. The M1 junction 8 upgrade would be delivered on land either within the ownership of the Crown Estate (TCE) or highway land. TCE and Hertfordshire IQ Enterprise Zone (supported by Hertfordshire LEP) are currently funding a detailed design project in sufficient detail to enable the construction of the J8 upgrade, along with the design of related highways improvements required for delivery of the TCE owned Herts IQ East Hemel site. This includes the major upgrade of Breakspear Junction which provides a key access point from the A414 to the Maylands Business Park and East Hemel areas. This co-funded £6m design project is being undertaken ahead of planning permission being secured, in order that these essential highways works are ready to be implemented when planning permission is secured by The Crown Estate. It is clearly unusual for both public and private investors to take such an approach, and this gives a strong indication of the local stakeholders commitment to the success of the project and the deliverability of the J8 upgrade scheme.

In terms of funding for the implementation of the main J8 upgrade scheme, this will be secured through a package of funders, and a plan is currently being concluded to target and secure a range of funding sources, including Road Investment Strategy 2, S106, CIL, Housing Infrastructure Fund, LEP Growth Deal funding and landowner contribution of land. However, the Herts IQ Enterprise Zone is able to provide a level of confidence in relation to funding for this scheme, through future business rates income being an already 'secured' source of funding to help deliver a range of Herts IQ priorities, of which the upgrade of the M1 J8 is its major project . Herts IQ EZ should be considered the funder of last resort to underpin delivery as there are a number of competing uses of the business rates funding to support delivery of the wider Herts IQ EZ project. In terms of the timeframe in which funding will be available, Hertfordshire County Council is the accountable body for Hertfordshire LEP and the Herts IQ Enterprise Zone, and has already considered early access to funds via public borrowing, to be repaid as funding sources become available.

5.9 The Hemel Hempstead broad locations have been afforded Garden Community status (within a wider proposal) which means MHCLG funding has been allocated to fast-track specialist survey work and planning works necessary for development. The Garden Community status provides extra confidence regarding commitment, resourcing and intent.

5.10 In terms of developer contributions, The SADC CIL LP Viability Strategic Site Testing (INFR Sep 2019) for East Hemel Hempstead North, East Hemel Hempstead South and North Hemel Hempstead, all identify contributions for transport infrastructure. Together the transport contributions indicated in the viability assessments add up to circa £61m as shown in extracts below. All broad locations are assessed as viable, which includes the transport contribution (See SADC response to M6 Q20); therefore viability (or lack thereof) should not be a barrier to securing appropriate transport contributions at this level.

5.11 Aside from these sites in SADC, additional developer funding for transport infrastructure is expected to come from the wider Hemel Garden Communities development of up to 11,000

homes (including c 5,000 homes in SADC). If transport contributions were set at a similar level in HGC DBC sites, the indicative transport pot could possibly double to circa £122m.

East Hemel Hempstead (North)

Table 3.2.14: Section 106 contributions

Contribution description	***Contribution***	***Comments on contribution***
…	*…*	*…*
Transport Infrastructure	*£18,150,000*	*Allows for:* *- Strategic - LTP4 major scheme;* *- Local highway - on & off site* *- Sustainable travel - public transport;* *- Sustainable travel - walking + cycling on & off site*

East Hemel Hempstead (South)

Table 3.2.15: Section 106 contributions

Contribution description	***Contribution***	***Comments on contribution***
…	*…*	*…*
Transport Infrastructure	*£26,400,000*	*Allows for:* *- Strategic - LTP4 major scheme;* *- Local highway - on & off site* *- Sustainable travel - public transport;* *- Sustainable travel - walking + cycling on & off site*

North Hemel Hempstead

Table 3.2.14: Section 106 contributions

Contribution description	***Contribution***	***Comments on contribution***
…	*…*	*…*
Transport Infrastructure	*£16,500,000*	*Allows for:* *- Local highway - on & off site* *- Sustainable travel - public transport;* *- Sustainable travel - walking + cycling on & off site*

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6. Question 6

What is the justification for the 3% self-build figure?

6.1 As set out in the Councils response to Q7i Q4, the justification is primarily based on the evidence from the Council's self-build register and also more generally from support from the public and Councillors when considering iteratively the emerging draft Plan. There are currently 444 individuals on the Council's self-build register. Some of these individuals will be able to access self-build opportunities through the normal functioning of the housing market and a number of such opportunities arise each year. However, in an area entirely washed over by the Metropolitan Green Belt and with high demand for housing and high house prices, it is evident that some will not. The Plan therefore seeks provision of 3% self-build opportunities in each of the Broad Locations. As the Broad Locations come forward, this will in due course provide for 307 self-build opportunities in the Broad Locations in the Plan period and 320 opportunities by the completion of the Broad Locations identified.

6.2 The PPG sets out at Paragraph: 011 Reference ID: 57-011-20160401;

"Local planning authorities should use the demand data from the registers in their area, supported as necessary by additional data from secondary sources (as outlined in the housing and economic development needs guidance), when preparing their Strategic Housing Market Assessment to understand and consider future need for this type of housing in their area. Plan-makers will need to make reasonable assumptions using the data on their register to avoid double-counting households."

6.3 The Council are also required to have regard for this demand for self-build as part of the Self Build and Custom Housebuilding Act 2015. The Council is aware that not all those on the register would come forward if a plot was made available in the Broad Locations. The Council acknowledges that it is currently uncertain exactly how much truly effective demand for self-build there is in the District. However, given the historic limitations of opportunities and the new chance provided by the first Plan since 1994, the Council does not wish to under-estimate the self-build demand and therefore makes a substantial provision of opportunities. The Council is very open to considering the matter again once this Plan is adopted and the level of take up and genuine and viable interest in self-build is better known, in a review of the Plan.

7. Question 7

Should the specific location for the primary school within the site be identified?

7.1 No, the Council considers that the location of the primary school within the site should be identified at the Masterplanning stage alongside other Masterplanning considerations. The requirements for the size of school has been set out been identified in the Infrastructure Delivery Plan 2018/19 (INFR 001).

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8. Question 8

How have heritage assets been considered and is a Heritage Impact Assessment required?

8.1 The Council has directly considered heritage assets as part of the Strategic Site Selection process and the Sustainability Appraisal and in considering the draft Plan wording. The Grade 2 and 2* listed buildings and an appropriate buffer that respects their setting are proposed to be retained within the Broad Location.

8.2 The Strategic Site Selection process set out a three stage process of selecting the broad locations, with stage 2 setting out;

Stage 2

2. Suitability will set out as (Red Amber Green) if there are any issues which are overriding constraints to development – eg Access, Transport, Heritage, Biodiversity, Flood Risk. Any Red rating will rule a site out for further consideration.

8.3 The Sustainability Appraisal, sets out as part of the SA/SEA Objectives;

10. To identify, maintain and enhance the historic environment, heritage assets and their setting and cultural assets

8.4 In consideration of the Broad Location S6 iii) it was set out in the Sustainability Appraisal that;

Uncertain effects have been identified for the 'historic environment' objective as development could affect the settings of Listed Buildings both within and adjacent to the site. In addition development of the site would also have the potential to impact upon the setting of Gorhambury Grade II Registered Park and Garden and its associated heritage assets.

8.5 Historic England has raised objections to the Plan, highlighting the lack of evidence to demonstrate that appropriate considerations have been given to the conservation and enhancement of the historic environment, together with a lack of policy criteria for the protection and enhancement of the historic environment in relation to these large sites. In the Councils response as set out in Regulation 22C;

"Cross reference Policy L30 This supports conservation of heritage assets appropriate to their significance and seeks that development which may affect such assets is accompanied by a Heritage Statement. Such heritage assets form only a small proportion of the overall Broad Location, are acknowledged and will be treated appropriately as part of the Masterplanning / planning application processes."

8.6 A specific Heritage Impact Assessment is not considered to be required at this Plan-making stage. A Heritage Statement and a Heritage Impact Assessment will be required as part of the Masterplanning and planning application processes. These Heritage considerations have already and will continue to inform the ongoing Masterplanning being taken forward through the PPA process (see other MIQ responses).

9. Question 9

What is the justification for the 15 pitch Gypsy and Traveller site here? Should its precise location be identified?

9.1 This question has been addressed in the responses to M5 Q7-18 and particularly at M7iiQ10.

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Matter 7 – The Broad Locations for Development – Specific Matters (Policy S6 (i) to (xi)

East Hemel Hempstead (South) S6 (iii)

List of Appendices

Strategic Local Plan Background Note

Residential Density

October 2014

St Albans City & District Council

Background Note

Residential Density

An earlier version of this note was considered by the Council's Planning Policy Committee on 3 July 2014. This version provides additional examples. The purpose of this Note is to illustrate housing density on some well known sites across St Albans City and District and thus to give a range of comparators for typical residential layouts / designs.

Measuring housing density is a simple way of quantifying the intensity of residential development and efficiency in use of land for housing. The measurement also gives some insight into the environmental character of housing areas.

The Note gives local examples of:

Relationship between gross and net density in recent major residential development

1. Jersey Farm; 1980's
2. Hill End / Cell Barnes; 1990s
3. Napsbury; 1990 / 2000s

Net density calculations

1. New England Street area, St Albans
2. King Harry Lane (new development in progress), St Albans
3. Jersey Farm Estate, St Albans
4. Oaklands Smallford Campus (current housing application as proposed), St Albans
5. Former Oaklands College City Campus housing redevelopment, St Albans
6. Part of Marshalswick Estate, St Albans
7. Part of Chiswell Green
8. Luton Road area, Harpenden
9. Belmont Hill, St Albans
10. Elm Lawns Close, St Albans
11. Land Rear of Sandridge Road, St Albans
12. Waverley Road, St Albans
13. St Albans Hospital site
14. Station Road, Harpenden (a)
15. Station Road, Harpenden (b)
16. Redbourn Lane, Harpenden
17. Luton Road, Harpenden

Calculation and interpretation of residential density

Decisions on what housing density is appropriate for a location are influenced by many different factors.

Building height, block size and housing typology are the main factors that influence the character of an area and perceptions of density.

However, higher density does not have to mean tall buildings with small apartments that fail to relate to local character. In fact, high buildings can be less effective in maximising the use of land, especially in terms of the relationship of developed and open areas.

Good design is crucial to achieve environmental quality. Each design scheme should establish the density appropriate for a particular location taking into consideration factors such as:

- Context - density appropriate to context and allowing respect for surrounding residential character
- Quality of public realm - a legible and stimulating public realm
- Outdoor space - high quality communal space
- Private and public space mix - ability to manage spaces
- Parking - adequate and appropriate car parking levels which do not dominate or detract from the external environment

Additional factors which might determine an appropriate density level include:

- Surrounding built form
- Housing types
- Need for different types of housing
- Need to create variety of densities – density mix
- Capacity of facilities for residents

It is important to remember that density is a product of design, not a determinant of it. Residential density should aim to support local infrastructure such as shops, schools, and local transport. Homes and Community Agency (HCA) “research has shown that there is no correlation between urban quality and density. Developments driven by average densities and shaped by blanket standards (relating to privacy, open space, parking and highway geometry, for example) stultify design and tend to produce lowest-common-denominator blandness.”

In the St Albans City and District Strategic Local Plan (SLP) the factors of what ‘housing types’ and the ‘need for different types of housing’ are particularly important. The draft SLP says: “All new housing development will contribute to a mix of different housing types in residential areas, taking into account the existing pattern of housing in the area, evidence of local need and site specific factors. It will in particular require the inclusion of more small and small to medium-sized housing, including one and two bedroom flats and 2

bedroom houses, in new development schemes in suitable locations, to increase the proportion of such sized units in the district housing stock, to widen choice and to provide more relatively low cost market housing available to buy. Floorspace, as well as room numbers and bedroom numbers, will be considered in judgments of relatively low cost market housing.

The Council requires the affordable housing size, type, and mix to broadly reflect that being provided for the market element of all development.

The Council seeks the provision of a reasonable proportion of housing designed to the lifetime homes standard that can be readily adapted to meet the needs of older people and people with disabilities.

Sheltered housing and extra care housing for older people and those with special needs will be encouraged on suitable sites in areas close to a range of services.

Further detail on requirements for appropriate housing size, type, mix and proportion of lifetime homes will be given in the DLP. “

Measuring density

There are different ways of measuring density, each of which provides different information.

They include:

- Dwellings per hectare (DPH) – this a common measure to indicate residential density. However, apartments at 60dph may actually have smaller built volume than larger houses at 30dph with related garaging.

- Square meters per hectare – measuring amount of floorspace per hectare is another method to illustrate development intensity. It indicates more clearly how efficiently land is being used.

- Floor area ratio (FAR) or plot ratio – this measurement express the ratio between gross floor area and site area. It again indicates the intensity of land use and gives some indication of massing volumes.

- Bedspace per hectare – measuring bedspace per hectare indicates population capacity rather than actual use (as some dwellings may be under-occupied.)

- Habitable rooms per hectare – habitable room and bedspace densities give an indication of resident population and a calculation of population capacity. Calculating habitable rooms per hectare can be helpful in

determination of likely demand for amenities and services such as public transport.

For the purpose of this Note the simple dwellings per hectare has been adopted.

The first part of the Note illustrates how density is viewed at a gross level. It gives examples of the relationship between gross and net density calculations. Gross density calculations can be used to estimate and illustrate the potential development capacity of a site. The Green Belt Review Part 2 (SKM Enviros Consultancy Study) used the approach that up to 60% of the Gross Development Area (GDA) would be developed (termed Net Development Area) and the remaining 40% would be required to provide infrastructure, main roads, open space and public facilities.

The second part of the Note illustrates calculations of net density. A net density measurement includes access roads within the site, private garden spaces, car parking areas, incidental open space and landscape and children's play areas but normally excludes major distributor road, primary schools, opens spaces serving a wider area and significant landscape buffer strips.

Net density is the measure of density used for the SKM recommended net development areas and thus is a comparable measure to that used in the illustrations in this Note.

Work on density assumptions in the draft Strategic Local Plan (SLP) is based on HCA research, in the form of a density matrix (Table 3.3 from the Homes and Communities Agency Urban Design Compendium – reference below). The matrix links typical residential densities to urban form ('creating urban structure'). It draws on examples of development across the UK and Europe. Average densities are based on case studies analysed as part of the *Sustainable Residential Quality: Exploring the housing potential of large sites* research. The matrix recommends that residential densities of 30 to 50 DPH (alongside related services) should be applied in suburban locations. This is considered to be relevant to the SKM identified sub areas assessed for the draft SLP, as they are located on the edges of existing settlements and exhibit suburban characteristics.

Illustrative areas analysed for the purpose of this study can be considered in the context of the Density Matrix.

The matrix is reproduced below:

		Option 1	Option 2	Option 3
Car Parking Provision		**High** 2-1.5 spaces per unit	**Moderate** 1.5-1 space per unit	**Low** less than 1 space per unit
Redominant Housing Type		**Detached & linked houses**	**Terraced houses & flats**	**Mostly flats**
Location	**Setting**			
Site within Town Centre 'Ped-Shed' (Accessibility index 6–4)	**Central**			240-1100 hr / ha 240-435 u / ha Ave. 2.7 hr / u
	Urban		200-450 hr / ha 55-175 u / ha Ave. 3.1 hr / u	450-700 hr / ha 165-275 u / ha Ave. 2.7 hr / u
	Suburban		240-250 hr / ha 35-60 u / ha Ave. 4.2 hr / u	250-350 hr / ha 80-120 u / ha Ave. 3.0 hr / u
Sites along Transport Corridors & Sites close to a Town Centre 'Ped-Shed' (3–2)	**Urban**		200-300 hr / ha 50-110 u / ha Ave. 3.7 hr / u	300-450 hr / ha 100-150 u / ha Ave. 3.0 hr / u
	Suburban	150-200 hr / ha 30-50 u / ha Ave. 4.6 hr / u	200-250 hr / ha 50-80 u / ha Ave. 3.8 hr / u	
Currently Remote Sites (2–1)	**Suburban**	150-200 hr / ha 30-65 u / ha Ave. 4.4 hr / u		

Table 3.3 Density matrix

Average densities are based on case studies analysed as part of the *Sustainable Residential Quality: Exploring the housing potential of large sites* research (LPAC, DETR, GOL, LT and HC, 2000)

(Note: This table is a direct extract from Homes and Community Agency Urban Design Compendium 1. Second row in column one should read 'predominant'.)

Reference:
Urban Design Compendium 2 (2007), *Delivering Quality Places* (2nd Ed), Homes and Community Agency

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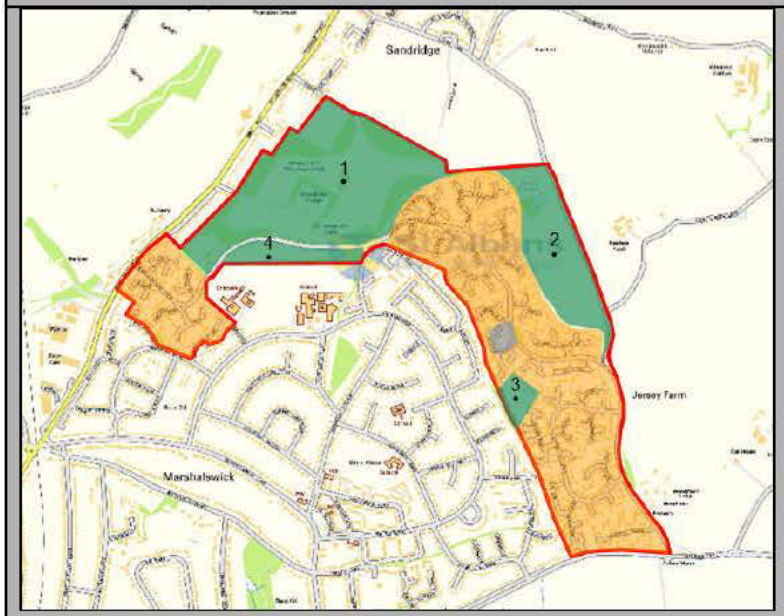
Relationship between gross and net density in recent major residential development – local examples

.

All figures are estimated / rounded (details noted below)

1. **Jersey Farm 1980s**

JERSEY FARM	Total area of development (Ha)	Area used for infrastructure (Ha) (mainly large open spaces, distributor roads and school sites)	Remaining area for residential development (Ha)	Dwelling numbers	Notes on assumptions / estimates
	102 ha	44 (**43%**)	58 (**57%**)	1800	• Infrastructure taken as including schools (see below), local centre (1 Ha) woodland park / schools (32 ha) eastern OS (9.5 Ha) local centre OS (1.5 ha) • Above area used for infrastructure includes approximately 25% of Wheatfields and Sandringham school sites to reflect use and expansion for the Jersey Farm estate (albeit this site

 Site boundary Developed area Undeveloped area 1. Woodland Park OS 2. Eastern OS 3. Central OS 4. Part of school site OS Local Centre					is pre existing and also serves Marshalswick) • Area used for infrastructure is probably an underestimate as, for ease of calculation, parts of the distributor road corridor and Jersey Lane are not included because they would require micro level area measurement • Dwelling numbers are estimated as Census super output lower level areas (SOAs 007C, 007B, 008A) and address point area adjustment. SOAs do not co-incide exactly with the estate to the NW corner. A cautious adjustment has been used
Density calculations - dwellings per Ha (dph)	**Gross** 1800 dwellings on		**Net** 1800 dwellings on		

	102 Ha = **18 DPH**		58 ha = **31 DPH**		

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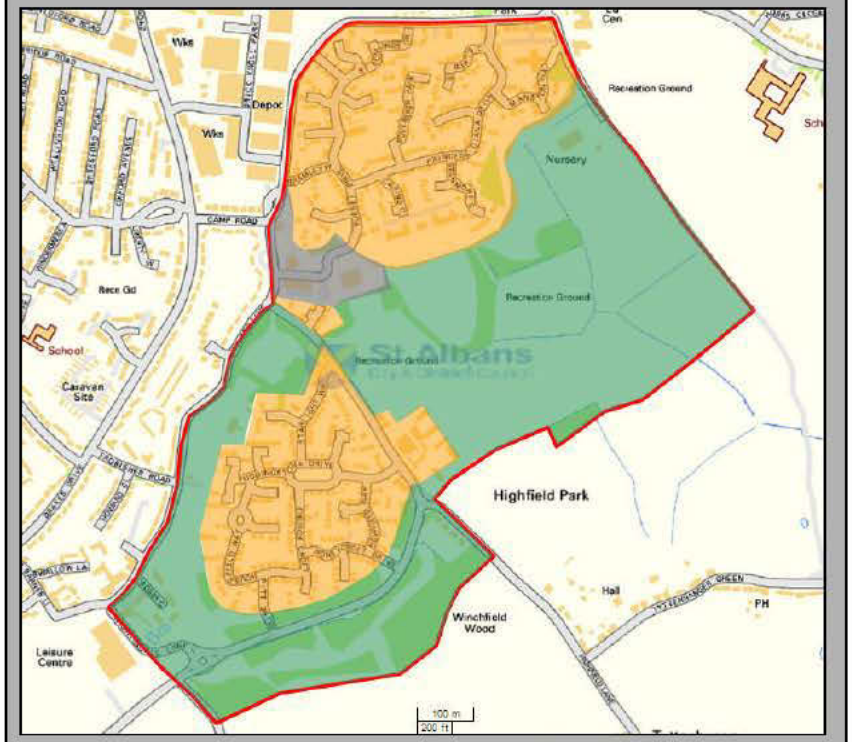
2. Hill End / Cell Barnes 1990s

HILL END / CELL BARNES (HIGHFIELD)	Total area of development (Ha)	Area used for infrastructure (Ha) (mainly large open spaces, distributor roads and school sites)	Remaining area for residential development (Ha)	Dwelling numbers	Notes on assumptions / estimates
	78 ha	46 ha **59 (%)**	32 ha **41 (%)**	800	• Infrastructure taken as including local centre (1.8 Ha), Highfield Park recreation areas (26 Ha) and Winchfield Wood OS (13.4 Ha). Full map of the Highfield Park facilities can be found here. The remainder is general open space and community facilities. • Dwelling numbers are estimated from Census super output lower level areas (SAOs) 015A and 015B and address point data

 Site boundary Developed Area Undeveloped Area Local Centre					adjustment. SAO 15B covers Tyttenhanger Village and parts of Colney Heath Lane schools.
Density calculations - dwellings per Ha (dph)	**Gross** 800 dwellings on 78 Ha = **10 DPH**		**Net** 800 dwellings on 32 ha = **25 DPH**		

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3. Napsbury 1990 / 2000s

NAPSBURY	Total area of development (Ha)	Area used for infrastructure (Ha) (mainly large open spaces, distributor roads and school sites)	Remaining area for residential development (Ha)	Dwelling numbers	Notes on assumptions / estimates
	60 ha	37 ha **62 (%)**	23 ha **38 (%)**	620	• Infrastructure taken as all large blocks of open space forming the setting for the residential development (37 Ha in all). These include distributor road and some small scale recreation facilities. • Area residentially developed is quite low and includes considerable additional integral amenity open space. This is due to the special character of this historic psychiatric hospital site; recognised in its conservation area designation. The

 Site boundary Developed area Undeveloped Area					design context set was in the importance of maintaining the extensive parkland setting
Density calculations - dwellings per Ha (dph)	**Gross** 620 dwellings on 60 Ha = **10 DPH**		**Net** 620 dwellings on 23 ha = **27 DPH**		

Net density calculations – local examples

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1. New England Street area, St Albans	Map and Aerial Photographs	Photographs	Density Calculations	Notes
Land enclosed by New England Street to the West, Verulam Road to the North and College Street to the South, St Albans This is a residential area with primarily 2 storey cottage terraced houses built in the 19th Century. Additional residential development took place at the beginning of 20th Century along Verulam Road. The site includes two commercial units and a social use with small pockets of open space.	 	 New England Street  Temperance Street  College Street	The site is 2.5 ha in area and there are 144 dwellings within the site. Net density of this site is **57 DPH.**	Some of the space adjoining New England Street has been included in the calculations to illustrate the density with a reflection of the character of the area including some public space. A major factor in high density is total reliance on-street parking.

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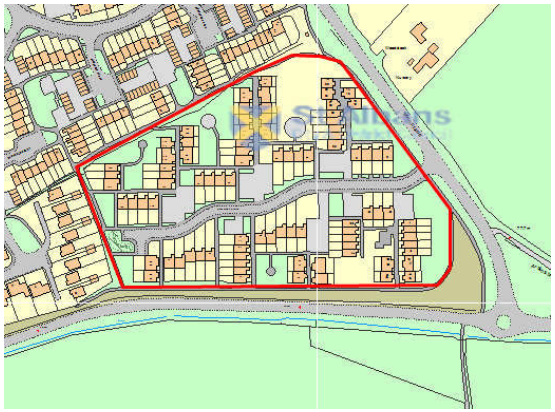
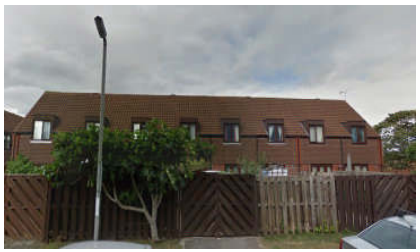
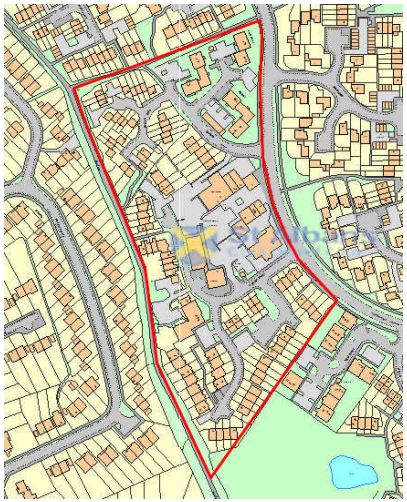
2. King Harry Lane (new development in progress), St Albans	Map and Aerial Photographs	Photographs	Density Calculations	Notes
The development of this site is divided into two phases. Phase one (northern side) is a proposal for 126 dwellings (16 key worker units, 45 extra care/assisted living units and 65 units of accommodation for the over 55s). Outline planning permission for phase one development was granted on appeal in February 2008. Phase two (immediately to the south of phase one development) is a development of 150 dwellings (ranging from 2 – 2.5 storey houses) Permission for this development was granted on appeal in April 2010.	 	 Illustrative Masterplan for phase one development.   Mortimer Crescent (phase two)	The site is 7.8 ha in area the total number of proposed dwellings is 276. Based on these figures, net density for the whole site is **35 DPH.**	This is illustrative of a recently permitted development in a suburban location but including some open spaces. Each site has different ownership but both sites share access arrangements and a coordinated design led approach.

3. Jersey Farm Estate, St Albans	Map and Aerial Photographs	Photographs	Density Calculations	Notes
Various parts of Jersey Farm Estate. The development of the whole estate took place across 1970s and 80s. <u>Area 1 – North – eastern part of Jersey Farm.</u> Permission for development of this site was granted in early the early 1980s.	.  	 Lincoln Close  Pirton Close  Sandringham Crescent	Area 1 The site is 6.8 ha in area and there are 156 houses within the site. Net density of this area is **23 DPH.**	The site consists of 2 storey detached houses. Average plot size is 300 to 350 m2. All the houses have garages and off street parking. .

<u>Area 2 – Southern part of Jersey Farm</u> This part of Jersey Farm Estate development consists mainly of 2 storey terraced houses. Permission was granted for the development of 118 Dwellings (60 flats and 58 homes) in the 1970s.	 	 Newgate Close  Newgate Close  Newgate Close	Area 2 The site is 2.8ha wide and there are 88 terraced houses within the site. Net density for this site is **31 DPH.**	Houses are set back from the street and have relatively large front and back gardens. There is a significant amount of designated resident parking space and pockets of green open space which explains the relatively low density for a development of terraced housing.

<u>Area 3 – Middle part of Jersey Farm</u> This is a mixed use area which includes residential dwellings, commercial and community uses Permission for the commercial Village Centre Development was granted in the late 1970s followed by approval for adjoining residential development in the early 80s.	 	 Harvesters  Twyford Road  Commercial Centre	Area 3 The site in total is 3.5 ha in area. Within the site there are 92 terraced houses, three blocks of flats (equivalent of 42 flats in total) and commercial centre (0.6 ha) which includes neighbourhood supermarket, five small retail units, public toilets, medical and community centre. After taking away the volume of commercial centre area and its parking, the net density for the site is **46 DPH.**	This relatively high density can be explained by the high proportion of terraced housing and flats. Dwellings of this kind are often included in the design of a central area or local centre within a settlement and this will allow higher overall densities to be achieved. It also introduces variation in the character of the built environment.

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4 Oaklands Smallford Campus (current housing application as proposed), St Albans	**Map and Aerial Photographs**	**Photographs**	**Density Calculations**	**Notes**
A full application for comprehensive redevelopment to provide new and refurbished College Buildings and residential development of 348 dwellings, car parking, associated access and landscaping was submitted in May 2013. The application is still under consultation. The area marked on the map is the area proposed by the applicant for residential development.	  	Landscape proposal  Proposed Residential Layout 	The site is 13.68 ha in area. The application proposes development of 348 residential dwellings. Within the design proposal there is a quite significant amount of structural open space in the northern part of the site and middle of the site. The overall density of the site is 26dph but after taking away the area of structural open space the net density for this development is **31 DPH.**	The scheme proposes mainly 2 – 3 storey houses. Density of the site varies depending on character zones. Proposed 'Main Streets' will be lower in density in the range of 30dph. 'The lanes' will be medium density (35dph) and 'Mews Links' will be higher density ranging from 40 - 45dph.

5. Former Oaklands College City Campus housing redevelopment, St Albans	**Map and Aerial Photographs**	**Photographs**	**Density Calculations**	**Notes**
This is a former Oaklands College City Campus site. Permission for demolition of educational buildings, change of use from educational use to residential use of eight buildings, retention of two building as hall and gym and erection of 15 apartment blocks providing a total of 329 units was granted on an appeal in August 2006. The density calculation is for part of the development - the section now redeveloped.	 	Newsom Place   Lemsford Road 	The site in total is 3.3 ha in area. Within the site boundary there are 20 apartment blocks (equivalent of 281 dwellings), gym and hall. After taking away the area of the hall/gym buildings the net density for this development is **93 DPH.**	The scheme proposes mainly 3 – 4 storey apartment blocks. Parking is at reduced level due to proximity to City services and public transport. Some of the parking is underground. This high density development is appropriate to an urban site, but there is space for extensive landscaping.

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6. Part of Marshalswick Estate, St Albans	Map and Aerial Photographs	Photographs	Density Calculations	Notes
Land along Sandpit Lane immediately to the north of current Oaklands application. Marshalswick, St Albans.	 	 Barnfield Road  Southfield Way  Ardens Way	The site is 8.4 ha in area and there are 170 dwellings within the site boundary. Net density for this area is **20 DPH.**	The area consists of 2 – 2.5 storey detached houses with garages/ off street parking and relatively large back gardens.

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7. Part of Chiswell Green	Map and Aerial Photographs	Photographs	Density Calculations	Notes
Land enclosed by North Orbital Road to the East and Watford Road to the West, Chiswell Green	 	 Manor Drive  Watford Drive  Forefield	The site is 9.7 ha in area and there are 145 dwellings within the site boundary. Net density for this area is **15 DPH.**	The site consists of a mixture of house types from 1 storey bungalows to 2.5 storey detached houses.

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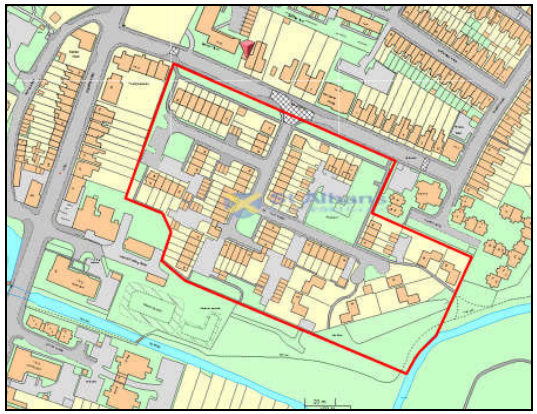
8. Luton Road, Harpenden	Map and Aerial Photographs	Photographs	Density Calculations	Notes
Land enclosed by Luton Road to the North and Tuffnells Way to the South, Harpenden	 	 Ridge Avenue  Wells Close  Tuffnells Way	The site is 10.8 ha in area and there are 190 dwellings within the site boundary. Net density for this for this site is **17 DPH.**	There is a mixture of house types. From 1 storey bungalows to 2 – 2.5 storey terraced and detached houses. Plot sizes vary from 1100 m2 to 215 m2. Most gardens are substantial and there is generally ample off street parking.

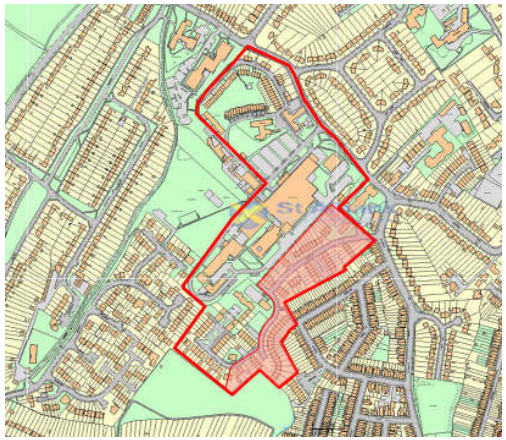
9. Belmont Hill, St Albans	Map and Aerial Photographs	Photographs	Density Calculations	Notes
De Tany Court at Belmont Hill, St Albans (former playing fields)	 	 De Tany Ct and related open space (part of former playing field)  De Tany Ct  De Tany Ct	The site is 2.24 ha in total and there are 80 dwellings within the site. Main open spaces are 0.3 ha in total. These are retained parts of the former playing fields and can be regarded as more than amenity open space included in a net area. Density of this site is **35 DPH**. If calculated without play area and open space (south east of the site) the density of this site is **41 DPH**.	This is a residential area with a mix of 2-3 storey houses and maisonettes built in late 80s. The site includes a substantial play area and riverside open space serving the wider area and small pockets of integral open space.

10. Elm Lawns Close, St Albans	Map and Aerial Photographs	Photographs	Density Calculations	Notes
Elm Lawns Close, off Avenue Road, St Albans	 	 Elm Lawns Close  Avenue Road	The site is 0.4 ha in total and there are 24 dwellings within the site. Net density of this site is **60 DPH.**	This residential development is a mix of 2- 3 Storey houses This is a small site, but it illustrates higher density development with car parking in a cul de sac layout. It comprises housing in terraced form.

11. Land Rear of Sandridge Road, St Albans	Map and Aerial Photographs	Photographs	Density Calculations	Notes
Archers Fields; R/O 168 Sandridge Road, St Albans	 	 Sandridge Road  Archers Fields  Archers Fields	The site is an urban infill of 0.75 ha in total. There are 27 dwellings within the site. Net density of this site is **36 DPH.**	The site consists solely of 2 storey houses, with gardens. They are mainly terraced, but including some linked detached and detached. There is no integral / amenity open space. There is a substantial unused road frontage (south side of access road) which results in a lower density figure than the layout would achieve if the site were not urban infill, fitting into an existing urban layout.

12. Waverley Road, St Albans	Map and Aerial Photographs	Photographs	Density Calculations	Notes
Pegasus Place off Waverley Road, St Albans	 	 Pegasus Place  Waverley Road	The site is an urban infill development of 0.74 ha in total. There are 36 dwellings within the site. Net density of this site is **49 DPH.**	The site consists entirely of 2-3 storey terraced houses with associated parking and landscaping. The houses have small gardens. There is no integral amenity open space.

13. St Albans Hospital Sites	Map and Aerial Photographs	Photographs	Density Calculations	Notes
Land adjacent St Albans Hospital, Waverley Road, St Albans.	 	 Goldsmith Way  Newmarket Ct  Waverley Road with entrance to St Albans City Hospital	The overall site is 9.2 ha in total. The main hospital site (shaded in red) is 3.2 ha. There are approximately 290 dwellings within the remaining site (6 Ha). Net density for the overall site is **48 DPH.**	The area includes a wide range of dwelling types including some substantial blocks of small flats. The overall site calculation includes some significant areas of open space, the site of a hospice and other hospital related uses. Densities within the overall site vary greatly. Some sub areas where dwellings are predominantly 2 -3 storey houses are considered separately below.

1. Goldsmith Way	 	Goldsmith Way   	The site shaded in red is 2 ha in total and there are 71 dwellings within selected site. Net density for this site is **35 DPH**	Dwellings are 2-3 storey houses. Within the site there are pockets of open space and significant amount of on-street and off-street parking.

2. Newmarket Court	 	Newmarket Court   	The site shaded in red is 1.1 ha in total and there are 43 dwellings within selected site. Net density for this site is **39 DPH**	The site is a mixture of houses and flats with significant amount of on and off street parking space.

14. Station Road, Harpenden (a)	Map and Aerial Photographs	Photographs	Density Calculations	Notes
Mallard Mews / Station Road / Waveney Road, Harpenden	 	 Mallard Mews  Waveney Road  Station Road	The site is 0.25 ha in total and there are 15 dwellings within the site. Density of this site is **60 DPH.**	This is an infill development with a mix of 2.5 – 3 storey flats and houses and apartments. This is a part cul de sac part street frontage development.

15. Station Road, Harpenden (b)	Map and Aerial Photographs	Photographs	Density Calculations	Notes
Station Road, Harpenden (flats)	 	 Station Road  Station Road  Station Road	The application site is 0.41 ha in total and there are 48 dwellings within the site. Net density of this site is **117 DPH.**	This development consists of 2-3 three storey blocks of flats with associated parking spaces to rear of blocks.

16. Redbourn Lane, Harpenden	Map and Aerial Photographs	Photographs	Density Calculations	Notes
Former Central Science Laboratories, Redbourn Lane, Hatching Green, Harpenden	 	 Manor Close  Manor Close  Hatching Green (road leading to the site)	The overall site is 1.9 ha and there are 39 dwellings within the site. Density of this site is **20 DPH.** If calculated without the surrounding open space (approx. 0.63 Ha) then the net density of this development is **32 DPH**	This residential development includes consists 2 storey housing with a mix of terraced, linked detached and detached forms. There is a mix of on-street and off-street parking. There is a substantial setting of open space related to the overall character of the area. This more than integral amenity open space.

17. Luton Road, Harpenden	Map and Aerial Photographs	Photographs	Density Calculations	Notes
40 Luton Road, Harpenden	 	 View from Townsend Road  View from Luton Road  Luton Road	The site is 0.14 ha in total and there are 9 dwellings within the site. Density of this site is **64 DPH.**	This residential development consists of 9 apartments in a 3 storey building with accommodation in the roof space and under croft parking. This is a small infill / redevelopment scheme, but it illustrates how higher density components within an overall area / scheme can contribute to character.