Scoping Report

Environmental Impact Assessment



CONTENTS

1.0	INTRODUCTION	3
2.0	THE SITE AND THE PROPOSED DEVELOPMENT	8
3.0	PLANNING POLICY CONTEXT	11
4.0	TRANSPORT	12
5.0	ECOLOGY	14
6.0	CULTURAL HERITAGE	16
7.0	WATER RESOURCES	18
8.0	LANDSCAPE AND VISUAL IMPACT	20
9.0	CONCLUSIONS	23
10.0	DISCIPLINES OUTSIDE SCOPE OF EIA	24

APPENDICES

Appendix 1: Site Plan

Appendix 2: Consolidated Constraints and Opportunities Plan

1.0 INTRODUCTION

- 1.1 This report presents the proposed scope of an Environmental Impact Assessment (EIA) of the allocated Gavray Drive site in Bicester ("the Proposed Development"). The report has been prepared on behalf of L&Q Estates as the promoter of the Proposed Development.
- 1.2 The report is being submitted to Cherwell District Council (CDC) with a request for an EIA Scoping Opinion under Regulation 15 of the *Town and Country Planning (Environmental Impact Assessment) Regulations 2017* (The EIA Regulations). In issuing a Scoping Opinion, it is envisaged that CDC will take account of the views of consultees on the proposed scope of the EIA presented in this report.
- 1.3 The EIA Regulations require that any development proposal falling within the description of a "Schedule 2 development" will be required to be the subject of EIA, where such development is likely to have "significant" effects on the environment, by virtue of factors such as its nature, size or location (as screened under Schedule 3 of the Regulations).
- No screening opinion has been sought from CDC to determine whether an EIA is required. The proposed development can be defined as a Schedule 2 "urban development project" and exceeds the threshold of 150 dwellings as set under part 10(b) whereby EIA may be required. Schedule 3 sets out the criteria for screening schedule 2 development. Planning Policy Guidance provides 'indicative criteria and thresholds' which are higher. This indicates screening should be undertaken for schemes where the area is more than 5 hectares or development of more than 1,000 dwellings is proposed. In this instance, the site area indicates the need to screen though the proposed built element is below the PPG guidance.
- 1.5 Given the largely urban setting, the relatively small-scale nature of the proposal in the wider context and the general absence of a wide range of environmentally sensitive features and receptors on site and in the locality, it is arguable whether EIA is required. Nevertheless, given the extensive history of EIA on this site, it is considered prudent to undertake EIA of any likely "significant" environmental effects. As such EIA will be offered voluntarily.
- 1.6 The planning history of the site is long and protracted. The site has been the subject of voluntary EIA attached to previous planning applications with minimal effects identified. The most recent application for Gavray Drive West was submitted in 2015. The EIA of that scheme found no greater than minor residual effects related to transport and drainage on a temporary basis during construction and through the permanent loss of agricultural land. The entire allocation was subject of EIA in 2004. This concluded that there would be no significant negative impacts following appropriate mitigation. The environmental effects of development in this area have

therefore been widely assessed and provide a helpful baseline to establish the possible significant effects to be assessed in this most recent EIA.

- 1.7 David Lock Associates (DLA) will co-ordinate the EIA. DLA is a town planning and urban design consultancy and a member of the Institute of Environmental Management and Assessment (IEMA) an organisation established to promote best practice in EIA and related disciplines. This EIA will be undertaken in accordance with the best practice guidelines issued by the IEMA.
- 1.8 In co-ordinating the EIA, DLA will manage the inputs of several specialist consultancies undertaking assessments of effects of the Proposed Development. The table below sets out the proposed structure of the report of the EIA the Environmental Statement (ES), identifying the consultancy assessing each proposed EIA topic and contributing each respective ES chapter. It is these areas which are considered to have the potential for significant effects given the findings of the historic EIAs on this site, guidance as set out in the 2017 Regulations and Planning Policy Guidance document:

Chapter	Topic	Author
1	Introduction	David Lock Associates
2	The Site and the Proposed Development	David Lock Associates
3	Planning Policy Context	David Lock Associates
4	Transport	Markides Associates
5	Ecology	EDP
6	Cultural Heritage	EDP
7	Water Resources	Hydrock
8	Landscape & Visual	EDP
9	Conclusion	David Lock Associates

- 1.9 The planning application may include a number of other standalone and supporting technical statements which will assess impacts and where appropriate propose mitigation. These are considered to have less potential to result in significant effects and are therefore proposed to fall below the threshold for EIA. As such they are 'scoped-out' of the EIA. Further detail is set out in chapter 10. If it is found that effects are significant during the production of any standalone assessments, then they may be considered within the EIA process too. However, at this point it is likely that the following are 'scoped-out':
 - Air quality
 - Noise
 - Agriculture and Soil Resources
 - Ground Conditions
 - Utilities

- Socio-economics
- Arboriculture
- 1.10 The individual topic chapters in Volume 1 will be structured as follows:
 - Introduction identifying the topic under consideration
 - Assessment Methodology setting out the scope and method of the assessment, identifying the criteria used to assess the significance of the effects of the Proposed Development and recording any uncertainties or limitations encountered
 - Relevant Policy summarising policy, legislation and guidance relating specifically to the topic under consideration
 - **Baseline Conditions** providing a description of the baseline conditions pertinent to that topic, including by indicating any likely significant changes in those conditions into the future if the Proposed Development does not proceed ("the projected future baseline")
 - Potential Effects identifying likely significant effects in the absence of mitigation measures, during both the construction and post-completion stages of the Proposed Development
 - Mitigation Measures proposing any measures which are necessary to avoid or reduce any significant potential adverse effects, beyond the measures inherent within the Proposed Development
 - Residual Effects identifying any residual effects of the Proposed Development, taking account of the mitigation measures proposed and assessing the significance of those residual effects
 - Cumulative Effects setting out any effects which might arise from the Proposed Development in combination with other nearby reasonably foreseeable development proposals, specifically the larger schemes set out in the table below as identified in Appendix 2 of the Annual Monitoring Report 2019:

Development proposals to be taken into account in the assessment of cumulative effects						
Deliverable (Available, Suitable and Achievable) Sites (10 or more dwellings)						
- Contributing to the '5 year land supply'						
commutating to the crystal land supply						
Graven Hill – Local Plan	Strategic Allocation for	Total Completion and				
Allocation Bicester 2	2100	projected completion 2011-				
		2031 of 1561				
Kingsmere (South West	Identified in the Non-	Total Completion and				
Bicester) Phase 1	Statutory Local Plan	projected completion 2011-				
	(2011)	2031 of 1799				
Land at Bessemer Close /	Identified for 70 dwellings	Total Completion and				
Launton Road	in the Non-Statutory	projected completion 2011-				
	Local Plan (2011)	2031 of 70				
Land at Skimmingdish	Completed site	Total Completion and				
Lane		projected completion 2011-				
		2031 of 49				
North West Bicester Eco-	Local Plan allocation	Total Completion and				
Town Exemplar Project	(2015) - Bicester 1	projected completion 2011-				
		2031 of 393				
North West Bicester	Local Plan allocation	Total Completion and				
Phase 2	(2015) - Bicester 1	projected completion 2011-				
		2031 of 1525				
South East Bicester	Local Plan allocation	Total Completion and				
(Wretchwick Green)	(2015) - Bicester 12	projected completion 2011-				
		2031 of 709				
South West Bicester	Local Plan allocation	Total Completion and				
Phase 2	(2015) - Bicester 3	projected completion 2011-				
		2031 of 216				
Specific Developable 9	Sites (10 or more dwelling	rs) - Identified developable				
Specific, Developable Sites (10 or more dwellings) - Identified developable sites not yet considered to be deliverable						
Cattle Market	Identified for 40 dwellings	40 dwellings proposed				
	in the Non-Statutory					
	Local Plan (2011)					

- 1.11 A second volume of the ES (Volume 2) will contain the plans and appendices cited in Volume 1 (the main text). A separate Non-Technical Summary will present the principal findings of the EIA in a form that may be more readily understood by the wider public.
- 1.12 In accordance with best practice in EIA, the significance of particular effects of the Proposed Development is determined by the interaction between the magnitude of predicted impacts and the sensitivity of the receptors affected by those impacts. Four levels of significance will be identified: "major", "moderate", "minor" and "negligible". Any beneficial effects will be noted, as well as adverse ones. Where any temporary, short- or medium-term, indirect, secondary or interactive effects are predicted, these too will be recorded. All assessments of the significance of effects will take account of proposed mitigation measures, although any significant potential effects in the absence of such measures will also be identified.
- 1.13 The remaining sections of this EIA Scoping Report reflect the proposed structure of the ES set out in the table under paragraph 1.8.

2.0 THE SITE AND THE PROPOSED DEVELOPMENT

- 2.1 The site is located in the south eastern quarter of Bicester, bounded by Gavray Drive to the south, the Birmingham to Marylebone rail line (Chiltern Line) to the north, the Oxford to Bletchley rail line to the west and Bicester's eastern bypass to the east. North of the site is Bicester Distribution Park, which provides a large footprint of B8 distribution units, with residential development south of Gavray Drive. Bicester town centre is located approximately 1.3km to the west of the site offering a full range of retail, commercial, employment and residential uses.
- 2.2 The extent of the land to which this Scoping Report relates is defined in the Site Plan in **Appendix 1**.
- 2.3 The site is agricultural in use but is also used for informal recreation. Two public rights of way cross the site, linking Langford Village with Launton and Bicester Distribution Park which will be incorporated into the layout
- 2.4 The site is characterised by pasture, small linear field compartments and tall, mature boundary hedgerows. The dominant, physical elements within the site are the mature standard oak trees; there are no built structures on the land.
- 2.5 A water course, Langford Brook, flows through the middle of the site. Land to the east of the brook is covered by a Local Wildlife Site designation. In addition, a wider area falls within the River Ray Conservation Area.
- 2.6 There are no designated heritage assets within or adjoining the site.

Background

- Outline planning consent was granted on appeal in July 2006 under application reference 04/02797/F, for "residential development (including affordable housing) incorporating a County Wildlife Site, together with land reserved for a primary school, community facilities, public open space, rail chord and structure planting" on land north of Gavray Drive, Bicester". An application to extend the life of that permission via the Town and Country Planning (General Development Procedure) (Amendment No.3) (England) Order 2009 (SI 2009 No.2261) which allowed for applications to extend the time limits for implementation, was approved by Cherwell District Council in February 2012, under application reference 10/01167/OUT.
- 2.8 Following a successful judicial review, Cherwell District Council's decision to approve the application to extend the time limit for implementation of extant outline planning permission was quashed by the High Court, on the 15 January 2013.

2.9 Most recently an appeal for development of part of the allocation west of Langford Brook was dismissed at appeal in 2018. The Inspector's comments point towards a need to consider development for the whole allocation. In response L&Q Estates are now proposing an application for the full extent of the allocation.

The Proposed Development

- 2.10 The extent of the Site reflects the area allocated for development in the adopted Cherwell Local Plan Part 1 (adopted 2016) under Policy BIC 13. A Constraints and Opportunities Plan is presented in **Appendix 2**. This continues to be refined in the light of ongoing technical work, as well as planned stakeholder and community engagement. A further iteration of that plan in the form of a Parameter Plan will provide the basis for the EIA and would be the subject of a condition on any grant of planning permission requiring the delivery of the Proposed Development in accordance with that plan.
- 2.11 The emerging proposal is likely to seek residential development including affordable housing, and ancillary uses and works comprising public open space, land remodelling, compensatory flood storage and structural planting.
- 2.12 The draft proposals comprise residential development outside of the Local Wildlife Site. This would result in the built area being focussed west of Langford Brook with a smaller built area in the south east part of the allocation. Subject to the agreed drainage scheme details, the smaller residential area east of the brook may require some land remodelling to raise the residential land. There is an indicative capacity of 202 dwellings across the site.
- 2.13 Access is taken from Gavray Drive. Good pedestrian and cycle connections will ensure that residents from both sites can move freely across Gavray Drive, circulating between Bicester Town centre and Langford Village Centre.
- 2.14 There are a number of trees, some subject of Tree Preservation Orders (TPO), hedgerows and ponds within the site, which will be retained where possible, and managed to enhance their wildlife value. New structure planting will reinforce the framework of existing vegetation.
- 2.15 The EIA will assume the construction of the Proposed Development would commence in 2023, with the Proposed Development being completed by 2027. This delivery timescale is realistic and readily achievable in the light of build rates experienced on developments of comparable scale elsewhere.
- 2.16 The EIA Regulations require any alternatives to the Proposed Development that have been studied by the prospective applicant to be outlined and the reasons for their rejection to be set

out. As the site is allocated for development in the adopted Local Plan it is not appropriate for the applicant to study potential alternative sites. However, the EIA will include a consideration of potential alternative forms of development on the Site, with reference to the evolution of the design of the Proposed Development. The 'no development' scenario will also be addressed in the EIA through the proposed topic-level assessment of the "projected future baseline" (see para. 1.10 above).

3.0 PLANNING POLICY CONTEXT

- 3.1 The third chapter of the ES will introduce planning policy of relevance to the Proposed Development. This includes relevant parts of the Government's *National Planning Policy Framework* (NPPF) and *Planning Practice Guidance* (PPG), as well as applicable policies within the adopted Cherwell Local Plan Part 1 (2016), 'saved' policies of the adopted Cherwell Local Plan 1996, the emerging Partial Review of Part 1 and emerging Oxfordshire Plan 2050.
- 3.2 Relevant policy specific to particular assessment topics will be outlined in the "Relevant Policy" section of each topic chapter (see para. 1.8 above).
- 3.3 The conformity of the Proposed Development to relevant planning policy, as well as the weight to be placed on different elements of the policy framework, will be addressed in the freestanding Planning Statement.

4.0 TRANSPORT

- 4.1 Markides Associates Ltd will prepare the transport chapter of the Environmental Statement. Key transport and access issues for the development proposals relate to:
 - The promotion of sustainable modes of transport for the development, including public transport, walking and cycling;
 - Minimising the impact of additional vehicular traffic generation as a result of the development on the local highway network.
- 4.2 Gavray Drive has 2m wide footways on either side. At its eastern end, pedestrian access to the town centre is achieved via a footbridge over the railway line to Launton Road. Immediately to the north of this access onto Launton Road is a toucan crossing. There are also several footpath links from Gavray Drive running to the south through Langford Village and the public open space.
- 4.3 The nearest rail stations to the site are Bicester North and Bicester Village, approximately 1500m and 1300m away respectively. The nearest bus service to the site is the X5, which runs through Langford Village to the south, offering an hourly service to Bicester Town Centre and Oxford.
- 4.4 Gavray Drive is accessed directly from the A4421, which is part of the Bicester Eastern Distributor Route, connecting the A41 in the south to the A421 to the north. The site is therefore easily accessible from the strategic road network, by vehicles of all sizes.
- 4.5 The EIA will address the following potential transportation and access related effects:
 - Temporary generation of heavy goods vehicles (HGVs) during the demolition and construction works to include any traffic movements associated with the potential importation of fill for ground remodelling;
 - Effects of the development on accessibility by sustainable modes. and
 - Effects of the development on traffic flows and capacities of the local highway network.
- The planning application will be accompanied by a comprehensive Transport Assessment (TA). The TA will include an assessment of the potential effects as outlined above. The TA content will broadly follow those that were submitted in support of the most recent application for development on the site. Outputs from the strategic SATURN model of Bicester will be used to assess the baseline performance of the following junctions:
 - Gavray Drive / Mallards Way Priority Junction
 - Gavray Drive / Wretchwick Way Roundabout

- Peregrine Way / Wretchwick Way Priority Junction
- Peregrine Way / Wretchwick Way Roundabout
- Peregrine Way / Wretchwick Way / Neunkirchen Way Roundabout
- 4.7 Where daily traffic flows are required as part of the ES assessment, the peak hour flows from the SATURN model will be factored up to daily flows using factors derived from daily flow profiles obtained from Automatic Traffic Counts.
- 4.8 Multi-modal traffic generation of the development will be based on the TRICS data used in the previous Transport Assessment's submitted on this site and the performance of the junctions will be re-assessed with the addition of development traffic. Where necessary, appropriate mitigation measures will be identified. These may take the form of physical improvement measures or form part of the Travel Plan that will also accompany the application.
- 4.9 In addition, estimates of the type and quantum of traffic generated during the construction period will also be undertaken and the impact of these on the local road network will be identified. Measure to minimise this impact will be identified.
- 4.10 The TA will also demonstrate that the proposed site access operates acceptably and justify the level of parking provision proposed on site.
- 4.11 The ES would make reference to the assessments within the TA and will also consider other areas based on changes in daily flow levels in accordance with the requirements of the EIA Regulations and guidance provided by the IEMA. As such, the assessment would identify all likely significant effects, provide an assessment of the environmental effects and a description of appropriate mitigation.

5.0 ECOLOGY

- 5.1 EDP will prepare the ecology chapter of the Environmental Statement. The scope of the assessment was shared with CDC's ecologist, Natural England, BBOWT and Butterfly Conservation in April 2020 and comments invited.
- 5.2 An Ecological Impact Assessment will be undertaken based on the ecology baseline. The ecology baseline has been fully updated during 2019 and 2020. The ecology baseline which will be used for the purpose of the assessment will include the full update in addition to referencing to the extensive suite of baseline information collated for the site since 2002.
- 5.3 The assessment will be made with reference to the Ecological Impact Assessment guidance published by the Chartered Institute of Ecology and Environmental Management (IEEM). The assessment of construction and operational impacts will be assessed in the absence of the Ecology Strategy but including the inherent measures which will be "built-in" to the proposals e.g. retention of hedgerows, historic field ponds, trees and Local Wildlife Site. The residual impacts will be determined once the Ecology Strategy is in place. Effects associated with any localised raising of ground levels will also be considered.
- With respect to the Ecology Strategy, this will include the provision for an Ecology Construction Method Statement (ECMS) and Wildlife Management Plan (WMP). Heads of Terms for both documents will be included as part of the Environmental Statement.
- 5.5 The ecology ES chapter will consider the conformance of the proposals with respect to relevant legislation and planning policy, the latter at a national and local level.

Determination of Valued Ecological Receptors

Provisionally, based on existing information and subject to the findings of the updated baseline surveys, the following are likely to be considered the Important Ecological Features (IEFs) which will be subject an assessment of significant impacts:

Statutory Designations

- Wendlebury Meads and Mansmoor Closes SSSI;
- Otmoor SSSI.
- 5.7 A pre-application advice letter from Natural England dated 11 May 2020 confirmed no objection to the development proposals, stating:

"Based on the plans submitted, Natural England considers that the proposed development will not have significant adverse impacts on statutorily protected nature conservation sites or landscapes."

Notwithstanding the above, Natural England has historically raised concerns regarding the potential for downstream impacts of the proposal, via adverse changes in water quality and/or flow within the Langford Brook, on two downstream SSSIs listed above. The ecology chapter, with reference to the drainage chapter, will therefore consider the potential for changes in water quality and/or flow in the Langford Brook with respect to the downstream SSSIs.

Non-statutory Designations

• Gavray Drive Meadows Local Wildlife Site (a large proportion of which lies within the application boundary).

Habitats

- Grassland (to be considered in parallel to Gavray Drive Meadows LWS)
- Ecologically Important Hedgerows (with reference to definition as set out in the Hedgerows Regulations 1997);
- Trees and scrub;
- · Historic field ponds; and
- Langford Brook.

Species

- Breeding and wintering birds;
- Bats:
- Great crested newts:
- Reptiles; and
- Terrestrial and aquatic invertebrates.
- 5.9 The species not currently considered to be IEFs include:
 - Marsh fritillary butterfly;
 - Badgers;
 - · Otters; and
 - Water voles.

6.0 CULTURAL HERITAGE

- The site does not contain any 'designated heritage assets' as defined in Annex 2 of the NPPF and, whilst there are a number of such statutorily protected assets located in the wider landscape around the site, they are notably distant and there are no previously identified links of note with the site (e.g. visual relationships), such that contribute to their significance. It is therefore unlikely that they will experience a significant effect from the development.
- 6.2 With regard archaeological remains, previous investigation of the site has recorded evidence for past human activity from at least the late prehistoric and Anglo-Saxon periods, with additional field investigation in adjacent areas (ahead of development schemes proceeding) having also identified evidence for Iron Age and Roman period settlement activity. As such, the site is concluded to contain non-designated heritage assets; with there also being potential for it to contain hitherto unrecognised/unrecorded archaeological remains. However, a mitigation strategy has been agreed with the County archaeologist for their recording ahead of development, and they are not required to be retained. As such, it is not expected that there would be a 'significant' effect (in EIA terms) on these remains.
- 6.3 It is recognised that the fields and hedgerows located within the site could be of potential significance for their historic landscape value. Consultation with the County archaeologist has suggested that some hedgerows and field boundaries are heritage assets, particularly that which follows Launton parish boundary. The scale of impact upon these hedges will need to be considered, but also in the context of the better management and public appreciation of those to be retained within the development, such that could enhance their significance.
- 6.4 Accordingly, EDP will prepare the chapter of the Environmental Statement, to assess the impact of the proposed development on the historic environment, following the preparation of a comprehensive baseline report. Following consultation with the local authority's archaeological advisor; in this case the Historic Environment Team at Oxfordshire County Council, the ES chapter will be prepared, with the baseline report included as a technical appendix.
- The chapter will define the legislative and planning policy context surrounding the conservation and management of the historic environment, the methodology employed in the identification and assessment of potentially significant effects, the baseline conditions pertaining to the site and its immediate environs, the nature and significance of any predicted effects, the scope of any mitigation and/or enhancement measures required to eliminate, minimise or offset those predicted effects and finally the significance of any long term residual effects persisting following their implementation.
- 6.6 The site has previously been subject of a programme of archaeological investigation, which not only comprised desktop work, but also the excavation of trial trenches in those areas which were

accessible and suitable, resulting in the agreement of a strategy for phased mitigation with the local authority's archaeological advisor. It is therefore expected that, whilst the baseline report will be brought up to date through date through the incorporation of any new archaeological and heritage information of relevance, the previously agreed approach to (phased) post-consent investigation and recording remains robust and will form the basis for mitigation in this instance.

- 6.7 The baseline report will be updated through a review of a refreshed archaeological and heritage datatrawl from the Oxfordshire HER; with any information of relevance being checked and updated through the completion of a walkover survey. The previously gathered and assessed historical maps and aerial photographs from the Historic England Archive are considered to still be relevant. The site visit will aim to establish the current ground conditions within the site and outline any changes of significance during the period since the previous investigation.
- 6.8 However, in addition to a thorough review of the current archaeological position, in respect of the site and the surrounding area, the baseline report will also assess the nature and significance of historic landscape resources within the site, compared against publicly available datasets from elsewhere in the county/region.

7.0 WATER RESOURCES

- 7.1 Hydrock will prepare the hydrology and drainage chapter of the Environmental Statement. A desk study of local policy documents and flooding studies will be carried out to develop an understanding of the site and potential flood mechanisms.
- 7.2 The ES will provide a hydrology baseline and report the likely impact that the development would have on the hydrological regime of the immediate area, considering the effects of the proposed development on surface and groundwater flows and water quality during construction and operation. Where adverse effects are identified, mitigation measures will be recommended to minimise these effects.

Fluvial Flood Risk

- 7.3 Gavray Drive lies within flood risk zones 2 and 3, reflecting a medium to high risk. A Flood Risk Assessment study will be carried out using the Environment Agency's most up to date hydraulic modelling results. This will examine the effect of the proposed development upon the existing hydrology and drainage of the site. The main flood risk to the site is considered to be from one source the Langford Brook which flows through the middle of the development site.
- 7.4 The specific methodology for defining and assessing flood risk is dictated by the requirements as set out in the NPPF.

Surface Water Drainage Strategy

- 7.5 Given the sensitive ecological nature of the site, it is anticipated that attenuated surface water runoff will be discharged into the public sewer. Greenfield runoff rates will be calculated for the site, and used to determine the likely size of surface water management features required within the site to meet the requirements of the Environment Agency and the SUDS Approving Body (Oxfordshire County Council, the Lead Local Flood Authority). Following agreement on predicted discharge rates and proposed discharge locations, a surface water drainage strategy will be produced, supported by hydraulic modelling of the proposed system (InfoWorks or MicroDrainage/WinDES software). A proposal will be submitted to Thames Water to confirm that the previously agreed discharge rates into the public sewer network still stand. Effects associated with any localised raising of ground levels will also be considered.
- 7.6 Natural England has historically raised concerns regarding the potential for downstream impacts of the proposal, via adverse changes in water quality and/or flow within the Langford Brook, on two downstream SSSIs. The hydrology chapter will consider the potential for changes in water quality and/or flow in the Langford Brook with respect to the downstream SSSIs.

Foul Water Drainage Strategy

7.7 A hydraulic model of the proposed foul drainage system will be developed using the MicroDrainage / WinDES software to confirm the existing public sewer network has sufficient capacity to access incoming flows from the site. Modelling results will be documented into a short Drainage Impact Assessment report which will then be submitted to Thames Water for their approval.

Floodplain compensation scheme

Part of the proposed development site lies within flood zone 3, as such a floodplain compensation scheme will be discussed with the Environment Agency in order to offset the impact of the proposal whilst mimicking current fluvial flow conveyance. Using the Environment Agency's most up to date hydraulic model of the Langford Brook and following analysis of available topographic survey data for the site, a level-for-level floodplain compensation scheme will be developed and submitted to the Environment Agency for approval. Effects associated with any localised raising of ground levels will also be considered.

8.0 LANDSCAPE AND VISUAL IMPACT

- 8.1 The ES Chapter will be produced by EDP. It will consider landscape and visual impacts by outlining the existing and baseline conditions at the site and in the surrounding area, review the relevant policy framework, consider the impacts of the proposed development on baseline conditions and, where necessary, propose mitigation measures.
- 8.2 The assessment will examine the current landscape and visual baseline conditions within the site and evaluate the site in its broader context with reference to sensitive visual receptors, landscape designations and published landscape character. The assessment process will involve an ongoing analysis of the likely landscape and visual effects of the evolving development proposals and, where 'significant' impacts cannot be avoided through design, will recommend additional mitigation measures.

Existing baseline data

- An initial desk-based assessment of the site has identified that there are no potentially sensitive landscape designations applicable to the site and local area. The allocated site is not situated in any areas of nationally or locally designated landscape importance or quality. The wider landscape is covered by the Oxfordshire Wildlife and Landscape Study, however the site itself is identified within the urban area of Bicester. The eastern edge of the site abuts the Clay Vale Landscape Type, which is described as "a low-lying vale landscape associated with small pasture fields, many watercourses and hedgerow trees and well defined nucleated villages."
- 8.4 Views back to the site are limited to a small number of receptors within close proximity of the site due to intervening features within the local context, including built form and mature tree and hedgerow cover. The initial appraisal has shown that the anticipated visual effects within 2km radius of the site are heavily limited by screening.

Potential effects and mitigation

- The assessment of the effects of the proposals on the landscape will evaluate the environmental consequences of the project in terms of its effects on the character and quality of the landscape, key public views and visual amenity. The possible significant adverse environmental effects arising from the development proposal are anticipated to be as follows:
 - Effects upon the host landscape character;
 - Effects upon Public Rights of Way (PRoW) within or adjacent to site; and
 - Effects upon the visual amenity of local residents, users of Public Rights of Way, users of recreational facilities and road users through the introduction of new elements in the landscape.

8.6 The baseline studies will set out the existing situation with regard to the character and visual condition of the site and surroundings. It will also define the extent of visibility of the site and the parts of the surrounding environment and visual resources that are likely to be sensitive to change. This baseline will set the criteria against which the proposals are assessed. The section will also explain as far as it is known, the scale/extent of other likely development which may add cumulatively to changes in landscape and visual baseline.

Assessment Methodology

- 8.7 The methodology for undertaking the Landscape and Visual Assessment will follow the guidelines set out in the third edition of Guidelines for Landscape and Visual Impact Assessment (GLVIA) (Landscape Institute and Institute of Environmental Management and Assessment, 2013). This will be used as a basic approach and amended as necessary to cover specific site issues.
- As part of the development proposals, measures to mitigate any visual impacts and enhance the landscape value and visual quality of the area are integral to architectural and landscape design work and particularly pertinent to the proposed development. The approach of the developer is to produce a scheme of a high architectural and landscape quality and design, taking full account of the setting of the site. If any adverse visual impacts are identified through the assessment, mitigation measures will be considered such as through choice of scale, massing, materials and finishes; landscape strategy; and screening during demolition and construction.
- 8.9 Finally, an assessment of any residual effects which may arise following the incorporation of mitigation measures will be undertaken and the significance of these effects stated. The evaluation of residual effects will be considered at Year 15. This allows for the consideration of the screening effects of screen planting that will be incorporated as mitigation for the development.

8.10 The ES chapter will:

- Establish the baseline conditions at a point at which the site will become available for development;
- Assess the landscapes sensitivity to change of nature and extent of the proposed development;
- Assess the landscape and visual impact of the development on the site and relevant surrounding area;
- Identify areas of landscape and visual concern and/or benefit in relation to the development and during its construction;
- Advise on any proposals to mitigate significant negative effects; and

Identify the residual impacts of the development.

9.0 CONCLUSIONS

9.1 A concise concluding chapter of the ES will summarise the main effects of the Proposed Development, identify any significant effects transcending the assessed topics and determine the overall balance between adverse and beneficial effects.

10.0 DISCIPLINES OUTSIDE SCOPE OF EIA

- 10.1 Where required, the planning application will include a number of other standalone and supporting technical statements which will assess impacts and where appropriate, propose mitigation. These are considered to have less potential to result in significant effects and are therefore likely to fall below the threshold for EIA. As such they are proposed to be 'scopedout' of the EIA.
- 10.2 If it is found that effects are significant during the production of these standalone assessments, then they may be considered within the EIA process too. However, at this point it is likely that the following are proposed to be subject of freestanding statements only or do not warrant further assessment at this time:

Noise

- 10.3 Previous assessments highlighted that the potential existing sources of noise and vibration, which could potentially affect the proposed development, comprised:
 - a) Noise and vibration associated with rail movements to the north east and north west;
 - b) Road traffic noise from on Gavray Drive, Charbridge Lane and the remainder of the local road network;
 - c) Commercial/industrial noise associated with operations to the north of the site.
- 10.4 The proposed development can mitigate against the above sources with the implementation of good acoustic design and standard mitigation measures. This could include the implementation of intelligent site layout, acoustic barriers, enhanced glazing and alternative means of ventilation. This can be considered appropriately during a standard outline planning application and, planning conditions, where necessary. This would ensure that any impact associated with existing noise and vibration sources are controlled to an acceptable level, in accordance with current acoustic design guidance.
- 10.5 Guidance would include (but is not exclusively limited to):
 - ProPG Planning & Noise: Residential Development
 - BS8233:2014 "Noise Reduction in Buildings"
 - As well as national and local planning policy documents and any guidance afforded by the Local Plan.
- 10.6 Significant distance standoffs from commercial/industrial and railway noise sources will afford "in built" noise and vibration mitigation.

- 10.7 In terms of railway mitigation, a barrier was previously proposed to the southern boundary of the railway at Gavray Drive West to control railway noise ingress at source to the north western portion of the site. Similar mitigation would likely be suitable for the south eastern portion also, subject to detailed assessment.
- 10.8 Subject to good acoustic design practices at the planning stage and beyond, no significant residual noise or vibration impacts on the new development as a result of the existing acoustic climate are expected.

Construction Phase Noise Impact

- 10.9 The construction phase of the proposed development has the potential to generate and noise and vibration impacts at existing sensitive receptors adjacent to the site. Construction works are considered temporary, and therefore any impact associated with construction activity will be limited to minor, or as a worst-case scenario moderate, impact, and in the short term only.
- 10.10 Associated impacts can be reduced appropriately using standard construction methods of mitigation and best practice, and implemented via a Construction Environmental Management Plan (CEMP) provided in accordance with best practicable means (BPM) guidance from BS5228 "Code of practice for noise and vibration control on construction and open sites."

Operational Noise Impact

Operational Fixed Plant and Services

10.11 Fixed plant and service associated with the development such as extractor fans, can be readily mitigated through standard attenuation measures with the required noise rating level limits established via planning noise assessment and typical conditioning to BS4142:2014 " Methods for rating and assessing industrial and commercial sound"". No significant impacts are expected in the short or long term.

Operational Road Traffic

- 10.12 The previous 2015 EIA for Gavray Drive West noise and vibration chapter provided a detailed analysis of the potential noise impact as a result of the northern portion of the development site and other potential outline or permitted schemes in the vicinity.
- 10.13 For the then future operational assessment year (2020) the nearby road network was predicted to experience a 'neutral/insignificant' noise increase (i.e. an increase of less than 1dB) in all scenarios with the exception of Gavray Drive during the future operational scenario, which

- experiences a minor adverse increase in noise. The increase in traffic noise for operation on Gavray Drive was predicted to be between 1.4dB and 2dB.
- 10.14 If the southeast Bicester development is in place, as well as the committed, proposed development along Gavray Drive, noise levels reduce as traffic is distributed onto other roads servicing south east Bicester.
- 10.15 A minor adverse impact is not considered significant in the long term. As traffic noise changes would not be significant it followed that any changes in airborne vibration effects from traffic would also be not significant as the effects are linked.
- 10.16 Any new internal traffic routes would not be expected to generate detectable ground-borne vibration as the distances to existing properties from new internal roads would be too great for there to be any possibility of significant vibration effects.
- 10.17 There is no potential for significant adverse impacts, which is the threshold criteria for EIA and therefore any further assessment would likely find similar magnitude impacts which can be reported and summarised in a standard noise impact assessment. It is considered that an assessment of new proposals should be undertaken in accordance with CRTN and DRMB and reported via a standalone noise assessment statement.

Air quality

- 10.18 The proposed development is around 1.3 km, as the crow flies and 3km by road, from the closest Air Quality Management Area (AQMA) which is the Cherwell District Council (CDC) AQMA No. 4 covering the sections of Kings End, Queens Avenue, Field Street, St Johns Street, Bicester. According to the National Atmospheric Emissions Inventory (NAEI) point source register there are no point sources of significance in the vicinity of the development. The trend in NO2 concentrations along London road, the closest monitoring to the site is downward.
- 10.19 The construction phase of the proposed development has the potential to generate dust impacts at existing sensitive receptors adjacent to the site. The previous EIA assessment considered that the development would attract an additional 30 HDVs, which is below the threshold for assessment, which is 500 HDV. Dust during construction can be controlled by regular road cleaning and damping down.
- 10.20 CDC latest Air Quality Action Plan (AQAP) was released in 2017 and lists 5 main policies for improving air quality. Policy 3 states: "Ensuring new developments encourage and facilitate low emissions and alternative transport".

- 10.21 It is not anticipated that development will increase trips in or close to the AQMA by more than 100 AADT and more than 500 AADT on surrounding roads, as suggested in the EPUK's 2017 guidelines as the threshold where air quality assessments might be appropriate. As a result, it is not expected that there will be a need for further assessment of the potential for impact from the development on Air Quality as part of the EIA.
- 10.22 There is potential exposure from stationary locomotives if regularly stationary for periods of 15-minutes or more and if there is regular outdoor exposure within 15m of the stationary locomotives. The railway chord lies closest to the proposed residential development on land west of Langford Brook. There are signals on the chord which could result in trains being temporarily stationary, however it is unlikely to result in regular stationary periods of 15-minutes or more. Regardless, the emerging proposals show an indicative set back buffer of 30 metres from the development edge to the railway line so exceeds the 15m distance threshold. The nearest stations to the Gavray Drive site are at a great enough distance for emissions from these to be considered insignificant. The previous assessment screened out the railway line from having an adverse impact on the development.

Agriculture and Soil Resources

10.23 Grade 3b land (moderate quality agricultural land) is found covering approximately 96% of the farmed area within the site. Grade 2 land covers a comparatively insignificant area (4%) in the eastern portion of the site. The land makes up a small proportion of the overall farm business and is isolated (approximately five miles away) from the rest of the land utilised by this farm business. The permanent loss of the very good Grade 2 land will be a negative effect but it's scale and location from the farm business indicates a very low significance. Consideration of its loss was made through the allocation of the land for development in the Cherwell Local Plan. No further assessment is considered necessary.

Ground Conditions

- 10.24 An appropriate intrusive site investigation can be undertaken once a detailed proposal is finalised. This is most likely considered to be required by way of a condition attached to any planning consent. At this stage, given the history of the site and the development areas, there are no known significant effects envisaged during the construction or occupation stages. No further assessment is considered necessary at this time.
- 10.25 Wardell Armstrong LLP undertook a desk study and preliminary ground investigation (dated May 2007). A summary of the investigations and assessments to date indicate the following:
 - Historical mapping indicates that little development has taken place over the site in the last 100 years. The site has been used for agricultural purposes.
 - The Langford Brook is located in the centre of the site flowing north to south. At the time of the report the water quality in the Langford Brook was fairly good (category C).

- Reference to more recent data indicates an overall water quality has improved to moderate.
- The central area of the site is underlain by superficial alluvial soils, presumably associated with the watercourse. Solid Geology comprises the Kellaway Formation and the Peterborough formation.
- Based on current guidance the Kellaway/Peterborough Formations is a Secondary A
 Aquifer and the superficial alluvium is also a Secondary A Aquifer. Additionally, The
 Environment Agency indicates that the site is not located within a groundwater Source
 Protection Zone.
- The site does not require radon protection.
- There are records of some localised fly tipping on the site (namely carpet tiles).
- The preliminary ground investigation identified thin veneer of Made Ground across the site generally comprising reworked natural material (ploughed horizon) over natural alluvium and clays of the Kellaway and Peterborough Formations.
- Shallow groundwater was recorded across the site (0.1 to 0.7m bgl).
- Wardell Armstong identified a single licensed landfill located 600m from the site. Hydrock
 has reviewed the Environment Agency landfill database which indicates that this landfill is
 located on London road to the south west of the site. This landfill accepted inert,
 industrial, commercial and household wastes.
- Wardell Armstrong undertook a programme of ground gas monitoring across the site. The
 results of the ground gas monitoring have recorded up 5.6% v/v carbon dioxide, 2.0% v/v
 methane and a maximum flow rate of 10.9 l/hr. The source of the ground gases has not
 been confirmed.
- Wardell Armstrong concluded that the site is classified as Green under the NHBC traffic light scheme (no ground gas protection measures required). The CIRIA 665 Characteristic situation methodology is now industry standard. Under this scheme the site is considered Characteristic Situation 2. In order to provide CS2 protection, at detailed construction stage the floor slab of the proposed dwellings should include:
 - » Reinforced concrete cast in-situ floor slabs (suspended, non-suspended or raft) with at least 1200gauge DPM and underfloor venting; or
 - Beam and block or pre-cast concrete floor with 2000-gauge DPM/reinforced gas membrane and underfloor venting; and
 - » All joints and penetrations sealed.
- The results of chemical testing of soil and groundwater did not identify the presence of any significant contamination issues with respect to human health and controlled water. Therefore, no remedial action is required.
- 10.26 On the basis of the investigations undertaken to date, Hydrock consider the risk to the environment from the site to be low and therefore a ground specific EIA chapter is not required.

Utilities

- 10.27 There is an 11 KV cable in Gavray Drive fronting the proposed development. Liaison with the statutory undertaker will confirm whether there is sufficient capacity to serve the new development.
- 10.28 There is an existing 250mm Low Pressure Main in Gavray Drive fronting the proposed development. Liaison with the statutory undertaker will confirm whether there is sufficient

capacity to serve the new development, or whether further reinforcement to the network may be required

- 10.29 There is an existing 15" water main crossing the eastern part of the site in a NE to SW direction. There is a 200mm water main in Gavray Drive fronting the proposed development. Liaison with the statutory undertaker will confirm whether there is sufficient capacity to serve the new development.
- 10.30 BT have confirmed they have plant and ducts in the vicinity of the site. Liaison with the statutory undertaker will confirm whether there is sufficient capacity to serve the new development.
- 10.31 It is anticipated that the development would be subject to appropriate mechanisms to ensure proportionate contributions towards utilities, infrastructure and services required to serve the site. It is not considered likely that there will be any constraints on providing adequate services to the site.
- 10.32 No further assessment is considered necessary at this time.

Socio-economics

10.33 The development would deliver new housing in an area that is well related to the town and centre, railway stations, employment opportunities, schools, shops and good public transport links. The site is entirely consistent with the objectives for the delivery of housing growth required by the NPPF and at a local level through the adopted Local Plan in which the site is allocated. The proposal would contribute to the Council's 5-year housing land supply. Further planning policy appraisal will be set out in the Planning Statement.

Arboriculture

10.34 EDP will prepare a standalone arboriculture assessment and tree survey. This will include assessment of the TPO trees and hedgerows as shown on the Consolidated Constraints and Opportunities Plan. Protection during construction and post construction measures for vegetation will be included. Additional planting will be included in the proposals.

Summary

10.35 This report is submitted to CDC with a request for an EIA Scoping Opinion under Regulation 15 of the Town and Country Planning (Environmental Impact Assessment) Regulations 2017 (The EIA Regulations). The scope of the EIA is set out at paragraph 1.8 and is proposed to include:

- Transport;
- Ecology;
- Cultural heritage;
- Water resources and;
- Landscape and visual.
- 10.36 The planning application may include a number of other standalone and supporting technical statements which will assess impacts and where appropriate propose mitigation. These are considered to have less potential to result in significant effects and are therefore proposed to fall below the threshold for EIA. At this point it is suggested the following are 'scoped-out':
 - Air quality;
 - Noise;
 - Agriculture and Soil Resources;
 - Ground Conditions;
 - Utilities;
 - Socio-economics and;
 - Arboriculture.

Appendix 1: Site Plan



Appendix 2: Consolidated Constraints and Opportunities Plan

