DERBYSHIRE COUNTY COUNCIL REGULATORY – PLANNING COMMITTEE

15 February 2021

Report of the Director - Economy, Transport and Environment

DEMOLITION OF ASHLEA FARM AND RELATED BUILDINGS OFF DEEP DALE LANE AND THE DEVELOPMENT OF A NEW ALL MOVEMENT JUNCTION ON THE A50 AND CONNECTING LINK ROAD TO INFINITY PARK WAY, WITH ASSOCIATED WORKS INCLUDING: STREET LIGHTING COLUMNS, FOOTWAYS/CYCLEWAYS, CONSTRUCTION OF EARTH MOUNDS, FLOOD COMPENSATION AREAS, ACOUSTIC FENCING AND LANDSCAPING AT LAND BETWEEN DEEP DALE LANE AND INFINITY PARK WAY, SINFIN, DERBY APPLICANT: DERBYSHIRE COUNTY COUNCIL

CODE NUMBE R: CD9/0319/110

9.1600.3

Introductory Summary This report relates to a proposal by the County Council for the construction of a new junction (Junction 3A) on the A50 trunk road and a new connecting link road between the new junction and Infinity Park Way in Derby. The proposal also involves ancillary works including the creation of two flood storage areas, the diversion of watercourses, safety improvements to Deep Dale Lane, and the demolition of buildings at Ashlea Farm.

It concerns development partly in Derbyshire which the County Council intends to carry out, therefore the application for permission that is assigned code number CD9/0319/110 has been made to this authority. Because the proposed development would occupy a site straddling the respective administrative areas of (1) Derby City and (2) South Derbyshire and Derbyshire County Council, a 'twin' application for permission has been made to Derby City Council. That application is due to be before the City Council's committee for regulatory planning matters on 11 February. Both applications have been accompanied by an Environmental Statement for the development.

The site is not located in a sensitive landscape area and there are no statutory nature conservation or cultural heritage designations within it. The site is close to, or within a number of Local Wildlife Sites and the Sinfin Moor Park Local Nature Reserve, and is also washed over by the Sinfin Moor Regionally

Important Geological Site. The site crosses a number of flood zones including flood zones 2, 3a and 3b, the latter representing the fluvial floodplain.

The Government places considerable weight on the need to support economic growth and productivity, taking into account both local business needs and wider opportunities for development. It is considered that the current proposal would bring significant economic and social benefit through the delivery of the highway infrastructure required to support the proposed Infinity Garden Village/South Derby Growth Zone initiatives and would assist in bringing forward the delivery of 2,300 new homes, 117 hectares employment land, new primary and secondary schools and green and blue infrastructure, as set out in the Derby City Local Plan and South Derbyshire Local Plan respectively.

The proposal would result in some landscape and visual impacts, as well as the loss of an agricultural unit, veteran trees and other vegetation, and a section of the Sinfin Moor Regionally Important Geological Site; it is considered that there would be conflict with some policies of the South Derbyshire Local Plan in this respect. The proposal would also result in the loss of floodplain, as well as interrupt existing flood flows and conveyance routes in conflict with the NPPF and the development plan. However, the need for the proposed development including its location in the flood plain is dictated by the allocation in the relevant local plans of a large (mainly agricultural) area of undeveloped land between the A50 and the current southerly-facing urban outskirts of the city of Derby, which includes the footprint of the proposal, for substantial development. The proposal represents highways infrastructure that would be essential for serving new developments that may be expected to occur in accordance to this substantial allocation (which are now perceived as generating a 'garden village' on the area, referred to as Infinity Garden Village). The location has been subject to the appropriate strategic flood risk assessments and sequential tests during the plan preparation and examination. It is not considered that the proposal would result in adverse impacts on highway safety or on the operation of either the strategic or local highway networks.

Mitigation measures are proposed including the formation of two flood storage areas and amendments to culverts and other watercourses which would allow for flood risk to be managed strategically. The measures have also been designed to mitigate flood risk associated with another development associated with Infinity Garden Village. A Green Infrastructure Strategy is also proposed, which would provide compensatory planting for trees/hedgerow/habitat lost, as well as creating stronger ties with the adjacent Sinfin Moor Park through the creation of significant new habitats, open green space and recreational links. It is considered that this would result in substantial biodiversity net gain.

Overall, the significant socio-economic benefits of the proposal, when set against the scale of environmental harm (which is not considered so significant as to warrant refusal of the development on those grounds), would outweigh those impacts to justify the grant of planning permission.

All proposals for new junctions on the strategic road network need approval by the Department for Transport. Its approval of this proposal has been confirmed recently, but it is conditional on some requirements being imposed by planning conditions.

The recommendation is therefore or authorisation for a permission to be granted in accordance with the application, subject to conditions provided that Derby City Council is also authorised to grant a planning permission in respect of the corresponding application it has received regarding the development.

- (1) **Purpose of Report** To enable the Committee to authorise the determination of an application for planning permission.
- (2) Information and Analysis The application for determination relates to a proposal for the development of a new junction (Junction 3A) on the A50 trunk road and a new connecting link road between the new junction and Infinity Park Way in Derby. The proposal straddles the administrative area of both Derby City and South Derbyshire/Derbyshire County Council. The proposal is therefore covered by two similar applications for planning permission. One, the application coming before this committee, is required for the development in Derbyshire (assigned code number CD9/0319/110). This application is for the County Council to determine because it is an application by the Council and the Council intends to carry out the development. The other is the corresponding, application that has been submitted to Derby City Council (assigned code no: 19/00417/FUL), which is expected to be before its committee for regulatory planning matters on 11 February.

The Site and Surroundings

The site for the proposal is generally to the south of the current urban expanse of Derby, approximately 1.01 kilometres (km) north of the village of Barrow upon Trent and 2.14km north-west of the village of Swarkestone. The overall site covers an area of 69.3 hectares (ha) with the greater portion being in Derby City.

The site stretches for approximately 2.1km between a small watercourse (Cuttle Brook) in the north to Deep Dale Lane in the south. With the exception of the A50 where the new junction is proposed, the majority of the site is agricultural land. Three watercourses, Main Drain, Cuttle Brook and Barrow Drain run through the site. Sinfin Moor Lane, which runs parallel to Main Drain, is the main means of access to Lea Farm. It is also a Regional Route 66 of the National Cycle Network (managed by Sustrans) and a public right of

way. The site is bounded by agricultural land to the south and east and by the residential areas of Sinfin and Stenson Fields to the north and west. The residential area of Chellaston is c. 1.6km to the east, and a number of dispersed farmsteads are close to the site: Lea Farm 230m to the east, Lowes Farm 1.1km to the east and Merry Bower Farm 1.2km to the southwest. The development at Arleston Farm is 1km to the west. Ashlea Farm is a farmstead situated close to the A50 and within the Derbyshire application site. The topography of the proposal site is relatively flat, lying between 38.8 metres (m) Above Ordnance Datum (mAOD) in the south and 38.7mAOD in the north. Within the wider landscape, the landform rises to the east at Chellaston Hill (78mAOD) and to the north-west at Sunny Hill, Derby (67mAOD). To the south of the A50, the land rises to form a ridge of higher land (55-60mAOD), including a local rise at Barrow Hill (62mAOD).

A number of designated and non-designated heritage assets are close to the site, although none are within it. Of these, a grade II* registered historic park and garden associated with Swarkestone Old Hall (2.65km to the south-east of the site boundary) and Swarkestone Lows Round Barrow Cemetery (scheduled monument 1.8km to the east) are the most significant. Other listed buildings and structures include the grade II listed Trent and Mersey Canal Deep Dale Bridge Number 17 at SK3485 2923, 272m to the south and the grade II listed Arleston House farmhouse, 1km to the west. Beyond that, there is a small grouping of listed structures associated with the Trent and Mersey Canal (1.6km to the south-east), and the grade II Lowes Farmhouse and attached buildings, (1.1km to the east). Further groupings of listed buildings are found in the nearby villages of Barrow upon Trent, Twyford and Swarkestone. The nearest conservation areas are the Trent and Mersey Canal conservation area (295m to the south), Twyford (2.05km to the south-west), Barrow upon Trent (1.01km to the south) and Swarkestone (2.01km to the south-east).

Boulton Moor Site of Special Scientific Interest (SSSI), a geological SSSI of interest for its unusual underlying glacial and fluvial sequence, is c. 2.1km to the east. No other internationally or nationally designated nature conservation sites are within 2.5km of the application site. There are some Local Wildlife Sites (LWSs) located in the proposal site and others are close to the proposal site. Sinfin Moor Lane Stream LWS (water vole/flowing water rivers streams) and Cuttle Brook LWS (water vole/flowing water rivers streams) are in the site. Arleston Canal and Pond LWS (habitat mosaic) is c. 250m to the south-west. Sinfin Moor Lane Meadows (habitat mosaic) is c. 235m to the north and north-west, Sinfin Moor Lane Park LWS (habitat mosaic) is immediately to the north and west, and Moor Plantation LWS (secondary, broad leaved woodland) is 475m to the east. Immediately to the west of the northern site boundary is Sinfin Moor Park Local Nature Reserve (SMPLNR) which is, in part, in the wider Sinfin Moor Lane Park LWS and the Sinfin Moor Lane Meadows

LWS. The site is also part of the Sinfin Moor Regionally Important Geological Site (RIGS), a large area that has been identified as a glacial lake and which is underlain by gleyed, calcareous blue-grey lacustrine clays containing remnants of a molluscan fauna.

Much of the site is in Flood Zone 3, with the land immediately to the south of the city administrative boundary being in Flood Zone 2. The southernmost section of the site, a broad swathe of land stretching 200m south and 450m north of the A50, is not in any flood zone.

There are a number of public rights of way (PROW) to the south, forming a dense network of paths connecting to the Trent and Mersey Canal. Barrow upon Trent Bridleway number 10 is 0.7km to the east. Barrow upon Trent Footpath (FP) number 9 runs along the towpath of the Trent and Mersey Canal and is 0.22km south of the application site. Two further public footpaths, Barrow upon Trent FP number 4 and Barrow upon Trent FP number 5, meet the Canal along its southern boundary and, at their closest point, would be within 0.3km and 0.5km of the application site respectively. Swarkestone FP number 9, which is 1.8km to the east, runs on a south-north alignment between the Trent and Mersey Canal and the southern extent of the Derby to Melbourne stretch of National Cycleway Network route 6.

Planning Background

The proposed junction and link road are a key element of Infinity Garden Village (IGV). IGV is being planned as one of 14 new 'garden villages' that it is proposed will be delivered across England, support for which was announced by the Government in January 2017. The IGV concept emerged from various components of proposed major growth on the southern edge of Derby (previously referred to as the South Derby Growth Zone (SDGZ)), as proposed in the following Local Plans: the Adopted Derby City Local Plan Part 1 (DCLP:P1), Adopted South Derbyshire Local Plan Part 1 (SDLP:P1) and Adopted South Derbyshire Local Plan Part 2 (SDLP:P2). It is envisaged that the IGV would deliver the following:

- around 2,130 new homes on land at Wragley Way, Sinfin supported by a primary school, local centre and extensive network of "green and blue infrastructure";
- around 117ha of new employment space as an extension to Infinity Park Derby;
- a new secondary school; and
- the delivery of new transport infrastructure including the Southern Derby Integrated Transport Link (SDITL) and a new junction on the A50 i.e. infrastructure corresponding to the current proposal.

Some outline and some full/detailed planning permissions have been granted for developments that are on local plan allocations associated with the IGV.

Some of the fully consented developments are currently under construction and some nearing completion. Within Derby, these include the east-west section of the link road (permission code: 11/15/01379), and 50 dwellings on land east of Deep Dale Lane (permission code DER/02/15/00211), which are already consented under planning permission reference 11/15/01379. Applications have also recently been submitted to both Derby City Council (code no: 19/00877/OUT) and South Derbyshire District Council (SDDC) (application code no: DMPA/2019/1097), for a total of 1,850 dwellings to the south of Wragley Way. A further application, for the residential development of up to 100 dwellings including infrastructure and associated works (application code 9/2017/0922), has been submitted to SDDC, also currently undetermined.

The Proposal

The development is proposed for the construction of a new junction (Junction 3A) on the A50 Derby Southern Bypass and a link road running between this new junction and Infinity Park Way to the north-east. It would also result in the loss of agricultural land and mature trees. The proposal also involves ancillary works, including the creation of two flood storage areas, the diversion of watercourses, safety improvements to Deep Dale Lane, and the demolition of buildings at Ashlea Farm (to accommodate the new junction).

The proposed grade separated junction, which would be located at the existing Deep Dale Lane A50 overbridge, would comprise a new dumbbell roundabout arrangement with four new slip roads leading onto/off the A50 providing an all-movement direct access.

The proposed link road would run northwards from the junction on an approximate south-west/north-east alignment. The southernmost 300m of the link road, as it leaves the new junction, would be dual carriageway, beyond which it would be single carriageway. The link road would also be lit. Two roundabouts would be provided along the proposed road to serve as means of access to and from future developments. Shared footway/cycleway provision would also be provided. A new traffic signal-controlled Pegasus crossing would be created at Sinfin Moor Lane in order to facilitate the safe crossing of the link road by existing pedestrian, cycle and equestrian users of this lane. Gated vehicle access would be provided along the length of the link road for maintenance purposes.

The road corridor would be constructed on a low earth mound (of varying heights between 0.5m to 2.0m above existing ground levels). The overall road corridor would be 28.6m wide on the dual carriageway section before narrowing to 16.3m wide for the single carriageway sections. To allow for minor variations, the application also includes a plan (the parameter plan) which identifies the maximum extent of any possible deviation (+/- 2m either

side). The alignment of the road within this parameter plan has been accounted for within the Environmental Statement (ES).

Flood alleviation measures are proposed including two flood compensation areas west of the link road. The proposed development would also need to cross the water courses identified above, including Barrow Drain, and would require the partial diversion of these, as well as some minor ditch improvement works in the vicinity of the proposed junction. Provision for surface water drainage would be made in the form of kerbs and gullies, combined kerb drainage, etc. Wherever possible, above ground sustainable drainage systems, such as swales, ponds, and ditches, would be utilised. Balancing ponds would be provided with flows into watercourses restricted to the greenfield run-off rates. The application indicates that some regrading of outfall ditches and watercourses would also be required.

Ancillary works would include the provision of street lighting to roundabouts and link road; post and rail fencing to demarcate the highway boundary; safety fencing (mainly within the A50 Junction works); signposts and other street signage. A 2.5m high acoustic fence (wholly within the Derby City area) would be erected as noise mitigation for the users of the SMPLNR. Temporary construction compound/soil storage areas would be located in the Derby City area, close to the iHUB innovation centre.

The development would also require the permanent removal of three parking lay-bys and one emergency lay-by on the A50. Deep Dale Lane, where it lies north of the A50, would also need to be realigned to tie in with the proposed junction and widened to 5.5m width to allow for increased traffic movements/traffic management measures.

The application includes a green infrastructure strategy (GIS) which sets out the vision for the proposed development's green infrastructure. The GIS proposes the protection of existing landscape features and makes provision for measures to mitigate impacts on the SMPLNR including the creation of new landscape habitats around it and compensatory planting to mitigate for the loss of hedgerows and trees, and enhance biodiversity and landscape character. It also seeks to deliver green infrastructure habitats that would be managed for biodiversity and recreational benefits; and accessible green space with recreational routes.

For the purposes of clarity, those sections of the overall development which are within Derbyshire/South Derbyshire are the proposed new A50 junction and its associated slip roads, the southernmost (approximately 0.8km) stretch of the proposed link road (dual and single carriageway sections and the southernmost roundabout) and the southern section (approximately one third) of the western flood storage area. The northernmost section of the proposed link road (approximately 0.81km), one roundabout, the northernmost flood

storage area and the upper two thirds of the western flood storage area are all in Derby.

Post-Submission Revisions

Following two rounds of consultation, the applicant has revised the scheme in the following areas:

- the addition of approximately 2.2km street lighting on the A50 through Junction 3A and associated slip roads;
- the conversion of 2 emergency lay-bys on the A50 to parking lay-bys to provide additional car parking capacity;
- the addition of 2 lay-bys on the link road to provide additional parking capacity;
- the provision of four areas of maintenance hardstanding on the A50 (two on the new junction and one each on the eastbound and west bound carriageways);
- the amendment of the southern roundabout at the proposed A50 Junction 3A to a 'tear drop' shape to ensure that it has sufficient capacity if IGV comes forward in totality;
- the addition of a second exit lane from the northern dumbbell roundabout;
- the addition of mitigation works at Infinity Park Way/Wilmore Road and Merrill Way/Boulton Lane (within Derby City);
- the addition of traffic calming measures at Deep Dale Lane (within Derby City);
- the revision to the size of the materials and stockpile areas to be able to contain approximately 18,000 metres cubed (m³) of topsoil and 24,000m³ of subsoil respectively thereby reducing volume of materials and stockpile area by 22,064m²;
- the revised position of drainage swales and footpath/cycleway; and
- the amendment of the design of the flood storage areas (to satisfy the needs of the current proposal and balance the needs of the IGV/Project Box development) and proposed culverts (to ensure sufficient freeboard from design flood level).

Environmental Statement

The application is accompanied by an ES which includes a description of the site and its surroundings, details of the proposed development and alternatives, and baseline information and technical reports prepared by specialist consultants relating to socio-economics; landscape and visual impacts; biodiversity; cultural heritage; transport and access; air quality; noise and vibration; drainage and flood risk; ground conditions and contamination; and cumulative and in combination effects.

The Company has also submitted supplementary environmental information (SEI) to the ES in response to comments made by consultees including information under a July 2020 addendum to the ES. The further information

relates to air quality, noise, hydrology and flood risk, transport, archaeology and a reservoir breach analysis in respect of the two flood storage areas. The applicant has confirmed that an addendum of July 2019 has been superseded by the 2020 addendum.

The contents of these submissions and the planning issues raised are addressed in the 'Planning Considerations Section' below.

Consultations

The application has been subject to several rounds of consultation.

Local Member

Councillor Neil Atkin (Repton) has been notified. He has indicated that he has registered his interest as an owner of land that would be affected by the proposed development, and will not be commenting on the application.

Adjacent Councillor Martyn Ford (Etwall and Repton) has also been notified.

Derby City Council

Appropriate liaison has taken place between the County Council's planning service and the City Council, as well as with specialist teams in the County Council including the Lead Local Flood team, and officers representing the County Council as applicant. This has guided both Councils, in preparing to report on the applications for their respective areas as planning authorities, towards taking similar and consistent approaches to identifying potential measures for controlling and monitoring the proposed development. The informal consultation through this liaison has assisted in the production of the proposed draft outline of requirements for conditions contained in my recommendation below.

With regard to specific environmental issues associated with the proposal, the Derby City Environmental Protection team raised no objections in respect of noise subject to the imposition of conditions requiring a construction environmental management plan (CEMP) and further noise mitigation measures for dwellings in the City. Following the submission of further information, the Team also had no objections to the proposals in respect of air quality, noting that given the potential benefits (resulting from the redistribution of traffic from existing congested routes), it strongly supported the application on air quality grounds, considering it an essential part of ensuring the impacts associated with IGV are mitigated as far as possible.

The City Council considered the impacts of the development on flood risk and the potential adverse impacts of the proposed flood storage areas (which constitute reservoirs under the Reservoirs Act 1975) on local communities. Whilst no objection were raised, conditions were requested including a

Handover Management Plan (HEMP) which would make provision for the ongoing management and maintenance of the flood storage areas.

At the time of writing, no final comments had been received in respect of highway safety. Any comments received will be reported on orally at Committee.

South Derbyshire District Council - Planning

SDDC raises no objection to the proposals and states its support, noting that the delivery of the road is of paramount importance in unlocking the SDGZ area for development thereby enabling the delivery of the identified housing and employment needs of both SDDC and Derby City.

With regard to likely environmental impacts, SDDC raises specific comments in respect of transport and access, biodiversity, drainage/flood risk as detailed below.

Transport and Access

SDDC raised concerns regarding the potential for the link road to act as a barrier to the east/west movement of pedestrians and cyclists, as well as the potential impacts of the proposals on the local road network. SDDC also commented that, if the sustainable live/work objectives set out in the Development Framework Document (DFD) are to be met, IGV should be 'permeable' for sustainable modes of transport, noting that a single 'Pegasus' crossing', as initially proposed, would be not be adequate to ensure safe and suitable means of access.

With regard to potential impacts on the existing local road network, SDDC highlights the potential for congestion on north/south routes through Sinfin and/or Stenson Fields, resulting from the increased connectivity brought by the proposals and requested further consideration on this issue. Further modelling was also requested in respect of the impacts to Deep Dale Lane south of the proposed A50 junction, as well as the junction of the A5132 and A514 in Swarkestone.

Biodiversity

SDDC noted the loss of trees/hedgerows but did not believe that such losses would be significant if compensatory habitat were provided. Whilst noting the more significant losses, e.g. a line of Poplar trees which form a visual barrier through the IGV, as well as cover either side of Sinfin Lane, SDDC acknowledged that the proposed road alignment would result in the least possible effect on this vegetation. With this in mind, SDDC did not consider statutory protection of these trees would be warranted or reasonable, given the wider need and benefits of the scheme, subject to appropriate conditions being applied to ensure protection of vegetation to be retained. SDDC also noted that a few veteran trees were identified which are afforded protection by

polices BNE3 and BNE7 of the SDLP:P1, as well as being classified 'irreplaceable habitat' in the NPPF. SDDC considers that appropriate protection buffers would be achievable for those located in South Derbyshire but highlights three veteran trees in Derby City which would be adversely affect by the proposals.

Drainage

SDDC commented that the design of the drainage should recognise the concept of integrated 'green' and 'blue' infrastructure as envisaged by the DFD, with water bodies designed to serve multiple purposes, as well as linking with the LNR to which they would relate.

Design

The proposed narrow width (1.5m) of the highway verges would compromise the ability to provide adequate tree planting which, given the nature of the route and its intended purpose, is particularly important. SDDC recommended that the verges be widened to 2.5m-3m and be continued around the proposed roundabouts. The SDDC first response also noted the lack of provision for pedestrian and cycle movements south through the underpass and continuing down Deep Dale Lane and requested that the scheme be amended to include this.

No comments were received following the second round of consultation, however, following the third round of consultation, SDDC reiterated that it had no objections to the scheme subject to its previous comments being taken into account. SDDC also commented that it accepted that the reasons for the scheme not incorporating some of its aspirations were due to the physical constraints of the site and the proposal.

Environmental Health Officer

The Environmental Health Officer (EHO) raises no objections to the proposals subject to conditions relating to a CEMP, a scheme of noise mitigation and potential ground contamination.

Barrow upon Trent Parish Council

Raise no objections to the proposals.

Stenson Fields Parish Council

Stenson Fields Parish Council (SFPC) objects to the proposals on the ground that the Transport Assessment (TA) does not consider the volume of traffic on the surrounding roads (including Stenson Road) during construction, and requests that a review of traffic flows during this period be undertaken, taking into account cumulative impacts associated with construction related delays on the A52 and the closure of the slip roads into Pride Park.

Comments were also received in respect of the closure of Arleston Lane and provision of a footbridge on Stenson Road and pedestrian lights were also received but are not relevant to the consideration of this application.

Department for Transport

The Department for Transport (DfT) was consulted by Highways England as part of the consultation process because that national agency organisation, unlike its predecessor, lacks authority to agree to new junctions on the strategic road network. The DfT provided the following response:

"The Secretary of State has seen the proposal for a grade-separated junction on the strategic road network (between junctions 3 and 4 on the A50 Derby Southern Bypass section) and connecting link roads.

He has considered whether there is a case for a Departure given the proposal is for a new connection to the strategic road network which was not previously identified. Where the strategic growth test cannot be met, the Circular does not allow additional junctions with, or direct means of access to, motorways and other routes of near motorway standard.

As part of his consideration the Secretary of State has:

- Determined that as the junction does not fall within the exemptions made in the Circular at paragraph 40, the case for a Departure must be made.
- Looked at the intention of the policy and the need to maintain the safe and efficient running of the SRN.
- Considered the impacts and benefits the exit would have on the operation of the A50 and the impacts on the local road network if the current permitted access is used.
- Taken into account the wider impacts, including the housing and economic growth opportunities the new junction will unlock.
- Taken into consideration that Highways England have assessed a road safety audit setting out the type and level of improvements the applicant is prepared to make to ensure the safety of SRN users.

On balance the Secretary of State considers that a Departure from Circular 02/13 allowing the junction would not impact negatively on the users of the SRN. He also considers that the boundary related matters should be addressed through the conditions put forward by Highways England in ANNEX A of this letter".

Highways England

Highways England (HiEn) has provided three responses in respect of the proposals. In its first response, HiEn made a holding objection pending the submission of further information relating to traffic modelling and the proposed

permanent closure of four existing lay-bys on the A50. In respect of traffic modelling, the response states:

'We note that the JUNCTIONS 9 traffic modelling tool has been adopted to carry out the capacity assessment of the junction.

From review of the JUNCTIONS 9 results presented in the Transport Assessment, in the 2030 scenario with all allocated elements of the South Derby Growth Zone (SDGZ) in place, the A50 eastern off-slip (to the southern roundabout) is shown to operate with an RFC of 0.89. In the 2030 scenario with the full SDGZ in place, performance of this approach is shown to worsen with an RFC of 1.02.

As DMRB guidance (TA 23/81) identifies an RFC of 0.85 as being the limit of capacity for priority-controlled roundabouts, the JUNCTIONS 9 results show the junction to operate over capacity, significantly so in the full SDGZ scenario.

The purpose of the proposed scheme is to accommodate significant growth plans in the area, namely the SDGZ, and as such consideration should be given to the scheme's ability to accommodate the forecast traffic demands from this growth region.

For a grade separated junction, VISSIM modelling work is considered more appropriate for representing likely network performance and we acknowledge that this has been used to assess the proposed scheme in addition to the JUNCTIONS 9 work.

We note from the Transport Assessment that static assignment of traffic has been adopted within the VISIM model. Although there is no option for alternative route choices within the modelled network, Highways England's preference is usually that traffic be dynamically assigned where possible, however, static assignment is often appropriate dependent on model parameters. Once the capacity concerns raised above have been addressed, the VISSIM models should be provided for review'.

HiEn also requested further information, including a review of lay-by provision in the A50 corridor in this location, regarding the proposed closure of the four lay-bys to enable it to assess the implications of such a closure.

The response also provides information about the formal procedure for the DfT to approve proposed new junctions on the strategic road network, as mentioned above.

In its second response, HiEn made a further holding objection pending the submission of further information to address continued concerns regarding the

applicant's traffic modelling and proposed lay-by provision. With regard to traffic modelling, HiEn acknowledged that the traffic model adopted in the ES addendum was acceptable but raised concerns regarding the methodology used to calculate traffic flows around the junction. With regard to the lay-bys, HiEn noted that whilst the addendum concluded that the proposed removal of the lay-bys would not result in negative impact on safety or spacing, it also required that additional capacity be provided.

Following the submission of the second addendum to the ES, HiEn has confirmed that it no longer has any comments to make in respect of the TA and recommended a number of conditions relating to drainage, geotechnics, proposed tree plant and street lighting.

Following the recent approval response from the DfT for the creation of the new junction as referred to above, HiEn has, subject to certain conditions, indicated a withdrawal of its holding objection.

Highway Authority

Derbyshire County Council, in its role as highway authority consultee (HA), has provided three responses.

In its initial response, the HA mentioned that the application is an infrastructure only proposal which, in itself, would not address the effects of all traffic generated by IGV and that additional infrastructure would be needed to deliver and mitigate the effects of this. On this basis, in principle, the HA raised no objections to the proposal. However, whilst (with the exception of construction traffic) the effects of the application proposals would be relatively limited in respect of Derbyshire County Council's highway network, the HA raised concerns regarding such works being introduced in isolation without further consideration of the diversionary effects of traffic movement on the highway network (in particular Deep Dale Lane, Sinfin Lane, Wragley Way and Stenson Road). The HA also mentioned that the phasing of the works/construction activity would also influence any traffic impact and requested further information. The HA also stated that a further consequence of the approach taken in the TA would be to limit mitigation for the anticipated diversionary trips in the vicinity of the new junction to widening Deep Dale Lane to 5.5m, as well as a number of traffic calming measures within the city boundary. As such, the HA considered that there was insufficient evidence to conclude that proposed works in isolation would be sufficient to mitigate the diversionary and attractant impact of the new junction on the existing network.

Following the second consultation exercise, the HA reiterated a view that the proposed road and junction might be insufficient to accommodate the overall traffic generated by IGV and that its acceptability was based on a premise that alternative routes would also be available to mitigate the impacts of that development. Further clarification was requested in respect of: the connection/

phasing of the proposed link road with the existing highway network to the north; the extent of land to be put forward for adoption; construction phasing; any mitigation measures to reduce impacts to the Stenson Road/Wragley Way and the A514/Barrow Lane (A5132) junctions; monitoring for the Barrow Lane/A514 junction; and a Stage 1 Safety Audit. The HA also noted that legal agreements between the three highway authorities (the County Council, Derby City Council and Highways England) would need to be in place prior to the commencement of construction works, as well as the weight limit on Deep Dale Lane being relocated to exclude the proposed roundabouts.

In its final response, the HA raised no objections on the basis that the proposed development would be 'commensurate to the quantum of development that it is expected to serve and is satisfied that the modelling is adequate to demonstrate that the capacity of the junction and new road can accommodate that anticipated development'. However, it further stated that this view was predicated upon the later delivery of an east-west link (considered essential for the overall function of the proposed future development), between Infinity Park and the primarily residential development south of Wragley Way. The HA also signalled that the proposed dumbbell junction arrangement does not have sufficient capacity to accommodate all development traffic associated with IGV.

Historic England

Historic England (HE) raises no objections to the proposals and recommends that this Authority seek the views of its own specialist conservation and archaeological advisers.

Natural England

Based on the information submitted, Natural England (NE) raised no objections to the proposals in respect of potential impacts to the Boulton Moor SSSI.

With regard to soils and best and most versatile (BMV) agricultural land, NE noted that the proposals would not lead to the loss of more than 20ha of BMV land and, as a consequence, did not make detailed comments in this respect but recommended that the general guidance set out in the Department for Environment, Food and Rural Affairs (DEFRA) Construction Code of Practice for the Sustainable Use of Soils on Construction Sites be followed during the construction phase of the development.

NE welcomes the green infrastructure element of the proposals and recommends the imposition of a condition in order to secure a scheme of green infrastructure creation.

Derbyshire Wildlife Trust

Derbyshire Wildlife Trust (DWT) raises no objections to the proposal, noting that the site is dominated by intensively managed arable land with a network of native hedgerows that would meet the definition of Habitat of Principal Importance and that the proposals would result in the loss of at least 1,455m of native hedgerow priority habitat. Whilst the Sinfin Moor LWS crosses the site, DWT considers that the loss of a small section of bankside, due to culverting, would be of only minor significance to the LWS.

DWT accepts the conclusions with regard to bats and great crested newts (GCNs) and support the recommendations set out in Section 5.12 of the bat survey with regard to lighting, advising that a condition be imposed in this respect. DWT also confirms that sufficient information has been provided to enable the authority to discharge its duty in respect of The Conservation of Habitats and Species Regulations 2017.

With regard to badger, DWT supports the recommendation for further, precommencement survey work to be undertaken, which it considered should be secured by condition and concur that reptiles, water vole and otter are unlikely to be present at the site but requested the imposition of a condition requiring a pre-commencement survey for water vole, as per the recommendations set out in the ES. DWT also requests a condition preventing ground or vegetation clearance works during the bird nesting season without survey work being undertaken beforehand.

DWT is generally supportive of the GI Masterplan, commenting that it expected it to include the replanting of sufficient species rich native hedgerows to compensate for those lost within the application site, and requesting that conditions requiring the submission of a CEMP and a Landscape and Ecological Management Plan (LEMP) be imposed.

In its second response, DWT made no further comments in respect of the proposal but asked that a revised condition in respect of badger be imposed on any permission.

Following the third consultation exercise, DWT notes that appropriate consideration has been given to potential ecological impacts associated with additional lighting and the creation of lay-bys on the A50 and concurs that the lighting would not result in unacceptable impact to bats and that the construction of the lay-bys would not result in loss of habitats of nature conservation value. In general, DWT considers that the proposed tree and hedge planting should compensate for vegetation removed and that the proposed GIS of the overall scheme should deliver significant net gain for biodiversity.

Environment Agency

The Environment Agency (EA) has made four responses in respect of the proposal. In its initial response, the EA objected on the basis that the hydraulic model on which the Flood Risk Assessment (FRA) is based was not fit for purpose because no information/survey work was provided to enable relevant checks to be carried out and because the modelling undertaken used inappropriate software.

In addition to flood risk, the EA also provided comments in respect of groundwater/contaminated land, stating that it was satisfied with the assessment of risk to controlled water receptors and requested the imposition of a condition relating to the remediation of previously unidentified ground contamination.

With regard to the ecology of the Sinfin Moor LWS and Barrow Drain, the EA stated that the development would only be acceptable if a landscape management scheme is secured via condition in accordance with paragraphs 170 and 175 of the National Planning Policy Framework (NPPF). The EA indicated that in the event that no such condition was imposed, it would object to the proposal because it cannot be guaranteed that the development will not result in significant harm to Sinfin Moor Lane Stream LWS and Barrow Drain. A condition relating to water quality in the Cuttle Brook and its tributaries was also requested.

Following the submission of the first addendum to the ES, the EA continued to object on the basis that the hydraulic model was not considered fit for purpose. Issues identified with the submitted model related to major issues with hydrology and hydraulics. With regard to hydrology, the EA requested that current best industry practice be followed so that sewer influence is accounted for. An audit trail in line with EA guidelines was also recommended. Whilst the further information was noted to address the hydraulic issues raised in its initial response, the EA considered that further clarification was required.

In its final response, the EA removed its objection, subject to the imposition of conditions relating to flood risk; ground contamination; the requirement for a landscape and ecological management plan and water quality. The response also mentioned that the two proposed flood storage areas were considered to be reservoirs for the purposes of the Reservoirs Act 1975 and provided advice in this respect. It was also recommended that this Authority consult the Council's Emergency Planning team.

Derbyshire County Council Emergency Planning

Emergency Planning (EP) raised no objections to the proposal but noted that the two flood storage areas would meet the criteria for large raised reservoirs under The Reservoirs Act 1975 because they would have the potential to store more than 25,000 cubic metres (m3) of water above ground level. EP

also provided advisory notes for the Council as applicant which are set out at the end of the report.

EP commented that consideration of ongoing maintenance and liabilities (maintenance costs; incident costs; onsite reservoir flood plans etc.) should be recognised and that the risk of major reservoir dam failure/collapse is currently identified and classified as "High" on the Community Risk Registers for both Derbyshire County and Derby City areas. On review of the application, EP noted that the reservoirs may require off site plans to be created due to their capacity. These would be multi-agency plans including partner agencies and members of the Local Resilience Forum (LRF).

Finally, whilst neither of the breach analyses of the flood storage areas appear to impact on any existing developments in themselves, EP requested that any future developments planned for this area should give consideration as to how these can be made safe from a potential breach. Future developments may also increase the risk profile of the reservoir and thus the emergency planning work associated with it.

Lead Local Flood Authority

Derbyshire County Council in its role as Lead Local Flood Authority (LLFA), has provided two responses. In its initial response, the LLFA requested further information/clarification in respect of proposed greenfield/brownfield rates of run-off for different sections of the proposals and the justification for this approach; the localised impacts on groundwater levels resulting from the dewatering of historic mines; and details of the additional treatment stages proposed for existing highway drainage.

Further information was also requested in respect of the FRA, with regard to pluvial run-off risk from land outside the application site as this, combined with the localised ditch network and shallow groundwater levels, indicates that the combined risk would be greater than predicted. Further information was also requested in respect of existing field drains; the future management, maintenance and means of access to the flood storage areas; positive flood plain compensation; maintenance/access to nearby electricity infrastructure; impacts on surrounding water table levels as a result of the proposed lowering of ground levels; confirmation that the low flow channel would be capable of accommodating all flows that are proposed to be discharged into it; confirmation that flood mitigation measures would not result in a negative impact on the surrounding area; accurate locations of each of the culverts that have been modelled; and information regarding the exact climate change scenario to be used.

Following the submission of the addendum to the ES, the LLFA confirmed that the proposed surface water discharge rates (greenfield rates of 4.4l/s/ha for the sections of highway on greenfield land and the remaining existing highway

network as 623l/s) would be sufficient to prevent an increase in run-off entering the existing catchment. The LLFA noted that the required flood attenuation areas for the greenfield area (3697m³) and existing infrastructure area (3879m³) would be provided by a mixture of conveyance swales and attenuation basins adjacent to the highway prior to discharge to nearby watercourses. The LLFA draws attention to the importance of future maintenance (including the necessary funding) of the northern and western flood attenuation areas, which it considered significant flood risk management assets, and stated that a robust maintenance plan and funding for the lifetime of the asset should be in place. The LLFA also recommends the imposition of conditions relating to surface water drainage, as well as a number of advisory notes for the applicant.

East Midlands Airport

East Midlands Airport (EMA) raised no safeguarding objections to the proposals

In response to the second round of consultation, EMA requested that, wherever possible, the water attenuation basins are planted with willow and alder to create wet woodland/carr rather than open ponds. This would offer valuable habitat for flora and fauna while minimising the site's attraction to large waterfowl.

Derby Airport

Raised no objections to the proposals

Cadent Gas Limited

Initially objected on the basis that there were two high pressure gas mains that would be affected by the proposals. Following direct discussions with the applicant, Cadent Gas withdrew its objection subject to the addition of an informative note for the applicant indicating that further direct liaison must take place prior to the commencement of the development.

Health and Safety Executive

Health and Safety Executive (HSE) initially responded to say that it advises against the development taking place because the risk of harm to people at the proposed development site, resulting from damage to the high pressure pipelines, would be such that there are sufficient reasons on safety grounds for the permission to be refused.

Following the provision of the Cadent Gas responses, HSE commented that it does not advise against the granting of planning permission subject to Cadent Gas being satisfied that the appropriate standards are maintained where the pipelines cross/encroach upon the proposed traffic route as required by the Institution of Gas Engineers and Managers (IGEM) (Sections 6.10.2 - 6.10.4 of IGEM TD/ TD1 - 'Steel pipelines and associated installations for high

pressure gas transmission'), or any detailed internal standards used by Cadent Gas.

Public Health England

Public Health England (PHE) states that its main concerns are air pollution emissions of nitrogen dioxide (NO₂) and particulate matter during the construction, operation and future operation phases of the development. PHE identifies the primary air pollution sources as construction machinery, construction dust and road traffic emissions. PHE notes that the air quality chapter in the ES takes into account Derby's nitrogen dioxide clean air zone to improve air quality and recommends that the developer work closely with Derby City Council's Clean Air Zone team to enable the impact from the proposed development to be considered in any Clean Air Zone planning and future work improving air pollution emissions in the future.

PHE welcomes the NO₂ and particulate matter modelling undertaken for the different phases of development and acknowledges that this indicates that the proposal would have negligible impacts and that annual mean air quality objectives at receptor locations would continue to be achieved. However, as emissions are likely to remain the same rather than reducing over time, PHE requests that the following be given consideration in the design of the application:

- 'Air pollution is considered to be the largest environmental hazard to public health
- Reducing public exposures to non-threshold pollutants (such as particulate matter and nitrogen dioxide) further below air quality standards has potential public health benefits...
- Defra's Clean Air Strategy 2019 has an aim to reduce particulate matter emissions nationally by 30% by 2020, and by 46% by 2030.
- The World Health Organization (WHO) has recommended an annual mean guideline limit of 10 μg/m3 for PM2.5 to reduce people's exposure. Defra have committed to support this in the Clean Air Strategy 2019. The application air quality modelling shows that none of the do something or do-nothing scenarios modelled of the new development would meet this guideline standard'.

Friends of Sinfin Moor Park Local Nature Reserve

Friends of Sinfin Moor Park Local Nature Reserve (FSMP) raised a large number of queries specific to the proposed A50 junction and link road, as well as issues more general to IGV. The issues raised that are specific to this proposal include, in summary, the following points:

 clarity should be provided regarding the role and extent of responsibility of the proposed management company in the context of IGV;

- the proposed level of consultation with stakeholders and the local community that the management company would be required to undertake, and how it would be funded;
- flood mitigation areas should be accessible to the public with paths and seating areas provided;
- all existing and proposed open green space should be seen as interdependent rather than separate entities;
- more design detail should be provided in terms of the proposed flood mitigation and screening areas with FSMP being consulted on these. The design of these areas should also be reviewed after three years;
- a circular cycle/disabled route should be provided through the green infrastructure areas to join up with Sinfin Moor Park;
- the proposed cycle route should commence at the A50 junction and run through the new parkland up to Rolls Royce in the north;
- planting should be provided along diverted watercourses;
- detailed information about surface water run-off should be provided; and
- various points of concern regarding aspects of the proposal specific to the Derby City area.

In its second response, the FSMP raises several additional concerns including, in summary, the following points:

- the proposed traffic calming measures on Deep Dale Lane would be inadequate;
- cumulative effects on the western and southern flood alleviation areas associated with housing development have not been fully considered. The climate change 1 in 100 +50% is therefore inadequate;
- no provision made for volunteer archaeological input;
- no overall map of cycle routes linking Deep Dale Lane with the new developments and the plans are biased in favour of vehicular traffic; and
- some further points regarding aspects of the proposal specific to the Derby City area.

Note: The proposal is an essential infrastructure requirement of IGV and therefore is not a form of development that should be required to provide mitigation in the form of further developer contributions.

Derbyshire Constabulary

Raise no objections to the proposals.

Western Power

Raised no objections to the proposals, but notes the presence of high voltage overhead lines and underground cables that would need to be diverted before works commence, requesting that an informative note be added to any

planning permission on what the developer should do about this prior to the commencement of development.

National Planning Casework Unit

Has no comments to make.

Severn Trent Water and DEFRA

Were consulted with a request for comments by 28 May 2019. No responses had been received at the time of writing.

Publicity

The application has been publicised four times by press notice (Derby Evening Telegraph), by site notice and by neighbour notification with a request for any comments by 26 May, 19 August 2019, 29 August 2020 and 3 February 2021 respectively. Three representations, two objecting and one providing positive comments, have been received as a result of the publicity. The main issues can be summarised as:

- no new roads should be built when our existing ones are in such poor condition and are in need of improvement;
- public transport services should be improved, with good connections to Derby and the surrounding villages, rather than building new roads;
- the development would result in the loss of natural resources which are finite:
- there is no footway on the section of <u>Deep Dale Lane between the Ragley</u> Boat Stop and Sinfin;
- encouraging to see cycling infrastructure considered. If well designed, the link road would provide an opportunity to improve cycling access to employers from nearby residential areas.

One representation received provided more general comments regarding the wider IGV development, proposing that areas of central Derby should be considered as potential mixed residential/commercial areas rather than the development of more greenfield land. The representation also suggested that all houses should be constructed to use sustainable construction/energy/water resources.

Note: This application is a standalone application for the provision of highway infrastructure associated with IGV and, as such, any comments regarding sustainable building techniques for dwellings, etc, are not material to its consideration. Sustainable drainage systems are considered in the planning consideration section of this report.

Canal and River Trust

The Trust submitted a representation as an affected landowner raising concerns about the impacts of the proposal on Barrow Bridge, which is the

structure that Deep Dale Lane uses to cross the Canal. The Trust is concerned that the TA does not consider the potential for increased risk of the bridge being damaged through being hit by a vehicle ('bridge strike') due to increased vehicle movements on Deep Dale Lane, and requests further consideration be given to the likely effect of the proposed new junction on traffic flows on Deep Dale Lane with specific consideration of the greater risk of frequency of bridge strikes at Barrow Bridge and the potential impacts on other road users associated with the subsequent repair works, e.g. road closures. The Trust also suggests potential mitigation measures to reduce the risk of damage to the bridge including CCTV or works to improve the splay on the north-west parapet to provide more space for vehicles which may have the potential to offset increased risks associated with increased vehicle movements.

Pre-application Engagement Statement

The applicant has also submitted a pre-application engagement statement (PES) providing details of the community engagement undertaken prior to the submission of the application. This included the creation of a dedicated webpage, an online consultation exercise that ran between 15 February 2019 and 10 March 2019, two public exhibitions that took place in Sinfin on 28 February 2019 and Barrow upon Trent on 4 March 2019, as well as a leaflet that was delivered to 1,714 households. Display boards were also placed at a number of public locations in the area, including a nearby supermarket, and two articles were published in Derbyshire Live on 18 and 28 February 2019. Direct engagement was also sought from FSMP and another local group, the Infinity Garden Village Liaison Group, the main purpose of which is to ensure that relevant local stakeholders are kept informed about all aspects of the wider IGV project, including the proposed junction and link road that are the subject of this application. The PES indicates that a combined total of 118 responses were received as a result of these engagement exercises. Of these, 71 (61%) responses offered positive or neutral comments, with the remaining 47 (39%) responses objecting to the proposals. Issues raised include: increased pressures on existing strategic and, potentially unsuitable, local highway network (including through Barrow upon Trent, as well as other nearby villages south of the River Trent to avoid gueuing traffic on the A50). and the lack of reference to sustainable travel in the proposal. Concerns were also raised regarding potential impacts to the SMPLNR, future maintenance of the new road/junction, highway safety and impacts to air quality. Positive comments were also received including the development providing a guicker, more reliable transport link and being necessary to support the level of proposed development in the area.

In response to the comments, suggestions and questions received through the pre-application engagement process, the PES indicates that the applicant made the following pre-application changes to the proposal:

- re-positioning of the proposed infrastructure from within the SMPLNR and away from the Sinfin residential area;
- introduction of weight restriction at Deep Dale Lane;
- traffic calming measures at the northern section of Deep Dale Lane, in close proximity to the school and existing residential properties;
- installation of acoustic fencing near to the LNR; and
- consideration to the future management of areas of open space.

Planning Considerations

Section 38(6) of the Planning and Compulsory Purchase Act 2004 requires planning applications to be determined in accordance with the provisions of the development plan unless material considerations indicate otherwise. In relation to this application, the relevant policies of the development plan are contained in the policies of the SDLP:P1 (2016) and SDLP:P2 (2017) and the DCLP:P1 (2017). Other material considerations include national policy, as set out in the NPPF 2019 and associated Planning Practice Guidance (PPG).

The Development Plan

The application site falls within the administrative boundaries of two planning authorities, each with separate development plans. For clarity, the relevant development plan policies from both plan areas have been listed, although it is expected that a full assessment of the proposals, for that part of the proposed development within Derby City, against the policies of the DCLP will be undertaken by that Authority.

South Derbyshire Local Plan (Part 1 and Part 2)

This made up of two parts. Part 1 identifies strategic allocations and key policies. Part 2 is concerned with non-strategic allocations and more detailed Development Management policies. The policies of the SDLP that are most relevant to the development are:

SDLP: Part 1 Policies

S1: Sustainable Growth Strategy

S2: Presumption in Favour of Sustainable Development

S4: Housing Strategy

S5: Employment Land Need

S6: Sustainable Access

H1: Settlement Hierarchy

H15: Wragley Way, South of Derby

E4: Strategic Location for Sinfin Moor Employment Site Extension

SD1: Amenity and Environmental Quality

SD2: Flood Risk

SD3: Sustainable Water Supply, Drainage and Sewerage Infrastructure

SD4: Contaminated Land and Mining Legacy Issues

BNE1: Design Excellence

BNE2: Heritage Assets BNE3: Biodiversity

BNE4: Landscape Character and Local Distinctiveness

INF2: Sustainable Transport

INF4: Transport Infrastructure Improvement Scheme

INF7: Green Infrastructure

SDLP: Part 2 Policies

BNE5: Development in Rural Areas

BNE7: Trees, Woodland and Hedgerows

BNE10: Heritage

INF13: Infinity Garden Village

Derby City Local Plan

The relevant policies of the DCLP are:

DCLP: Part 1 Policies

CP1(a): Presumption in Favour of Sustainable Development CP1(b): Placemaking Principles for Cross Boundary growth

CP3: Placemaking Principles CP4: Character and Context CP16: Green Infrastructure

CP18: Green Wedges CP19: Biodiversity

CP20: Historic Environment

CP23: Delivering a Sustainable Transport Network

CP24: Transport Infrastructure

AC15: Land South of Wilmore Road, Sinfin (Infinity Park Derby)

AC18: Wragley Way

Neighbourhood Plan

There are no neighbourhood plans in or close to the application site.

Infinity Garden Village Development Framework Document

SDDC, Derby City Council and Derbyshire County Council have worked together to produce a DFD that pulls together all the relevant policies (from both the SDLP:P1 and SDLP:P2 and the DCLP:P1) for the IGV area and is a material consideration as a guide the delivery of development in support of the IGV.

South Derbyshire Design Guide Supplementary Planning Document (November 2017)

This SPD, which aims to improve the design quality of development in South Derbyshire, is also a material consideration.

National Planning Policy Framework

The NPPF sets out the Government's planning policies for England and how these should be applied. It states that the purpose of the planning system is to contribute to the achievement of sustainable development and the framework as a whole contains a presumption in favour of sustainable development. The NPPF goes on to say that achieving sustainable development means that the framework has three overarching objectives - economic, social and environmental - which are interdependent and need to be pursued in mutually supportive ways (so that opportunities can be taken to secure net gains across each of the different objectives).

The economic and social objectives of sustainable development, as described in the NPPF, aim variously to build a strong, responsive and competitive economy and support strong, vibrant and healthy communities, in the latter instance, by ensuring that a sufficient number and range of homes can be provided to meet the needs of present and future generations. To this end, Paragraph 72 of the framework states that 'the supply of large numbers of new homes can often be best achieved through planning for larger scale development, such as new settlements ...provided that they are supported by the necessary infrastructure and facilities'. Paragraph 80 states that planning 'decisions should help create the conditions in which businesses can invest, expand and adapt'. Planning authorities are expected to place significant weight on the need to support economic growth and productivity, taking into account both local business needs and wider opportunities for development.

Those sections of the NPPF that are particularly relevant to this proposal are:

Section 2: Achieving sustainable development.

Section 6: Building a strong, competitive economy.

Section 9: Promoting sustainable transport.

Section 12: Achieving well designed spaces.

Section 14: Meeting the challenge of climate change, flooding and coastal change

Section 15: Conserving and enhancing the natural environment

The Principle of and Need for the Proposal

The application is for an infrastructure only proposal relating to the construction of a new junction on the A50 and a link road leading from this junction to Infinity Park Way in the north. It seeks to provide a key element of IGV in the form of essential highway infrastructure that would unlock currently inaccessible land allocated for employment and housing purposes in both the DCLP and SDLP. As a major urban extension to Derby, IGV forms part of the strategic vison for growth in the district of South Derbyshire over the current plan period (2011-2028), the growth potential of which the SDLP states '... will have been unlocked through transport and other infrastructure improvements...'.

Both parts of the SDLP contain policies that either give direct support for, or make reference to, the need for the provision of additional highway infrastructure in the area south of Derby. Most relevant are SDLP: P1 Policy H15: Wragley Way (South of Derby) which relates to a sustainable urban extension to Derby through the provision of up to 1,950 dwellings in nearby South Derbyshire. In accordance with other policies within the SDLP, the policy states that it will require a number of site specifics, including the provision of and/or contributions to new highway infrastructure, to mitigate the impact of new housing development around Wragley Way on both the local and strategic road networks of the whole site. The policy makes specific reference to both the construction of the SDITL; and a potential junction connecting the site to the A50.

SDLP:P1 Policy INF4: Transport Infrastructure Improvement Schemes seeks delivery of a number of transport schemes in south Derbyshire including the SDITL phases 1 and 2. It states that, in determining the detailed alignments and designs of these transport schemes, regard shall be had to minimising the impact on the environment, heritage assets and natural features; taking full account of recreational routes along, or affected by, the schemes; providing for the needs of cyclists, pedestrians and people with impaired mobility, etc, and mitigating any potential flood risk.

SDLP:P1 Policy E4: Strategic Location for Sinfin Moor Employment Site Extension identifies land for development for employment uses as an extension to planned new employment development at Sinfin Moor. The policy acknowledges that the site has the potential to deliver a part of the SDITL and states that SDDC envisages its delivery once a satisfactory scheme has been identified and demonstrated to be deliverable.

SDLP:P2 Policy INF13: Southern Derby Area and Infinity Garden Village supports development proposals and cross boundary collaboration in the Southern Derby Area for a mix of uses as part of the IGV development. The policy seeks to guide the delivery of a range of development in support of the IGV proposal, including the SDITL. The IGV DFD referred to above is intended to guide the delivery of development within the IGV area. The policy states that until the DFD is approved, any necessary infrastructure required to deliver the comprehensive approach will be supported.

The DCLP:P1 also contains policies that are directly relevant to the proposal. Whilst it is expected that a full assessment of the proposal against the policies of the DCLP:P1 will be undertaken by Derby City, these policies are also a material consideration here. Of particular relevance to this proposal are Policy AC15, which relates to the development of new employment space and at (j) supports proposals for the delivery of the SDITL, subject to the requirements of Policy CP24.

Policy CP24: Transport Infrastructure relates to the delivery of the Council's long term transport strategy, and supports the implementation of strategic proposals that help create an economically and environmentally sustainable transport network. Sub paragraph (b) relates to SDITL phases 1 and 2.

DCLP:P1 Policy AC18: Wragley Way, states at (a) that the City Council will work with South Derbyshire to '...ensure that new highway infrastructure is provided to help mitigate the impact of the development on the local and strategic road networks. This will include the development of, or contributions towards, the construction of the South Derby Integrated Transport Link. The potential for a new junction onto the A50 to be delivered in the future should not be prejudiced'.

In principle, therefore, I consider that the proposed development has the potential to deliver key infrastructure that would assist in achieving the spatial vision for both the district of South Derbyshire and Derby City as set out in the development plan policies identified above through the provision of essential transport infrastructure as well as meeting the higher level aims of paragraphs 72 and 80 of the NPPF.

Location of Development

The proposal would be on land predominantly allocated for housing and employment uses, the relevant policies for which acknowledge the need for the construction of the SDITL and a new junction on the A50. The exception to this is a small strip which sits between the H15 and E4 policy areas which, technically, in application of the SDLP is to be considered a rural area, the relevant policy for which is BNE5. The policy states that planning permission for development outside settlement boundaries will only be granted where the development is, inter alia, 'unavoidable outside settlement boundaries', and it would not unduly impact on landscape, biodiversity, soils and heritage assets. I am satisfied that this section of the proposed development could not, realistically, be located in any location that would enable it to either fall within an allocation or within a settlement boundary. This is further illustrated by the SDLP policy map for the Aston area which clearly assumes that the SDITL would need to cross from the H15 policy area to meet the T12 link in the north. I therefore find no conflict with SDLP:P1 Policy BNE5 on this issue. The policy also requires that, in order to be acceptable, development should not result in adverse environment impacts. A full assessment of the environmental impacts of the proposal is set out below.

General Considerations

Notwithstanding the above, the proposal also needs to be assessed against the more general environmental policies of the development plan. The planning application is accompanied by an ES and the following assessment addresses individual topics in the order they are reported in the ES.

Alternatives

The ES describes those alternatives considered by the applicant. The main alternatives include 'do-nothing'; the Phase 1 SDITL without a new junction on the A50; and alternative alignments to the proposed link road.

With regard to the 'do-nothing' alternative, whilst this would avoid the loss of greenfield land, the ES considers it to represent a lost opportunity in terms of: delivering new highways infrastructure for IGV; increasing accessibility/ connectivity to the strategic highway network and local communities living in or around the IGV area; and reducing highway congestion in the local area. The ES concludes that the socio-economic benefits of the proposed development would be so significant so as to outweigh the limited benefits of the 'do-nothing' alternative.

The ES notes that both the SDLP and DCLP rely on Phase 1 of the SDITL to mitigate the transport impacts of the housing planned for Wragley Way. However, the ES indicates that, in isolation, the SDITL would have insufficient capacity to accommodate all the committed developments within IGV to the same extent as the whole current proposal (including as it does the proposed new A50 junction). In particular, the ES predicts that the proposal would reduce congestion by over 70% whereas SDITL would only deliver a predicted 23% reduction in congestion. It is therefore concluded that the SDITL alternative would not deliver appropriate mitigation for the allocated housing and employment developments associated with IGV.

The scope for alternative locations for the junction is also considered in the ES. It states that the junction could not be located elsewhere on this stretch of the A50 or be of materially different design as it utilises the existing under bridge. The ES notes, however, that the proposed alignment of the link road has changed significantly since the request for a Scoping Opinion was made in July 2018 and is now on its third iteration, being further to the east than initially proposed. Changes to the alignment have largely resulted from concerns about impacts on the SMPLNR and from the loss of Green Wedge, and are considered by the applicant to be the least harmful in that context.

The Town and Country Planning (Environmental Impact Assessment)
Regulations 2017 (EIA) regulations, which affect the determination of this application, require that any reasonable alternatives to a proposed project which are studied by the developer are outlined and addressed in the ES. In general, I am satisfied that the range of alternatives considered is appropriate and proportionate in the context of the proposed development. There is a clear strategic expectation from the policies in the SDLP and the DCLP that developments which contribute to the envisioned IGV (including the associated transport infrastructure such as proposed under this application) should go ahead. The IGV is anticipated to provide a much-needed sustainable urban extension to Derby. Under these circumstances, I concur

with the ES that the 'do-nothing' alternative is unrealistic. Likewise, whilst both local plans refer to the SDITL, they also indicate that a new junction on the A50 may be required. I do not consider it unreasonable for the two infrastructure elements be combined to form a single proposal, particularly at this early stage. With regard to alternative alignments, I note that the applicant has significantly amended the alignment of the proposed link road such that it does not now encroach on SMPLNR or significantly impact on the function of the Green Wedge. This approach is welcomed and I am of the view that the alignment, as currently proposed, is the most appropriate of those considered, whilst ensuring that sufficient land remains to deliver the anticipated employment and housing needs of the area.

Socio-economics

The ES assesses baseline socio-economic conditions and the likely effects of the proposed development (both direct and indirect) on the human population in the vicinity of the site. The ES notes that South Derbyshire has a higher rate of economic activity than regional/national averages, but that Derby has a lower economic rate in comparison as evidenced by the Lower Layer Super Output Area (LSOA) in and around the application.

Likely significant effects of the proposed development were assessed at both the construction and operational phases of the development. The ES estimates the creation of up to 371 temporary jobs during the 18 month construction phase with an estimated £31.6 million of gross value added (GVA) over the same time frame which would represent a short term significant beneficial effect. Once operational, the development would unlock the development potential of the area, including the creation of 5,000 jobs on site and an annual GVA contribution of £53.6 million. The ES considers that these impacts would have a significant beneficial effect in the long term. Due to the significant beneficial effects, the ES does not consider mitigation or enhancement measures.

In general, I am satisfied that the ES provides an accurate picture of the economy of South Derbyshire and Derby City and have no reasons to doubt its conclusions in respect of the significant socio-economic benefits the proposals would bring to the area. I do have some concerns that the economic impacts associated with the partial loss of the farm unit at Ashlea Farm have not been fully accounted for. The ES does allude to this loss, commenting that the GIS would provide additional multifunctional greenspace providing for long term environment enhancement, but I consider that such a response highlights potential socio-environmental enhancements rather than any real economic impact, adverse or otherwise. Whilst Ashlea Farm does not appear to have been in active use for some time, no consideration appears to have been given as to whether there are any viable agricultural regimes for it that could be of benefit to the local area and, in this respect, I consider the ES to be lacking. Notwithstanding this, however, I acknowledge that any benefits

arising from Ashlea Farm would be minor in the context of the substantial socio-economic benefits that the proposed link road and junction under consideration here, and the wider IGV, would bring.

Landscape and Visual

Good design principles are required by Policy BNE1 of the SDLP:P1, and at a national level in Section 12 of the NPPF: "Achieving Well Designed Spaces." Policy BNE4 of the SDLP:P1 requires, inter-alia, that 'The character, local distinctiveness, and quality of South Derbyshire's landscape and soilscape will be protected and enhanced through the careful design and sensitive implementation of new development and states 'Development that will have an unacceptable impact on landscape character (including historic character), visual amenity and sensitivity and cannot be satisfactorily mitigated will not be permitted'.

The ES includes a landscape and visual impact assessment (LVIA), describing the baseline conditions of the application site and its surroundings and the consequential effects (significance) of the development on landscape character and visual amenity. The application site is described as flat with regularly shaped agricultural fields defined by hedgerows containing mature trees, and dry and wet ditches, with the surrounding landscape being punctuated by high voltage pylons and overhead electricity lines. Due to the proximity of the site to Derby, urbanising influences including the A50, the built edges of Stenson Fields and Sinfin (including the Wragley Way development currently under construction in Derby City) are identified with the pylons and overhead lines being considered a particularly detracting element.

The ES notes that neither the site, nor the surrounding area, are subject to any landscape designations. The landscape fabric is considered to be relatively intact and in reasonable to fair condition, but unremarkable. With regard to landscape character, the ES places the site and its surrounding area in the Trent Valley Washlands National Character Area (NCA) at the national level, and in the Floodplain Valley Landscape and Village Farmlands Landscape Character area (LCA) at the regional level. At a local level, the site is variously in the Wet Pasture Meadows (link road) and Lowland Village Farmlands (A50 junction) landscape character types (LCT), the main characteristics of which can be described as 'A flat, low-lying mixed farming landscape, with regular and geometric field patterns...Largely uninhabited with very occasional, large, red brick farmsteads' and '...large scale, open, gently rolling lowland landscape ...a mixed farming landscape defined my medium to large regular fields with thorn hedges, punctuated by villages' respectively. The ES considers that the landscape of the application site is broadly representative of the landscape characterisations at national, regional and local levels.

Overall, the landscape in and around the application site was assessed to have medium susceptibility to change, able to absorb the proposed development. With the GIS in place, the ES considers that longer term effects would not result in unacceptable harm to landscape character, with overall levels of impact being limited. Due to the considerable scale of the Trent Valley Washlands NCA/LCA, the magnitude of impact at the national and regional level was assessed as inconsequential and negligible. At the local level, magnitude of change is assessed as low-negligible due to the localised nature of the impact, with impacts to the application site being assessed as high-medium. The assessment concludes that landscape effects at the site level during construction/demolition would be major-moderate adverse which is considered significant, but that such impacts would be very localised, short term and temporary. Once operational, with the planned GIS in place, the LVIA concludes that impacts and adverse effects to landscape character would not result in significant long term landscape harm.

The LVIA identifies 17 viewpoints broadly representative of residential properties/settlements; rights of way/recreational users (including SMPLNR) and highway users. The LVIA judged all residential receptors and PROW/recreational receptors to be of high sensitivity. Highway receptors were variously judged to be of low-medium to low sensitivity. A Visual Envelope (VE) is provided which identifies the area in which the proposed development would be visible. Due to the screening effects of surrounding landform/vegetation, views of the development from outside the VE are assessed as limited. During demolition and construction, the assessment considers that the most significant visual effects (major-moderate adverse) would be experienced by receptors in Sinfin, but these would be short term (18 months) and temporary. Once operational, visual impacts to receptors in Sinfin are assessed as major-moderate adverse (significant), although the LVIA considers that this would lessen to moderate-minor once screen planting became established. Visual effects to other receptors are assessed as varying between moderate adverse and negligible. The LVIA concludes that visual impacts would continue to reduce over time with impacts being moderateminor adverse in the worst instance.

Mitigation measures are proposed as part of the development including the implementation of the GIS, the details of which are set out above. The ES considers that landscape/visual enhancement would be delivered through the retention of existing vegetation and landscape features, the creation of accessible greenspace in the fields immediately to the east of Sinfin, as well as the provision of biodiversity benefits through habitat creation in the form of replacement hedgerows, trees and woodland, new grassland habitats and wetland areas. Additional mitigation would be provided through the provision of a CEMP which would include measures to minimise effects on the environment. The GI would also be subject to ongoing management and maintenance to ensure satisfactory establishment of habitats.

In conclusion, the original ES states that the design and mitigation approaches proposed would minimise effects on landscape and visual receptors in the longer term to the extent that residual adverse effects would lessen. As a result, it is not considered that the proposed development would result in any unacceptable long term landscape or visual effects.

Revisions to the scheme (at the request of HiEn) include the proposed addition of 2.2km street lighting on the A50 through the proposed junction and its slip roads. The addendum to the ES provides further assessment in respect of the potential landscape and visual impacts associated with light pollution. It states that, whilst the lighting would be a new element in the landscape, given that existing stretches of the A50 are lit it would not be uncharacteristic. Mitigation measures associated with appropriate lighting design and columns are proposed. With such mitigations, the ES considers landscape effects would be 'moderate adverse', reducing over time (once the GI had become established) so that long term residual effects would be 'moderate-minoradverse'. Overall, the ES concludes that the proposed addition of street lighting would not result in any unacceptable landscape effects and would be minimised through the design and mitigation proposed. With regard to visual impacts, the addendum considers that these would be restricted to a localised area of landscape. It further notes that neither the application site nor the surrounding area are subject to 'dark sky' policies and that the urban area of Derby impacts a level of sky glow on this landscape at present. It states that changes to increase lighting would be localised in their extent and observed in the context of settlement/urban edge landscape. As with landscape impacts, with the proposed mitigations in place, the addendum suggests that any adverse visual effects would lessen over time. Overall, it is not considered that the proposed changes would alter the conclusions provided within the original ES.

In general, I am satisfied that the LVIA correctly identifies the appropriate LCAs and has been undertaken in accordance with appropriate methodologies and guidance. I also concur with the consideration of the condition and nature of the landscape fabric of the application site and its surroundings. I note that the LVIA appears to use the scale of the Trent Valley Washlands NCA/LCA as a key justification for assessing impact in respect of landscape character. Whilst this may be appropriate at a national/regional level, I have some concerns regarding the conclusions drawn in respect of the impacts to the Lowland Village Farmlands and Wet Pasture Meadows LCTs. In particular, the LVIA suggests that settlement and highway infrastructure are a key feature of both LCTs. Whilst I accept that they are components of the Lowland Village Farmlands and agree with the conclusions in the LVIA in respect of this LCT, such infrastructure is not characteristic of the Wet Pasture Meadows. Under those circumstances, I am of the opinion that effects on the Wet Pasture Meadows LCT would be somewhat greater than assessed in both the short and long term, although such impacts are hard to assess in

isolation, particularly when the wider development of IGV (parts of which are either already consented or are allocated for future development in the SDLP and DCLP) would result in almost the entire loss of this LCT in Derbyshire.

Direct impacts to the landscape fabric would relate to the loss of arable farmland, hedgerows and occasional trees, not only as a direct result of the development, but also as a consequence of the proposed mitigation measures which, in some instances, are extensive. Whilst it is always disappointing to lose trees, I am satisfied that such losses would not be significant and note that the applicant has taken care to minimise those instances where tree loss/removal would be necessary. It is not clear whether the assessment gives consideration to the more indirect impacts but, given the scale and nature of the flood alleviation works and their proximity to Sinfin, I consider that there is potential for the introduction of adverse landscape effects closer to those receptors located to the west than is indicated. With regard to the proposed additional street lighting on the A50, whilst I accept the conclusions in respect of landscape/visual impacts for receptors located to the north of the A50. where the nightscape would be dominated by the urban influence of Derby, I consider that such effects have been underestimated when viewed from the south-west. The landscape between Twyford Road in the south and the A50 is predominantly rural in feel, and essentially unlit. In considering the comparative levels of land to the south and the A50 carriageway, the latter sitting at a higher elevation, properties located in the Arleston Farm development and the Ragley Boat Stop public house, would potentially have direct views of the development with little intervening vegetation to act as a screen. Whilst I do not consider that the impacts associated with the additional street lighting would be so detrimental as to warrant a refusal. I do consider that any detailed lighting scheme needs to give consideration to mitigating these impacts. I would therefore recommend the imposition of a condition on any planning permission requiring the production of a detailed lighting scheme with a mechanism for review.

With regard to potential visual impacts, I agree that the nature of the local topography combined with the southern edge of Derby would restrict views to those vantage points close to the site as set out in the VE, with most significant visual effects limited to residents on the eastern and southern edge of Sinfin, as well as the users of Sinfin Moor Lane. I concur with the LVIA that such effects would be major/moderate adverse during construction, reducing to moderate adverse 15 years post-completion by virtue of the fact that we would be left with a modern highway on a raised embankment crossing what is a relatively open landscape. As with landscape effects, however, such visual effects need to be considered in the round in the full knowledge that IGV will introduce more significant visual impacts, so in relative terms the proposed junction/link road makes only a modest contribution to the overall visual effects of the eventual wider development.

In conclusion, the proposed junction and link road would result in adverse landscape and visual impacts which, in some instances in my opinion, would be greater than predicted and which would clearly be at odds with the established landscape character of the greater part of the site. Such impacts would be most evident for receptors in Sinfin where direct and indirect landscape effects from the proposed new road and its associated flood works would be most visible. Whilst I do not consider that such impacts would be significant when viewed in isolation, cumulative impacts associated with the development of the wider IGV would clearly be far more substantial, resulting in the almost entire loss of the Wet Pasture Meadows LCT. Whilst I note and welcome the compensatory landscaping/habitat creation proposed in the GIS, which I consider would bring substantial benefit through landscape and biodiversity enhancement/gain, I do not consider that this, in itself, would be sufficient to outweigh such landscape impacts/loss either in the context of the current proposal or the wider IGV. In this respect, there is clearly some conflict with SDLP:P1 Policy BNE4.

Biodiversity

Paragraph 170 of the NPPF requires that planning decisions should contribute to and enhance the natural and local environment by 'minimising impacts on and providing net gains for biodiversity, including by establishing coherent ecological networks that are more resilient to current and future pressures'. Paragraph 175 states that d) development whose primary objective is to conserve or enhance biodiversity should be supported; while opportunities to incorporate biodiversity improvements in and around developments should be encouraged, especially where this can secure measureable net gains for biodiversity'. Policy BNE3 of the SDLP:P1 is supportive of development that contributes to the protection, enhancement, management of biodiversity and geodiversity and delivers net gains for biodiversity.

The ES sets out the baseline ecological conditions of the application site. It identifies one statutory nature conservation designation, the Sinfin Moor LNR, as being adjacent to the application site and two non-statutory designations, the Sinfin Moor Lane Stream LWS and the Cuttle Brook LWS, within it. Field surveys identified the presence of a range of typically agricultural habitats which were of little ecological interest. Habitats identified as being of local interest were species poor native hedgerows; wetland features which, whilst heavily affected by agricultural practices, provide benefit in terms of habitat biodiversity and continuous biodiversity corridors through the landscape; and mature trees which were considered to provide additional structural and habitat diversity. Fauna identified in or adjacent to the site include 29 typical urban edge/farmland bird species of which 10 are either protected or appear in the Royal Society for the Protection of Birds (RSPB) Birds of Conservation Concern 4 (BoCC4), some of which were also identified as breeding. Other fauna identified include common and widespread bat species, although no roosts were identified; otters using some of the ditches for commuting

purposes; common toad, common frog and smooth newts in the ponds in the vicinity of the site. No evidence was found of reptiles, water voles or badgers during the site surveys work, although the latter species are known to occur within the wider local area.

The ES states that, due to the intensive management of the site for agriculture, important ecological receptors are limited and, as a consequence, the site is unremarkable for biodiversity at any more than the local level. Nevertheless, the ES identifies a number of likely adverse effects. During construction, these would include habitat loss resulting from culverting works to a small section of the Sinfin Moor Stream LWS/Main Drain (significant locally); disturbance to the banks of the Meadow Drain which forms part of the wider Cuttle Brook LWS (not significant); the loss of a number of mature crack willow and black poplar trees in the shelter belt (significant locally); the loss of 1.45km of hedgerow (significant locally); the loss of species poor semiimproved grassland (not significant); the loss of species-poor/arable agricultural habitat (not significant); and the culverting of a small section of Barrow Drain (significant locally). With regard to habitat disturbance, the ES considers that adverse effects would include the potential pollution to watercourses - Main, Barrow and Meadow Drains, as well as watercourses downstream such as the Sinfin Moor Lane Stream LWS and Cuttle Brook LWS (significant locally); and inadvertent damage to retained habitat through construction operations (significant locally). Adverse effects on faunal species during construction were considered to include the potential loss of bat roosts during demolition and tree felling works (significant locally); fragmentation of bat dispersal corridors through habitat loss and use of flood lighting (potentially significant a local scale); and disturbance to breeding birds leading to nest abandonment/harm (significant locally).

Once operational, likely significant effects associated with the proposed development were identified as potential disturbance to the fauna within the SMPLNR and LWS (significant at a County level) and, without appropriate management, hydrological changes to local watercourses including the Sinfin Moor Lane LWS could lead to a decline in these aquatic habitats (significant locally). With regard to fauna, likely effects were identified as lighting and noise from the proposed junction/link road leading to a reduction of use in adjacent habitats by bats and birds (significant locally); and the severance of badger dispersal corridors of movement leading to badger mortality (significant to individuals).

Mitigation and enhancement measures are proposed, including the implementation of the GIS, which is seen as an integral part of the development and a primary mitigation measure. Avoidance measures, including route realignment (to avoid impacts to the SMPLNR) and the retention of shelterbelt woodland, hedgerows and mature trees are proposed wherever possible. The ES considers that these measures would not only

ensure that any likely impacts were minimised, but would also result in biodiversity enhancement. A LEMP is proposed for all habitats created/maintained for nature conservation purposes generally. The ES considers that the LEMP would be beneficial to the wetland habitats created as part of the flood compensation areas, as these would have the potential to complement those habitats present within the SMPLNR. It is also considered that the erection of the 2.5m high acoustic fence would provide mitigation for the SMPLNR, reducing the disturbance effects of the road. It is proposed that a CEMP would ensure that best working practices would be adopted during the construction phase, including the requirement for pre-commencement surveys where necessary. Effects on bats would be reduced through the sensitive design of landscape features adjacent to the road including the use of appropriately designed street-lighting. Road crossings over the Main and Barrow Drains would also be designed to allow the passage of wildlife. The ES concludes that, with the mitigation/enhancement measures in place, the proposed development would result in significant net gain to biodiversity.

The ES addendum includes a lighting assessment that gives consideration to the potential impacts on bats as a result of the additional street lighting proposed on the A50. It states that no potential roosts have been identified in the area affected by the lighting and, subject to lux levels being restricted to 3.6LUX, no foraging/commuting activity would be significantly affected. Based on the above, the addendum concludes that the proposed amendments would not alter the conclusions of the main ES in respect of biodiversity.

I note the conclusions in the ES and am satisfied that an appropriate suite of ecological assessments have been undertaken, following recognised methodologies and to satisfactory standards. Whilst I note that these surveys were undertaken over an extended period of time, they are, for the most part, sufficiently recent to be considered acceptable, particularly in light of the update surveys undertaken during 2018. I concur with the applicant's conclusions regarding the ecological value of the site and, subject to the imposition of appropriate conditions as set out in the ES, am satisfied that the proposed development would not result in adverse impacts to either designated sites/landscapes or European Protected Species. NE has also confirmed that it considers this to be the case in respect of designated sites. DWT raised no objections in respect of protected species, noting that it considered that sufficient information has been provided to allow this Authority to discharge its requirements of The Conservation of Habitats and Species Regulations 2017.

Whilst the application site is of limited value ecologically, it does provide value locally, particularly through the provision of a network of wildlife corridors, roosting and foraging habitat. In this respect, the proposed loss of 1.45km hedgerow, as well as some mature trees, is regrettable. I note the content of the GIS which, if satisfactorily managed and maintained, would result in

significant biodiversity mitigation and enhancement. I am also mindful that the alignment of the proposed link road has changed significantly and that it is now sufficiently to the east to avoid direct impacts to the SMPLNR. On balance, therefore, I am of the view that any such losses would be satisfactorily mitigated for through compensatory planting and management.

In conclusion, I do not consider that the proposed development would result in significant adverse effects on the ecology of the site or European Protected Species. As indicated above, conditions should be required to ensure the protection of badger, bats, water vole, breeding birds and to require the inclusion of mammal underpasses, as well as the implementation of the GIS, and replacement hedgerow planting from where it is removed. With such conditions in place, I am satisfied that the proposal would accord with paragraphs 170 and 175 of the NPPF and Policy BNE3 of the SDLP:P1 through the delivery of significant biodiversity net gain.

Cultural Heritage

The heritage assets in the vicinity of the site are set out above. Paragraph 190 of the NPPF requires that Local Planning Authorities (LPAs) '...should identify and assess the particular significance of any heritage asset that may be affected by the proposal (including development affecting the setting of a heritage asset) taking account of the available evidence and any necessary expertise'. Paragraph 199 of the NPPF requires LPAs to '...require developers to record and advance understanding of any heritage assets to be lost (wholly or in part) in a manner proportionate to their importance and their impact and to make this evidence (and any archive generated material) publicly accessible'. SDLP:P1 Policy BNE8 states that development that affects South Derbyshire's heritage assets will be expected to protect, conserve and enhance the assets and their settings in accordance with national guidance.

The ES includes an assessment of the likely significant effects of the development on built heritage and archaeology. The assessment is supported by an archaeological desk-based assessment; a geo-archaeological assessment, geophysical survey and a built heritage statement. Based on local topography, the study area covered a 1km area from the site boundary. The assessment adopted a three-stage approach which considered the importance/sensitivity of the heritage asset; the proposed effects on that asset and the overall effect on that asset and its significance.

No designated archaeological or built heritage assets were identified within the application site or the 1km search area, with the nearest scheduled monument, Swarkestone Lows, being 1.1km to the east. Topography, combined with the relative distance between the identified heritage assets and the site, has led the applicant to conclude that the majority of designated and non-designated heritage assets identified in the study area would not be affected by the proposal. Much of the site sits on deposits associated with a

former shallow post-glacial lake and the likelihood of located Palaeolithic archaeology was therefore considered to be low. Historic geotechnical information suggests that whilst organic material is preserved within the former lake basin, its condition was variable and dependent on local conditions. Whilst there is negligible potential for evidence of past settlement of all dates, there remains a small possibility that archaeology may be buried beneath later alluvial deposits. The ES indicates that the southern part of the application site has some "theoretical potential" for Prehistoric to Roman remains, although none were identified by the geophysical survey. Only two heritage assets, the Grade II listed building, Trent and Mersey Canal Deep Dale Bridge, and the Trent and Mersey Canal Conservation Area were considered potentially affected. The assessment therefore concentrates on the likely effects to the setting of these.

Likely significant effects to heritage assets during the construction and operational phases were assessed. The primary effect during construction was considered likely to be associated with groundworks, particularly within the flood compensation areas, where these would result in the substantial or total loss/removal of any archaeological remains within these areas. Whilst the proposed use of a low mound on which to construct the link road would ensure the partial preservation of buried archaeology within the road corridor, overall effects were assessed as significant. Once operational, the applicant considered that the proposed development would result in changes to the wider settings of both the Trent and Mersey Canal Conservation Area and Deep Dale Bridge. Such changes would not result in harm to the significance of either of these heritage assets, however, because the predicted changes would be in keeping with existing visible and audible qualities of the A50 which are already experienced in their respective settings. The impact of the development of Deep Dale Bridge and the Trent and Mersey Canal Conservation Area are therefore assessed as neutral/not significant.

Measures designed to mitigate the likely significant effects of the development on archaeology include a geo-archaeological trial programme to further investigate the potential of the deposits in the application site. Depending on the results of this trial work, the ES notes that further fieldwork could be necessary. With such measures in place, the ES concludes that any effects to archaeology would not be significant. No mitigation measures are proposed in respect of the Conservation Area or Deep Dale Bridge.

I am generally satisfied that the work undertaken which has led to the conclusions on heritage and archaeology in the ES has been done in accordance with the relevant guidance and that it fulfils the requirements of the NPPF. Whilst I initially had some concerns about potential impacts to the wider setting of the Conservation Area and the listed building, having visited the site and noted the intervening topography, as well as the nature of the

existing environment, I do not consider that the development would result in harm to the significance of these assets.

With regard to archaeology, whilst I note the suggestion that the potential for conventional below ground archaeology to be low, I also consider that the site may contain some deposits of archaeological or paleo-environmental importance which might enable the sequential development and chronology of the lake to be better understood or even identify late Palaeolithic activity associated with exploitation of lake margins. Following the submission of a more detailed information in respect of the timing and method of archaeological/geo-archaeological investigation, I am satisfied that the archaeological interest is capable of being accommodated through a post-consent scheme of work, which should be secured by condition, in line with that envisaged in Paragraph 199 of the NPPF.

In conclusion, subject to the recommended conditions as set out below, I do not consider it likely that the proposal would result in significant impact on any heritage asset or buried archaeology. I am therefore satisfied that the proposal would accord with the requirements of the NPPF and Policy BNE8 of the SDLP:P1.

Transport and Access

SDLP:P1 Policy S6: Sustainable Access seeks to minimise the need to travel, make efficient use of transport infrastructure, encourage a modal shift away from private car use towards more sustainable forms of transport and support transport measures that address accessibility, safety, health, socio-economic and environmental needs.

SDLP:P1 Policy INF2: Sustainable Transport permits development where travel generated by development, including heavy goods vehicles (HGVs), would not result in detrimental impacts to highway safety, local amenity, the environment or the efficiency of transport infrastructure; appropriate provision is made for safe and convenient access for pedestrians, cyclists, public transport and private car users; and car travel generated by the proposal is minimised.

SDLP: P1 Policy INF4: Transport Infrastructure Improvement Schemes supports the delivery of a number of transport infrastructure schemes including the SDITL (phases 1 and 2). The policy requires that, when determining applications, regard shall be had to i) minimising the impact on the environment, heritage assets and natural features; ii) taking full account of recreational routes along, or affected by, the schemes; iii) providing for the needs of pedestrians, cyclists and people with impaired mobility; and iv) mitigating any potential flood risk impact. Paragraph 109 of the NPPF states that 'development should only be prevented or refused on highway grounds if

there would be an unacceptable impact on highway safety, or the residual cumulative impacts on the road network would be severe'.

The applicant has provided a TA, which assesses the likely significant effects of traffic flows and highway safety associated with the development. Baseline data about the nearby local and strategic highway network is provided, as are details of traffic count surveys undertaken. Traffic modelling was undertaken to predict traffic flows for 2020, when it is proposed the new junction and road would come into use, and 2030, the latter taking into account all committed and allocated development and infrastructure improvements associated with IGV. Personal injury accident data was also assessed for a five-year period between 2013 and 2018 with the majority (83%) of accidents classified as slight, 16% serious and 1% being recorded as fatal.

Likely significant effects during the construction period were identified as the daily generation of 83 HGVs, 17 light goods vehicles (LGVs), 83 cars, 83 vans, which equates to a total of 266 vehicles per day. Construction access to the site would be from Infinity Park Way at the iHUB roundabout and the TA assumes traffic routing from either side of this roundabout. Percentage increase in traffic flows, as a result of construction traffic, was assessed as 1.4% on Infinity Park way (south of Wilmore Road) and 2.5% on the stretch south of iHUB, which was considered minimal. The effects of construction traffic such as noise, dust, vibration, etc, is given consideration in the other sections of the ES. However, based on Transport and Road Research Laboratory guidance, as well as the relative distance of the nearest residential properties to the site, disruption caused by construction traffic was considered to be limited. Overall, traffic impacts during the construction phase were assessed as negligible, short term and temporary. Once operational, the TA demonstrates that increase in traffic flows for all links beyond the proposed development would be less than 30% in both 2020 and 2030, with concentrations predicted for Infinity Park Way north of the iHUB roundabout (28.3%), Wilmore Road (28.5%) and Merill Way (25.3%). Some links would experience a reduction in traffic flow, which was considered a direct result of the redistribution of traffic from existing network to the proposed link road and junction.

Operational effects also considered in the TA include severance; driver delay; pedestrian delay/amenity; fear and intimidation and accidents. With regard to severance, the ES concludes that a major severance impact would occur at Sinfin Moor Lane, where the proposed link road crosses the existing pedestrian/cycle route. Mitigation is proposed in the form of a formal crossing facility at this point. All other links in the TA assessment area were assessed as either minor or minimal change and no mitigation is therefore proposed. Driver delay is assessed as neutral for the proposed development with delay elsewhere being minor. Major pedestrian delay and amenity impacts would be experienced at Sinfin Moor Lane where the proposed link road crosses it. As

set out above, a crossing point is proposed as mitigation. Elsewhere, pedestrian delay and amenity impacts are predicted to be minor. Major pedestrian fear and intimidation impacts are predicted at Sinfin Moor Lane with neutral impacts predicted elsewhere. Accident analysis undertaken identified no existing safety concerns on the local highway network and, given that the proposed junction/link road would not generate additional traffic, no safety concerns have been identified.

Mitigation measures are proposed to minimise impacts to traffic flow and highway safety. During the construction period, these would include the adoption of a Construction Management Plan (CMP) to control hours of operation/ensure that appropriate vehicle cleaning measures are in place for HGVs leaving site; and that appropriate temporary works and diversions are put in place. Once the road is taken into use, because the development is an infrastructure only scheme, no mitigation measures are proposed. The exception to this is the provision of a signal-controlled crossing where the proposed link road crosses the line of existing pedestrian/cycle route at Sinfin Moor Lane.

At the request of consultees, further traffic modelling has been undertaken in respect of impacts to junctions on both the strategic and local highway networks; lighting on the A50; impact of the proposals on lay-by provision on the A50 and the provision for pedestrians and cyclists including crossings of the link road. This work has required some consequential changes to the design of the scheme (which are described above). The ES addendum states that additional modelling of the impact of re-distributed traffic on existing junctions in the locality was undertaken. Whilst the Merrill Way/Boulton Lane junction operates within full capacity, the proposal was found to impact on evening peak hour traffic. Mitigation measures are now proposed that would enable the junction within 100% of the capacity. The assessment of Infinity Park Way/Wilmore Road concluded that it was operating over the 90% threshold during the morning peak hour period, but operating satisfactorily during evening peak hour. The proposed mitigations would ensure that the junction would operate within capacity at both peak times. Based on the additional information provided and the scheme changes, the addendum considers that there would be no changes to the previous conclusions of the ES.

The development proposed is for highway infrastructure—which is intended to reduce pressure on existing major junctions in the surrounding area, as well as providing direct access/connectivity with the land that will become IGV. It is not intended to provide sufficient highway infrastructure to support IGV in its entirety, and it is anticipated that current and forthcoming development proposals, within the IGV area, would include sufficient highway infrastructure and mitigations to support those particular developments. It is therefore understood that whilst the development would result in direct impacts

associated with construction traffic and road closures, etc, during the construction phase, once operational the proposed junction and link road would not be traffic generating in themselves with initial impacts likely to be limited to a redistribution of existing traffic flows in the surrounding area. I have therefore assessed the application on those terms.

I note the conclusions of the TA in terms of highway safety during the construction and operational phases and am satisfied that the revised development would not result in adverse impacts in this respect. I am also satisfied that the proposed mitigation measures would be capable of being secured via condition. I further note that, following the submission of revised modelling work and revisions to the design, both the HA and HiEn have confirmed they have no objections to the scheme in respect of highway safety, subject to the imposition of conditions, which are set out in my recommendation below. In consideration of the comments of the Canals and Rivers Trust in respect of potential damage to Barrow Bridge, I have made provision for a period of monitoring to be undertaken, with subsequent review and mitigations, if required.

Concerns regarding the lack of pedestrian/cycle routes are noted. However, provision is made for safe north/south cycle access and the scheme also allows for the potential for further east/west links. The revised location of the cycleways/footpath away from the carriageway would also improve the safety of users as set out above. The inclusion within the GI of proposed recreational routes, linking with the surrounding area, is also noted and welcomed. Whilst I concur with SDDC that the continuation of the cycle way south of the proposed junction would be beneficial, I also accept that this would not be possible due to the restricted size of the Deep Dale Lane underbridge.

Subject to conditions based on those suggested within the response from the Council, as Highway Authority, as well as HiEn, the application is considered to be in general accordance with the provisions of national and local planning policy identified with regard to highway considerations, as set out above.

Air Quality

The NPPF, at Paragraph 170, advises that planning decisions should enhance the natural and local environment by, amongst other things, preventing new and existing development from contributing to unacceptable levels of air pollution. Development should, wherever possible, help to improve local environmental conditions, such as air quality. Paragraph 180 of the NPPF requires that planning decisions should ensure that new development is appropriate for its location, taking into account the likely effects (including cumulative effects) of pollution on health, living conditions and the natural environmental, as well as the potential sensitivity of the site or the wider area to impacts that could arise from the development. Paragraph 181 requires LPAs to sustain and contribute towards compliance with relevant limit values

or national objectives for pollutants, taking into account the presence of Clean Air Zones, and the cumulative impacts from individual sites in local areas. Opportunities to improve air quality or mitigate impacts should be identified, such as through traffic and travel management, and green infrastructure provision and enhancement. Planning decisions should ensure that any new development in Clean Air Zones is consistent with the local air quality action plan.

'The UK plan for tackling roadside nitrogen dioxide concentrations' (DEFRA) (2017) identifies zones which are in exceedance (non-compliance) of EU limit values for annual average Nitrogen dioxides (NO²). Derby has been identified as a location of NO² non-compliance within the East Midlands zone and is required to implement a Clean Air Zone to improve air quality in the shortest possible time.

The applicant has undertaken an air quality assessment which is included in the ES. Baseline air quality conditions indicate that concentrations of NO₂ at the application site and its surrounding area are all currently below the annual mean air quality objectives of 40ug.m³. Modelled background levels of NO₂ and PM10 and PM2.5 are not predicted to exceed the relevant annual mean air quality objectives for 2020 and 2030. The assessment considers construction phase dust emissions, as well as operational phase road traffic emissions. Principal air pollution sources are identified as road traffic, including the A50.

Likely impacts associated with the construction phase dust emissions were undertaken in accordance with Institute of Air Quality Management 'Guidance on the Assessment of Dust from Demolition and Construction version 1.1' (2014). The assessment of operational road traffic emissions was undertaken in accordance with DEFRA Local Air Quality Management Technical Guidance (LAQM.TG16). Construction phase activities likely to result in impacts to air quality, including dust, were excavation, earthworks and trackout activities, as well as exhaust pollutant emissions from construction traffic and on-site plant and machinery. Dust arisings from demolition works at Ashlea Farm were considered minimal in the context of the overall development and were not given further consideration. Based on the Institute of Air Quality Management guidance, dust emissions associated with excavation, earthworks and trackout were assessed as large, with the sensitivity of the area and risk of dust impacts assessed as medium in respect of dust soiling and low in terms of impacts to human health and ecology.

Likely significant effects associated with air quality during the operational phase were primarily associated with traffic emissions. The impact of development-generated road traffic on local air quality was assessed at identified existing receptor locations (R2-R9). Road traffic emissions were modelled and concentrations of NO₂, PM10 and PM2.5 were predicted. In all

instances, predicted NO₂, PM10 and PM2.5 concentrations at 2020 (without development), 2020 (with development), 2030 (without development) and 2030 (with development) fell below the relevant annual mean air quality objectives for all receptors and did not lead to any exceedances. Impacts were therefore considered to be 'negligible' which is 'not significant'.

Mitigation measures to reduce dust emissions during the construction phase are proposed. The ES states that no mitigation measures are required once operational, although it notes that mitigation is built into the design of the scheme as the proposed junction and link road could reduce congestion and reduce journey times in Derby. In conclusion, the ES states that there would be no residual effects to air quality as a result of the development.

I am satisfied that the assessment has been undertaken using appropriate methodologies and that it covers all emissions to air likely to be associated with the development. The proposed implementation of best practice construction site management measures are noted and welcomed, as is the relative distance between the development site and receptors. Subject to the imposition of suitable conditions controlling this aspect of the development, which I am recommending should be included in a CMP, I am satisfied that there would be no adverse impacts associated with dust. With regard to emissions to air, whilst impacts associated with these are assessed as negligible, the assessment takes account of the consequential redistribution of traffic resulting from the construction of the link road and junction (though this is without any factoring in of potential future cumulative impacts from additional traffic associated with IGV. Therefore the development is likely to lead to net benefits, in terms of air quality, at least for the short term, as some traffic moves away from existing congested routes, particularly in the city. The potential air quality impacts relating to traffic using the link road and junction in the longer term, however, once IGV is more established and traffic flows naturally increase, are hard to predict but could be less beneficial. I would have preferred to have seen the inclusion of an assessment of the wider impacts associated with IGV to allow some more informed consideration of the longer term and wider aspects of air quality concerns relating to the entire IGV area (with an emphasis on sustainable transport modes and cycleway/pedestrian provision). There should, however, opportunities for such consideration in appropriate detail in relation to each new significant IGV development proposal, as and when it comes forward for assessment and determination in the planning system. Notwithstanding the above reservation, I acknowledge that the current proposals provide for cycleway and pedestrian links to the north of the new junction that would lead to both existing and proposed employment areas and the surrounding residential areas. These links, or the provision of infrastructure to support new links, appear to allow for north-south and east-west movement, which is welcomed. I note the comments of both SDDC and FSMP in respect of cycleway provision south of the A50 and agree that such provision would be essential to enable improved

sustainable transport links between the city and the surrounding villages. Due to physical constraints associated with the Deep Dale Lane underbridge, the applicant states that it is not possible to incorporate similar links through the underbridge itself and I have no reason to doubt this.

In light of the above, I am satisfied that there would be no adverse impact to air quality as a result of the development. In reaching this conclusion, I have taken into account the requirements of the policies of the SDLP and the NPPF.

Noise and Vibration

The application site is located on agricultural land close to densely populated urban environments, as well as several trunk roads including the A50. When considering the impact of noise from development proposals, PPG advises planning authorities to take account of the prevailing acoustic environment and, in doing so, to consider whether or not noise from the proposed operations would give rise to a significant adverse effect or an adverse effect or whether or not a good standard of amenity could be achieved. PPG refers to the Explanatory Note of the Noise Policy for England which requires applicants to identify whether the overall effect of the noise exposure is, or would be, above or below the "significant observed adverse effect level".

The ES includes an assessment of noise and background noise levels which have been monitored by the applicant's acoustic consultant. Baseline measurements were taken at three locations around the site, chosen to be representative of the nearest residential properties. Measured daytime noise levels are stated in the ES as ranging from 51-52 dB(A) to 66 db(A). For the purposes of the assessment, daytime hours were assumed to be (0700 hours to 2300 hours/0600 to 0000 hours) and night-time (2300 hours to 0700 hours/0000 to 0600 hours) dependent on the location. As both the existing and future noise climate would continue to be dominated by traffic noise from the surrounding road network, modelled scenarios for 2020 and 2030 without the development were considered sufficiently representative of the future noise baseline.

The ES identifies four residential noise sensitive receptors (NSR) predicting the likely noise levels that would be experienced at these properties during the construction and operational phases. Predicted noise levels experienced at the SMPLNR are also considered. Construction activities likely to generate noise impacts are excavation works, earthworks and regrading using heavy plant. Vehicle movements associated with the construction phase would also be noise generating. Whilst the ES notes that the demolition of the buildings at Ashlea Farm would result in increased noise levels, due to the relative distance of the nearest NSR (500m) and the short term, temporary nature of the demolition works, it does not consider that there would be any appreciable adverse impacts and is not considered further in the assessment. The ES

anticipates that, in the worst case, the effects of construction noise would, in general, be moderate adverse when works happened to be taking place close to NSRs. Given likely setback distances and proposed construction techniques, impacts associated with vibration were considered to be temporary, minor adverse.

Operational noise has been assessed in line with the Design Manual for Roads and Bridges, the DfT document 'Calculation of Road Traffic Noise' for human receptors and BS8233: 2014 Guidance on sound insulation and noise reduction for buildings for ecological receptors. Potential noise effects associated with the operation of the new road are therefore considered to be minor adverse through the daytime, during both the short and long term. For some receptors, there is also predicted to be a major beneficial effect in the short term and moderate beneficial in the long term. Impacts to the SMPLNR are assessed as being moderate adverse.

Mitigation measures for the reduction of noise include restricting construction activities to daytime hours (0700 to 1900 hours), with working outside these, subject to prior agreement and, in the case of night-time working, only in exceptional circumstances. Once operational, as impacts to NSR were assessed as minor adverse, no mitigation measures are proposed. The exception to this is SMPLNR, where it is proposed to erect a 2.5m high acoustic fence to the west of the link road

I note the conclusions of the ES with regard to noise and vibration, and am satisfied that the assessment has been undertaken in accordance with the appropriate guidance and British Standards. The proposed development would be located at least 0.5km from the nearest receptors and is unlikely to result in significant adverse effects. The ES suggests a suite of mitigation measures designed to reduce noise levels associated with the construction period and, in order to secure these, I have recommended the imposition of a condition requiring the submission of a detailed CMP. I further note the request of the SDDC EHO with regard to the need for a noise mitigation condition to deal with road noise, once the proposed junction and link road become operational, which I consider would be warranted, and have suggested an appropriate condition in the schedule below.

In conclusion, I am satisfied that there would be no adverse noise impacts associated with the development and, subject to the conditions recommended above, consider it to be acceptable. In reaching this conclusion, I have taken into account the requirements of the policies of the SDDLP:P1 and the guidance in the PPG.

Drainage and Flood Risk

Paragraph 155 of the NPPF states that 'Inappropriate development in areas at risk of flooding should be avoided by directing development away from areas

at highest risk (whether existing or future). Paragraph 159 of the NPPF indicates that if it is not possible for development to be located in zones with a lower risk of flooding, the exception test may have to be applied. The need for the exception test being dependant on the potential vulnerability of the site and of the development proposed. NPPF Paragraph 160 states that for the exception test to be passed, it should be demonstrated that a) the development would provide wider sustainability benefits to the community that outweigh the flood risk; and b) the development will be safe for its lifetime taking into account the vulnerability of its users, without increasing flood risk elsewhere and, where possible, will reduce flood risk overall. There is a requirement, under Paragraph 161, for both elements of the test to be satisfied for development to be allocated or permitted.

Paragraph 163 of the NPPF states that 'When determining any planning applications, local planning authorities should ensure that flood risk is not increased elsewhere'. Development should only be allowed in areas at risk of flooding where it can be demonstrated that 'a) within the site, the most vulnerable development is located in areas of lowest flood risk, unless there are overriding reasons to prefer a different location; b) the development is appropriately flood resistant and resilient; c) it incorporates sustainable drainage systems, unless there is clear evidence that this would be inappropriate; d) any residual risk can be safely managed; and e) safe access and escape routes are included where appropriate, as part of an agreed emergency plan'. Paragraph 165 of the NPPF requires major developments to incorporate sustainable drainage systems which should, inter alia, include maintenance arrangements to ensure an acceptable standard of operation for the lifetime of the development and, where possible, provide multifunctional benefits.

In its Flood Risk vulnerability classification, PPG categorises development of the type proposed here as 'essential transport infrastructure (including mass evacuation routes) which has to cross the area at risk' (Paragraph: 066 Reference ID: 7-066-20140306).

Policy SD2: Flood Risk of the SDLP:P1 prioritises the development of sites to those with the lowest risk of flooding and reiterates the requirements of NPPF Paragraph 160. Sites with a higher risk of flooding will only be considered where essential for regeneration or where development provides wider sustainability benefits to the community that outweigh flood risk. Development in such areas is expected to i) be resilient to flooding through design and layout; ii) incorporate appropriate mitigation measures, such as on-site flood defence works and/or a contribution towards or a commitment to undertake and/or maintain off-site measures; iii) not increase flood risk to other properties or surrounding areas; and iv) not affect the integrity or continuity of existing flood defences. Development that could lead to changes to surface water flows or increase flood risk are expected to be managed through the

incorporation of Sustainable Drainage Systems (SUDS). Proposals for flood management or other infrastructure offering improvements that lower the risk of flooding will be supported, subject to the proposal having no other adverse effects on local amenity and/or flood risk elsewhere. Where new flood related infrastructure is proposed, opportunities for delivering environmental improvements including biodiversity gain and GI delivery should be fully considered by those delivering the project.

The ES considers the effects of the proposal on the water environment with specific reference to local flood risk and drainage, noting that road projects have the potential to affect water quality due to mobilisation of suspended solids, as well as risks from pollution. The ES is also supported by a full FRA and sustainable drainage strategy. Baseline conditions at the site are assessed. Watercourses in and around the site are considered typical of lowlying agricultural areas, with very slight gradients and requiring regular maintenance (dredging) to aid conveyance and prevent blockage. One watercourse, Cuttle Brook, is classified in the Humber River Basin Management Plan, with the other local watercourses forming part of its catchment. Cuttle Brook is also classified as a heavily modified river with a 'moderate' overall classification with particular sensitivity to pollution from 'transport drainage'. With regard to ground water bodies, the site overlays the Water Framework Directive ground water body defined as Lower Trent Erewash – Secondary Combined but is not located in a groundwater source protection zone. Underlying bedrock is designated as a Secondary B bedrock aguifer. Susceptibility to flooding from groundwater sources is therefore considered to be low (less than 25%).

The site is identified as falling into a number of flood zones including the functional floodplain (flood zone 3b) which is at significant risk of flooding. Culverted sections of watercourses (primarily associated with informal farm crossing points and under highways) are also identified as a potential flood risk due to blockage. In general, the ES assesses the site to have a low risk of flooding from surface waters although notes isolated areas of ponding which could represent a risk. Existing highway drainage infrastructure, primarily associated with the A50, is also present within the site and the ES identifies drainage catchments associated with this. Run-off from both the westbound and eastbound carriageways of the A50 drain into ditches located either side of its embankment before being piped westwards for discharge into a local watercourse. Drainage from Deep Dale Lane is also discharged the same way. The ES estimates that run-off from a total catchment of 54,300m² drains into the watercourse.

Likely significant effects during the construction and operational phases are assessed with local receptors (environmental and human) identified and assigned a sensitivity. During construction, impacts associated with flood risk would include removal of part of the floodplain, as well obstructions to

floodplain conveyance and flow routes. Without mitigation, this would potentially displace a large volume of floodplain towards properties to the west on Lomond Avenue, Coltsfoot Drive, Farmhouse Drive and surrounding areas which is assessed as having a high adverse magnitude effect and of major adverse significance. Risks to construction workers during this period were assessed as being of major adverse significance, although temporary and short term. Construction activities, such as soil stripping/earthworks, etc, were also identified as having the potential to generate sediment that could be washed/blown into local watercourses and highway drainage infrastructure, thereby reducing water quality and flow, and potentially increasing the risk of flooding. This was considered to be of medium adverse magnitude and. overall, of minor to moderate significance. Release of pollutants/contaminants into the local water environment was considered to be of medium adverse magnitude on a medium to low sensitivity receptor. Effects would be both direct and indirect potentially impacting over the medium term and of minor to moderate negative significance. Impacts to local watercourses (including the ditch which runs close to the farm) resulting from demolition works around Ashlea Farm was assessed, although the ES considered this to be of low likelihood with negligible effects.

Once operational, due to its raised elevation, the proposed new road and junction were not considered to be at risk from flooding. The ES notes that significant flood alleviation measures are proposed that would store and convey flood waters from local watercourses. It considers that the measures would offer strategic management of fluvial flood risks and would have a high beneficial impact on medium to high sensitivity receptors and would therefore be of moderate to major positive significance. With regard to water quality, the ES notes that with the sustainable drainage strategy built into the design of the development, impacts associated with water pollution would be of negligible effect and therefore have negligible significance. Additional interceptors proposed for existing highway drainage from the A50 and Deep Dale Lane which would be of minor to moderate positive significance over the long term. Loss of agricultural land to flood alleviation and habitat creation, thereby reducing impacts associated with agrichemicals, was also considered to have minor to moderate positive significance.

Mitigation/enhancement measures to reduce flood risk and pollution to watercourses/groundwater include: the creation of two strategic flood storage areas (north and west); designing diverted/improved sections of watercourse to accommodate the designed flood event (1 in 100 - year + 30%); and new culvert crossings designed with excess capacity to minimise the potential risk of blockage. Surface water drainage systems would also be designed to ensure future resilience. Flow rates from existing drainage infrastructure would be restricted as far as possible and new catchments would be limited to the greenfield rate to reduce surface water flooding. The ES considers that, with these measures, most flood risk impacts during the operational phase would

be beneficial, offering a betterment to the current situation. Flood compensation areas would be constructed prior to works within the highway corridor being commenced, thereby reducing flood risk during the construction phase to minor adverse to negligible and that the CEMP would include a section on flood management and evacuation. With such measures in place, the ES considers that the significance of flood risk to construction workers would be reduced to minor adverse. With regard to water quality, the ES notes that there were no moderate to major adverse effects that were not mitigated by the design of the proposal. Nevertheless, in addition, it is also proposed that appropriate site management techniques (construction of haul roads, damping down soil stripping/earthworks to limit mobilisation of dust particles) be utilised to minimise dust generation.

In conclusion, the ES states that with the proposed mitigation measures in place, the development would not result in any significant adverse effects to drainage and flood risk. It further notes that the strategic flood management solution provides improvements beyond what is required to support the proposed development.

As set out above, and at the request of consultees, a number of amendments have been made to the original scheme in terms of flood alleviation measures. The revised design has required further assessment work to be undertaken which has been provided in an addendum to the original ES. The addendum states that, with the proposed revisions, there would be no change to the original conclusions of the ES in respect of likely significant effects during either the construction or operational phase of development. Primary mitigation from a flood risk perspective are the flood storage areas and the ES considers that these offer a significant reduction in flood risk to the local environment.

The development would be partially located in the fluvial floodplain (flood zone 3b), which is at the highest risk of flooding, as well as flood zones 2 and 3a (medium-high probability of flooding respectively) and would, by virtue of both its location and alignment, have the potential to remove existing floodplain, as well as interrupt the conveyance and flow of flood waters. This would conflict with the requirements of NPPF Paragraph 155 and SDLP:P1 Policy SD2. As set out above, the current proposal is an infrastructure only proposal which forms a key element of IGV, itself an essential part of the wider spatial vision for SDDC, delivering significant socio-economic benefit. Both the SDLP and the DCLP include allocations for new housing/employment land within the wider surrounding area, some of which are also located in flood zones 2 and 3a/3b and the principle of developing this land has already been assessed, and found to be acceptable, in respect of flood risk at a strategic level. Relevant policies associated with IGV also accept the need for significant new highway infrastructure. In the context of IGV, therefore, I am satisfied that it would not be possible for the proposed new junction and link road to be

located elsewhere. It is therefore necessary to assess the proposals against NPPF paragraphs 159-163 and the remainder of SDLP:P1 Policy SD2.

As noted above, the proposed development is of a type defined as 'essential infrastructure' by PPG. It is intended to enable the development of IGV by unlocking previously inaccessible land and links the A50 in the south to existing highway infrastructure at iHUB roundabout in the north. It would also provide one of the main evacuation routes for residents and businesses within IGV during times of flood. It is therefore essential that the development is designed to ensure that such a means of escape is maintained. On the basis of the information submitted. I am satisfied that the revised scheme has been designed in such a manner so as to ensure that it would be appropriately flood resistant and resilient. The proposed incorporation of mitigation measures, including the two flood storage areas (which are now designed to accommodate flood events of a scale predicted for the 2080s and balance); the restriction of existing run-off rates and proposed run-off rates to greenfield rates and the proposed management regime would be sufficient to ensure that, overall, the development would neither increase flood risk to other properties or surrounding areas, nor affect the integrity or continuity of existing flood defences and the EA has no objections in this respect. I further note that the revised scheme has also been amended to balance impacts associated with other nearby development.

With regard to the proposed sustainable drainage strategy, I note that the LLFA is now satisfied that the revised scheme would represent an acceptable approach to sustainable management of drainage in the site and surrounding area. At the request of the LLFA, a condition has been imposed in order to secure the strategy. Diverted watercourses would include provision for the creation of new habitats and the applicant's GIS seeks to provide for the delivery of new habitats including in and around the proposed flood alleviation where a network of linked permanent and marginal waterbodies would be created. Where they are located within Derbyshire, proposed future maintenance of the flood areas could be satisfactorily be secured via condition.

I note the comments of the FSMP in respect of lack of proposed public access to the flood storage areas. Whilst this may be disappointing, I also consider that it would be inappropriate in this instance. Installation of recreational benches, etc, and significant levels of planting would have the potential to adversely affect the efficacy of these areas. Notwithstanding this, the scheme makes provision for enhancements to existing public access and recreation in the immediate area through the GIS which would be of benefit to the local community. Detailed information relating to planting scheme would be secured via condition for submission at a later date.

In light of the above, I am satisfied that the development would accord with the requirements of the NPPF and policies SD2 and SD3 of the SDLP:P1 in respect of flood risk.

Ground Conditions and Contamination

Paragraph 170 of the NPPF requires planning decisions to contribute and enhance the natural and local environment by, inter alia, protecting and enhancing valued landscapes, sites of biodiversity or geological interest and soils and preventing new and existing development from contributing to unacceptable levels of soil and water pollution or land instability. SDLP:P1 Policy SD4 seeks to ensure that human health and the natural environment are protected through the provision of remedial measures where ground contamination is known or potentially known to exist. SDLP:P1 Policy BNE3 seeks to contribute towards the protection, enhancement, management and restoration of geodiversity including local geological sites.

The ES sets out baseline geological and soil conditions of the site and its surroundings. It highlights the predominant agricultural land use of the application site, noting the corresponding lack of potentially contaminative activities as a result. Exceptions are identified at Ashlea Farm (including tanks) and the A50 with the principal contaminants likely to be hydrocarbons, poly-aromatic hydrocarbons (PAHs), inorganics, heavy metals and asbestos/asbestos containing materials (ACMs). Adjacent land uses are also identified as predominantly agricultural, with residential development to the west at Stenson Fields and Sinfin. Industrial activity has historically been located to the north.

The ES states that the majority of the site is underlain by superficial Lacustrine deposits of varying ages, the exception being along the route of the A50 and the land to the south junction where deposits of sand and gravel (Beeston member) between 1.90m and 2.25m below ground level were noted. All geology is identified as Secondary A aquifer, with underlying bedrock being a secondary B aquifer. The ES notes that the centre of the application site (north of the A50 and south of Sinfin) lies in the Sinfin Moor RIGS. There are no groundwater abstraction licences within the site, although historically three are known to have existed to the south. The site is not in an EA Source Protection Zone. Groundwater levels within the application site have been encountered between 0.2m and 3.91m below ground level. Topsoils have varying thicknesses of up to 0.45m with approximately 78.5% of the application site falling within agricultural land classification subgrade 3b due to slow permeability and seasonal waterlogging. The remainder of the application site is classified as non-agricultural.

Likely significant effects during all phases of development are assessed. During construction, damage to soil structure (through poor handling and storage) and the potential for increased particulate run-off into local

watercourses are identified, although not considered significant. Fuel/lubricant spillages would also potentially lead to the pollution of soil and groundwater. although the ES considers that such effects would be localised and, therefore, not significant. The ES notes that there would be potential for unknown contaminants to be present in the soils, although the risk of this is considered negligible. Inappropriate construction methods and earthworks would have the potential to affect the RIGS where it lies within the application site. Mitigation measures proposed include working in line with CIRIA C471 Good Practice on Site and the production of a CEMP to reduce topsoil damage and soil particulate run-off to negligible effect levels. Fuels would be stored in accordance with EA guidance which would mitigate the effect of spillages impacting local soils and groundwater quality to negligible levels. With regard to the RIGS, the ES recommends that, where possible, a piled foundation solution is utilised to minimise the impact on the sedimentary sequences. Further recommendations in respect of the RIGS include keeping cut and fill exercises as small as possible with a full watching brief during excavation works to record the sedimentary sequences. Based on the assessments undertaken, the ES concludes that, subject to the recommended mitigation measures being implemented, the potential ground condition and contamination effects associated with the development during the construction and operational phases would not be significant.

The ES gives a commitment to the appropriate handling and storage of soils during the construction period, as well as the appropriate reuse of these stored soils during the landscaping of the current proposals and the wider IGV development. This is welcomed as an appropriate and sustainable use of the existing soil resource. The loss of agricultural land is always of concern, although in real terms the loss associated with the current proposals would be relatively small and the soils of only moderate quality. In this respect, I note that NE did not raise any objections regarding agricultural land or soils. I further note that the ES sets out a range of good practice site management measures to ensure that the site and its surroundings are not affected by pollution during the construction and operational phases of the development.

The EHO has requested the imposition of conditions to account for any previously undetected contamination and I would agree that this is an appropriate response. I further note that the ES suggests that contamination (including asbestos) may be present within the Ashlea Farm buildings and I would therefore recommend that a further condition, requiring detailed information relating to the handling and disposal of such material, also be imposed.

The proposal would result in the loss of a portion of the RIGS. Cumulatively, such losses would be even greater in the context of IGV as, when complete, this development would cover almost the entire designation. Whilst RIGS are non-statutory, they generally represent geological features of County level

interest and are therefore a material consideration. The ES recommends mitigation measures, including a watching brief during excavation works to record the sedimentary sequences, as well as less intrusive construction methods, and I have recommended conditions to secure these. I do, however, have some concerns regarding the approach to the RIGS designation in the ES, which tends towards the geo-archaeological rather than the geomorphological, the latter being one of the reasons for the site's designation. I also consider the ES to be lacking in respect of an assessment of the potential cumulative impacts associated with this development and, as a consequence, there does not appear to be any suggestion of any comprehensive approach to ensuring adequate coverage of the RIGS and its geomorphology, the recording and subsequent depositing of such information. I would therefore recommend an additional condition requiring that such work be undertaken to ensure that a permanent record of the RIGS be created.

In conclusion, subject to the conditions set out above, I am satisfied that the proposal would not conflict with the relevant requirements of SDLP:P1 policies SD4 and BNE3 or Paragraph 170 of the NPPF.

Cumulative and in Combination Effects

The ES includes a chapter on cumulative and in combination effects. With regard to in combination effects, the ES notes other committed developments, particularly those that make up the wider IGV proposals. From a socioeconomic perspective, cumulative effects to population, construction employment, housing provision, employment generation and educational capacity, as a result of the wider IGV proposal, are considered to be major beneficial. Cumulative impacts in respect of deprivation were assessed to be moderate beneficial with the two schools and increased employment floorspace considered to address the higher deprivation levels in the vicinity of the site. Impacts to healthcare provision were assessed as negligible due to sufficient GPs, dentists and provision of other services existing in the surrounding area, whilst impacts to community facilities (retail/leisure facilities, as well as green and blue infrastructure) were considered to result in a minor beneficial effect.

With regard to specific cumulative environmental impacts, the ES argues that there would be no overriding cumulative environmental constraints that would preclude the proposed development.

Whilst there is no one universally accepted format for cumulative impact assessment, I concur with the ES that those appropriate to the consideration of the effects of the proposed link road and junction are the concurrent impacts associated with the development of the wider IGV and the in combination environmental effects of the development. One particularly important cumulative impact issue is the combined effect of the changes to the application site and its surroundings as a result of the development of IGV

which, if and when fully developed would, in my view, result in almost total and inevitable losses of the Wet Pasture Meadows LCT and the landform associated with the RIGS. The broad issues of the effects from such losses, however, would have been very apparent anyhow during each stage in the statutory processes leading to adoption of both the SDLP and the DCLP. Therefore it has to be assumed that the obviously adverse landscape and geological effects from such inevitable losses were under those local plan processes found to be outweighed by beneficial factors, such as the substantial socio-economic benefits to the area that would be achieved through the delivery of IGV.

In the assessment of individual topics above, I have concluded that there would be no substantive adverse impacts sufficient to warrant a recommendation of refusal. For this reason and the other reasons indicated above, I also consider that the proposal would not give rise to any cumulative adverse impacts sufficient to warrant refusal.

Climate Change

Paragraph 150 of the NPPF requires that new development should be planned for in ways that avoid increased vulnerability to the range of impacts arising from climate change. It says that when new development is brought forward in areas which are vulnerable, care should be taken to ensure that risks can be managed through suitable adaptation measures, including through the planning of green infrastructure.

As an infrastructure only project, in itself the development would not result in an increase in vehicular traffic, although it may result in a redistribution of traffic flows in the surrounding area. As noted above, in respect of air quality, the proposal would not result in a worsening of existing air quality standards, the key conclusions of the ES being that any impacts would be 'negligible' and 'not significant'. As a built structure, the proposed junction and link road is likely to have a negligible effect on climate change or any impacts arising from it, given the effect of additional tree replacement and landscaping proposed in the GIS and the proposed flood mitigation measures (which are designed to accommodate flood events +50% which equates to the situation in the 2080s) which go beyond those required in respect of the proposals. Furthermore, the overall scheme has been designed to incorporate/facilitate pedestrian and cycle links that would lead to existing and proposed employment/residential areas allowing for north-south and east/west movement across the IGV area which would promote more sustainable modes of transport.

It is acknowledged that the proposed junction/link road would not operate in isolation, its primary function being to support the delivery of IGV. Additional traffic generation associated with IGV, as well as the proposed new employment and residential development, are all likely to facilitate the generation of additional emissions to air into the atmosphere which could have

the potential to lead to impacts on climate change, both singly and in cumulation. However, the consequence of increased emissions in terms of potential impacts in respect of climate change would need to be assessed, and mitigated for, at the time that any development proposals came forward for consideration to either SDDC or Derby City. In light of the above, I am satisfied that the proposal would accord with the Paragraph 150 of the NPPF.

Conclusion

The Government places great weight on development. The development would have substantial socio-economic benefit to the area through the provision of essential highway infrastructure, thereby enabling the development of IGV to commence by unlocking currently inaccessible land. The proposal would accord with the strategic vision set out in the SDLP, both of which include policies that assume the provision of such infrastructure, as well as the wider aspirations of the NPPF in terms of the delivery of economic growth and the delivery of new homes.

In general, I am satisfied that the proposal would not result in significant adverse environmental impacts and that it would bring environmental benefit in the form of substantial biodiversity gain through GIS, as well as providing flood capacity in excess of that required in respect of the current proposals. The development would, however, also result in some adverse landscape and visual impacts and impacts to geology, through the loss of part of the Wet Pasture Meadows LCT and the Sinfin Moor RIGS. Viewed in cumulation with the wider IGV development, such losses would be more significant leading to both being lost almost in their entirety. However, in light of the fact that such losses are already assumed by the allocation of the land in both the SDLP and the DCLP, and that such development would clearly result in substantial socio-economic benefit, I do not consider that these losses would be sufficient to outweigh that benefit or justify a recommendation of refusal.

Planning Permission as sought by the application is therefore recommended to be authorised to be granted subject a set of conditions corresponding to a scheme of outline requirements for conditions below and Derby City Council authorising a corresponding grant of permission for the corresponding application made to the City Council.

(3) **Financial Considerations** No fee was payable to Derbyshire County Council in respect of this application although, as per the requirements of Paragraph 8(2)(b) to Schedule 1 of The Town and Country Planning (Fees for Applications, Deemed Applications, Requests and Site Visits) (England) Regulations 2012, the applicant has paid a fee of one and a half times the normal fee (e.g. that which would have been payable were the site located within the area of one local planning authority) to Derby City Council.

(4) **Legal Considerations** This is an application submitted under the Town and Country Planning General Regulations 1992 for development which the County Council itself proposes to carry out.

I do not consider that there would be any disproportionate impacts on anyone's human rights under the European Convention on Human Rights as a result of this permission being granted subject to the conditions referred to in the Officer's Recommendation.

(5) **Environmental and Health Considerations** As indicated in the report.

Other Considerations

In preparing this report the relevance of the following factors has been considered: prevention of crime and disorder, equality and diversity, human resources, property, social value and transport considerations.

(6) **Background Papers** File No.9.1600.3

Application documents and correspondence received from Pegasus Group on behalf of the Director of Property received 24 April 2019, together with the letter and accompanying documents from Pegasus Group on behalf of the Director of Property received 17 July 2019, the addendum to the ES and accompanying documents received from Pegasus Group on 24 July 2020 and the Breach analysis assessment and flood risk technical note received from Pegasus Group on 14 December 2020.

Letters from Historic England dated 23 April 2019 and 24 July 2019; emails from the Conservation, Heritage and Design section dated 24 April 2019, 16 May, 21 May and 24 May 2019, 18 July, 22 July, 25 July and 31 July 2019, 9 August, 12 August and 15 August 2019, and 13 August 2020; Letters and emails from Cadent Gas Ltd dated 26 April 2019, 3 May and 24 May 2019; letters from South Derbyshire District Council dated 30 April 2019, 5 June 2019, 8 August 2019 and 7 September 2020; letters from Highways England dated 10 May 2019, 2 August 2019, 8 August 2020, January and 27 January 2021; letters from Natural England dated 17 May 2019 and 9 August 2019; letters from Public Health England dated 21 May 2019, 24 July 2019 and 8 August 2020; email correspondence from East Midlands Airport dated 28 May 2019, 23 August, 29 August 2019, 11 September 2020 and 2 January 2021; email from Councillor Neil Atkin dated 28 May 2019; correspondence from the lead Local Flood Authority dated 30 May 2019, 15 August 2019 and 28 August 2020; email correspondence from Derbyshire Constabulary dated 31 May 2019, 22 July 2019 and 31 July 2020; letters from Derbyshire Wildlife Trust dated 31 May 2019, 28 August 2019 and 25 September 2020; letters from the Environment Agency dated 3 June 2019, 29 August 2019, 16 September 2020,11 December 2020 and 5 January 2021; letter from Friends of Sinfin

Moor Local Nature Reserve dated 6 June 2019 and 14 August 2020; email from Derby Airfield dated 7 June 2019; correspondence from Health and Safety Executive dated 12 June 2019, 23 July 2019,12 August 2019 and 16 August 2019; email correspondence from the Highways Authority dated 14 June 2019, 29 July 2019, 27 September 2019 and 13 October 2020; email correspondence from Stenson Fields Parish Council dated 18 June 2019 and 19 September 2019; email correspondence from Western Power Ltd dated 21 August 2019; letters from the Canal and River Trust dated 18 October 2019, 1 September 2020 and 13 January 2021; letter from the Department for Transport dated 7 January 2021; and email from Derbyshire County Council Emergency Planning team dated 27 January 2021.

- (7) **OFFICER'S RECOMMENDATION** That the Committee resolves to **authorise** the Director to grant a County Council planning permission for the development described in the application in respect of the County Council's administrative area subject to:
- 7.1 Derby City Council resolving to authorise a corresponding grant of planning permission in respect of the corresponding application for the development in its administrative area; and
- 7.2 conditions based on the following set of outline requirements:

Duration and Commencement

- 1) Limit time for commencement to five years from the date of the permission.
- 2) A corresponding planning permission to be in place, before commencement of development, for the connecting section of link road (to be granted by Derby City Council under application ref: 19/00417/FUL.

Approved Details

3) Condition adherence to the full set of plans and documents.

Highways

- 4) The A50 junction and link road not to open until the off-site highway works and traffic calming scheme on Deep Dale Lane are provided in accordance with approved details.
- 5) Improvements to be made to Deep Dale Lane, north of the A50.
- 6) Pre-commencement and post-implementation monitoring programme for traffic on Stenson Road/Wragley Way, Deepdale Lane south of the A50, and the A5132/A514 junctions and Barrow Bridge. If monitoring

- identifies highway improvement measures needed to mitigate any highway safety impacts, such measures to be secured by scheme submission and approval.
- 7) Precise details for all lighting (including temporary and task lighting).

Flood Risk/Drainage

- 8) Detailed flood risk management/mitigation scheme, having regard to submitted Flood Risk Assessment. To include details of outfall design. Relevant construction to be supervised by a registered Reservoir Panel Engineer.
- 9) Culverts, bridge crossings and open water features not to be constructed until detailed designs have been approved.
- 10) Watercourse diversions not to be constructed or undertaken until detailed designs have been approved.
- 11) Development not to take place until details of the method of disposal of surface water, including details of the outfall have been submitted and agreed. Surface water drainage to include sustainable drainage features in accordance with defined criteria.
- 12) A Handover Environmental Management Plan (HEMP) for maintenance of flood alleviation areas including arrangements for long term maintenance and management.
- 13) The development to be carried out in accordance with the submitted Flood Risk Assessment.
- 14) A scheme to treat and remove suspended soils from surface water runoff during construction.

Highway Noise Mitigation

- 15) A scheme of noise mitigation for the traffic noise generated once the development is operational.
- 16) Design and siting details along with technical specification for acoustic fence and a precise timetable for its delivery.

Ground Contamination/Pollution to Controlled Waters

17) Comprehensive treatment of contamination not previously identified [in line with NPPF Paragraph 170].

Archaeology

18) A detailed Written Scheme of Investigation (WSI) for archaeological work. The development to be carried out in accordance with the agreed

WSI and provision for analysis, publication, and dissemination of results.

Ecology/Green Infrastructure/Geology

- 19) A detailed hard and soft landscaping scheme, to be based on the principles set out in the Green Infrastructure Strategy. To include precise details for layout, planting and access.
- 20) A detailed Landscape and Ecological Management Plan (LEMP). Plan to include planting details, design objectives, management responsibilities and maintenance schedules.
- 21) A pre-commencement badger survey and any consequential mitigation needed.
- 22) A pre-commencement survey for water vole and any consequential mitigation needed.
- 23) Provision of mammal underpass beneath the link road.
- 24) A final Arboricultural Method Statement and a final Tree Protection Plan.
- 25) Timing of ground and vegetation clearance works to avoid the bird nesting season.
- 26) Geological reporting to provide a record of the Sinfin Moor RIGS to be lost.

CEMPs

27) A detailed Construction Environmental Management Plan (CEMP) which shall include a detailed construction dust management plan.

Statement of Compliance with Article 35 of the Town and Country Development Management Procedure Order 2015

The Council, as County Planning Authority (the "Authority"), worked with the Council as applicant (the "applicant") in a positive and pro-active manner based on seeking solutions to problems arising in the processing of planning applications in full accordance with this Article. The applicant has engaged in pre-application discussions with the Authority prior to the submission of the application. The applicant was given clear advice as to what information would be required. The Authority also responded to a formal Scoping Opinion request concerning the issues to be addressed in the Environment Statement that accompanied the application.

The Environmental Statement, as submitted, covered all the necessary topics but did not fully address all the relevant aspects and issues of each topic and contained some assessments where the presentation was not satisfactory. In accordance with the EIA regulations, the applicant was given clear advice as to the form and content of the supplementary survey work required to enable an appropriate assessment of the proposed development to be made.

The requested information related to the need to complete the range of survey work submitted with the application and the need for further assessment of the impacts on hydrology and flood risk, archaeology, noise and transport. These issues arose from the comments from the respective consultees to the original planning application documentation. The applicant also agreed to extend the timescale for the determination of the application.

In accordance with Section 100ZA of the Town and Country Planning Act 1990, as amended and the Town and Country Planning (Pre-Commencement Conditions) Regulations 2018 ('the Regulations'), the applicant has been provided with an initial draft schedule of conditions. However, to promote consistency with the conditions to any planning permission issued by Derby City Council, it is now proposed that a new draft schedule, reflecting the outline requirements' set out in the recommendation to this report, would be provided to the applicant before the issue of any permission.

Draft footnotes to decision notice:

Highways England

- The highway mitigation work associated with this consent involves works within the public highway, which is land over which you have no control. Highways England therefore requires you to enter into a suitable legal Section 278 agreement to cover the design check, construction and supervision of the works. Contact should be made with Highways England Section 278 Service Delivery Manager David Steventon to discuss these matters at david.steventon@highwaysengland.co.uk.
- The applicant should be made aware that any works undertaken to Highways England network are carried out under the Network Occupancy Management policy, in accordance with Highways England procedures, which currently requires notification/booking three months prior to the proposed start date. Exemptions to these bookings can be made, but only if valid reasons can be given to prove they will not affect journey time reliability and safety. The contact email for these matters is Area7networkoccupancy@highwaysengland.co.uk.

Highway Authority

- 3) Pursuant to sections 149 and 151 of the Highways Act 1980, steps shall be taken to ensure that mud or other extraneous material is not carried out of the site and deposited on the public highway. Should such deposits occur, it is the applicant's responsibility to ensure that all reasonable steps (e.g. street sweeping) are taken to maintain the roads in the vicinity of the site to a satisfactory level of cleanliness.
- 4) Pursuant to Section 38 and the Advance Payments Code of the Highways Act 1980, the proposed new estate roads should be laid out and constructed to adoptable standards and financially secured. Advice regarding the technical, financial, legal and administrative processes involved in achieving adoption of new residential roads may be obtained from the Department of Economy, Transport and Environment at County Hall, Matlock (tel: 01629 533190 and ask for the Development Control Implementation Team).
- 5) Pursuant to Section 163 of the Highways Act 1980, where the site curtilage slopes down towards the public highway measures shall be taken to ensure that surface water run-off from within the site is not permitted to discharge across the footway margin. This usually takes the form of a dish channel or gulley laid across the access immediately behind the back edge of the highway, discharging to a drain or soakaway within the site.
- Pursuant to Section 184 of the Highways Act 1980 and Section 86(4) of the New Roads and Streetworks Act 1991 prior notification shall be given to the Department of Economy Transport & Environment at County Hall, Matlock regarding access works within the highway. Information, and relevant application forms, regarding the undertaking of access works within highway limits is available via the County Council's website www.derbyshire.gov.uk, email highways.hub@derbyshire.gov.uk or telephone Call Derbyshire on 01629 533190.
- 7) Pursuant to Section 278 of the Highways Act 1980 and the provisions of the Traffic Management Act 2004, no works may commence within the limits of the public highway without the formal written Agreement of the County Council, as Highway Authority. Advice regarding the technical, legal, administrative and financial processes involved in Section 278 Agreements may be obtained from Development Control at County Hall, Matlock (tel: 01629 538658). The applicant is advised to allow approximately 12 weeks in any programme of works to obtain a Section 278 Agreement.
- 8) Pursuant to Section 50 (Schedule 3) of the New Roads and Streetworks Act 1991, before any excavation works are commenced within the limits

- of the public highway, at least 6 weeks prior notification should be given to the Department of Economy, Transport and Environment at County Hall, Matlock (tel: 01629 533190 and ask for the New Roads and Streetworks Section or e-mail highways.hub@derbyshire.gov.uk).
- 9) Construction works are likely to require Traffic Management and advice regarding procedures should be sought from Mr J Adams, Traffic Management, 01629 538628. All road closure and temporary traffic signal applications will have to be submitted via the County Councils web-site; relevant forms are available via the following link www.derbyshire.gov.uk/transport_roads/roads_traffic/roadworks/default.asp

Lead Local Flood Authority

- 10) The County Council does not adopt any Sustainable Drainage System (SuDS) schemes at present (although may consider ones which are served by highway drainage only). As such, it should be confirmed prior to commencement of works who will be responsible for SuDS maintenance/management once the development is completed.
- 11) Any works in or nearby an ordinary watercourse may require consent under the Land Drainage Act (1991) from the County Council. For further advice, or to make an application please contact Flood.Team@derbyshire.gov.uk.
- 12) No part of the proposed development shall be constructed within 3m-8m of an ordinary watercourse and a minimum 3m for a culverted watercourse (increases with size of culvert). It should be noted that the County Council has an anti-culverting policy.
- 13) The applicant should be mindful to obtain all the relevant information pertaining to proposed discharge in land that is not within their control, which is fundamental to allow the drainage of the proposed development site.
- 14) The applicant should demonstrate, to the satisfaction of the County Planning Authority, the appropriate level of treatment stages from the resultant surface water discharge, in line with Table 4.3 of the CIRIA SuDS Manual C753.
- 15) The County Council would prefer the applicant to utilise existing landform to manage surface water in mini/sub-catchments. The applicant is advised to contact the County Council's Flood Risk Management team should any guidance on the drainage strategy for the proposed development be required.
- 16) The applicant should provide a flood evacuation plan which outlines:

- The flood warning procedure
- A safe point of extraction
- How users can safely evacuate the site upon receipt of a flood warning
- The areas of responsibility for those participating in the plan
- The procedures for implementing the plan
- How users will be made aware of flood risk
- How users will be made aware of flood resilience
- Who will be responsible for the update of the flood evacuation plan
- 17) Flood resilience should be duly considered in the design of the new building/s or renovation. Guidance may be found in BRE Digest 532 Parts 1 and 2, 2012 and BRE Good Building Guide 84.
- 18) Surface water drainage plans should include the following:
 - Rainwater pipes, gullies and drainage channels including cover levels
 - Inspection chambers, manholes and silt traps including cover and invert levels.
 - Pipe sizes, pipe materials, gradients and flow directions and pipe numbers.
 - Soakaways, including size and material.
 - Typical inspection chamber/soakaway/silt trap and surface water attenuation details.
 - Site ground levels and finished floor levels.
- 19) On Site Surface Water Management:
 - The site is required to accommodate rainfall volumes up to 1 in 100 year return period (plus climate change) whilst ensuring no flooding to buildings or adjacent land.
 - The applicant will need to provide details and calculations including any below ground storage, overflow paths (flood routes), surface detention and infiltration areas, etc, to demonstrate how the 100 year + 30% Climate Change rainfall volumes will be controlled and accommodated, also incorporating a sensitivity test to 40% Climate change. In addition an appropriate allowance should be made for urban creep throughout the lifetime of the development as per 'BS 8582:2013 Code of Practice for Surface Water Management for Developed Sites' (to be agreed with the LLFA).
 - Production of a plan showing above ground flood pathways (where relevant) for events in excess of 1 in 100 year rainfall, to ensure exceedance routes can be safely managed.

• A plan detailing the impermeable area attributed to each drainage asset (pipes, swales, etc).

Peak Flow Control

- For greenfield developments, the peak run-off rate from the development to any highway drain, sewer or surface water body for the 1 in 1 year rainfall event and the 1 in 100 year rainfall event, should never exceed the peak greenfield run-off rate for the same event.
- For developments which were previously developed, the peak run-off rate from the development to any drain, sewer or surface water body for the 1 in 1 year rainfall event and the 1 in 100 year rainfall event must be as close as reasonably practicable to the greenfield run-off rate from the development for the same rainfall event, but should never exceed the rate of discharge from the development, prior to redevelopment for that event.

Volume Control

- For greenfield developments, the run-off volume from the development to any highway drain, sewer or surface water body in the 1 in 100 year, 6 hour rainfall event must not exceed the greenfield run-off volume for the same event
- For developments which have been previously developed, the run-off volume from the development to any highway drain, sewer or surface water body in the 1 in 100 year, 6 hour rainfall event must be constrained to a value as close as is reasonably practicable to the greenfield run-off volume for the same event, but must not exceed the run-off volume for the development site prior to redevelopment for that event.

Note:- If the greenfield run-off for a site is calculated at less than 2 l/s, then a minimum of 2 l/s could be used (subject to approval from the LLFA).

- Details of how the on-site surface water drainage systems shall be maintained and managed after completion and for the lifetime of the development to ensure the features remain functional.
- Where cellular storage is proposed and is within areas where it may be susceptible to damage by excavation by other utility contractors, warning signage should be provided to inform of its presence.
 Cellular storage and infiltration systems should not be positioned within the highway.
- Guidance on flood pathways can be found in BS EN 752.
- The Greenfield run-off rate which is to be used for assessing the requirements for limiting discharge flow rates and attenuation storage for a site should be calculated for the whole development area (paved

and pervious surfaces - houses, gardens, roads, and other open space) that is within the area served by the drainage network whatever size of the site and type of drainage system. Significant green areas such as recreation parks, general public open space etc., which are not served by the drainage system and do not play a part in the run-off management for the site, and which can be assumed to have a run-off response which is similar to that prior to the development taking place, may be excluded from the greenfield analysis.

K. If infiltration systems are to be used for surface water disposal, the following information must be provided:

- Ground percolation tests to BRE 365.
- Ground water levels records. Minimum 1m clearance from maximum seasonal groundwater level to base of infiltration compound. This should include assessment of relevant groundwater borehole records, maps and on-site monitoring in wells.
- Soil / rock descriptions in accordance with BS EN ISO 14688-1:2002 or BS EN ISO 14689-1:2003.
- Volume design calculations to 1 in 100 year rainfall + 30% climate change standard. An appropriate factor of safety should be applied to the design in accordance with CIRIA C753 Table 25.2.
- Location plans indicating position (soakaways serving more than one property must be located in an accessible position for maintenance).
 Soakaways should not be used within 5m of buildings or the highway or any other structure.
- Drawing details including sizes and material.
- Details of a sedimentation chamber (silt trap) upstream of the inlet should be included.

Soakaway detailed design guidance is given in CIRIA Report 753, CIRIA Report 156 and BRE Digest 365.

- 20) All Micro Drainage calculations and results must be submitted in .MDX format, to the Local Planning Authority. (Other methods of drainage calculations are acceptable.)
- 21) The applicant should submit a comprehensive management plan detailing how surface water shall be managed on site during the construction phase of the development ensuring there is no increase in flood risk off site or to occupied buildings within the development.

Cadent Gas

22) The applicant is advised to contact Cadent Gas network protection team well in advance of the works commencing. The applicant's attention is

also drawn to the High Pressure Gas Pipelines Guidance 'Specification for Safe Working in the Vicinity of Cadent and/or National Grid High Pressure Gas Pipelines and Associated Installations - Requirements for Third Parties' (SSW22).

This can be obtained from:

http://www2.nationalgrid.com/WorkArea/DownloadAsset.aspx?id=33968

Dial Before You Dig Pipelines Guidance:

http://www2.nationalgrid.com/WorkArea/DownloadAsset.aspx?id=33969

Western Power

23) The applicant is advised to contact Western Power Distribution on 01332 276675 or 07710 155781 well in advance of the works commencing in order to obtain the necessary diversion/disconnection quotes.

Environment Agency

- 24) Compliance with the Reservoirs Act 1975 The applicant has confirmed that the two structures referred to as the Western Flood Storage Area (WFSA) and Southern Flood Storage Area (SFSA) will be classified as large raised reservoirs (i.e. with capacity to store greater than 25,000m³ above ground level) and will require compliance with the Reservoirs Act 1975. The Environment Agency are the enforcement authority for the Reservoirs Act 1975 and under this Act it is a requirement that the reservoir owner:
 - Appoint a qualified civil engineer ('construction engineer') under Section 6 of the Reservoirs Act to design and supervise the construction work. Details of suitably qualified engineers can be found here https://www.gov.uk/reservoirs-a-guide-for-owners-and-operators.
 - Provide the national reservoir safety team with a notice of their intention under Section 21 of the Reservoirs Act, not less than 28 days before work on-site is due to start.
 - Appoint a supervising engineer and an inspecting engineer if the reservoirs are considered high risk.

Responsibilities under The Reservoir Act 1975

- 25) The Reservoir Act 1975 sets out the following responsibilities for the reservoir owner:
 - Appoint a qualified civil engineer ('construction engineer') under Section 6 of the Reservoirs Act to design and supervise the construction work.

- Provide the national reservoir safety team with a notice of their intention under Section 21 of the Reservoirs Act, not less than 28 days before work on-site is due to start.
- Appoint a supervising engineer and an inspecting engineer if the reservoirs are considered high risk.

Tim Gregory
Director for Economy, Transport and Environment