

RIDGE

ENVIRONMENTAL STATEMENT: NON-TECHNICAL SUMMARY

FOR NEW STADIUM DEVELOPMENT

ON BEHALF OF OXFORD UNITED FOOTBALL CLUB

February 2024

CONTENTS

1. INTRODUCTION	3
Background	3
What is an Environmental Impact Assessment?	3
2. APPROACH TO EIA	5
Scope of the Assessment	5
Approach to the Assessment	5
Cumulative Effects	7
3. DESCRIPTION OF THE SITE AND SURROUNDING AREA	8
Site and Surrounding Context	8
Designations	8
Surrounding Area	9
Planning History	10
4. DESCRIPTION OF DEVELOPMENT	11
Overview of the Proposed Development	11
Description of the Proposed Development	11
Building Form and Height	13
Stadium Operation	13
Open Space and Landscape/Biodiversity Strategy	14
Access and Parking	15
Sustainability	16
Waste	17
Technical Matters	17
Development Programme and Construction	18
5. CONSIDERATION OF ALTERNATIVES	19
Alternative Sites	19
Alternative Site Layout/Design	21
The 'Do Nothing' Scenario	21
6. PLANNING POLICY CONTEXT	22
7. LANDSCAPE AND VISUAL	23
8. ECOLOGY AND NATURE CONSERVATION	27
9. CULTURAL HERITAGE AND ARCHAEOLOGY	30
10. TRANSPORT AND ACCESS	31
11. NOISE AND VIBRATION 12. AIR QUALITY	34 35
13. LIGHTING	36
14. FLOOD RISK AND DRAINAGE	38
15. SOCIO-ECONOMICS	40
16. CLIMATE CHANGE	42

GHG emissions	42
Climate resilience	43
17. WASTE	45
18. MAJOR ACCIDENTS AND DISASTERS	46
19. CUMULATIVE EFFECTS	47
20. SUMMARY	49

FIGURE 1: CUMULATIVE SITES PLAN FIGURE 2: SITE LOCATION PLAN

FIGURE 3: SITE ALLOCATIONS CONTEXT FIGURE 4: PROPOSED SITE LAYOUT

1. INTRODUCTION

Background

- This Non-Technical Summary (NTS) presents a summary of the findings of an Environmental Statement (ES) that was prepared in relation to a planning application for a new stadium development at Land East of Stratfield Brake and West of Oxford Parkway Station, known as The Triangle ('the Site'). The application has been submitted on behalf of Oxford United Football Club (OUFC: 'the Applicant').
- The Proposed Development includes the development of a stadium and ancillary uses. The stadium has a capacity of 16,000 people and will include hospitality spaces for match and non-match day uses including corporate, community, education and other events. The development also includes a 180-bed hotel and a variety of commercial spaces opening out onto a new plaza and community park. These commercial spaces will include a public restaurant and bar, restaurant, health and wellbeing clinic, OUFC Shop and a gym. These uses will be situated within a strong landscape setting, with native species and landscaping elements incorporated into the design. The vision is to incorporate flexible multi-functional spaces that can be enjoyed whether it be a match day or not. The proposals include a new vehicular access off Frieze Way, and improvements to pedestrian and cycling connections in the vicinity of the site. The development is subsequently referred to as the 'Proposed Development' with Chapter 3 of this NTS providing a more detailed description of what is proposed.

What is an Environmental Impact Assessment?

- 1.3 An Environmental Impact Assessment (EIA) has been undertaken by a team of competent experts to assess the environmental effects of the Proposed Development. The EIA is reported within an ES which has been prepared in line with the EIA Regulations¹. The purpose of the ES is to identify the likely significant effects that the Proposed Development may have on the environment and setting out how they can be avoided or reduced.
- 1.4 In line with the EIA Regulations, the ES should include a non-technical summary of the information presented within the ES. The National Planning Practice Guidance (PPG)² identifies that the main findings of the ES must be set out in accessible, plain English, to ensure that the findings can more readily be disseminated to the general public, and that the conclusions can be easily understood by non-experts as well as decision-makers.

¹ Town and Country Planning (Environmental Impact Assessment) Regulations 2017 (as amended)

² Paragraph 035 Reference ID: 4-035-20170728

- 1.5 This NTS sets out the key issues and findings of the ES in an accessible format, in line with the above.
- 1.6 The ES comprises:
 - Volume 1: Main Text
 - Volume 2: Figures
 - Volume 3: Technical Appendices
- 1.7 The ES addresses the following issues with a dedicated Chapter on each:
 - Approach to EIA
 - Description of the Site and Surrounding Area
 - Description of Development
 - Consideration of Alternatives
 - Planning Policy Context
 - Landscape and Visual Impact
 - Ecology and Nature Conservation
 - Cultural Heritage and Archaeology
 - Transport and Access
 - Noise and Vibration
 - Air Quality
 - Lighting
 - Flood Risk and Drainage
 - Socio-Economics
 - Climate Change
 - Waste
 - Cumulative Effects
 - Summary

4

- 1.8 The ES and this NTS accompany a suite of documents that together support the planning application submitted to the Local Planning Authority, Cherwell District Council (CDC).
- 1.9 Hard copies can be viewed at CDC's Offices³. Electronic copies of the ES and planning application can be viewed on the CDC's website at https://planningregister.cherwell.gov.uk/.

³ Cherwell District Council, Bodicote House, Bodicote, Banbury, Oxon, OX15 4AA

2. APPROACH TO EIA

2.1 An EIA identifies the likely significant environmental effects of a development on the environment, and where relevant, outlines mitigation measures that would either avoid, minimise or offset any negative (adverse) effects.

Scope of the Assessment

- 2.2 A Scoping Request was prepared and submitted to CDC in August 2023 to invite the Local Planning Authority's (LPA) views on the topic matters to be included within the ES in the form of a Scoping Opinion. The Scoping Opinion was received on 29th September 2023, which confirmed that the LPA were in agreement with the following topics being scoped in:
 - Landscape and Visual;
 - Ecology and Nature Conservation;
 - Cultural Heritage and Archaeology;
 - Transport and Access;
 - Noise and Vibration;
 - Air Quality;
 - Lighting;
 - Flood Risk and Drainage;
 - Socio-Economics;
 - Climate Change; and
 - Waste.
- 2.3 In additional to the above, CDC requested that the impacts associated with terrorism be scoped into the ES. As such, Major Accidents and Disasters has been scoped in.
- 2.4 It was agreed that no likely significant environmental effects will arise in regard to Human Health, Soils, Land Quality and Ground Conditions. As such, these topics have been scoped out of the ES. However, technical reports relevant to these matters have been prepared separately which accompany the planning application.

Approach to the Assessment

2.5 For the topics included, the ES includes a description of the 'baseline condition' which is the existing environmental characteristics for each individual topic. Where relevant, the 'future baseline' (how the baseline environment may change in the absence of the Proposed Development) is also set out.

- 2.6 Each topic identifies receptors which could be sensitive to the impacts of the Proposed Development, including local residents and businesses, pedestrians, cyclists and road users, designated sites, heritage assets, habitats and species, and the local economy, amongst others.
- 2.7 Each Chapter then measures whether environmental effects on those receptors are significant using standards or codes of practice and expert judgement.
- 2.8 The ES considers potential effects during both the construction and operational phase of the development.
- 2.9 The overall level of the effect (i.e. whether it is significant or not) is described in each of the technical chapters, determining whether those effects are direct, indirect, secondary, cumulative, transboundary, short-term, medium-term or long-term, permanent or temporary, positive or negative. The overall significance is then assessed by determining:
 - Whether the actual change taking place (magnitude) is High, Medium, Low or Negligible;
 and
 - Whether the sensitivity or value of the receptor is High, Medium, Low or Negligible.
- 2.10 The overall effect of significance is based on the interaction between magnitude and sensitivity, whereby the effects can be beneficial (positive), adverse (negative) or negligible (neutral). Overall, the effects, are defined as follows:
 - Major (adverse or beneficial) where the development would cause significant deterioration (or improvement) of the existing environment;
 - Moderate (adverse or beneficial) where the development would cause noticeable deterioration (or improvement) to the existing environment;
 - Minor (adverse or beneficial) where the development would cause perceptible deterioration (or improvement) to the existing environment;
 - Negligible no discernible improvement or deterioration to the existing environment.
- 2.11 Unless specified within the Technical Chapter, if the effect falls into the category of either 'Moderate' or 'Major', it is considered significant in EIA terms.
- 2.12 The EIA was undertaken in parallel to the design process and, where possible, measures to minimise environmental effects have been designed-in to the Proposed Development (embedded mitigation). If adverse effects are identified, then additional mitigation measures have been put in place where practicable to reduce that impact. The extent of the mitigation measures and how these will be effective is discussed within each of the technical chapters. 'Residual effects' are those that remain after mitigation measures have been implemented.

Cumulative Effects

- 2.13 The EIA Regulations also require assessment of any potentially significant effects of the Proposed Development that may arise cumulatively (when combined with) other development sites in the local area. The sites considered in the ES are displayed on a plan at **Figure 1**. Each topic chapter has a section which assesses these cumulative effects.
- 2.14 The ES also considers the effects that have arisen from the interaction between individual effects of the Proposed Development. These are considered in Chapter 19.

3. DESCRIPTION OF THE SITE AND SURROUNDING AREA

Site and Surrounding Context

- 3.1 The Site is approximately 7.17 ha and is situated approximately 6 km to the north of Oxford and at the gateway of Kidlington. The Site consists of a broadly triangular field, surrounded by linear vegetation associated with the A4260 Frieze Way to the west and Oxford Road to the east. Short sections of these routes adjacent to the field fall within the Site boundary, including the slip roads to Stratfield Brake Sports Ground to the west. The Site boundary extends south along Oxford Road to include the ramped access and embankment down to Oxford Parkway Station.
- 3.2 The main part of the site is a triangular shape and comprises of a willow plantation of relatively recent origin (less than 20 years) bounded by hedgerows and trees, with a strip of neutral grassland located between the boundaries and plantation. A woodland is present off-site along the southern boundary and an area of planted scrub is also present within the northern section of the site. Surveys have identified a number of low-moderate quality trees around the outskirts of the woodland area.
- 3.1 As above, the Site includes stretches of Oxford Road along its north-eastern boundary, and Frieze Way along the north-western boundary. Kidlington Roundabout is located to the north of the site, and woodland forms the southern boundary of the site, beyond which is agricultural land. Beyond the south-eastern boundary of the Site is Oxford Parkway Railway Station and the Park and Ride, and to the west of the Site is Stratfield Brake Sports Ground. A site location plan can be found at **Figure 2.**

Designations

- 3.2 The Site is washed over by the Oxfordshire Green Belt but it does not include any sites which are designated for nature conservation, heritage or landscape value.
- In terms of nature conservation, the closest statutory site is the Oxford Meadows Special Area of Conservation (SAC), which includes the constituent Site of Special Scientific Interest (SSSI) Pixey and Yarnton Meads SSSI, located approximately 1.9km southwest of the Site at its closest point. Other constituent SSSIs nearby include Port Meadow with Wolvercote Common & Green SSSI, which is located approximately 2 km south at its closest point, and Wolvercote Meadows SSSI, located approximately 2.1 km southwest. Rushy Meadows SSSI is located 2.3 km northwest of the site, Hook Meadow & Trap Grounds SSSI is located approximately 2.7 km south of the Site, New Marston Meadows SSSI is located approximately 3.9 km southwest of the Site, and Iffley Meadows SSSI is 7.6 km southwest of the Site.
- 3.4 The woodland located off-site adjacent to the southern boundary is listed on the MAGIC database as a Priority Deciduous Woodland which also forms part of the Stratfield Brake Cherwell District

Wildlife Site (DWS). The Meadows West of the Oxford Canal is an Oxfordshire Local Wildlife Site (LWS) which lies approximately 0.6km west of the site, and is separated from the Site by Frieze Way, Stratfield Brake DWS and Oxford Canal.

- 3.5 There are tree belts along the eastern and western boundaries of the Site associated with Oxford Road and Frieze Way, and scrub vegetation in the north of the Site. A line of five Poplars are located at the northern tip of the Site and are prominent in local views. The embankment down to Oxford Parkway consists of Field Maple, Hornbeam, Hazel and Hawthorn. The majority of the internal arrangements of the field within the Site are occupied by the commercial willow plantation. There are seven Tree Preservation Orders (TPOs) on the Site boundary (five on the northern boundary and two on the eastern boundary).
- 3.6 The Site is located in Flood Zone 1 and therefore is not considered at risk of fluvial flooding. The north of the Site indicates a risk of surface water flooding due to its topography. There are field ditches found on the western boundary and to the northern edge of the woodland. The north of the Site contains a Gas Main and Overhead Power Cable.
- 3.7 No Scheduled Monuments, Registered Parks and Gardens or Registered Battlefields are present within or in the vicinity of the Site. Whilst there are no Listed Buildings within the Site, there are a number of Listed Buildings within its proximity.
- 3.8 There are a number of Public Rights of Way (PROW) which extend from the settlement edge of Kidlington into the surrounding landscape.

Surrounding Area

- 3.9 Surrounding the Site are a mix of uses, including retail, transport infrastructure, and sports and recreation. There are a number of allocations surrounding the Site and residential development is proposed to the north-west, north-east and south-east of the Site. Allocated Site PR6b (residential development of 690 dwellings) is situated to the south-east, Allocated Site PR6c (for the potential construction of a golf course should this be required as a result of site PR6b) to the south-west, and Site Allocation PR7a (for 430 dwellings, an extension to Kidlington Cemetery and 11 hectares of land to provide formal sports/green infrastructure for the development and for the wider community) to the north-east. Beyond Oxford Parkway to the south-east is Allocated Site PR6a (690 dwellings and other associated uses). A Plan showing the site in the context of these allocations can be found at Figure 3.
- 3.10 The Site is well related to existing and proposed development and is in a highly accessible location, adjacent to the strategic highway network as well as Oxford Parkway Railway Station and Park and Ride. It is therefore accessible by a range of transport modes.

Planning History

3.11 There is no recent planning history of relevance. Planning permission was granted for the change of use from agricultural to motorcycle track in January 1998 for a period of 1 year (reference 97/01897/F).

4. DESCRIPTION OF DEVELOPMENT

Overview of the Proposed Development

- 4.1 Much like the county of Oxfordshire, OUFC comes from a proud heritage and rich history. The Club has aspirations for a new, modern and sustainable stadium, which is a significant community landmark that contributes meaningfully to the economy and society of Oxfordshire. This is a once in a generation opportunity to provide a new home for sport, entertainment, business, education and tourism which the whole county can be proud of.
- 4.2 The Proposed Development is defined through a financial appraisal which identifies the ideal facilities which benefit both the Club and the community. This contributes to the financial sustainability of the Club, whilst also enhancing the offering to the community around Oxford and the surrounding area.
- 4.3 The Proposed Development looks to deliver a 16,000 capacity stadium for OUFC and associated facilities within a single building. The commercial and community uses within the Stadium provide facilities for conferences, exhibitions, education and other events with a capacity for 1,000 guests. In addition to this the Stadium building provides a Club Shop, public restaurant, bar, health and wellbeing/clinic facility and gym, as well a 180-bed hotel.
- The stadium is situated in the southern part of the site on a north-west/south-east axis. Externally, there will be a pedestrian concourse around the perimeter of the stadium, as well as a community plaza and fan zone to the north of the Stadium, with an area of enhanced green infrastructure in the northern corner of the site. This area will provide connectivity through the Site to the areas of open space to the west and east of the site. Car parking is situated to the south-west of the stadium, which includes an area which will be used as an outdoor broadcasting compound on matchdays. To the south of the site are SUDs drainage ponds as well as another area of public realm to the southeast which provides another arrival space from the south-east. The proposed masterplan can be found at **Figure 4.**

Description of the Proposed Development

4.5 The description of the Proposed Development is as follows:

'Full planning permission for the erection of a stadium (Use Class F2) with flexible commercial and community facilities and uses including for conferences, exhibitions, education, and other events, club shop, public restaurant, bar, health and wellbeing facility/clinic, and gym (Use Class E/Sui Generis), hotel (Use Class C1), external concourse/fan-zone, car and cycle parking, access and highway works, utilities, public realm, landscaping and all associated and ancillary works and structures'

4.6 The breakdown of land-uses proposed is as follows:

Use	Use Class	Quantum/Amount
Stadium (F2)	F2	16,000 Capacity
Club Shop and Ticket Office	Е	315m ²
Sports Bar	Sui Generis	197m ²
Restaurant	Е	276m ²
Gym	Е	698m ²
Health and Wellbeing/Clinic Facility	Е	827m ²
Hotel	C1	180-bed
Parking		184 car parking spaces, 2 coach bays, motorcycle spaces and 150 cycle parking spaces.
Green Infrastructure/ Landscaped		The Plaza and Gardens - 7,515m²
areas		The Southern Plaza – 1,152 m²
		The Approach – 1,322 m ²
		Other areas of landscaping and SUDS
		drainage – 2,297 m ²

- 4.7 The proposed design for the stadium is for a fully covered 360-degree 16,000 capacity single tier rectangular seating bowl.
- 4.8 The west stand is the main stand and provides player access and facilities, media facilities, hospitality, sky boxes, directors lounge, and premium seating, as well as ancillary offices, equipment and plant and other back-of-house facilities. The hospitality areas will provide Conferencing and Events space and will be used on both match and non-match days. The lounge area on the first floor has capacity for 1,000 guests.
- 4.9 The north stand contains the proposed commercial spaces on the ground floor, as well as the hotel entrance, with the hotel accommodation on the second to fourth floors. Half of the hotel bedrooms will be outward-looking, overlooking the green roof of the commercial spaces below and wider surroundings. The other half will be inward looking, and two of the levels of the inward-looking rooms will have pitch view. The east and south stands provide the remainder of the seating bowl.
- 4.10 The stadium has capacity for 16,000, provided over a number of different seating types. This comprises of General Admission (GA) including licenced standing, Premium GA and premium seating for hospitality and lounges. The away GA seating provision is located in the south-east corner with options of either 800, 1,600 or 2,400 (5%, 10% or 15% of the stadium capacity respectively). Each seating category/hospitality space will have a designated number of wheelchair positions. These will be spread across multiple locations to provide users with flexibility and choice.
- 4.11 The stadium also includes a Sensory Room and two multi-faith spaces.

Building Form and Height

- 4.12 In terms of the design of the stadium, it is not proposed to encase the entire building in a uniform exterior, but instead, express the distinct features of each individual part. The stadium is designed to look and feel like a stadium, featuring a continuous 360-degree seating bowl with a concourse beneath. However, the hospitality areas and the hotel create a different mass, height and required aesthetic, which will wrap around the stadium on two sides.
- 4.13 The proposed maximum height of the stadium is 24.6m. The most prominent part of the building on-site is at the north-west corner. This corner will serve as the public face of the Proposed Development. The scale of this corner is celebrated, and the height is gradually reduced as it extends east and south.

Stadium Operation

- 4.14 The Proposed Development will function as a multi-purpose sporting, leisure and cultural facility.
- 4.15 The stadium will host men's and women's first team fixtures. The stadium is likely to hold 28 men's first team football matches per annum, including home league games, pre-season and cup games, and 13 women's home league games and cup fixtures. It is also projected that there will be 2 stadium hire events per year, for sporting events such as junior international matches, or community or university sport events. Whilst these are projected to result in a lower average attendance of 10,000 people, a worse case of full capacity is assessed. As such, the assessment within the ES has been done on the basis of 43 football matches per annum at 16,000 capacity.
- 4.16 In terms of events, it is not proposed that the stadium will host concerts. However, it will be utilised for a wide range of activities including conferences, meetings, trade shows, corporate events and dinners. Over the course of a year, it is anticipated that around 580 events will be hosted. These will be of differing scales, with the majority being smaller events with an average attendance of 10 or 30 people. The stadium has capacity to host events for up to 1,000 attendees and initial projections anticipate that there will be approximately 85 events with an average of 150 people, and 68 large events with an average number of 700 people. This includes Christmas parties.
- 4.17 The majority of football matches are held in the afternoon / early evening of weekends during the football season. Some matches, in particular cup-ties, are held during the week with kick-off time around 19:45. These games usually finish by 22:00, with the exception of very few cup games that go to extra-time and penalties.
- 4.18 There will be activity on site 24 hours a day. At this stage, end users for the commercial and community uses have not been defined but it is anticipated that the hours of use, with the exception of the hotel use which will be 24 hours, will be between 06:00-00:00. The specific hours will vary

depending on the use but are likely to fall within these broad parameters. Security will be on site 24-hours.

Open Space and Landscape/Biodiversity Strategy

- 4.19 Whilst the Proposed Development would introduce new built form and open space to the landscape, the proposed stadium has been situated as far south within the Site as possible without impacting on the woodland block to the south of the site. This protects this key landscape feature that is designated as a priority habitat, whilst retaining an open green space in the north of the Site to maintain an open green space between the Proposed Development and the southern edge of Kidlington. The Proposed Development would see the introduction of a large number and variety of new landscape features, creating new areas of habitat, open space and helping to reduce the visual impacts of the built form. Vegetation removals along the eastern and western boundaries to facilitate access are replaced within the Site.
- 4.20 The Planning Application is accompanied by a Landscape Strategy. This identifies that the strategy consists of four main character spaces:
 - 1. The Gardens: this area is located in the northern part of the site and includes native tree planting, provision of a natural pond, natural amphitheatre as well as grassland.
 - 2. The Plaza: this area is to the south of The Gardens and north of the stadium and includes paved landscaping, raised planters and tree planting, as well as a formal walkway running east-west across the site. This is envisaged to be a home team fan zone on match days and community space on non-match days.
 - 3. The Approach: the eastern boundary of the site which forms the main pedestrian and cycle access to the site from Oxford Road. There will be removal of vegetation along this boundary (including two TPO'd oak trees) to create a permeable edge but raised and stepped planters would provide opportunities for planting, including boulevard trees.
 - 4. The Southern Plaza: the south-eastern corner of the site is the away fans area and includes areas of hardstanding around the perimeter of the stadium, a SuDS attenuation area, tree and buffer planting along the southern boundary of the Site.
- 4.21 The submitted Arboricultural Impact Assessment for the Site identifies the proposed removal of 17 individual trees (one Category A, four Category B, 10 Category C and 2 Category U) of varying maturity and the removal of five tree groups (one Category B and four Category C) and the partial loss of two groups to facilitate the Proposed Development. The retention of the existing mature trees along the northern boundary and the partial retention of the existing trees on the eastern and western boundaries help to retain a mature landscape setting for the Proposed Development alongside the existing woodland to the south of the Site.
- 4.22 The majority of trees to be removed are categorised as 'C'. The Proposed Development therefore provides the opportunity to significantly increase the overall number of trees, the range of species

(and associated ecological benefits) and improve the age-structure of the tree stock. 143 new trees would be planted within the Site, including 81 trees of extra heavy standard or above, approximately 2,000m² of scrub planting and 350 linear metres of native hedgerow. Replacement and additional trees will be planted as early as feasible within the construction programme to enable their rapid establishment.

- 4.23 The Proposed Development seeks to achieve a minimum of 10% Biodiversity Net Gain. The landscape planting strategy, which helps to achieve this, is as follows:
 - The protection of the adjacent woodland.
 - Creation of species-rich wildflower grassland and species-rich amenity grassland, and if
 deemed necessary, a transplantation exercise of those plants that are of greater
 conservation value to dedicated areas left for biodiversity.
 - New native tree and hedgerow planting is proposed of a length/area greater than lost.
 - Creation of a pond and attenuation features;
 - Creation of new scrub habitat and hedgerows which will include Blackthorn.
 - New bird nest boxes and bat boxes will be provided on suitable retained trees within the Site.
 - Log piles will be created within areas of open space.
 - Three areas of biodiverse roof are proposed on parts of the north, east and south stands and a green wall is proposed on the northeastern elevation of the stadium to provide additional opportunities for ecological enhancement.

Access and Parking

- 4.24 Vehicle access to the Site is via a new junction on Freize Way to the north of the proposed stadium, with vehicle egress on to Freize Way south of the stadium. A secondary emergency access is proposed onto Oxford Road.
- 4.25 Car parking is situated to the west of the proposed stadium and accommodates a total of 184 car parking spaces, of which 78 are accessible bays and 106 are standard car bays. On match days, some of the car parking spaces (approximately 25 of the standard spaces) are to be utilised as an TV Broadcasting Area. These are to be provided in Grasscrete. 2 coach bays and 150 cycle parking spaces are proposed on-site. Cycle parking is also proposed to be provided at Oxford Parkway Station.
- 4.26 On match days, it is anticipated that accessible spaces will be allocated to fans based on need and through a booking system. The standard spaces will be used by match officials, operational staff and outside broadcast, which will require pre-booking in advance of the match. On non-match days, the car park will be used by OUFC staff working at the stadium, visitors to the hotel, commercial, and leisure uses. The car park will be managed by OUFC.

- 4.27 The Proposed Development seeks to promote the use of sustainable transport measures.

 Measures include:
 - New and improved pedestrian and cycle routes to/from the stadium from/to Oxford Parkway, which also connect to the committed pedestrian and cycle routes at Kidlington Roundabout and on Oxford Road. The improvements will include signage and lighting.
 - Crossing facilities (TOUCAN) across Oxford Road.
 - Crossing facilities (TOUCAN) across Frieze Way.
 - A new stepped access to Oxford Parkway from Oxford Road.
 - New bus stops on Oxford Road.
- 4.28 In terms of the management of crowds, Match Day and Non-Match Day Interim Travel Plans have been prepared which set out the measures proposed. In terms of match days, measures include:
 - Shuttle bus services to/from the Park and Ride sites around Oxford on match days (aligned to demand/ticket sales).
 - Increased frequency and longer operating hours of public bus services to the stadium on match days if demand/ticket sales require.
 - Traffic Management Plan, including the following measures:
 - Traffic management on Oxford Road for at least 30 minutes before and after a match. Key bus services and coaches marshalled through Oxford Road during periods of lighter pedestrian flows.
 - Controlled Match Day Parking Zones up to 2km from the Stadium in Kidlington and North Oxford.
 - Variable Message Signage on radial routes to the Stadium advising of football match and availability of Park and Ride car parks.

Sustainability

- 4.29 The Applicant has developed a 'customised' Sustainability Framework for the Proposed Development. The Sustainability Framework sets out a range of sustainability issues, questions and key performance indicators designed to optimise sustainability performance for the Proposed Development. Performance Indicators included within the Framework are aligned with meeting, or exceeding, relevant policy requirements and/or recognised industry guidance. The Sustainability Framework is a working document and will continue to evolve through the design, construction and operation stages of the development; however, it demonstrates the commitment of OUFC to deliver a number of measures across the site.
- 4.30 The application is accompanied by a Sustainability Statement which demonstrates that the Proposed Development is targeting 'Best in Class' or better across all the themes.

- 4.31 The stadium will be constructed to achieve the highest economically viable energy efficiency and be designed to maximise the delivery of decentralised renewable or low-carbon energy generation. The stadium will aim to reduce energy use and carbon emissions through the use of energy efficient equipment and Low and zero carbon technologies. Heating and cooling will be provided in the form air source heat pumps to provide space heating and cooling. In addition, PV panels are also proposed as an onsite electricity generation system, further reducing the energy consumption of the building.
- 4.32 The Proposed Development aims to achieve at least a BREEAM rating of 'Very Good' (Building Research Establishment's Environmental Assessment Method), a sustainability rating scheme for the built environment which is used in securing sustainable developments.

Waste

- 4.33 An Operational Waste Management Strategy (OWMS) will be produced which will provide an estimate of the anticipated waste generation from the Proposed Development during operation. The OWMS will provide guidance on how to allow waste to be disposed, stored and managed in a sustainable manner. It is proposed that the Stadium will operate with zero plastic, with minimal waste and packaging. The recycling target of the waste generated by the Proposed Development will be 75%.
- 4.34 Good practices for recycling of waste generated will be incorporated that includes:
 - Composting of green waste.
 - Source segregation of dry recyclables.
 - Treatment of food waste by anaerobic digestion process or by composting

Technical Matters

Drainage

4.35 The Proposed Development incorporates sustainable drainage systems (SuDS) which comprises of filter drains, rain gardens and two attenuation ponds. Two storage ponds and geo-cellular ground surface storage will provide flow attenuation.

Noise

4.36 The stadium is designed as a 'wraparound' bowl which will contain noise within it. The detailed design will be developed to maximise this containment effect and minimise noise spillage outside of the stadium. Detailed design for fixed plant and PAVA systems will ensure background noise levels are not exceeded.

Lighting

4.37 Design criteria have been outlined which will ensure that the levels of obtrusive light are acceptable in respect of external lighting (including field of play lighting), façade illumination, illuminating advertising, and internal lighting.

Development Programme and Construction

- 4.38 The Proposed Development will be constructed over a period of 2 years, beginning in August 2024 and ending in July 2026.
- 4.39 The following assumptions have been made in respect of the construction phase to inform the ES:
 - Anticipated construction methods;
 - Site working hours and days;
 - Construction employment;
 - Construction Traffic routing;
 - Construction traffic timings and frequency; and
 - Traffic management requirements.
- A detailed Construction Environmental Management Plan (CEMP) will be prepared prior to construction which will set out the principles and measures that contractors should adhere to on site to minimise and mitigate environmental impact that may arise during the construction period. This will include measures aimed at reducing dust, noise and lighting nuisance. The preparation of a CEMP is an established method of managing environmental effects resulting from construction works and will be secured by planning condition.
- 4.41 A draft Construction Traffic Management Plan (CTMP) has been prepared which sets out measures for managing and mitigating construction vehicle activity into and out of the site, to ensure safety of other road users and to protect the environment. This is a working document.
- 4.42 Construction activities on site will be managed to reduce the level of waste generated. This involves promoting the use of recycled materials, re-using on site where possible, and disposing of any waste in the most sustainable manner. A Resource Management Plan (RMP) will be prepared to outline the procurement requirements for materials, and a Site Waste Management Plan (SWMP) will be prepared as part of the CEMP which will set out control measures to ensure that waste generated from the construction of the Proposed Development is kept to a minimum.

5. CONSIDERATION OF ALTERNATIVES

- 5.1 The EIA Regulations requires that an ES includes "a description of the reasonable alternatives (for example in terms of development design, technology, location, size and scale) studied by the developer, which are relevant to the proposed project and its specific characteristics, and an indication of the main reasons for selecting the chosen option, including a comparison of the environmental effects".
- 5.2 This Chapter outlines the main alternatives of the scheme considered by the Applicant and key reasons as for proceeding with the Proposed Development. The alternatives that have been considered in this Chapter include:
 - Alternative Sites;
 - Alternative Designs; and
 - The 'Do Nothing' Scenario.

Alternative Sites

- 5.3 An Alternative Sites Assessment (ASA) has been undertaken, which has been submitted as part of the planning application.
- There is currently no relevant planning policy regarding the location of sports stadiums, and there is no policy guidance for undertaking an assessment of alternative sites. However, relevant planning applications and planning appeals in respect of stadium development has been reviewed as the consideration of alternative sites is often a consideration in the determination of those cases. The Brighton and Hove Albion appeal decision provides a useful benchmark for assessing alternative sites as it provides an in-depth analysis, and an Inquiry took place solely on the approach to assessing alternative sites. The Secretary of State set out key criteria to be considered. Whilst these criteria do not form planning policy or guidance, they have informed key questions that have been asked within the ASA:
 - 1. Is the site acquisition a realistic proposition?
 - 2. Is the site large enough for the stadium and required parking/circulation?
 - 3. Can a stadium be built without incurring unaffordable development costs?
 - 4. Any overriding site specific planning issues?
 - 5. Is the site accessible by sustainable modes of transport?
 - 6. Can a stadium be built without any unacceptable environmental or visual impact?
- These questions are considered to provide a robust assessment to understand whether there are any alternatives sites that are practical, realistic and feasible to accommodate a proposed stadium development. In line with the EIA Regulations, these questions also allow a comparison of the environmental effects of alternative site options.

Area of Search

- OUFC will need to obtain approval from the Board of the English Football League (EFL) for any relocation of the club's Stadium to a new site, who will take into account the location of the stadium before any consent is granted, against the EFL Regulations. The Regulations mean that there is a requirement that the location of any new stadium remains linked to the City of Oxford. The EFL have confirmed that if the Club proposed a site that was not within or within close proximity to the City of Oxford, they would unlikely give consent for the move. This would result in a position where the Club would have to be renamed, removed from the league and would have to start again at the bottom of the football pyramid. This would not be a viable option for the Club.
- 5.7 Under the current regulations, the furthest a club has been provided consent by the EFL to relocate its stadium was in the case of Bolton. The proposed new stadium was approximately 7 miles from the old ground site and 5 to 6 miles from the city centre of Bolton. Whilst the suitability of site from the EFL perspective is more to do with the relationship and links to Oxford, a search radius of 7 miles from Oxford City Centre was deemed appropriate in the context of the above as the starting point for the search.

Approach to Assessment

- A phased approach to assessing alternative sites was undertaken. An initial assessment was undertaken by Savills which provided an initial review of sites within the 7-mile radius. This assessed a total of 64 sites (42 non-allocated and 22 allocated sites) and considered the site area, landowner intention, accessibility, viability and any key constraints. An initial planning appraisal was then undertaken of these sites which reviewed the planning policy context and planning history of each site. Where specific constraints were identified, further assessment work was undertaken by specialist consultants in respect of these issues, namely landscape and visual impact, heritage impact and flood risk. In combination with the initial planning appraisal, this work assessed the environmental effects of each of the alternative site options.
- 5.9 Finally, the assessment work was pulled together with a conclusion made in respect of each of the questions set out above. An overall conclusion as to the suitability and availability of each site was also made, which also included a comparison to the Site.

Summary of Assessment

5.10 Based on the methodology adopted, the ASA demonstrates that there are no other feasible, practical and realistic alternatives to accommodate the Proposed Development within the area of search identified through discussions with the EFL. The only viable option which may be available to acquire

and is capable of delivering a well-connected, sustainable stadium within the necessary timeframe for OUFC is the Site.

Alternative Site Layout/Design

- 5.11 The design of development has evolved throughout the pre-application process. Environmental considerations have influenced the final design, and mitigation measures have been embedded into the design to reduce significant effects where possible. A number of key constraints were identified at the beginning of the design process:
 - Green Belt designation;
 - Area at risk of surface water flooding in the northern part of the Site;
 - Gas Main and Overhead Power Cable in the northern part of the Site;
 - The woodland to the south of the site, which is Priority Habitat, and vegetated boundaries; and
 - The Site's relationship with the adjacent site allocations and transport infrastructure.
- 5.12 Following the constraints analysis, an initial masterplan was produced. An iterative process has taken place which has been informed by both the Applicant's aspirations for the Site, as well as continuous engagement from the technical team in respect of environmental considerations, with the aim of avoiding and minimising adverse significant effects through design. Key design decisions were made in relation to the following:
 - Stadium location, orientation and design
 - Access and movement
 - Relationship to surrounding allocations
 - Landscape design
 - Ecological requirements
 - Drainage requirements
- 5.13 The Design and Access Statement accompanying the planning application provides further detail on the design process of the scheme.

The 'Do Nothing' Scenario

5.14 The 'Do Nothing' scenario would result in the Site remaining in its present condition. In this scenario, the baseline conditions identified within this ES would remain largely as described, and the effects identified during the construction and operational phases of development would not arise. The opportunity to take advantage of the sustainable location would not be realised and the benefits of the Proposed Development, for OUFC, the economy and the community, would not occur.

6. PLANNING POLICY CONTEXT

- 6.1 The site sits within the constituency of Cherwell District Council, and its relevant development plan comprises:
 - Cherwell Local Plan 2011-2031 Part 1;
 - Cherwell Local Plan 2011-2031 (Part 1) Partial Review Oxford's Unmet Housing Need;
 and
 - 'Saved' policies of the Adopted Cherwell Local Plan 1996;
- 6.2 In addition, material considerations such as the National Planning Policy Framework and National Planning Practice Guidance have been considered.
- 6.3 The Council is currently reviewing the above documents and is preparing the Cherwell Local Plan 2040. The Local Plan preparation is still at an early stage; the latest consultation, on the Regulation 18 Local Plan Consultation Draft, took place at the end of 2023.
- Other technical guidance relevant to each topic matter has been outlined in each of the technical chapters within the ES.
- 6.5 The Planning Statement, which accompanies the planning application submission, includes an assessment of each of the policies and the overall planning balance.

7. LANDSCAPE AND VISUAL

- 7.1 The Landscape and Visual Impact Chapter of the ES addresses the potential effects of the Proposed Development upon the landscape and visual resource.
- 7.2 The landscape between Kidlington and Oxford and within the study area is predominantly agricultural. The central part of the study area and immediate surroundings of the settlement have been influenced by human and development pressures and have experienced significant change over time, with the settlement boundary still evolving with the allocated development sites in the adopted Local Plan. Movement corridors including the A34, A4260 Frieze Way, Bicester Road, Oxford Road and railway line cut through the landscape, often defining the settlement edge or cutting through the landscape and detract from the sense of tranquillity in proximity to the settlement. These major transport corridors are flanked by substantial tree belts, which compartmentalise the landscape. Field boundaries remain intact and well defined, with a medium large scale, irregular pattern. To the west of Kidlington, the Oxford Canal is an attractive feature within the landscape with open views across agricultural fields and a link to Stratfield Brake, which includes areas of woodland, scrub and a formal sports ground. The central part of the study area in close proximity to the settlement edges and major transport and utility corridors has a limited sense of tranquillity and human influence is clearly visible. The wider study area to the east becomes more open, and rural, set around the flood plains of the River Cherwell, which creates an attractive, rural landscape of high scenic quality. An extensive Public Right of Way network provides good informal recreation access to the study area. A number of listed buildings and Conservation Areas provide a sense of time depth.
- The Site is representative of the character of the Landscape Character Area within which it sits. Its topographical profile and wooded character are in keeping with the surrounding landscape which limit its perceptual relationship with the wider area. The Site is broadly triangular in shape and bound by the A4260 Frieze Way to the west and Oxford Road to the east. The southern boundary of the Site is defined by an existing woodland that is part designated as a Natural Environment and Rural Communities Act S41 habitat. Overhead transmission lines run through the northern part of the Site and are a detracting feature within the Site and wider landscape, alongside the large-scale electricity pylons to the south of the Site, flood lighting columns within Stratfield Brake Sports Ground and the street lighting associated with Oxford Road and Frieze Way. The Site boundary continues to the south west and south east of the central field along the Frieze Way and Oxford Road corridors, encompassing the embankment and ramped access to Oxford Parkway Station. Two Oak trees on the eastern boundary and five Poplars on the northern boundary are all the subject of Tree Preservation Orders.
- 7.4 Views of the Site are experienced by receptors in the immediate local environment, where there are open views of the Site boundary vegetation, which generally truncate or filter views of the internal

arrangements of the field within the Site. The Site is generally viewed in the context of the existing vegetation and nearby built form. Beyond this, due to the combination of topography and vegetation, the Site is not readily discernible or apparent. Within the wider landscape, views of the Site are obscured due to the intervening woodland, trees and topography.

- 7.5 Landscape and visual assessments are separate, although linked, procedures. For example, often the assemblage of landscape elements contributes to informing the Zone of Theoretical Visibility and the degree of visibility from the range of visual receptors.
- 7.6 The baseline assessment describes:
 - Each of the landscape elements which then collectively inform landscape character for the site and its context.
 - The character, amenity and degree of openness of the view from a range of visual receptors (either transient, serial or static views).
 - The current and future baseline scenarios; and
 - The value of each of the landscape and visual receptors.
- 7.7 Landscape effects derive from either direct or in-direct changes to the physical landscape which may give rise to changes to the individual landscape components. This in turn effects the landscape character and potentially changes how the landscape is experienced and valued.
- 7.8 Visual effects relate to the changes that arise in the composition, character and amenity of the view as a result of changes to the landscape elements.
- 7.9 The assessment of effects therefore systematically:
 - Combines the value of the receptor with the susceptibility to the proposed change to determine the sensitivity of the receptor.
 - Combines the size, scale, geographic extent, duration of the proposals and its reversibility in order to understand the magnitude of the proposal.
 - Combines the sensitivity of the each of the receptors and the magnitude of effect to determine the significance of the effect.
 - Presents the landscape and visual effects in a factual logical, well-reasoned and objective fashion.
 - Indicates the measures proposed over and above those designed into the scheme to prevent/avoid, reduce, offset, remedy, compensate for the effects (mitigation measures) or which provide an overall landscape and visual enhancement.
 - Sets out any assumptions considered throughout the assessment of effects; and
 - Sets out residual effects.

- 7.10 Effects may be positive (beneficial) or negative (adverse) direct or indirect, residual, permanent or temporary short, medium or long term. They can also arise at different scales (national, regional, local or site level) and have different levels of significance (Major, Moderate, Minor, Negligible or neutral / no change). Residual effects are those at year 15 considering any additional mitigation measures in place over and above those designed into the scheme. The combination of the above factors influences the professional judgement and opinion on the significance of the landscape and visual effects.
- 7.11 This states that effects judged as Minor Adverse or Negligible are not considered to be significant in EIA terms.
- 7.12 The inherent design mitigation that has informed the site layout includes locating the stadium building as far south within the Site as possible, without impacting on the existing woodland block in the south of the Site. This protects this key landscape feature that is designated as a priority habitat, whilst retaining an open green space in the north of the Site to maintain an open green space between the Proposed Development and the southern edge of Kidlington.
- 7.13 The detailed assessment of landscape and visual effects arising from the proposed development are set out in a series of impact tables in Volume 3 Appendix 7.2. These set out the effects on:
 - Contextual landscape receptors (i.e. effects on landscape receptors beyond the Site boundary, for example, direct and indirect effects on landscape character);
 - Site landscape receptors (i.e. effects on landscape receptors within the Site boundary only);
 and
 - Visual receptors (effects arising from the changes to the landscape which are perceived by both static and transient receptors).
- 7.14 During the construction phase significant adverse effects are considered to occur to two contextual landscape receptors, six Site landscape receptors and five visual receptors in the immediate local environs to the Site. These effects are considered to be temporary and short term but see the start of long-term change.
- 7.15 At Year 1 of operation significant adverse effects are considered to occur to two contextual landscape receptors, five Site landscape receptors and two visual receptors in the immediate local environs to the Site. These effects are considered to be permanent and medium long term.
- 7.16 Additional mitigation measures would be implemented in relation to open spaces, trees and vegetation, materials and lighting. The likely effectiveness of the additional mitigation measures is considered to vary depending on the type of mitigation and the time frames considered. The mitigation measures implemented in relation to open space, materials and lighting are all considered to have an immediate impact on the likely landscape and visual effects experienced as a result of

the Proposed Development. In relation to trees and vegetation, the effectiveness of this additional mitigation measure is considered to improve with the passage of time, as new tree planting and vegetation grows and matures. This has a particular influence on the assessment of the residual effects from visual receptors as the potential of the proposed vegetation to screen and filter views of the Proposed Development becomes greater.

- 7.17 At Year 15 of operation, the landscape proposals are considered to have matured and the assessed effects are therefore considered to be the residual effects of the Proposed Development. Significant adverse residual effects are considered to remain to one contextual landscape receptor, five Site landscape receptors including Minor Moderate Beneficial effects to landscape features due to the scale of the landscape proposals, and two visual receptors. These effects are considered to be permanent and long term.
- 7.18 This LVIA considers that, as with the development of any green field site, there would be some significant adverse landscape and visual effects arising as a result of the Proposed Development during construction, at Year 1 and Year 15, which are considered to be the residual effects.
- 7.19 In terms of cumulative effects, significant adverse effects are considered to occur to three contextual landscape receptor, and one visual receptor. These effects are considered to be permanent and long term.

8. ECOLOGY AND NATURE CONSERVATION

- 8.1 This Chapter considers the potential for any likely significant effects on ecology and nature conservation from the Proposed Development.
- 8.2 The majority of the site comprises a Willow plantation and strips of neutral grassland, with areas of modified grassland located along road verges, which are of limited ecological value, comprising common and widespread species. A small number of more notable species and 2 orchid species have been recorded in areas, however, overall these habitats are still considered to be generally species-poor and not of significant botanical interest, with the more notable species confined to edges/small patches as opposed to being frequent/abundant throughout. The mixed scrub is of relatively low ecological value in terms of its species content, however does offer some foraging and nesting opportunities for birds and navigational opportunities for bats. The hedgerows and trees within the Site and the adjacent woodland are of greater ecological value, whereas the areas of hardstanding are of negligible value.
- 8.3 The hedgerows and trees are to be retained where possible, with losses to be offset through the extensive planting of trees and a new species-rich hedgerow with trees based around native species and those of benefit to wildlife. Losses to those habitats of lower ecological value are to be offset through the creation of species-rich wildflower grassland, new aquatic habitats in the form of a pond and attenuation features, and new native scrub planting. Other enhancements include a biodiverse green roof, a green wall and rain gardens throughout, which will represent an overall enhancement, and a net gain in biodiversity, over the existing situation.
- 8.4 Potential impacts from the Proposed Development on Oxford Meadows SAC and it's constituent SSSIs (Pixey and Yarnton Meads SSSI, Wolvercote Meadows SSSI and Port Meadow with Wolvercote Common & Green SSSI) are considered within this Chapter. Specifically with regard to hydrology, air quality and recreation.
- 8.5 The drainage design for the proposals will ensure existing greenfield runoff flow rates will be maintained from the Site. Implementation of best practice methods and effective engineering solutions will be employed to ensure that contaminated run-off is prevented from entering ditches and new on-site aquatic habitats during both the construction and operational phases.
- A worst-case scenario was applied by the Air Quality consultants which found that no significant effects on air quality will occur on any statutory designated sites as a result of the proposals during construction or operation. Additionally, no significant effects would occur on any non-statutory designations due to traffic emissions during the construction phase. The worst-case scenario found that potentially significant effects may occur on Stratfield Brake LWS due to traffic emissions during the operational phase. However, the woodland is currently exceeding thresholds for nitrogen

deposition and there is no apparent detriment to woodland function/ground flora composition and the small increase predicted (in the worst-case and with the potential for improvement from the predicted worst-case due to technological advancement) is not deemed to be significant for the LWS in that context and given the extent of the wider LWS that would not be affected at all (i.e. not exceed thresholds).

- 8.7 It is deemed unlikely that visitors to the football stadium would frequent Oxford Meadows SAC and it's constituent SSSIs, based nearly 2km southwest from the Site. Hotel users may utilise local green spaces for recreational use, however based on the distance between the Site and the SAC and the number of alternative recreational resources that are closer to the Site, it is not considered that there would be any likely significant recreational effects on any statutory designated sites as a result of the proposals.
- 8.8 The off-site woodland is listed as a Priority Deciduous Woodland which also forms part of the Stratfield Brake Cherwell District Wildlife Site (DWS). The offsite woodland will be retained, safeguarded during construction and will be buffered by a green corridor separating the development from the woodland during the operational phase.
- 8.9 Potential impacts to the Stratfield Brake DWS, located adjacent to Frieze Way road, are also considered. Standard mitigation techniques and engineering practice in respect of dust and pollution control would be implemented to negate any potential effects from dust emissions or runoff into the nearby DWS.
- 8.10 A number of additional statutory and non-statutory sites are present within the wider local area, although no significant impacts are anticipated.
- 8.11 In light of the above, it is not considered that any potential impacts would arise as a result of the Proposed Development that would adversely impact any European, statutory, or non-statutory designated sites.
- 8.12 A number of bat potential trees have been recorded within and adjacent to the Site. Any bat potential trees that are proposed to be lost will be subject to tree-climbing and/or emergence/re-entry surveys and a Natural England European Protected Species licence may be required prior to any felling works commence, with appropriate mitigation provided.
- 8.13 A precautionary approach with regard to Great Crested Newts is recommended during the construction of the Oxford Parkway stairway.
- 8.14 The hedgerows, scrub and adjacent woodland are considered to offer suitable nesting opportunities for birds. Safeguards with regard to nesting birds are proposed during any clearance of suitable vegetation.

- 8.15 The provision of new wildflower grassland will provide enhanced foraging opportunities for Badgers, bats, birds as well as terrestrial habitat for invertebrates. New native tree and hedgerow planting will provide enhanced foraging and navigational opportunities for bats, foraging and nesting opportunities for birds and foraging opportunities for Badgers, as well as enhanced habitat for invertebrates. The provision of new ponds, attenuation features and rain gardens will also provide new and enhanced aquatic / wetland habitat on site for amphibians, reptiles and invertebrates over the existing scenario, as well as enhanced foraging opportunities for bats and foraging/nesting opportunities for birds. The provision of a biodiverse green roof and green wall will also provide opportunities for more mobile species such as bats, birds and invertebrates.
- 8.16 The provision of new bat boxes as part of the proposals will create new roosting opportunities for bats within the Site, while the provision of bird boxes will create enhanced nesting opportunities for birds within the Site. The provision of log piles/hibernacula will provide hibernation opportunities for amphibians and reptiles and create new habitat for saproxylic invertebrates post-development. The retention and creation of hedgerows and scrub with the inclusion of Blackthorn will maintain opportunities for the Brown Hairstreak butterfly.
- 8.17 In summary, the Proposed Development will safeguard retained habitats of greater ecological value and protect species present within and adjacent to the Site during construction. It is considered that the proposals will provide enhanced habitats and opportunities for protected species over the existing situation and will represent a significant net gain in biodiversity.

9. CULTURAL HERITAGE AND ARCHAEOLOGY

- 9.1 The Cultural Heritage and Archaeology Chapter of the ES addresses the potential effects of the Proposed Development on the historic environment, comprising cultural heritage and archaeology. The Chapter identifies the location, type and value of cultural heritage assets and their setting and reports on the predicted impacts of the Proposed Development on this resource and the likely significance of effect. No significant effects have been identified.
- 9.2 There is the potential for archaeological features located within the Site to be disturbed or removed during construction groundworks. Potential archaeological assets could be impacted during the Construction Phase, which would result in a permanent physical impact to the archaeological resource. However, suitable mitigation measures have been proposed to ensure the archaeological value of such remains is realised and preserved by record, by a programme of archaeological investigation prior to development.
- 9.3 A number of heritage assets have been identified within the Study Area that could be sensitive to changes to their setting as a result of the Proposed Development, including Listed Buildings and the Oxford Canal Conservation Area. However, the settings assessment undertaken as part of this Chapter has established that the value of these assets will not be impacted by the Proposed Development either physically or by changes within their setting. Therefore, no adverse effects have been identified as a result of changes to the setting of these heritage assets as a result of the Proposed Development.
- 9.4 The potential cumulative effects of the Proposed Development have been considered in relation to nearby approved or proposed schemes. No cumulative effects have been identified, either through changes to the setting of designated heritage assets or through disturbance of potential archaeological remains.

10. TRANSPORT AND ACCESS

- 10.1 This Chapter of the ES assesses the effects of the proposed development in respect of traffic and transport.
- The proposed methodology has been determined from best practice and guidance consisting of 'Environmental Assessment of Traffic and Movement' produced by the Institute of Environmental Management and Assessment (IEMA) in July 2023 ('the IEMA Guidance').
- Traffic survey data and subsequent assessment provided in the Transport Assessment form the basis for determining the environmental impact of the Proposed Development. The assessment of operational driver delay has been informed with interim junction capacity assessments, but will be updated within an Addendum to the Transport Assessment and ES Chapter when the North Oxford VISSIM modelling is completed, as outlined in the Transport Assessment paragraph 10.1.3.
- 10.4 A net impact exercise was undertaken to identify the areas of the network which may be significantly affected following construction and operation of the site. In addition, sensitivity of each link was assessed. The assessment identified sixteen links for assessment:
 - A4260 Oxford Road (North section)
 - Bicester Road (North section)
 - Frieze Way (North section)
 - A4165 Oxford Road (South section)
 - A4165 Banbury Road (North section)
 - A40 Elsfield Way
 - A4165 Banbury Road (South section)
 - A40 North Way
 - A44 Woodstock Road (Central section)
 - A44 Woodstock Road (South section)
 - A40 Northern Bypass Road
 - A44 Woodstock Road (North section)
 - A44 (Central section)
 - A34 (South section)
 - A34 (North section)
 - Godstow Road
- In terms of the assessment, baseline Annual Average Daily Traffic (AADT) traffic flows are presented as 2026 without Development scenario. Match Day/Non-Match Day and peak period traffic flows are presented in the Transport Assessment. This has informed the forecasts for 2026 AADT With Development and daily match day traffic as presented.

10.6 The assessment considers the following scenarios:

Table 10.1: Scenarios

Title	Description
Construction Phase	
Scenario 1	2025 Without Development
Scenario 2	2025 With Construction Traffic
Operational Phase	
Scenario 3	2026 Without Development
Scenario 4	2026 With Development

- 10.7 The Construction Phase looks at 2025 as this is the peak year for construction traffic. The development will be operational from 2026.
- The embedded mitigation for the construction phase of the development is the implementation of a Construction Traffic Management Plan (CTMP) during the construction phase of the development. The CTMP will set out agreed routes to and from the Site for construction vehicles, together with details of any relevant mitigation measures, designed to minimise any effects associated with the construction works.
- 10.9 The following measures (i.e. embedded mitigation) are proposed as part of the sustainable transport strategy for the operational development:
 - Access design, improved pedestrian and cycle paths, and pedestrian crossings on Oxford Road and Freize Way.
 - Provision of 150 Sheffield stands onsite with access to further spaces at Oxford Parkway, including electric bike charging.
 - A new stepped access to Oxford Parkway from Oxford Road.
 - Match Day and Non Match Day Interim Travel Plans have been prepared which outline a
 package of measures for implementation on match day and non match days with the aim to
 reduce the number of single occupancy car trips generated by the Site and promoting
 sustainable travel modes.
 - Shuttle bus services to/from the Park and Ride sites around Oxford on match days (aligned to demand/ticket sales).
 - New bus stops on Oxford Road for the existing bus services passing the stadium.
 - Increased frequency and longer operating hours of public bus services to the Stadium on match days if demand/ticket sales require.
 - A Traffic Management Plan (TMP) has been prepared (within the Transport Assessment) to support this application to manage match day crowds and traffic flows safely and effectively to minimise effects on the wider transport network. The following traffic management measures are being proposed:

- Traffic management on Oxford Road for at least 30 minutes before and after a match.
 Key bus services and coaches marshalled through Oxford Road during periods of lighter pedestrian flows. This will improve pedestrian safety and access.
- Controlled Match Day Parking Zones up to 2km from the Stadium in Kidlington and North Oxford to prevent supporters travelling to stadium by car and parking on nearby residential streets. This aligns with the proposed controlled parking zones being progressed as part of the planning applications for nearby allocated sites.
- Variable Message Signage for diverting drivers when a match day traffic management is in place and to inform availability of Park and Ride car parks and direct supporters to Park and Ride sites.
- 10.10 Following the implementation of mitigation, the effects of the construction of the development is expected to be Not Significant in terms of severance; driver delay; pedestrian delay; pedestrian amenity; fear and intimidation; accidents and safety; and hazardous loads.
- 10.11 Following the implementation of mitigation, the effects of the operation of the development is expected to be Not Significant in terms of severance; pedestrian delay; pedestrian amenity; fear and intimidation; accidents and safety; and hazardous loads.
- 10.12 The driver delay⁴ associated with Cuttleslowe Roundabout (A40 North Way, A40 Northern Bypass Road and Godstow Road, Banbury Road N and S and Elsfield Way) will see a temporary Minor/Moderate Effect and significant impact. This is expected to be up to 30 minutes on match days when the Oxford Road traffic management is required.
- 10.13 The Proposed Development will bring about improved non-motorised user amenity and improved pedestrian non-motorised user delay on Oxford Road (S) and Frieze Way with the embedded mitigation of improved pedestrian and cycle paths, and new pedestrian crossings on Oxford Road and Freize Way. There is therefore have a Moderate Beneficial Effect on Oxford Road (S) and Frieze Way, which is significant.

33

⁴ The results are based upon interim assessments, as explained in paragraph 10.3.

11. NOISE AND VIBRATION

- 11.1 This Chapter of the ES provides a noise and vibration assessment which assesses the potential impacts associated with the construction and operation of the Proposed Development. The assessment has been undertaken with reference to relevant national, regional and local policy and guidance with respect to noise and vibration.
- 11.2 A baseline noise survey was undertaken from 30th September to 4th October 2023. The survey comprised both unattended, continuous long-term measurement and attended, short-term measurements.
- 11.3 A qualitative assessment has been undertaken to determine the potential impacts of noise and vibration associated with construction activities. The assessment provides recommendations for minimising impacts and concludes that effects on the closest noise sensitive receptors would be Negligible and not significant.
- 11.4 An assessment of construction traffic noise has been undertaken based on traffic flow data provided by Ridge Transport Consultants. The effect of construction traffic noise on the closest noise sensitive receptors was considered to be Negligible and therefore not significant.
- 11.5 Noise criteria has been set for fixed mechanical plant associated with the operation of the Proposed Development, with the expectation that no significant noise effects will result from these sources, assuming these criteria are met through careful design and established mitigation measures. An assessment of vehicle noise in car parks has also been conducted, with the impact of car park noise not considered to be significant.
- An assessment of road traffic noise during matchdays has been conducted based on traffic flow data provided by Ridge Transport Consultants and based on predicted changes in the Basic Noise Level on the key road links close to the Proposed Development. The assessment determines that the effect of matchday traffic noise is Negligible and therefore not significant.
- 11.7 An assessment of matchday noise, including the noise generated by patrons of the stadium and the public address system within the stadium, which is expected approximately twice monthly during the season, has been conducted. The assessment determines that this impact would be Negligible and therefore not significant.

12. AIR QUALITY

- 12.1 This Chapter presents the findings of an air quality assessment for the following key impacts associated with the construction and operation of the Proposed Development:
 - the impacts of dust soiling and effects on concentrations of course particulate matter (PM₁₀) during the construction period, and
 - the impacts of emissions from road traffic generated by the Proposed Development on concentrations of nitrogen dioxide (NO₂), PM₁₀ and fine particulate matter (PM_{2.5}) at sensitive receptors along the local road network during both construction and operation.
- 12.2 The assessment also considers whether any additional mitigation measures will be required to address any significant air quality effects.
- The qualitative assessment of construction dust effects undertaken for the Proposed Development, using the most up to date dust guidance, found that there is likely to be a 'minor' risk of dust creating nuisance and/or loss of amenity and 'minor' risk of particulate matter (PM₁₀) leading to adverse health effects (without mitigation). Despite the predicted 'minor' risk identified, appropriate mitigation specific to the Proposed Development have been presented. Following the appropriate implementation of the mitigation measures, effects are predicted to be Negligible and not significant.
- Modelling has been carried out on the Proposed Development to predict air quality effects, both during the construction phase and the operational phase. This has been undertaken in accordance with the most up to date guidance. NO₂, PM₁₀ and PM_{2.5} concentrations at predicted sensitive receptor locations in the worst year of construction of the Proposed Development are predicted to be below the relevant air quality objectives. NO₂, PM₁₀ and PM_{2.5} concentrations at sensitive receptor locations in the first year of opening of the Proposed Development are predicted to be below the relevant air quality objectives. Air quality effects associated with the Proposed Development are considered to be Negligible and therefore not significant.

13. LIGHTING

- 13.1 This Chapter presents the finding of a lighting assessment which has been carried out to assess the potential effects that lighting from the Proposed Development is likely to have on the identified receptors within the surrounding area.
- 13.2 Lighting receptors have been identified though a desktop assessment and in liaison with other specialist disciplines. These are:
 - Landscape and Visual;
 - Ecology and Nature Conservation; and
 - Cultural Heritage and Archaeology.
- 13.3 The environmental zone applicable to the Proposed Development and the surrounding area has also been assessed. This was achieved using both a desktop and baseline survey, and it concluded with the Proposed Development and Receptors being classified as E2 environmental zone (rural surroundings).
- A qualitative assessment has been carried out, as the lighting designs are not developed to the point to allow obtrusive light calculations to be conducted. This assessment is based on the latest available design information, including the external lighting design and the design of the stadium field of play. Limits are set on the levels of obtrusive light that are acceptable for each identified receptor, with mitigation being embedded into the design to ensure these limits are maintained.
- 13.5 The sensitivity of each identified receptor to changes in artificial lighting has been assessed based on the type of receptor and the existing baseline lighting conditions present at the receptor location. Based on the proposed light levels, the tasks and areas within the Proposed Development requiring lighting, the visibility of the Proposed Development from each receptor location, the embedded mitigation, and the distance of the identified receptors from the Proposed Development, the magnitude of effect experienced by each identified receptor has been assessed. Using both the sensitivity of a receptor and the magnitude of effect, the significance of effect has been assessed prior to the application of any additional mitigation.
- 13.6 Before additional mitigation is applied there are effects of obtrusive light from the Proposed Development. These are assessed as Minor adverse, and therefore not significant. All reasonable and practical mitigation is embedded into the lighting design. Therefore, no additional mitigation is proposed.
- 13.7 The Proposed Development has been assessed for its cumulative effects alongside other planned development in the surrounding area. The majority of cumulative effects of the identified receptors

are considered Negligible, with some planned developments being assessed as having Minor adverse effects alongside the Proposed Development on sky quality (sky glow).

13.8 When assessed as a whole, if all planned developments are constructed there will be a change in the environmental zone of the area (with or without the Proposed Development), which would result in the area surrounding the Site being more characteristically similar to an E3 environmental zone (suburban surroundings). This would be a significant effect.

37

14. FLOOD RISK AND DRAINAGE

- 14.1 This Chapter presents the findings of an assessment of potential flood risk and drainage impacts from the Proposed Development, and considers the environmental effects of flood risk to the Site and other nearby flooding receptors.
- 14.2 A Flood Risk Assessment (FRA) forms part of the appended documents for the ES. The FRA provides technical analysis of the potential impacts of the Proposed Development on flood risk.
- 14.3 The assessment considers the different types of flood risk sources according to legislative requirements and industry standard guidance. Fluvial flood risk was shown to be negligible due to the elevation of the Site above any main rivers in the study area and the absence of any flow paths towards the Proposed Development.
- 14.4 The predominant source of baseline flood risk to the Site is from storm rainfall/surface runoff. This is shown by Environment Agency flood risk mapping identifying the potential for storm water to collect in the central western area of the Site under baseline conditions. Baseline flood risk from groundwater, drainage, reservoir and canal sources have been shown to be low or negligible in significance.
- 14.5 Surface water runoff for the permanent works for the Proposed Development will be reduced by the inclusion of embedded mitigation measures in the design, including a Sustainable Urban Drainage System (SuDS) with attenuation ponds that are able to store storm water and provide a controlled release into a watercourse. These measures will reduce the runoff from the Proposed Development to greenfield runoff rates for storm events up to the 1% Annual Exceedance Probability plus climate change event, thereby providing negligible flood risk to the Proposed Development from storm rainfall. The restricted flow from the SuDS will also result in a negligible effect on flood risk downstream of the A4260 culvert.
- 14.6 The existing culverted drainage route under the A4260 on the western side of the Site was observed as being partially blocked during site visits in 2023. This culvert and the downstream ditch/channel are to be unblocked and kept free of blockage materials by the respective landowners prior to and during the construction works. The culvert and the downstream ditch/channel are to be regularly maintained by the respective landowners throughout the operational period of the Proposed Development to provide unrestricted drainage from the site for the water released from the SuDS.
- 14.7 Flood risk effects during the construction phase on the A4260 road, the construction site, Stratfield Brake woodland and temporary construction areas are assessed as Minor, which are not significant, providing mitigation measures are followed through the application of a comprehensive Construction Environmental Management Plan. The flood risk effects on the impact zone of Pixey and Yarnton

Meads SSSI and the wildlife area adjacent to the Oxford Canal for the construction phase are Negligible and not significant.

- During the operational phase, flood risk effects from storm rainfall and the risk of blockage of the A4260 culvert and the downstream ditch/channel are assessed as Minor, which are not significant, providing best practice measures are applied. Other potential flood risk effects including surface water flooding to the Proposed Development and flood risk to other receptors associated with runoff from the site are assessed as Negligible, due to the inclusion of embedded mitigation in the design.
- 14.9 Cumulative effects for combined impacts from the Proposed Development and other development sites have been assessed and are determined to be Negligible for flood risk and are not significant.
- 14.10 Following mitigation, the Proposed Development is shown to not have any significant effects on flood risk. The Proposed Development is shown to have an overall neutral residual effect on flood risk and drainage which is not significant.

39

15. SOCIO-ECONOMICS

- 15.1 The effects of the proposed development are considered across a range of relevant spatial areas including the Local Impact Area (LIA), District (Cherwell) and Sub-region (Oxfordshire). The LIA is defined as the wards of Kidlington West and Kidlington East.
- The LIA is characterised by a comparatively high proportion of residents aged 65 and over, a relatively high economic activity rate (62%), as well as a relatively low unemployment rate (2.1%). Travel To Work (TTW) data indicates a net outflow of people leaving Cherwell for work, however, total employment in the LIA has risen in recent years and accounts for a relatively high proportion of district wide jobs (13%). Recent data showed that, within the LIA, the largest sectors included wholesale and retail trade, repair of motor vehicles and motorcycles, administrative and support service activities and manufacturing.
- In terms of deprivation, Cherwell as a whole ranked in the top 30% least deprived areas in the country; however, there are pockets of localised deprivation with some areas within the district ranking among the 20% most deprived areas in the country. In terms of open space provision, Kidlington's network of provision exceeds locally set greenspace requirements, however the more urban areas of the District either just meet or are marginally below these standards.
- 15.4 Following the establishment of baseline conditions, impact assessments on both the construction and completed and operational stages of the Proposed Development were undertaken, as well as a cumulative effects assessment.
- During the works, the proposed development would provide economic benefits to the sub-region, supporting 210 construction jobs per year over a two-year construction period. Beneficial effects would be enhanced through the Applicant targeting and engaging with local employment initiatives.
- Once completed and operational, the proposed development would support 285 net direct Full Time Equivalent (FTE) jobs and £12.6m in GVA in Cherwell annually. In addition, the scheme will support a number of off-site jobs and GVA through indirect and induced effects across the sub-region (Oxfordshire) amounting to 142 FTE off-site jobs and £13m in GVA including new and retained jobs and GVA. A high proportion of the net direct jobs will likely be taken up by Cherwell residents (60%) and Oxfordshire residents (75%). In addition, the proposed development is expected to support off-site visitor spending in the region of £5.8m, which in turn will support around 95 FTEs around 70% of which is expected to be captured in Oxfordshire. The proposed development is also expected to have a beneficial effect on Cherwell District Council's income derived from an estimate contribution of £280,000 in business rates per annum.

- 15.7 The proposed development will lead to an increase in publicly accessible open space of over 12,000 sq m (1.2 ha) and improvements in deprivation levels across multiple domains including the employment and income, environment and living domains.
- Together with the cumulative schemes, there will be significant beneficial cumulative effects in terms of job creation, local economic performance (GVA), fiscal contributions (business rates) and open space provision.

41

16. CLIMATE CHANGE

16.1 This assessment is divided into two parts, the first part includes the assessment of Greenhouse Gas emissions from the Proposed Development and the second part considers how resilient the Proposed Development is to the effects of climate change.

GHG emissions

- The Greenhouse Gas (GHG) emissions assessment considers the global atmosphere as the sensitive receptor. GHG emissions from the construction and operation of the Proposed Development contribute to an increase in atmospheric GHG emissions, contributing to the global climate change effect. The assessment quantifies the likely emissions of GHGs (typically measured in carbon dioxide equivalent (CO₂e)) during construction and operation of the Proposed Development and the associated effects, and mitigation measures to minimise the impacts.
- 16.3 The baseline considers existing emissions related to the Site, which is currently undeveloped. Since there are no baseline emissions associated with the Site, any development on the Site will result in additional emissions.
- 16.4 The GHG assessment undertaken based on Life Cycle Assessments (LCA), considers the following stages:
 - Embodied carbon emissions that include the material manufacturing, construction, use of Proposed Development and the end-of-life stage.
 - Operational carbon emissions that include the emissions from energy use and match day travel.
- 16.5 The embodied carbon associated with the Proposed Development is estimated to be 9,670 tCO₂e.
- 16.6 Implementation of mitigation measures and usage of Low and Zero carbon technologies such as solar panels and heat pumps would reduce the impact of these emissions.
- 16.7 The assessment has demonstrated that the embodied carbon stage, which includes the construction stage, of the Proposed Development would result in Moderate adverse effect on the global atmosphere prior to mitigation. This effect will be mitigated through mitigation measures such as setting out a Construction Environmental Management Plan to minimise construction emissions and to reduce energy usage during construction. Therefore, no significant effects are anticipated following mitigation.

- The effects from matchday travel are predicted to be minor and positive as the new stadium has a target to achieve more sustainable travel modes compared to the existing stadium. The operation of the Proposed Development would result in Minor negative effect. This effect is likely to be mitigated through introducing low carbon technologies such as air source heat pumps and solar panels, resulting in no significant effects after mitigation.
- 16.9 In conclusion, the results of this assessment have indicated that the potential environmental effects resulting from GHG emissions to the global atmosphere resulting from the embodied stage to be Moderate adverse, short-term and direct prior to mitigation. The effect from operation of the Proposed Development is predicted to be Minor adverse, long-term, permanent, and direct prior to mitigation. Following mitigation however, both embodied and operational effects are anticipated not to be significant.

Climate resilience

- 16.10 The climate resilience assessment considers the risk due to future climate change on the Proposed Development's assets and operation throughout its lifetime. This includes potential impacts on users (the staff, players and public) and the way in which the design and long-term management incorporate climate resilience and adaptation measures.
- 16.11 The baseline conditions for climate resilience are obtained from the Met Office datasets on the future climate conditions that we may experience as a result of different levels of global greenhouse gas emissions. A 'worst case' scenario has been used for this assessment, equivalent to a 4°C rise in global temperatures, and has considered projected changes to temperatures and rainfall through till the 2090s. The future climate projections for the Oxford area include seasonally wetter winters and drier summers, and also an increase in frequency and intensity of extreme weather events such as heatwaves and intense rainfall. The changes from the present day get gradually greater as the century progresses.
- 16.12 The climate resilience assessment considers the physical effects of climate change on following assets and/or users:
 - Structural design, including stadium structure and the pitch.
 - Mechanical and electrical design, including the indoor heating and cooling systems.
 - Flood risk and drainage design, including landscape planting.
 - People, including stadium staff, players, fans, hotel residents and other site users.
- 16.13 The assessment presents risks for certain assets and users, the climate hazard faced (e.g. increasing temperature, increasing precipitation, extreme weather events), the resilience measures implemented as part of the Proposed Development and the significant of each risk.

- 16.14 Risks identified as having moderate significance include risks to landscape planting as a result of increasing temperatures in summer combined with reduced summer rainfall and drought, and the potential heat-related health impacts to both players and fans due to increasing temperatures in summer, in particular more frequent and hotter heatwaves.
- 16.15 Risks to the physical structure of the stadium and buildings, mechanical and electrical assets, and the health and safety of staff and hotel residents have been considered minor due to the resilience measures already included within the design of the Proposed Development, and the ability for it to adapt as the climate changes, with features such as space for additional cooling units incorporated into the design.
- In conclusion, there is potential for climate change to adversely affect the Proposed Development throughout its operation due to risks to landscaping and planting and risks of heat-related illness to site users due to projected future summer temperatures and heatwaves. It is considered that these risks can be managed and reduced by considering future climate conditions within the detailed landscaping design, and also by monitoring and managing the operation and use of the Proposed Development throughout its lifetime, including through planning for heatwaves and other extreme weather events to reduce heat-related risks to fans and players. Following this monitoring and management through the operational lifetime, it is considered that these effects can be mitigated to be Minor and therefore not significant.

17. WASTE

- 17.1 An assessment of the environmental effects of resources and waste was undertaken, considering the following key factors:
 - Use of material resources during its construction phase; and
 - Waste generated and managed for its construction and operational phase.
- 17.2 The material resources required for the operational phase have been scoped out from the EIA.
- 17.3 It is anticipated that a large quantity of materials will be required for the construction of the Proposed Development, particularly aggregate, aggregate based materials, concrete and steel-related materials. Sufficient quantities of sand and gravel, crushed rocks are available, within the Oxfordshire and South East England region, and steel, within the UK.
- 17.4 The design and mitigation measures outlined will ensure:
 - The efficient use of material resources on the site.
 - The reuse of material is made a priority.
 - Recycled or secondary material is used wherever technically appropriate and economically feasible.
- 17.5 Following the implementation of the design and mitigation measures, as outlined within the assessment, an adverse negligible effect is expected for the use of material resources. The significance of environmental effect for use of material resources in construction is considered not significant.
- During the construction process, waste is anticipated to be generated. Mitigation measures including the production of a Materials Management Plan and Site Waste Management Plan will help to manage the waste generated. Therefore, the significance of environmental effects for generation and management of waste in construction is considered not significant.
- During operation, repair and replacement of the Proposed Development and associated infrastructure will be infrequent, and maintenance will not generate significant quantities of waste. Some waste will be generated from the daily operation of the Proposed Development. It is expected that the current waste management infrastructure in Oxfordshire will be able to manage the potential waste anticipated to be generated during the operational phase. An Operational Waste Management Strategy will be prepared during a later design stage, to identify the waste streams and storage provisions required during the operation of the Proposed Development. Following the implementation of the design and mitigation measures, as outlined within the assessment, the environmental effect for waste generated for the operational phase is Negligible and, therefore, considered not significant.

18. MAJOR ACCIDENTS AND DISASTERS

- 18.1 This Chapter provides an assessment of any potentially significant adverse effects on human health and the environment deriving from the vulnerability of the Proposed Development to risks of major accidents and/or disasters.
- Adopting a proportionate approach, a shortlist of 'events' with the potential to lead to significant effects, in the absence of mitigation, was identified, namely:
 - Disease, epidemics, and pandemics;
 - Terrorism and war:
 - Flooding from rivers and the sea;
 - Surface water flooding (rainfall);
 - Flooding from reservoirs and groundwater;
 - Cyclones/hurricanes/typhoons, storms and gales;
 - Extreme temperatures (heatwaves and sub-zero temperatures);
 - Droughts;
 - Transport accidents;
 - Building fires;
 - Employee safety.
- 18.3 Given a number of proposed design and management measures, all of which are considered and reported in the assessment, and include compliance with environmental protection legislation and health and safety regulations, it is not anticipated that the Proposed Development is vulnerable to any major accidents and/or disasters which could result in significant effects on human health or the environment.
- Notwithstanding this, given concerns raised by Thames Valley Police, which were reported in the Scoping Opinion, potential impacts associated with terrorism have been given further consideration in the assessment. This draws upon the Security Threat and Risk Assessment (STRA) which has been completed to inform the design of the Proposed Development and which considers security hazards, threats and vulnerabilities based on the design information, consultation with key stakeholders and professional experience. The STRA identifies a number of 'high risk' terrorism-related scenarios, and then recommends mitigation solutions based on industry best practice and standards. As all risks are considered to be reduced to a manageable and acceptable level following the adoption of the security mitigation measures, no significant residual effects on human health and/or the environment are predicted as a consequence of terrorism.

19. CUMULATIVE EFFECTS

- 19.1 An assessment has been carried out to assess the potential for interaction of individual effects of the Proposed Development upon an identified receptor, e.g. noise, air quality and visual effects (intra-project effects) during the construction and operational phases.
- 19.2 Only beneficial or adverse residual effects identified in the technical assessments classified as being of Minor, Moderate and Major significance were considered for the potential combined effects.
- During the construction phase, adverse visual effects and adverse transport effects are identified on users of local roads, in respect of construction vehicles. Whilst adverse effects are identified in respect of non-motorised user amenity, the assessment of visual effects already takes into account the presence of construction vehicles and therefore the level of effect is considered to be no greater than identified in the individual chapters. Positive effects are identified in terms of socio-economic effects; however, these benefits generally cover a larger area. Whilst it is possible that some of the construction jobs on site would be taken by those living in close proximity of the site, it is considered unlikely that these benefits would interact with the other effects to a noticeable extent.
- 19.4 In terms of the operational phase, residents of the existing dwellings on the southern edge of Kidlington are likely to experience combined adverse effects during the operational phase where the visual effects interact with sky glow. Due to the mitigation in place, the combined visual and sky-glow effects will be infrequent and therefore will not result in a significant intra-project combined effects on nearby residential properties. In terms of users of local roads, there is the potential for effect interactions between visual effects and lighting effects. Non-match day lighting effects are in limited to building and sign luminance effects, with match-days also having sky-glow effects. The lighting of the building is already considered in the assessment of visual effects and the conclusions are no greater than set out within the technical chapters.
- 19.5 In terms of the interaction between lighting of the building and road safety, the lighting Chapter already includes mitigation measures to ensure that drivers are not distracted.
- 19.6 In respect of non-motorised users (pedestrians and cyclists), whilst there will be adverse visual effects on users of Oxford Road and Frieze Way as a result of the proposed development, the non-motorised user amenity and pedestrian delay see significant beneficial effects at Frieze Way and Oxford Road due to the improved pedestrian and cycle paths, and new pedestrian crossings on Oxford Road and Freize Way. As such, whilst it is acknowledged that there will be effects on views from these receptors, it is considered that the overall experience will be beneficial.
- 19.7 There is the potential for a number of beneficial effects on the local population in respect of socioeconomic factors. Whilst the majority of the effects cover a much broader area than the other

effects generally in close proximity to the Site, it is reasonable to conclude that these will also benefit a number of receptors in the vicinity of the Site. Nevertheless, it is noted that these effects are not directly comparable and will impact the receptor in different ways (over the longer-term). The exception to this is the provision of public open space as part of the Proposed Development which will directly effect the local population within the vicinity of the Site. However, this benefit is unlikely to interact with any of the other effects to a noticeable extent.

- 19.8 In terms of 'inter-project effects' (those effects of the Proposed Development and other committed developments), it is noted that the majority of developments assessed are allocated for development within the area and a number of these have planning permission. The area will be subject to significant change, irrespective of the Proposed Development.
- 19.9 In respect of landscape and visual effects, adverse significant effects are identified in respect of:
 - LCA F: Peartree Hill.
 - LCA D: Yarnton
 - Contextual Townscape Elements
 - Visual Receptor Stratfield Brake.
- 19.10 In respect of lighting, there would likely be a potential change to the background environmental zone in which the Site sits, which would be a significant adverse effect. However, this would take place whether the Proposed Development is constructed or not.
- 19.11 In terms of socio-economic effects, there will be beneficial cumulative effects in terms of job creation, local economic performance (GVA), fiscal contributions (business rates) and open space provision.
- 19.12 No other significant cumulative effects are anticipated.

20. SUMMARY

- 20.1 The ES includes a summary of the mitigation measures and residual significant effects identified in each of the Technical Chapters.
- 20.2 Mitigation measures have been proposed to avoid, reduce or offset significant environmental effects. Measures include those specified as part of the design process, as well as additional mitigation through the construction and operational phase as set out within the Technical Chapters.
- A thorough assessment has been undertaken of the likely significant environmental effects of the Proposed Development. There will be some adverse significant effects during the construction phase associated with the proposed works, primarily in relation to the effects on site landscape, contextual landscape, visual effects from residential properties, Stratfield Brake and users of some local roads and PRoWs. The majority of these effects will be temporary and mitigated as far as practicable through implementation and adherence to measures set out within the CEMP.
- Once the development is operational, there will be significant adverse effects on contextual landscape and site landscape by the very nature of the site being developed, although effects on vegetation cover (site landscape) will be beneficial. There will also be significant visual effects on users of the PRoW Footpath 229/4/30 to the east of the Site and users of Stratfield Brake. There will be significant beneficial effects in terms of the creation of natural and semi-natural habitats, plant and habitat for bats and invertebrates. In terms of highways, there will be significant beneficial effects in terms of pedestrian delay and non-motorised user delay on both Oxford Road and Frieze Way, although there will be significant effects on driver delay⁵ at Banbury Road N and Elsfield Way and A40 North Way on match-days, albeit this will be for a temporary period of 30 minutes. There will be significant beneficial effects in terms of labour market.
- 20.5 No residual significant effects are anticipated in respect of all other topics.

-

⁵ The results are based upon interim assessments, as explained in the Transport Chapter.

Figure 1: Cumulative Sites Plan

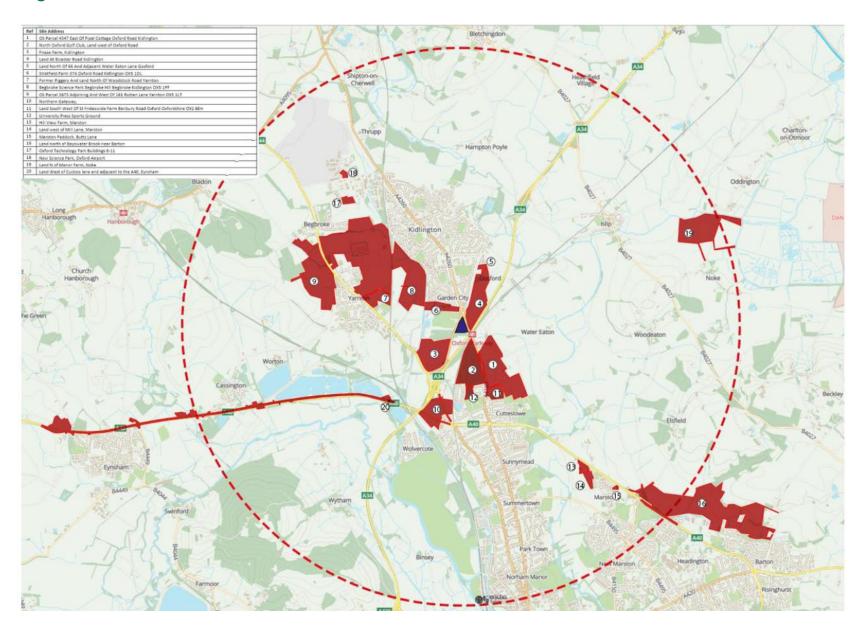


Figure 2: Site Location Plan

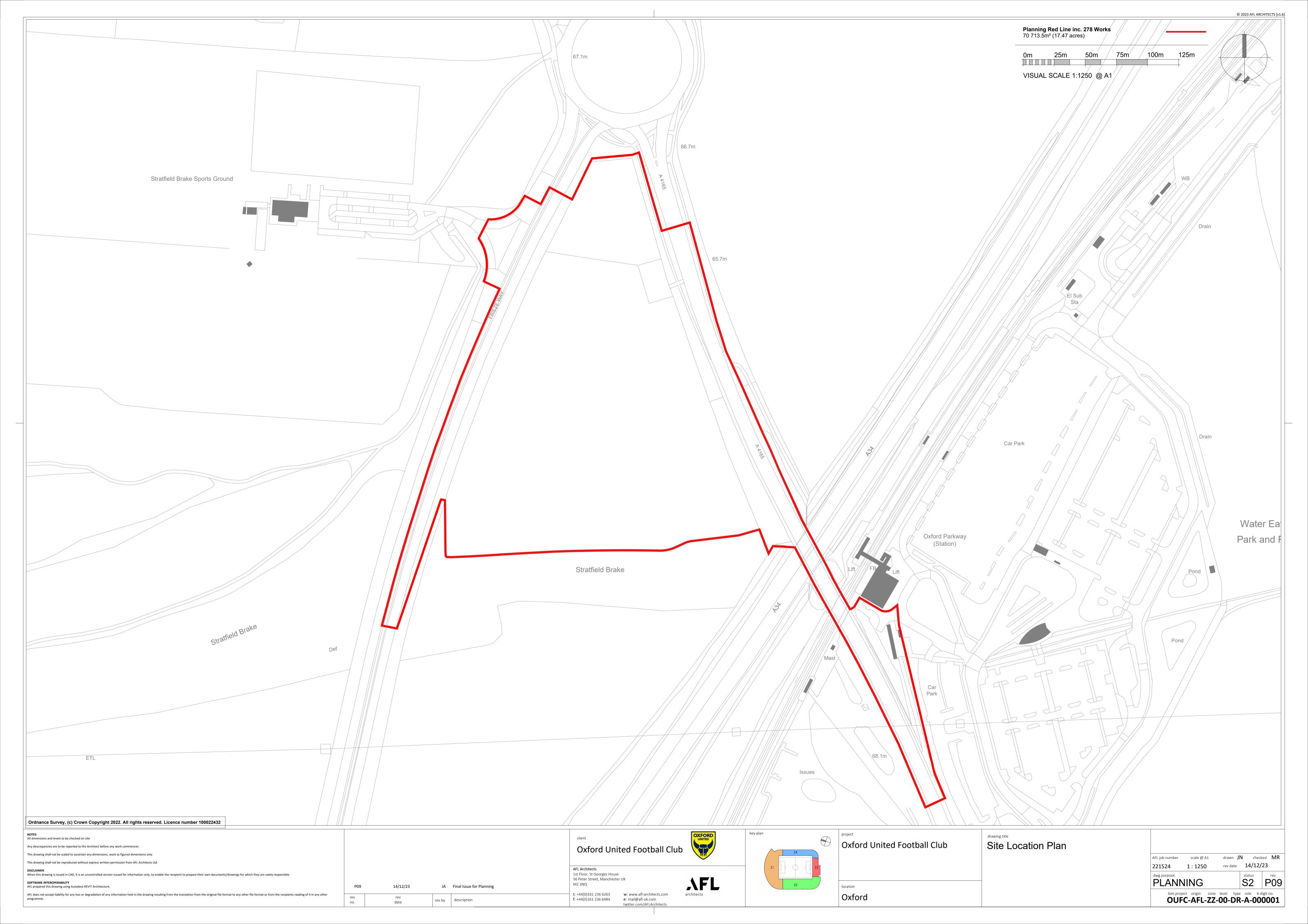
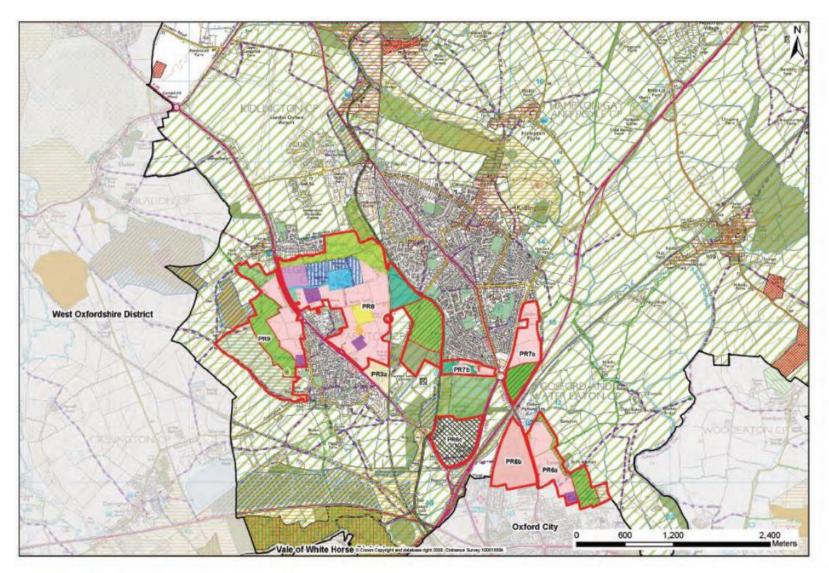
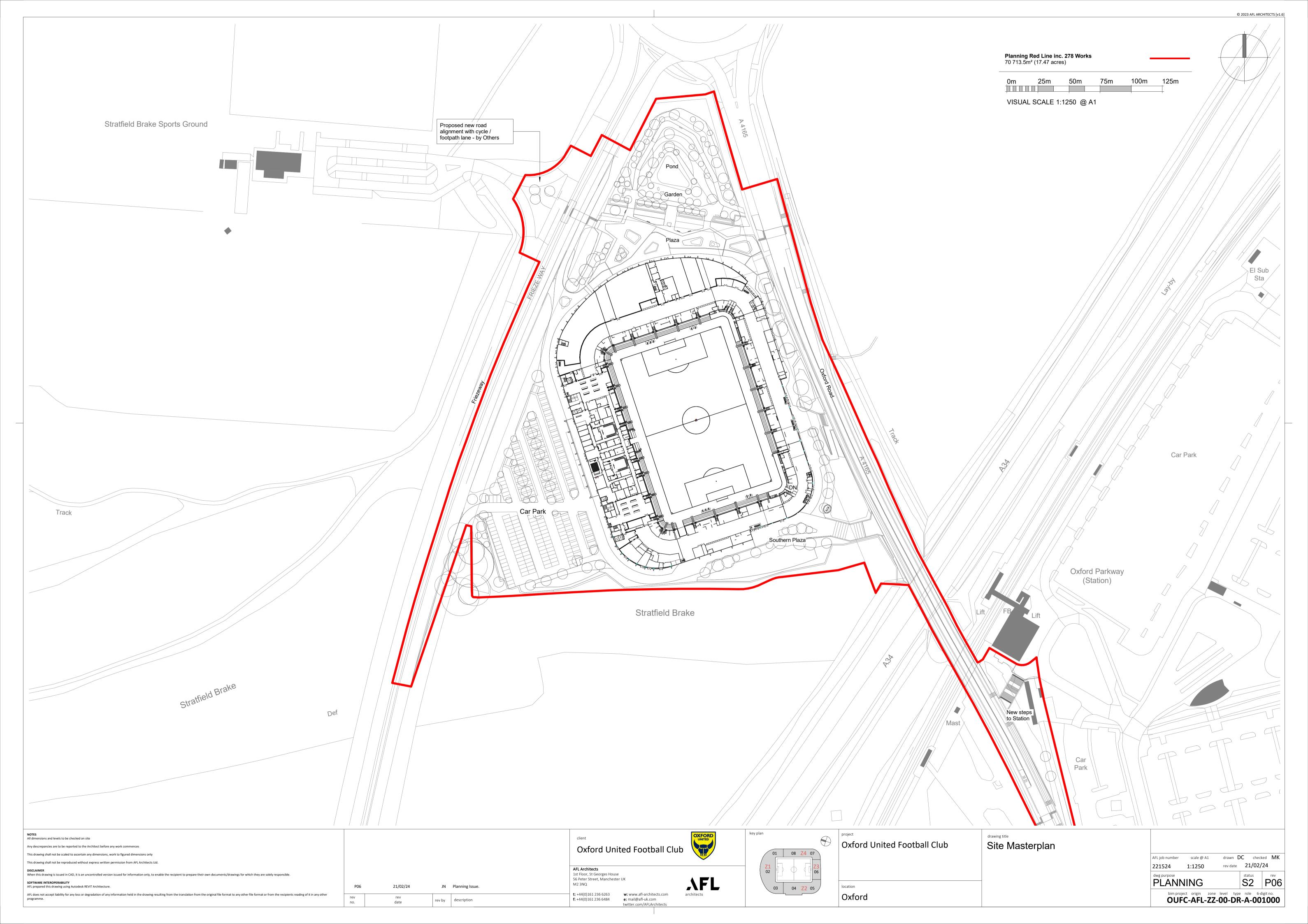


Figure 3: Site Allocations Context



Source: Cherwell Local Plan Part 1 Partial Review: Policies Map

Figure 4: Proposed Site Layout





RIDGE



www.ridge.co.uk