

St Albans City and District Council

Local Plan Public Examination

Matter 7

**“The Broad Locations for Development - Specific Matters
Policy S6(i) East Hemel Hempstead (North)
Broad Location”**

Submitted by Sellwood Planning

on behalf of

The Crown Estate

December 2019

1.0 Introduction

- 1.1 This Statement, relating to Matter 7 ‘The Broad Locations for Development – Specific Matters’ has been prepared by Sellwood Planning on behalf of The Crown Estate (TCE). TCE is the freeholder of the land necessary to deliver Broad Locations S6(i), (ii) and (iii) at East Hemel. TCE is also working cooperatively with the promoters of North Hemel Hempstead (S6(iv)).
- 1.2 In view of the extensive TCE land holdings in 3 Broad Locations, the Inspectors have agreed to the submission of 3 separate Statements. This Statement deals with East Hemel Hempstead (North) (S6(i)).

2.0 (Q1) “Is the site suitable for housing, are there any specific constraints or need for mitigation measures”?

- 2.1 The potential for a strategic release of Green Belt land at East Hemel Hempstead and its ‘exceptional circumstances’ has long been recognised. This can be traced back to 2006 when the Panel’s report into the Examination of the Regional Spatial strategy for the South East was published. The Panel disagreed with the submitted plan and concluded that exceptional circumstances existed to warrant a major expansion of Hemel Hempstead..

“In our view this is an insufficient response to the challenges facing the region and the opportunities that expansion could present to the town, including repairing its image after the Buncefield fire various submissions give us confidence that there are enough options for Dacorum related housing growth of 12,000 (together with appropriate employment related and other development) to be achieved without breaching environmental limits in terms of landscape and other factors. While a strategic review of the Green Belt will be required we are confident that this can take place without compromising the broader purposes and integrity of the Green Belt. However, a significant proportion of the

necessary urban extensions to Hemel Hempstead would probably have to be in St Albans District, thus requiring close co-operation across the boundary and the development of a strong and effective delivery organisation” (para. 5.128).

- 2.2 In 2013, the Inspectors Report was published in relation to the Dacorum Local Plan. The role of East Hemel had been discussed during the Examination and the Inspector concluded

“A number of sites were considered for housing development, although it should be noted that this most recent assessment did not include any land outside the Borough boundary (eg. Land between the town and the M1 which is within St Albans City and District). However, an earlier assessment in 2009 did consider an eastern growth scenario and concluded that if significant expansion of Hemel Hempstead is required ‘this should be taken forward in the form of the eastern growth option’. This would require the co-operation of St Albans City and District Council but it is not a ‘new’ concept and it would appear that a significant assessment of this option has been undertaken in the past, upon which further consideration could be based” (para 57).

- 2.3 As explained under Matters 4, 5 and 6, St Albans Council (SADC) has undertaken a methodical process to identify Broad Locations. Having first established that ‘exceptional circumstances’ exist to justify the release of Green Belt land, it then commissioned SKM to do an independent Green Belt review to identify which sites served least Green Belt purposes. The S6(i) site was identified as serving limited Green Belt purposes. SADC then assessed the site in terms of its planning suitability, sustainability and the ability to deliver significant public benefits.

- 2.4 Area S6(i) is a logical extension to the urban area of Hemel Hempstead since
- it adjoins the Spencers Park area which is currently under development

- the facilities in S6(i) (such as schools, a local centre, open space and community facilities) will support the 1,000 homes at Spencers Park
- it is adjacent to the existing Maylands Business area which is of sub regional importance for jobs
- it will be adjacent to the proposed 55 ha of new employment and jobs in S6(ii)
- it has excellent pedestrian and cycle links to both Hemel Hempstead and Harpenden via the Nickey Line
- the landscape can accommodate the level of proposed housing.

2.5 The Broad Location does have constraints such as the high voltage overhead power line and the BPA pipeline which runs north from Buncefield. However, both can be accommodated in the design as part of the masterplanning process.

2.6 TCE is currently preparing an outline planning application for the whole of S6(i) plus all of S6(ii) and the northern part of S6(iii). This will comprise around 3,000 homes, 55 hectares of employment and other social and physical infrastructure. This was to be submitted in March 2020, but will now be submitted in May 2020 due to the General Election and this Local Plan Examination. An EIA has been prepared which identifies no “showstoppers”, although mitigation will be required. The range of mitigation includes compensatory nature conservation works, noise bunding to the M1, on site educational / social infrastructure and transport works. This application will comprise the majority of the 4,000+ homes capacity envisaged by the Plan for the land controlled by TCE in S6(i) and (iii).

3.0 **(Q2) “What evidence is there that the Broad Location is capable of delivering 1,650 homes”?**

3.1 *Appendix 1* is a Briefing Note on S6(i). Included within it is both the emerging master plan and a parcellisation / density plan. Once open space, recreational areas, transport routes, schools and the neighbourhood centre are deducted, the estimated capacity of the area is 1,745 dwellings. This assumes an average net density of 40 dph.

- 3.2 Furthermore, the comprehensive transport and other infrastructure studies have demonstrated that, with appropriate mitigation, this level of development can be supported.

4.0 (Q3) “What is the justification for the care home / flexi-care / special needs accommodation”?

- 4.1 This is a matter primarily for the Council to answer.
- 4.2 TCE has a detailed concern about the specific use class references in the S6 policies in terms of the care home / flexi-care / special needs accommodation in all the Broad Locations. The Council needs to clarify what it seeks to achieve from the Policy since the reference to a ‘50+ bed C3 ‘flexi-care scheme’ could not provide a significant element of care / support and still remain as C3. It is suggested that the policy is reworded to state (using S6(i) as an example)

“The 1,650 dwelling figure above includes at least a 50+ bed residential or nursing care home, together with a flexi-care scheme to provide a minimum of 50 units for those aged 55 or over, plus 12 units of special needs accommodation in accordance with Policy L2”.

- 4.3 By deleting references to specific Use Classes, the policy identifies the need but leaves the precise Use Class to be determined in the context of each planning application.

5.0 (Q4) “What is the justification for the 3% self build figure”?

- 5.1 Whilst not objecting to the principle of self build, TCE has been unable to find any evidential basis to support the self build figure. Until this can be provided, this part of the S6 policy is without justification and unsound. As such, it should be deleted.

- 5.2 Assuming that the Council is able to provide evidence to support its 3% figure, it is also unclear from the policy whether the 3% relates to the total number of dwellings in a Broad Location or if it is 3% of the private dwellings. It is considered that 3% of all dwellings would be too onerous. In addition, if a self build requirement remains in the Plan, it would be more effective (and hence sound) if the Plan was modified to include a separate 'self build' policy. This has been the approach adopted in other Local Plans and would set out the requirements / criteria relating to this complex area.

6.0 (Q5) "What is the effect on the Nickey Line and proposed mitigation"?

- 6.1 Since it is a requirement that, in combination, Broad Locations S6(i), (ii) and (iii) have to deliver a new link road from Redbourn Road to the A4147 Hemel Hempstead Road, it is inevitable that the Nickey Line will have to be crossed at some point. TCE is aware of the importance of the Nickey Line to walkers and cyclists and its environmental sensitivity, so the topic has been a matter of discussion with SADC, Dacorum Council, HCC and 'The Friends of the Nickey Line'. There are two options to cross the Nickey Line
- grade separated
 - at grade.
- 6.2 Following investigations and discussions, the favoured approach by the Council's and TCE is an at grade separated 'feature' crossing which is carefully designed to manage traffic and minimise conflict. A signalised pedestrian / cyclist crossing will be provided along with measures to slow traffic down. The proposed solution is shown in **Appendix I** (S6(i) Briefing Note) and is the approach which will be contained in the EHH planning application when it is submitted in May 2020.
- 6.3 Therefore, the effect on the environment of the Nickey Line is modest with mitigation being provided by the high quality signalised crossing and associated landscaping.

7.0 (Q6) “Does the capacity reflect constraints, have the HSE been consulted”?

7.1 A full suite of survey work has been undertaken as part of the EIA which will support the planning application. As part of this, substantial consultation meetings have taken place with the HSE in relation to both the consultation zones around the Buncefield Oil Depot and the pipelines / easements which connect to it. In terms of S6(i), the consultation zones only extend into the extreme south western corner of the Broad Location. This area is proposed to be used as playing fields / open space which is acceptable to the HSE since it is a ‘less sensitive use’. This has been confirmed in the HSE email of the 28th October (*Appendix 1*).

7.2 The layout reflects the lines of the BPA pipeline which have been kept free of development. The development will also be set back 23 metres from the high voltage powerline which forms the north eastern boundary of S6(i). The Briefing Note (*Appendix 1*) demonstrates that despite these technical constraints plus the need to reflect the topography and vegetation, the site is capable of achieving 1,745 dwellings which is in excess of the S6(i) requirement for 1,650 dwellings along with the other elements of Policy S6(i).

8.0 (Q7) “Arrangements for joint working between SADC and DBC”?

8.1 Whilst the majority of the EHH planning application is within SADC, it includes access infrastructure within DBC. For this reason, applications will be made to both Councils. The PPA has been entered into with both Councils and multiple meetings have taken place with SADC, DBC and HCC. They are therefore, fully involved in all aspects of the masterplan and the planning application. It is intended that the Councils will agree a compatible set of planning conditions and both will be signatories to the S106 agreement.

- 8.2 Since Broad Location S6(i) also forms part of the Hemel Garden Community (HGC), it is also the subject to joint working via the HGC Board, Steering Group and sub Groups.

9.0 (Q8) “Timescale and funding sources for improvements to Junction 8 of the M1”?

- 9.1 In relation to timing, the COMET modelling undertaken by HCC and the Paramics modelling undertaken by Vectos for TCE indicates that the J8 improvement will be required before 2036 to accommodate all the planned development in SADC and DBC. This comprises development in the adopted DBC Local Plan, the draft SADC Local Plan and further development envisaged within HGC. *Appendix 2* is a short note on ‘East Hemel Transport Infrastructure Design and Development’ prepared by Vectos.
- 9.2 However, the Paramics modelling demonstrates that M1 Junction 8 improvements are not directly required as a result of traffic from Broad Locations S6(i), (ii) and (iii) ie. if these developments proceed in isolation of other planned (but not permitted) growth. It is likely that, with other development, the M1 Junction 8 improvements will actually be required mid way through the Plan period.
- 9.3 TCE is a responsible landowner and recognises that its land control around the junction is critical to the successful delivery of the M1 Junction 8 improvement which is a HCC LPT4 scheme and is required to serve the Plan led development in the area.
- 9.4 In addition, the early delivery of the improvement will make East Hemel a significantly more attractive location for both home buyers and businesses. Normally, a landowner would not speculate time and money on undertaking detailed design work for a motorway junction upgrade until planning permission has been granted. In a demonstration of its commitment, TCE has jointly agreed with the Hertfordshire LEP to fund the £6m detailed design work for the improvement to M1 Junction 8. The full

works subject to the funding agreement are as listed below (see *Appendix 1* for a plan of the works)

- A414 / Breakspear Junction upgrade
- Commercial Spine Road
- Upgrading of M1 Junction 8.

9.5 This design work has a two year programme and commenced in September 2019.

9.6 The EHH planning application will include the improvement of M1 Junction 8. The aim is that by 2021, planning permission will have been granted for S6(i), (ii) and (iii) and the detailed design work for the package of works outlined above including M1 Junction 8 completed. This would allow tenders for these works to be sought.

9.7 With regard to funding, this is an LPT scheme and has been submitted for funding under RIS2. A decision on this is expected in 2020. Since this infrastructure scheme is the priority project of the Hertfordshire LEP, 'Herts IQ' (with the agreement of the LEP), has formally resolved that it will underwrite the costs in the event of a funding shortfall. Whilst a matter for negotiation, TCE is currently assuming that in addition to providing all the land for J8 and 50% of the funding for the detailed design, that TCE will contribute its proportionate share to the construction cost. Current indications are that the Junction 8 improvement could be in place between 2026 and 2031.

10.0 (Q9) “Whilst other infrastructure work needs to be undertaken, is it appropriate to leave to the masterplanning stage”?

10.1 The TCE draft IDP (attached as *Appendix 1* to the Matter 6 Statement) sets out the approach to the delivery of social and physical infrastructure plus drainage and utilities in Broad Locations S6(i), (ii) and (iii). This work is being carried out in conjunction with the joint masterplanning work and will inform the Council’s decisions on the planning application. As a consequence, it is appropriate to leave these other infrastructure issues to the masterplanning stage.

11.0 **(Q10) “Implications of Luton Airport Flight Path”?**

11.1 This issue has never been raised as a concern by either SADC or DBC or at the public consultation events. However, there are two potential issues, noise and air quality

- **Noise** : *Appendix 1* contains the Luton Airport noise contours for 2016 and 2028. These demonstrate that Broad Location S6(i) will be outside the lowest noise contour at both dates, so noise should not be an issue. Whilst Luton Airport has a pending planning application (No. 19/00428) to vary a planning condition relating to the area within certain noise contours, this has no material impact on noise levels within S6(i)
- **Air Quality** : Defra’s Local Air Quality Technical Guidance (2016) states that NOx emissions from aircraft can be an issue in some circumstances. This is particularly the case during take off and landing where planes are at a low level. Screening and assessment is recommended for development within 1 km of the airport. Broad Location S6(i) is more than 10 km from Luton Airport and is not under the flight path track. As such, air quality is not likely to be an issue.

11.2 As part of the work for the preparation of the planning application, NATS has been consulted in terms of aviation safeguarding. NATS has confirmed that it has no safeguarding objection and this letter forms part of *Appendix 1*.

12.0 **(Q11) “Should the policy refer to the provision of sports facilities”?**

12.1 TCE is proposing to provide a wide range of sports provision in S6(i) to meet SADC and Sport England requirements. As a consequence, TCE would not object to a reference to their provision. However, the policy should avoid being too prescriptive since there is a range of ways in which sports facilities can be provided.

13.0 (Q12) “Have Heritage Assets been considered and is an HIA required”?

- 13.1 As part of the preparation for the planning application, the EIA includes a Heritage Impact Assessment (HIA). This has been based on an assessment of the listed buildings at Woodhall Farm (which TCE owns) and an intrusive archaeological investigation of S6(i). The results of this work have informed both the masterplan and the capacity analysis.

14.0 (Q13) “Is the approach to the new primary and secondary school on site justified in relation to the Green Belt”?

- 14.1 The proposed primary school in S6(i) is embedded within the new urban area, so Green Belt issues do not arise.
- 14.2 The 8 form entry Secondary School, with its extensive playing fields occupies an area of 12 hectares. Clearly, this could not be included within the urban area without the loss of around 500 homes which would prejudice the wider housing ambitions of the Plan. In view of this, the TCE emerging masterplan proposes a location for the Secondary School where
- the school buildings, playgrounds and parking are located adjacent to the proposed urban edge of S6(i) within a short walking / cycling distance of the primary school and the local centre
 - the playing fields are located to the east of the building area and occupy all the land up to the M1.
- 14.3 As noted in the TCE Statement on Matter 4 (Metropolitan Green Belt), the NPPF does not list schools as a use which is ‘not inappropriate’ in the Green Belt. In view of this, the Council’s proposals to include the Secondary School in the Green Belt conflicts

with national guidance and is unsound. The policy should be modified and school sites in the Broad Locations should be excluded from the Green Belt. It is noted that HCC (as Education Authority) has also objected to the treatment of new school sites and suggests that the buildings and associated hardstanding could be removed from the Green Belt whilst open areas would remain in the Green Belt. The TCE proposal (see *Appendix 1* to Matter 4) is to exclude the whole of the Secondary School site from the Green Belt. The boundary proposed by TCE follows physical features such as hedgerows and the M1, so it is clearly defined, recognisable and permanent as recommended in paragraph 139(f) of the 2019 NPPF. However, the HCC proposal would also be acceptable to TCE.

Appendix 1

Briefing Note on S6(i)

December 2019

EAST HEMEL

**St Albans City and District Council
Local Plan Public Examination**

Briefing Note: Broad Location S6(i)
East Hemel Hempstead (North)

1.0 Introduction

- 1.1 This Briefing Note has been prepared as an Appendix to The Crown Estate's (TCE) Statement in response to the Inspectors Matter 7 Questions in relation to 'The Broad Locations for Development – Specific Matters (Policy S6(i) to (xi))'. This Briefing Note focusses on Broad Location S6(i), East Hemel Hempstead (North). TCE is the freeholder of all the land necessary to implement this Broad Location and this Briefing Note demonstrates why it is a sound proposal which is available, suitable and deliverable in accordance with the objectives of the Local Plan.

2.0 Master Plan / Capacity

- 2.1 *Figure 1* is the current version of the S6(i) masterplan. This has been in preparation since 2018 and is supported by a full EIA. Since the signing of the PPA in August 2019, detailed and intensive pre-application work and meetings have been taking place. This will form the basis of a planning application to be submitted in May 2020. The master plan will deliver

- around 1,745 dwellings at 40 dph
- a neighbourhood centre with a care home / flexicare / special need accommodation
- a primary school (3FE)
- a secondary school (8FE)
- a new roundabout access on Redbourn Road (B487)
- a link road through the site which will continue through S6(ii) to the A414 and Junction 8 of the M1
- a country park
- a range of open space / recreational facilities.



Figure 1 : Current Emerging S6(i) Masterplan

3.0 Capacity and HSE Constraints

- 3.1 **Figure 2** is the Housing Capacity Plan for S6(i). This shows each of the main parcels with an indicative capacity range. This would deliver between 1,675 and 1,900 homes. Densities are proposed to be higher close to the neighbourhood centre.

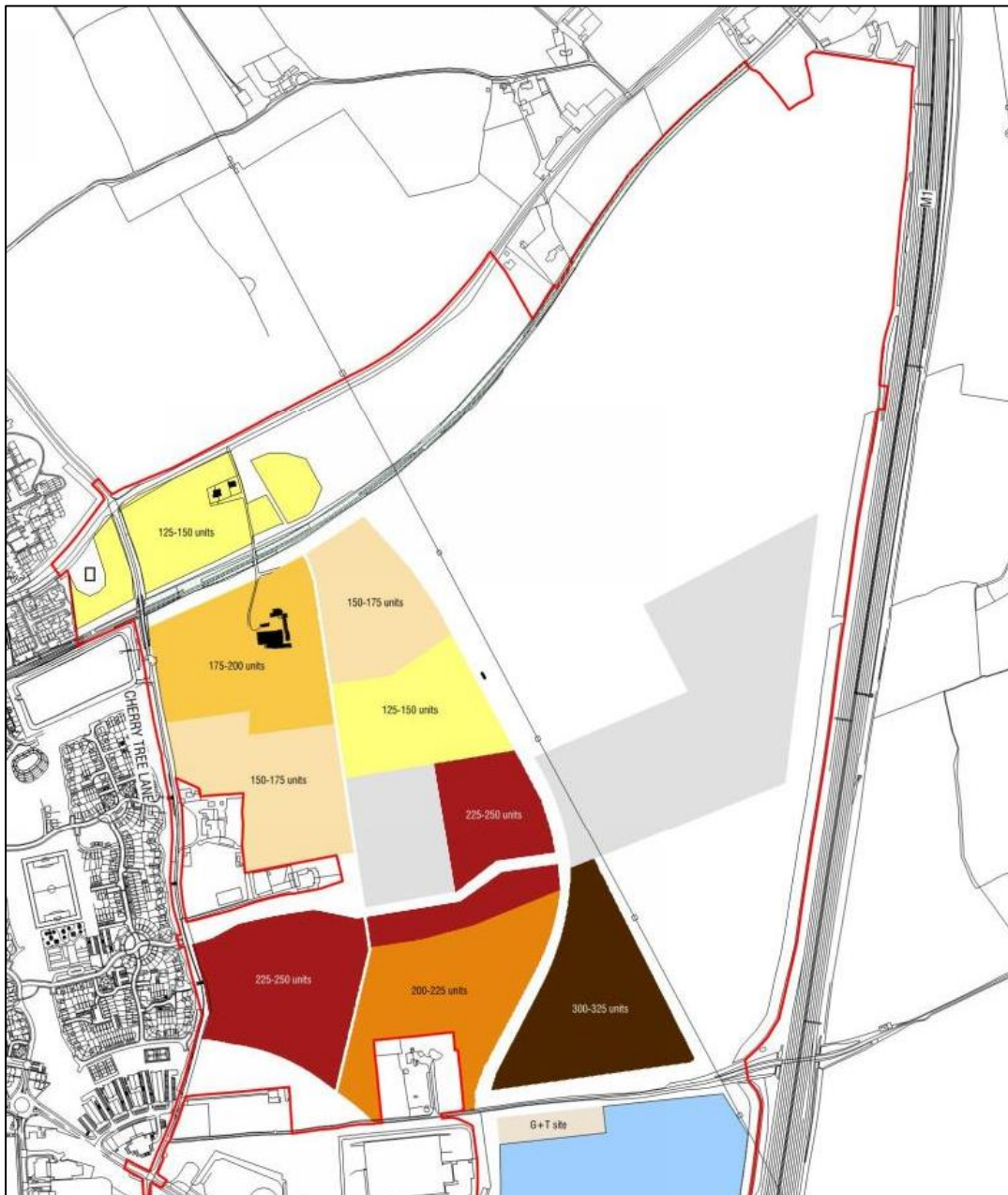


Figure 2 : Housing Capacity plan / schedule

- 3.2 **Figure 3** shows the extent of the Buncefield HSE consultation zones in relation to S6(i). They only affect the south western corner of the site. It demonstrates that no part of the site is within the Development Prevention Zone, and only open space is proposed within the Inner and Middle Zones. Some housing is shown in the Outer Zone in accordance with HSE Guidelines. The attached email from the HSE confirms this is acceptable. The BPA pipeline running north from Buncefield is maintained with a protected ‘no development’ corridor. Similarly, the capacity does not rely on any homes being closer to the overhead powerline than standard allowances.



Figure 3 : HSE Consultation Zones

4.0 Nickey Line

- 4.1 **Figure 4** shows the proposed crossing point of the Nickey Line with the S6(i) link road. This will be an ‘at grade’ crossing entrance feature with pedestrian / cycle controlled traffic signals.



Figure 4a : Detail of the Nickey Line Crossing

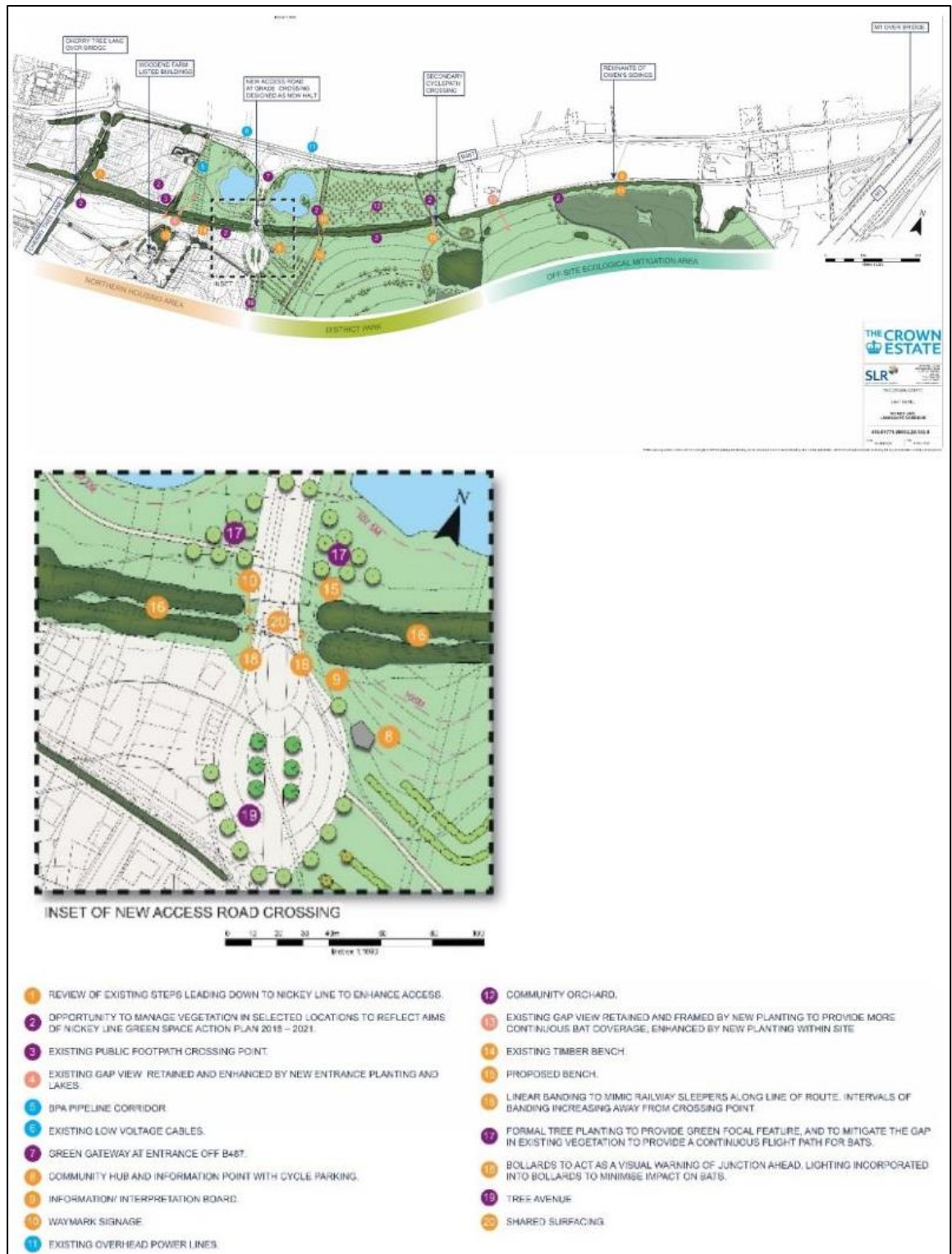


Figure 4b : Detail of the Nickey Line Crossing

5.0 Luton Airport Flight Paths

5.1 **Figure 5** shows the 2016 and 2028 Luton Airport noise contours and their relationship to Broad Location S6(i). The outer contour in each case is located between 5 and 6 kilometres north of Redbourn Road which is the most northerly boundary to S6(i). This demonstrates that noise levels for future residents are well below noise guideline levels and this will remain the case in the future. There is also no aviation safeguarding objection from NATS. A letter confirming this is attached.

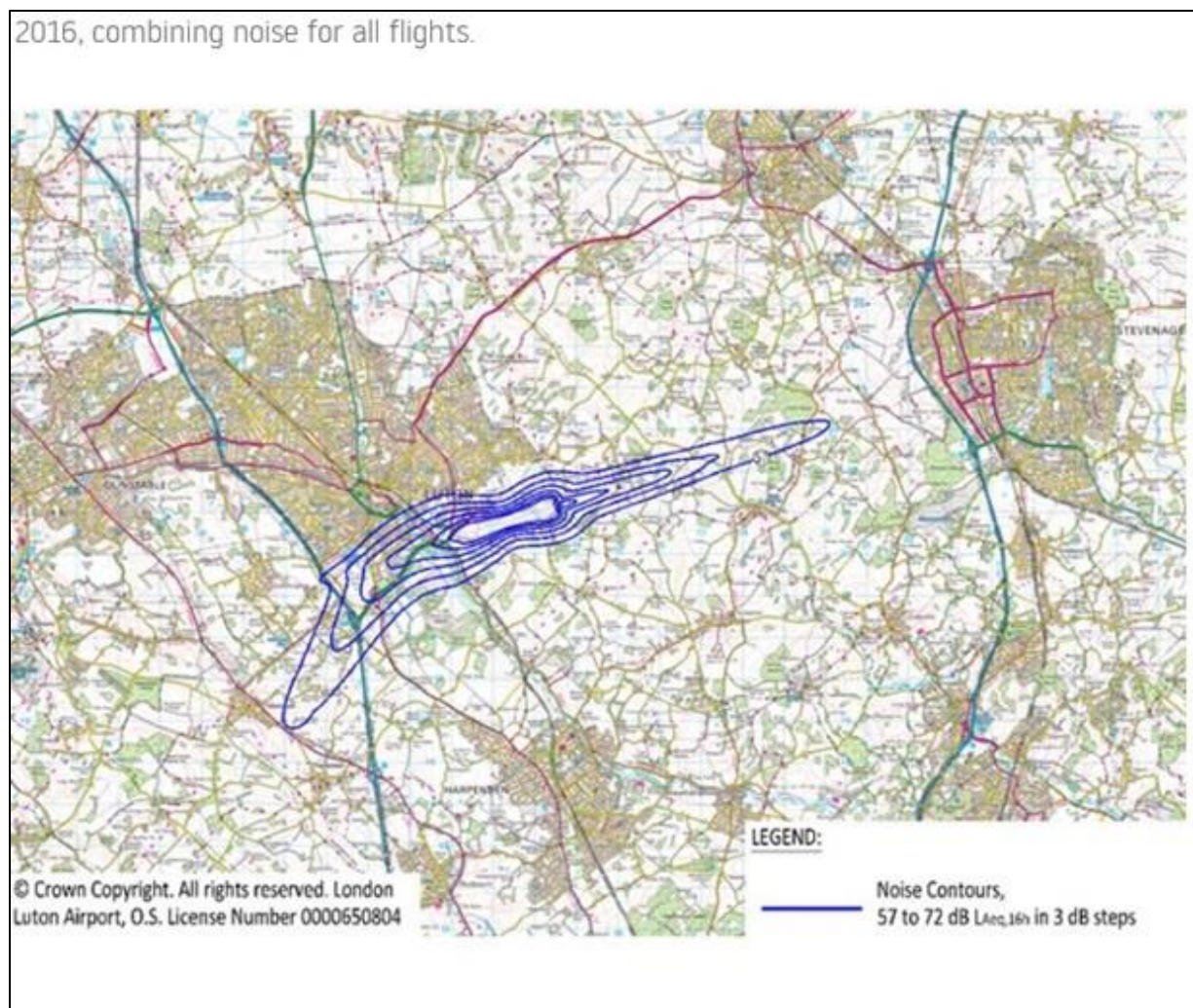


Figure 5a : Luton Airport Noise Contours 2016

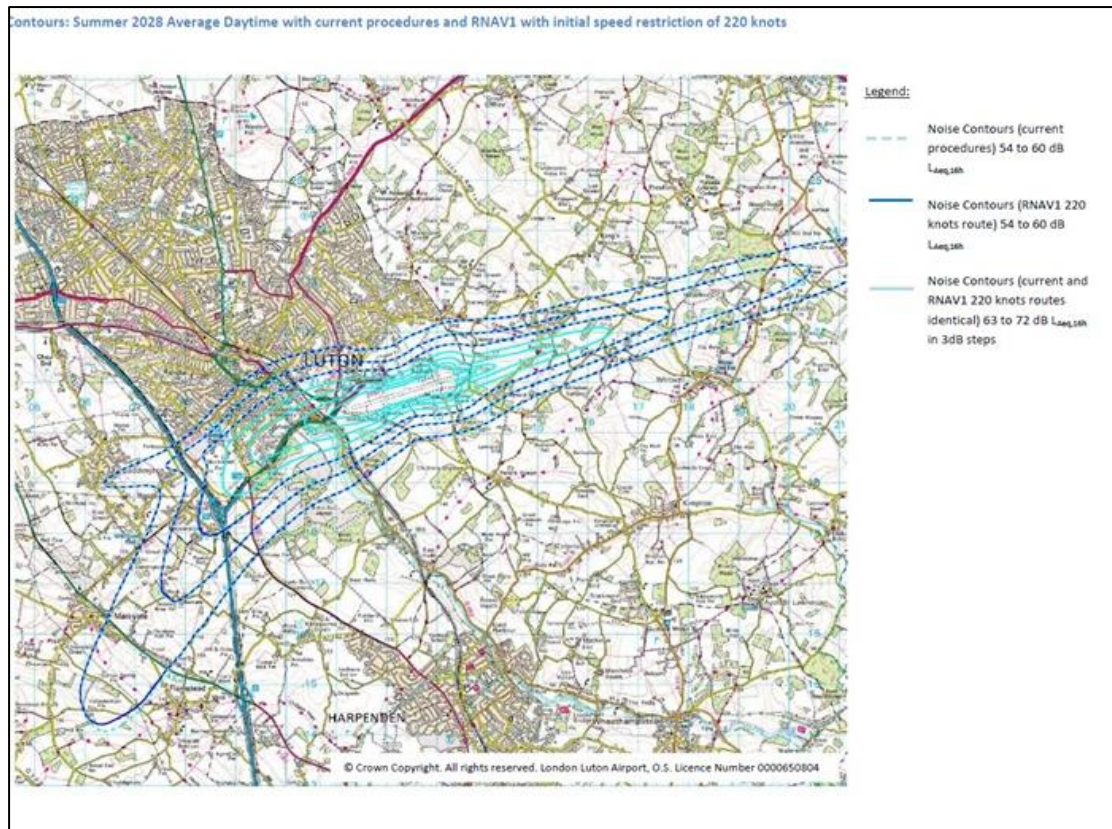


Figure 5b : Luton Airport Noise Contours 2028

6.0 **M1 Junction 8 Improvement**

6.1 **Figure 6** shows the current outline design for the strategic infrastructure improvement for Junction 8 of the M1, the Breakspear / A414 junction and the commercial area spine road. This is the scheme which is now subject to detailed design work jointly funded by the Hertfordshire LEP and TCE.



Figure 6 : Junction 8 Improvement location plan

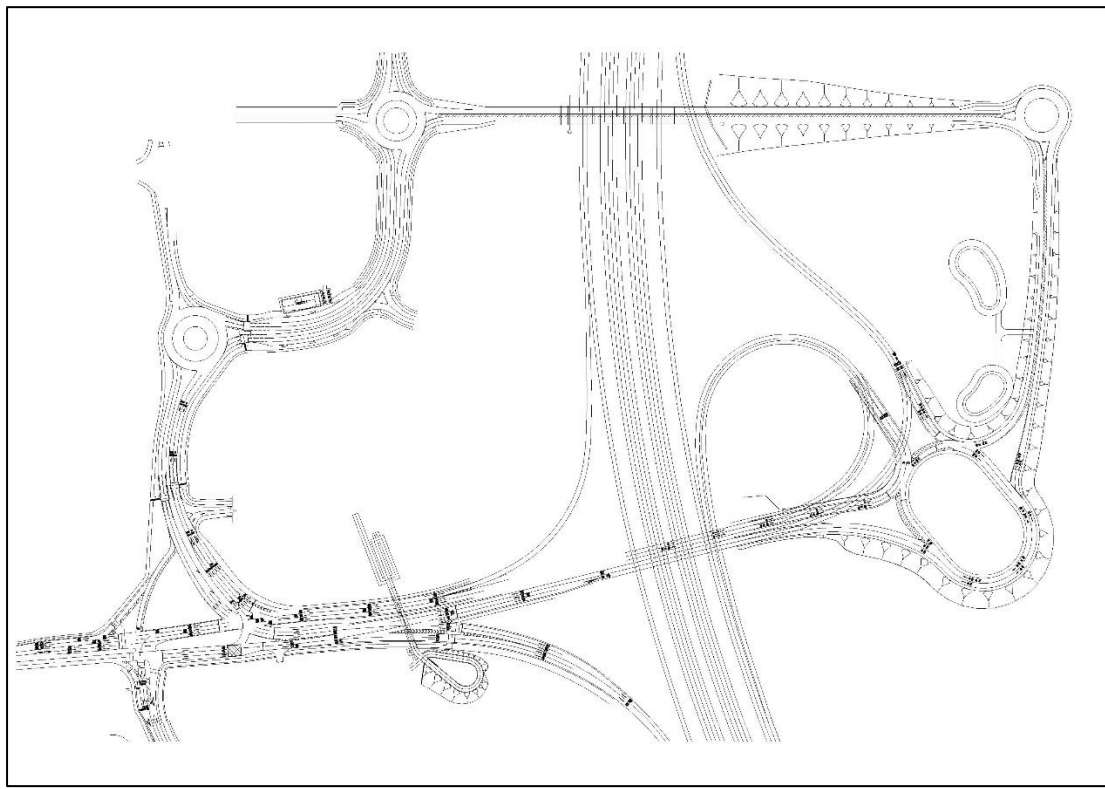


Figure 6 : Junction 8 Improvement CAD plan

Appendix to the Briefing Note – HSE Email Dated 28 October 2019

From: <Gerry.Adderley@hse.gov.uk>

Date: 28 October 2019 at 16:26:56 GMT

To: <LucasA@rpsgroup.com>

Cc: <powellL@rpsgroup.com>, <lupenquiries@hsl.gsi.gov.uk>, <Stuart.Reston@hse.gov.uk>, <John.Birch@hse.gov.uk>, <Dave.Painter@hse.gov.uk>

Subject: RE: East Hemel - HSE advice on latest masterplan - October 2019 (D919)

Dear Andrew

Thank you for your email of 21 October 2019 and previous emails which included a letter from Lyn Powell dated 12 September 2019 and the revised Masterplan drawing ref. EHUK-SBR-1XX-XX-DR-A-08004 Revision 5.

I can confirm that HSE would not advise against the granting of planning permission for the proposed layout shown in drawing ref. EHUK-SBR-1XX-XX-DR-A-08004 Revision 5 on the following basis:

- a. the limitations on the use of Green Lane between Three Cherry Trees Lane and Boundary Way, and the occupancy of the sports facilities which will be provided within the middle zone, are as set out in Lyn Powell's letter of 12 September 2019, and
- b. all warehouse/office units which are located wholly or partly within the inner zone (Units 600, 700, 800, 900, 1501, 1502, 1503 as shown in drawing ref. EHUK-SBR-1XX-XX-DR-A-08004 Revision 5) will have fewer than 100 occupants, and no more than 2 occupied storeys.

Please note that any further pre-application advice from HSE on this proposal is likely to incur additional charges under our pre-application advice service.

Regards

Gerard Adderley
Health and Safety Executive
Chemicals, Explosives and Microbiological Hazards Division
Statutory and Commercial Land Use Planning Advice
1.2 Redgrave Court
Merton Road
Bootle
Merseyside
L20 7HS
Tel: 02030 283003

rpsgroup.com



Appendix to the Briefing Note – NATS Letter dated 25 February 2019

Shah, Glen

From: Planning Mailbox <Planning@dacorum.gov.uk>
Sent: 25 February 2019 15:51
To: Briony Curtain
Subject: FW: Details for Planning Application 4/00207/19/SCO

From: AULD, Alasdair E <Alasdair.Auld@nats.co.uk>
Sent: 25 February 2019 15:08
To: Planning Mailbox <Planning@dacorum.gov.uk>
Cc: NATS Safeguarding <NATSSafeguarding@nats.co.uk>
Subject: RE: Details for Planning Application 4/00207/19/SCO

The proposed development has been examined from a technical safeguarding aspect and does not conflict with our safeguarding criteria. Accordingly, NATS (En Route) Public Limited Company ("NERL") has no safeguarding objection to the proposal.

However, please be aware that this response applies specifically to the above consultation and only reflects the position of NATS (that is responsible for the management of en route air traffic) based on the information supplied at the time of this application. This letter does not provide any indication of the position of any other party, whether they be an airport, airspace user or otherwise. It remains your responsibility to ensure that all the appropriate consultees are properly consulted.

If any changes are proposed to the information supplied to NATS in regard to this application which become the basis of a revised, amended or further application for approval, then as a statutory consultee NERL requires that it be further consulted on any such changes prior to any planning permission or any consent being granted.

Yours Faithfully



NATS Safeguarding

D: 01489 444687
E: natssafeguarding@nats.co.uk

4000 Parkway, Whiteley,
Fareham, Hants PO15 7FL
www.nats.co.uk



From: Planning@Dacorum.gov.uk <Planning@Dacorum.gov.uk>
Sent: 14 February 2019 11:40
To: NATS Safeguarding <NATSSafeguarding@nats.co.uk>
Subject: Details for Planning Application

Mimecast Attachment Protection has deemed this file to be safe, but always exercise caution when opening files.

Date 14 February 2019
Your Ref 4/00207/19/SCO
Our Ref Briony Curtain

The Forum
Marlowes
Hemel Hempstead

Appendix 2

Vectos Transport Infrastructure Report

St Albans District Council Local Plan EiP

East Hemel Transport Infrastructure Design and Development

03 December 2019

131121/N70

Introduction

1. This note summarises how the infrastructure proposed in the East Hemel/Maylands area has been developed and the role that TCE and their consultant team (primarily Vectos) have played in that development.
2. The starting point for this note is the Maylands Growth Corridor Study (MGCS) which was undertaken by SADC, Dacorum Borough Council, Hertfordshire County Council (HCC), the Herts LEP and Highways England which commenced in 2015. TCE became involved during the period of the study and was a member of the Steering Group. They also provided key technical input on scheme development.
3. The purpose of the MGCS was to investigate the infrastructure required to serve existing and proposed developments in the Maylands and East Hemel area. The study conclusions are summarised in a "Prospectus" which is included at Appendix 3 of the Infrastructure Delivery Plan within the Local Plan Evidence Base.
4. Vectos had a key input to this exercise in describing the quantum of development and traffic that would be generated by the proposed East Hemel development and the design of suitable mitigation, in particular the Spine Road through the development from Redbourn Road in the north to Hemel Hempstead Road in the south and improvements to Breakspear Junction and Junction 8 of the M1.
5. The Prospectus was agreed by the sponsoring parties with a view to being taken forward for further design development and for discussions on funding and implementation.
6. TCE, through Vectos, took forward the design of the agreed highway works in association with preparation of a planning application for the East Hemel Development. A number of rationalisations were required to the design and in particular:
 - The need to move traffic away from the HSE protection zones around the Buncefield oil depot. Hence the introduction of a new north/south spine road through the commercial area and retention of the existing Green Lanes for access and buses only;
 - Comments from the Design Review Panel and other stakeholders on the proposed layout for the commercial area and, in particular, the east/west element of the Spine Road to allow a more holistic business campus development in the southern section of the commercial area;

- Future proofing of the Junction 8 proposals to allow for a north-south link road between Junction 8 and Redbourn Road on the east side of the M1 (within TCE land ownership);
 - Adjustments to allow for detailed information on the location of the BPA pipeline becoming available .
7. The above has led to the proposed works shown on **Drawing No. 131121/A/54** attached.
 8. In parallel with the above design development the Enterprise Zone and Crown Estate also agreed to jointly fund the detailed design of an element of these works at a cost of circa £6M. These works, referred to as the “Breakspear Project” are shown at **Drawing No. 1331121/A/ 137** attached. It should be noted that these works include provision of a pedestrian/cyclist bridge over the A414. The funding allowed the detailed design to progress significantly earlier than would have been the case in the normal course of events which would have been after the grant of planning permission. The reasoning for this significant investment was to facilitate early delivery of the works (particularly the Breakspear junction improvement and the commercial Spine Road) and allow funding discussions to progress on provision of Junction 8.
 9. The “Breakspear Project” design work commenced in September 2019 and is progressing with the aim of having a completed and approved design in 2 years time ie September 2021. This would allow these works to be tendered soon after this with the potential for implementation in 2022.
 10. It should be noted that the above works will be included in the East Hemel planning application as detailed matters ie for determination. The application will also include the connections of the Spine Road to B487 Redbourn Road in the north and A4147 Hemel Hempstead Road in the south in detail thus facilitating early delivery of the entire Spine Road.
 11. In parallel with the above, Vectos have also been working with the stakeholders and in particular HCC and Highways England on progressing the modelling of the development proposals and the infrastructure provision. The modelling has been undertaken using the Hemel Hempstead Paramics Model (HHPM) which is a detailed microsimulation model of Hemel Hempstead which covers the area shown on the following page.
 12. Two primary tests are being carried out as follows:
 - The Core Test which assesses the impact of the East Hemel development assuming all committed (ie permitted) developments that might affect the study area progress;
 - Cumulative Test which considers, in addition to committed developments, prospective development coming forward in relevant Local Plans.
 13. The Cumulative Test uses growth that is derived from HCC’s COMET model which is a County-wide model that is used to predict overall levels of growth due to planned

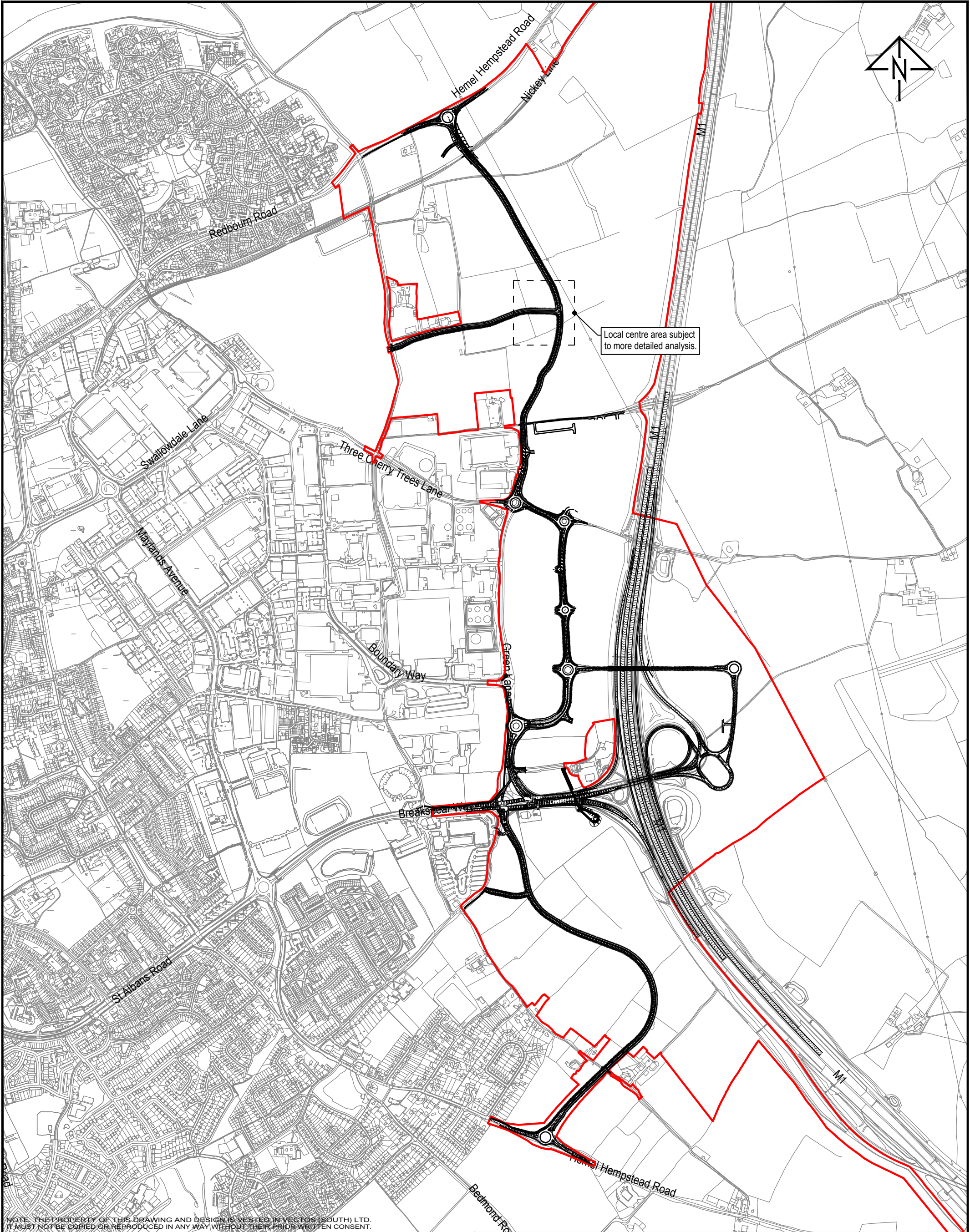
development. Therefore, the outputs from the Paramics models are consistent with the COMET testing but give a more detailed analysis for the Hemel Hempstead area.

14. Testing has been undertaken assuming SADC's proposed Local Plan growth to 2036 and also as a separate test assuming other prospective growth in the area consistent with HCC's COMET 4 model run.
15. The above detailed testing has demonstrated that the proposed strategic infrastructure as described above is suitable for the development proposed. To cater for the planned growth in the area the works will be introduced in a phased manner with the Spine Road, including Breakspear junction improvement, delivered early within the East Hemel development scheme (and therefore early within the Local Plan period) with the Junction 8 enhancement being delivered around the mid-point of the Local Plan period.


HHPM Area

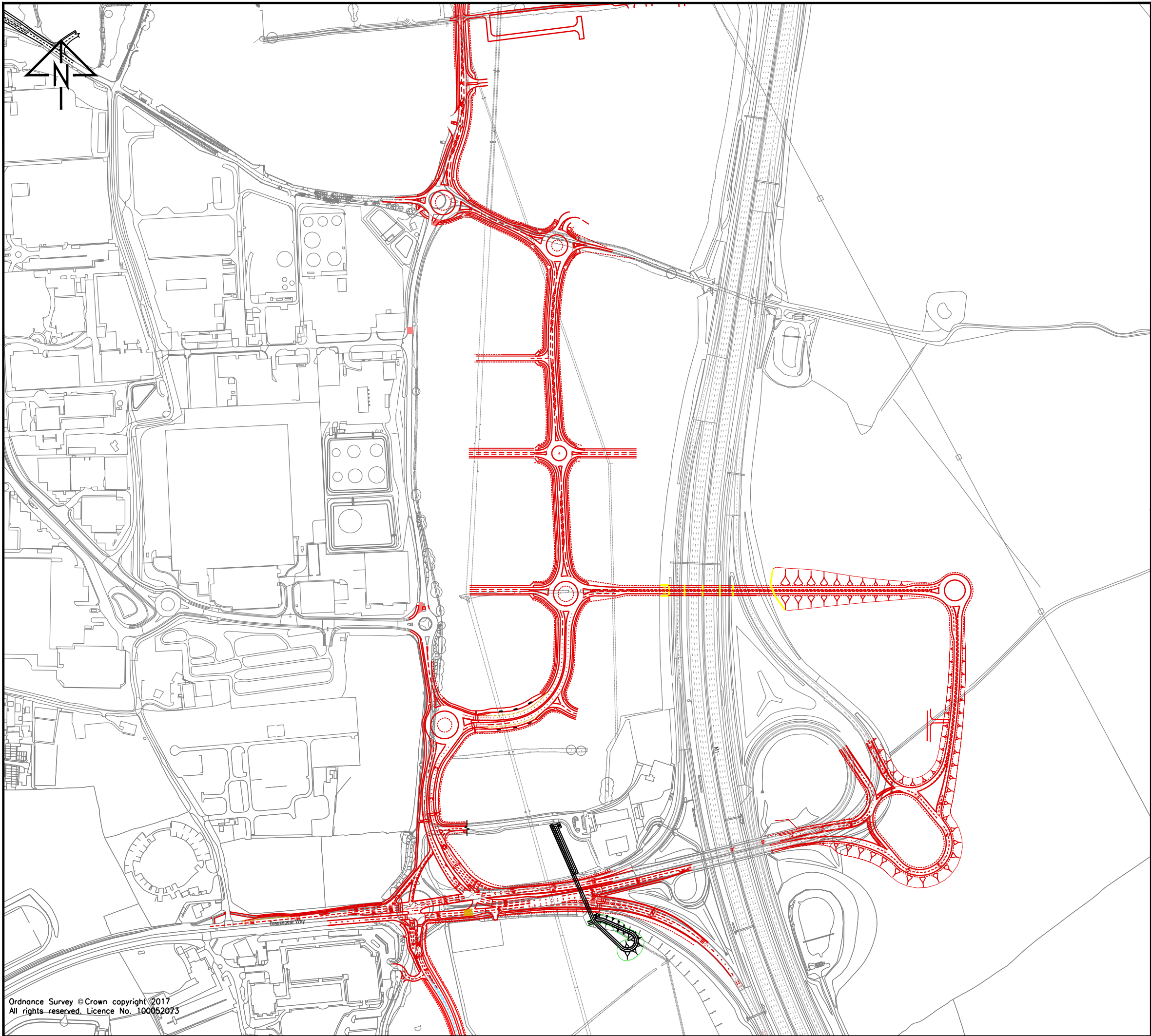


DRAWINGS



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REV	DETAILS	DRAWN	CHECKED	DATE	Notes:	East Hemel Hempstead		The Crown Estate	
A	Roadnames and hatching added.	KB	DB	10.07.2018	1. This is not a construction drawing and is intended for illustrative purposes only. 2. White lining is indicative only.	Overall Highway Strategy		 Network Building, 97 Tottenham Court Road, London W1T 4TP t: 020 7580 7373 e: enquiries@vectos.co.uk	
B	Commercial area routing updated.	TF	MdC	07.08.2018					
C	M1 bridge crossing amended.	TF	MdC	08.10.2018					
D	Spencers Park hatched area removed.	KB	MdC	29.01.2019					
E	Layout updated.	TF	MdC	04.02.2019					
F	Spencer's Park added to key.	TF	MdC	19.02.2019					
G	Northern and southern layout updated.	TF	MdC	01.05.2019					
H	Layout updated to suit.	TF	MdC	13.05.2019					
I	Layout updated to suit.	TF	MdC	24.05.2019					
J	Highways layout progressed.	TF	MdC	05.06.2019					
K	Highways layout progressed.	KB	MdC	22.07.2019					
L	Latest highways layout.	TF	MdC	04.09.2019					
M	Access routes added.	KB	MdC	11.09.2019					
N	Highways layout progressed.	PP	MdC	01.10.2019					
P									
						DRAWN:	CHECKED:	DATE:	SCALES:
						TF	MdC	07.06.2018	1:12,500 at A3
						DRAWING NUMBER:		131121/A/54	REVISION:
									P



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- Notes:
- 1. This is not a construction drawing and is intended for illustrative purposes only.
 - 2. White lining is indicative only.

REV.	DETAILS	DRAWN	CHECKED	DATE

CLIENT:

The Crown Estate

PROJECT:

East Hemel Hempstead

DRAWING TITLE:

Project Breakspear

SCALES:

NTS at A3

DRAWN:	TF	CHECKED:	MdC	DATE:	03.12.2019
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