



Birmingham Local Plan Issues & Options

Sustainability Appraisal
Interim Report

Birmingham City Council

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Delivering a better world

Quality information

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1. Introduction

- 1.1 The emerging Birmingham Local Plan (BLP) will shape how the city will develop over the next 20 years. It will set out the spatial strategy and planning framework to be used to guide development in the city. Once adopted (c. 2026) the BLP will replace the existing Birmingham Development Plan (2017), Aston, Newtown, Lozells Area Action Plan (2012) and Longbridge Area Action Plan (2009).
- 1.2 The Plan development process is currently at the Issues and Options stage which summarises key planning issues such as the level and distribution of housing and employment growth over the Plan period. The Issues and Options document also sets out proposed / potential changes to policy approaches in the existing Birmingham Development Plan.
- 1.3 A sustainability appraisal (SA) is being undertaken alongside the Local Plan review, which is a legal requirement. The aim of SA is to assess the effects of a Plan (and reasonable alternatives) with a view to identifying significant effects and identifying ways to minimise negative effects and maximise the positives.
- 1.4 This report is an interim step in the Sustainability Appraisal process, setting out an appraisal of the 'Issues and Options' document. This is a voluntary stage intended to support engagement and the decision making process. Further appraisals will be undertaken as the Plan progresses.
- 1.5 The structure of the Interim SA report is as follows:
 - Housing growth options
 - Employment Options
 - Other Plan Options
 - Proposed policy changes

2. Options for appraisal

Introduction

2.1 The 'Issues and Options' document sets out the vision and objectives for Birmingham and sets the level of housing and employment growth and identifies initial / high level options for the distribution of growth. It also considers potential policy approaches including changes to currently adopted BDP policies. These are summarised below.

Housing growth options

2.2 Five options are considered for the distribution of housing growth which can be summarised as follows:

2.3 **Option 1 Increase housing densities:** this option seeks to maximise housing densities (dwellings per hectare of land) on sites allocated for residential development within the City Centre. The adopted BDP (policy TP30) specifies densities ranging from 40 to 100 dwellings per hectare (dph) depending on locations with the highest density (100 dph) proposed for City Centre sites, 50 dph in areas well served by public transport and 40 dph elsewhere. Having analysed the densities of sites recently granted planning permission, the Council found that it is reasonable to revise densities as follows:

- 40 dph in suburban locations
- 70 dph in and around urban centres¹
- 400 dph within and around the city centre².

2.4 **Option 2 More active public sector land assembly:** this involves acquiring parcels of land from multiple landowners (including through compulsory purchase) and assembling them to produce larger sites which deliver more housing and provide wider regeneration benefits. There are few of these opportunities within the city, but the approach could also be applied to smaller schemes which would typically result in higher densities.

2.5 **Option 3: Further comprehensive housing regeneration:** there have been several regeneration schemes of existing estates to deliver better homes, and improving the attractiveness of neighbourhoods and providing enhanced community facilities and open space. This option involves identifying further housing regeneration areas to deliver similar improvements.

2.6 **Option 4: Utilise poor quality under-used open space for housing:** this involves developing open space that is currently of limited value or underutilised to provide new housing. In many parts of the city there is already a shortage of good quality open space, so opportunities to utilise open space for housing are limited. The Council also aspires to increase the amount of and quality of open space in the city.

2.7 **Option 5: Utilise some employment land for housing:** involves repurposing poorer quality / underused employment land for housing development.

¹ 'Around' centres is defined as within a 400 buffer from the boundary of an identified local centre.

² 'Around' City centre is defined as within a 400 buffer from the boundary of the City centre.

- 2.8 **Option 6: Release Green Belt land for housing:** involves releasing Green Belt land for housing development. The Green Belt currently covers around 15% of the city's area. The majority is in the north of the city with smaller areas where the city boundary meets Sandwell to the west and Bromsgrove to the south. There are also a number of 'green wedges' along river valleys, such as the Cole Valley and Woodgate Valley. The only significant areas of Green Belt remaining are in the north east of Birmingham in Sutton Coldfield.
- 2.9 It is important to recognise that these options above are not 'mutually exclusive' and would not in themselves represent a spatial strategy for the Plan. Some of the options overlap with one another in terms of the locations that could be involved, and to meet identified housing needs, it is likely that a range of sources would need to be secured, rather than just one of these options.
- 2.10 The purpose of exploring and appraising a range of options at this stage is not to compare them to one another (or say which is better or worse), but to identify what potential issues and opportunities each approach would generate, and then this can be fed into the development of a more detailed strategy (and reasonable alternatives), which is likely to contain elements of several of these initial options.

Employment options

- 2.11 The BLP will set out the amount of employment land required up to 2042. This will be informed by the findings of the recent Housing and Employment Development Needs Assessment (HEDNA 2022)³ which identifies a need for 295.6 ha of employment land over the BLP period. However, the most recent assessment of available employment land supply (Housing Employment Land Availability Assessment 2022) (HELAA)⁴ estimates employment land supply capacity to be around 221.96 ha, leaving a shortfall of 73.64 ha which needs to be found through the BLP process. Therefore, the Issues and Options document considers the following broad options/ approaches to increase employment land supply:
- 2.11.1 **Option 1: To continue investigating and identifying further sources of land supply to address the shortfall:** the Council cites opportunities for future industrial development, identified (through the HEDNA), within the Core Employment Areas (CEAs). Further potential opportunities have been identified but these are yet to be confirmed by the landowners concerned.
- 2.11.2 **Option 2: To accommodate the shortfall within other authorities in the wider Housing Market Area (HMA):** this is to be discussed by the concerned authorities to determine whether any employment land proposed in their forthcoming plans can meet some of Birmingham's need. For example, evidence for the Black Country Plan has identified 53 hectares of potential development land at the West Midlands Strategic Rail Freight Interchange in South Staffordshire that can cater for a share of Birmingham's B8 warehousing needs.
- 2.12 Similar to the housing options, the employment options are high level in nature, and not site specific. Therefore, the appraisals are undertaken in this context

³ HEDNA 2022

⁴ HELAA 2022

and are designed to inform the identification of a more detailed approach to employment (including detailed alternatives if they are reasonable).

3. Appraisal methods

Methods

- 3.1 The appraisal has been undertaken by assessing each option / proposed policy changes against a framework of sustainability topics, objectives and guiding appraisal questions.
- 3.2 The framework for the SA was established at the Scoping Stage of the SA process and finalised following consultation with a range of stakeholders (including the statutory consultation bodies).
- 3.3 Table 3-1 below lists the headline topics and objectives (Appendix A replicates the full SA Framework as established in the scoping report).

Table 3-1 The SA Objectives

SA Topic	SA Objectives
1. Housing	1a) To meet housing needs of the current and future resident and by providing decent affordable homes of right quality and type.
2. Equality, diversity and community development	2a) To promote safer communities and reduce the fear of crime and antisocial behaviour.
2. Equality, diversity and community development	2b) To reduce Index of Multiple Deprivation (IMD) to address poverty and help improve access to facilities and services for disadvantaged individuals and communities
2. Equality, diversity and community development	2c) Ensure easy and equitable access to services, facilities and opportunities.
2. Equality, diversity and community development	2d) Support, empower and connect communities to create a healthier and just society.
3. Health and wellbeing	3a) To improve the health of the population and reduce health inequalities.
3. Health and wellbeing	3b) To improve access and availability of sports and recreation facilities.
3. Health and wellbeing	3c). To improve access and availability to open spaces.
4. Waste and resource use	4a) Encourage and enable waste minimisation, reuse, recycling and recovery.
	4b) To ensure efficient use of natural resources such as water and minerals.

SA Topic	SA Objectives
5. Economy and employment	5a). Achieve a strong, stable and sustainable economy and prosperity for the benefit of all of Birmingham's inhabitants.
5. Economy and employment	5b) To achieve sustainable levels of prosperity and growth throughout the city.
5. Economy and employment	5c) To improve educational skills of the overall population
5. Economy and employment	5d) To maintain and enhance the vitality and viability of town and retail centres
7. Air quality	7a). Minimise air pollution levels and create good quality air.
7. Air quality	7b) Increase use of public transport, cycling and walking as a proportion of total travel and ensure development is primarily focused in the major urban areas, making efficient use of existing physical transport infrastructure
8. Water quality	8a) Minimise water pollution levels and create good quality water.
9. Land and soil	9a) Minimise soil pollution levels and create good quality soil.
9. Land and soil	9b) Encourage land use and development that creates and sustain well-designed, high quality distinctive and sustainable places.
9. Land and soil	9c) Encourage the efficient use of previously developed land and buildings and encourage efficient use of land.
10. Achieving zero carbon living	10a) Minimise Birmingham's contribution to the cause of climate change by reducing emissions of greenhouse gases from transport, domestic commercial and industrial sources.
10. Achieving zero carbon living	10b) Promote and ensure high standards of sustainable resource efficient design, construction and maintenance of buildings
10. Achieving zero carbon living	10c) Urgently and drastically reduce carbon emissions from transport to contribute to the Council's decarbonisation commitment.
11. Flooding	11a) To reduce vulnerability to climatic events and flooding.
12. Historic environment	12a) Value, conserve, enhance and restore Birmingham's built and historic and archaeological environment and landscape.

SA Topic	SA Objectives
13.Natural landscape	13a) Value, protect, enhance and restore Birmingham's natural landscape.
14. Biodiversity and geodiversity	14a) To conserve and enhance biodiversity and geodiversity.
15. Accessibility and transport	15a) Increase use of public transport, cycling and walking as a proportion of total travel and ensure development is primarily focused in the major urban areas, making efficient use of existing physical transport infrastructure.
15. Accessibility and transport	15b) Ensure development reduces the need to travel and reduce the negative impacts of transport on the environment
15. Accessibility and transport	15c). Urgently and drastically reduce carbon emissions from transport to contribute to the Council's decarbonisation commitment.

- 3.4 The aim of appraisals at this stage is to identify what the effects would be as a result of the plan proposals / options and how this compares to what might otherwise be expected to happen (the projected baseline).
- 3.5 At this stage the options / proposed policy changes are necessarily outlined in broad terms and will be refined and become more defined as the LP process progresses. Therefore, this interim appraisal considers the effects in broad terms to determine the potential effects (rather than providing a detailed assessment of significance). When identifying potential effects, account is taken of a range of factors including: the magnitude of change, sensitivity of receptors, the likelihood of effects occurring, the length and permanence of effects and cumulative effects. The potential effects are classified as shown in Table 3.2.

Table 3-2 Scale used to record potential effects

Potential to be significantly positive	++
Likely to be positive	+
Neutral	0
Likely to be negative	-
Potential to be significantly negative	--
Uncertainty	?

4. Housing options: Summary of findings

- 4.1 Table 4.1 presents a visual summary of the options appraisal findings. Below is a summary of the effects for each of the Options. A more complete appraisal is presented in **Appendix B**.
- 4.2 It is important to point out that the options appraised are not mutually exclusive it is likely that a combination of several or all options would be required in order to fulfil the housing growth required. As such this appraisal does not rate the option against each other but rather highlights the potential effects associated with each option.
- 4.3 **Option 1** (Increased housing densities) scores particularly well with likely significant positives for housing, economy and employment, and accessibility and transport as the approach would increase housing provision with less land take and increase growth in more sustainable, well-connected locations; improving accessibility services, employment and transport. Conversely, the option could potentially have significant negative effects on the historic environment due to the concentration of heritage assets in the City Centre and urban centres; making it harder to avoid impacts on the character of such locations.
- 4.4 **Option 2** (More active public sector land assembly) scores relatively well with respect to six of the SA topics as it would help improve housing land supply and address the housing shortfall including for affordable housing. No likely significant effects (either positive or negative) are predicted for this option but as with other options, there are some potentially negative effects on air quality, water quality, the historic environment and biodiversity due to the scale of growth urban areas. It is important to point out that effects are ultimately dependent on the locations, sizes and site-specific policies pertaining to the assembled sites and therefore there is a degree of uncertainty at this stage.
- 4.5 **Option 3** (Further comprehensive housing regeneration) has some mixed effects with respect to housing and equality, diversity and community development as the option is unlikely to result in a substantial net increase in dwellings and may have negative effects in the short term during the demolition and construction phases (which will reduce the housing stock including affordable housing and social rents in the interim). However, the regeneration approach is also likely to produce positive effects due to improved quality of housing, environment, open space and amenities. Due to the overall scale of development required, negative effects are predicted for the air quality, water quality, achieving net zero living and the historic environment topics, but these are unlikely to be significant. The option is neutral with respect to the remaining topics. There is a large degree of uncertainty at this stage which would be resolved once the extent and locations of proposed regeneration sites are identified.
- 4.6 **Option 4** (Utilising poor quality under-used open space for housing) is positive with respect to housing as it would likely improve housing land supply with knock on positive effects on equality, economy and employment, land and soils (as growth is likely to reduce land take outside urban areas) and accessibility/transport (as sites are likely to be in more accessible locations). However, mixed effects are likely on health and wellbeing; positive ones due to the enhanced housing provision (including affordable housing) and potentially negative

implications due to the reduction of open space which is already underprovided in the City. Mixed effects are also predicted with respect to the natural landscape; negative effects due to the loss of amenity and change to the existing landscape/ townscape character with potential positive effects due to reduced encroachment on areas of high landscape sensitivity and the potential for improved provision of higher quality open/ green space.

- 4.7 **Option 5** (Utilise some Core Employment Area land for housing) is likely to have positive effects on housing as it will improve housing land supply with knock on positive effects on health and wellbeing due to the increased choice of housing, including affordable housing. The option could also result in negative effects on health and wellbeing due to the location of new housing within employment areas. These may not be well suited to residential use due pollution or noise associated with some industrial / commercial premises and the lack of comprehensive walking/ cycling infrastructure within the Core Employments Areas (CEAs). The option also has mixed effects with respect to employment and the economy with additional housing helping support economic growth (positive effects) but potential negative effects due to the loss of employment land. Positive effects are likely with respect to the landscape, and land and soil topics as the option would reduce development pressures on areas of higher landscape sensitivity and non-urban areas containing good quality agricultural land.
- 4.8 **Option 6** (Release Green Belt for housing) could potentially generate significant positive effects on housing due to the improved land supply and potential for larger scale developments such as SUEs with associated beneficial effects on health, wellbeing and the economy. However, this option is likely to have negative effects on land and soil and the natural landscape as it will lead to the loss of some high-quality agricultural land and change the character of areas of landscape sensitivity in the Green Belt areas. Some locations in the Green Belt are also not ideally located in terms of accessibility.

Table 4-1 Summary of findings: Housing Growth Options

SA Topic	Option 1	Option 2	Option 3	Option 4	Option 5	Option 6
Housing	Green	Light Green	Grey	Yellow	Light Green	Green
Equality, diversity and community development	Light Green	Light Green	Yellow	Light Green	Grey	Grey
Health and wellbeing	Light Green	Light Green	Grey	Light Green	Light Green	Light Green
Waste and resource use	Light Green	Light Green	Grey	Grey	Grey	Grey
Economy and employment	Green	Grey	Grey	Light Green	Light Green	Light Green
Air quality	Yellow	Yellow	Yellow	Yellow	Yellow	Yellow
Water quality	Yellow	Yellow	Yellow	Yellow	Yellow	Yellow
Land and soil	Light Green	Light Green	Light Green	Light Green	Light Green	Red
Achieving zero carbon living	Yellow	Yellow	Yellow	Yellow	Yellow	Yellow
Flooding	Light Green	Grey	Grey	Yellow	Grey	Grey
Historic environment	Red	Yellow	Yellow	Yellow	Light Green	Yellow
Natural landscape	Light Green	Grey	Grey	Light Green	Light Green	Red
Biodiversity and geodiversity	Grey	Yellow	Grey	Yellow	Yellow	Yellow
Accessibility and transport	Green	Light Green	Grey	Light Green	Grey	Yellow

5. Appraisal findings: Employment options

Summary of findings

- 5.1 Table 5.1 presents a visual summary of the options appraisal findings. Below is a summary of the effects for each of the two high level employment options identified at this stage. A more complete appraisal is presented in **Appendix C**.
- 5.2 There is considerable uncertainty involved in predicting the effects of the options at this level of detail. This is because effects could vary widely depending on the actual sites and locations that are involved. The appraisals at this stage should therefore be taken in this context, and as broad indications of the potential merits and drawbacks of each approach.
- 5.3 Option 1 brings potential for the widest range of effects, which is to be expected given that it would involve additional land being identified for employment in Birmingham itself. However, the effects are mixed for many SA topics, as location will be important in determining whether effects are positive or negative. The most beneficial aspect of Option 1 is in terms of economy and employment, as it will deliver needs where they are arising, which is a potential significant positive effect. Provided that jobs are accessible to communities and well located, this ought to bring benefits in terms of health, equality and community development. Effects on environmental factors such as heritage, landscape, biodiversity are uncertain, but could be negative depending on the sites involved. Conversely, they could help reduce pressure on greenfield development. A balance will need to be carefully explored though, as there is also pressure to maximise the use of land for housing in the urban areas.
- 5.4 Addressing the shortfall in employment locally may also lead to increases in employment related traffic, which could affect air quality, and could also mean more growth in areas at risk of flooding.
- 5.5 Meeting the shortfall in land outside of Birmingham has some clear environmental benefits for Birmingham itself, but it is unclear what the knock on effects would be in the wider HMA. However, given that there is limited land supply in the City, and the area is already highly urbanised, a reduced pressure to address all employment needs locally could help to free land for housing and / or reduce the need to utilise sub-optimal sites. This could have subsequent knock-on benefits with regards to heritage, landscape, biodiversity, land and soil (which may otherwise be difficult to avoid). In terms of social factors though, Option 2 would be less beneficial with regards to Birmingham's economy (though would still have some positives) and could make it more difficult for less mobile members of the community to access the full range of employment on offer. These are negative effects, but are only considered to be minor given that the majority of needs would still be met in the City.

Table 5-1 Summary of findings: Employment Growth Options

SA Topic	Option 1		Option 2	
Housing	?			
Equality, diversity and community development	?	?	?	
Health and wellbeing	?	?		
Waste and resource use	?		?	
Economy and employment				
Air quality	?			
Water quality				
Land and soil	?		?	
Achieving zero carbon living	?		?	
Flooding	?			
Historic environment	?	?		
Natural landscape	?	?	?	
Biodiversity and geodiversity	?	?	?	
Accessibility and transport	?	?	?	?

6. Appraisal of proposed policy changes

Introduction

6.1 A crucial element of the plan making processes is to establish a suitable strategy for development growth and distribution. The Issues and Options document puts forward a range of policy approaches (including changes to adopted policy approaches) to help guide development. This section presents an appraisal of the preliminary high level policy approaches outlined in the Issues and Options stage of the BLP against the SA Framework. The high level effects have been identified taking into account magnitude, duration, frequency, and likelihood. Combined, these factors have helped to identify the likely significance of effects, whether these are positive or negative. The policies are individually considered and appraised at this stage, but will be considered in their totality in combination with the spatial strategy at the next stages of the plan and SA processes. Where policies are not mentioned under a particular SA Topic, then the assumption should be that they are of little relevance and would not give rise to effects.

Methods

6.2 The potential significance of effects is recorded according to the following scoring convention;

- **Potential significant positive effects**
- **Likely positive effects**
- **Neutral effects**
- **Likely negative effects**
- **Potential significant negative effects**
- **? Indicates uncertainty**

Appraisal findings

6.3 The below discussion takes each SA topic in turn and appraises the policies / policy changes proposed in the Issues and Options document, outlining the potential effects and their likely significance. The discussion below considers each policy proposal / policy change in turn and considers effects on the SA topics of relevance; i.e. those likely to be affected by the policy being appraised.

6.4 **Affordable housing:** The proposed policy changes seek to maximise affordable housing (AH) provision in Birmingham. The adopted policy (BDP policy TP31) seeks 35% AH provision on sites of 15 dwellings and over. The recent HEDNA estimates a need for 5,396 AH per year and 1,031 dpa affordable ownership tenures. When 'existing households falling into need' i.e. those already in accommodation, is excluded from the above figure a net 'current need' of 3,049 AH per annum results. This represents 45% of the total housing need calculated in the HEDNA (using the standard method); a very substantial portion of the total growth required. The HEDNA concludes *the analysis identifies a notable need for affordable housing, and it is clear that provision of new affordable housing is*

an important and pressing issue in the area’ adding that ‘affordable housing delivery should be maximised’.

- 6.5 Therefore, the proposed policy change could be beneficial in helping achieve more AH provision. However, this will ultimately depend on viability considerations which will vary from site to site. Too rigid a requirement for greater AH contribution may make development unviable. However, this is recognized in the proposed policy change which states that the Council will *test the 35% to see if a higher contribution is viable*. Overall, the policy change is **potentially positive** with regards to housing and health and wellbeing as it is likely to maximise AH delivery without jeopardising viability. The effects on other SA topics are considered likely to be limited given that viability will need to be taken into consideration.
- 6.6 **Family Housing:** Seeks to safeguard family housing (use class C3) from potential loss, through conversion of larger family homes into smaller multiple units or Houses in Multiple Occupation (HMO). The Council already has a city-wide Article 4 direction relating to HMOs and HMO SPD in place. The latter identifies a higher demand in the city for 2 and 3 bed dwellings and that the proportion of households with dependent children is higher in Birmingham than regional and national averages, adding that there is a particular shortage of family accommodation. The SPD requires applicants to demonstrate that there is an established lack of demand for the single family use of the property to be converted. Whilst the guidance is helpful in reinforcing the Council’s intention to safeguard family housing it may have adverse effects on AH provision as smaller dwellings in HMOs are likely to be more affordable to those most in need, particularly younger residents. Having said that the proposed policy change is not expected to significantly affect the baseline position given the existence of the above-mentioned Article 4 direction and the SPD. Therefore, **neutral effects** are envisaged at this stage for all SA topics. Site specific policies may be more effective in helping achieve an appropriate housing mix on a specific site, appropriate to its location.
- 6.7 **Housing for older people:** The Council is considering whether to introduce a policy that requires the provision of a specific percentage of homes for older people and explore allocating sites/ parcels within larger sites for specialist housing. Additionally, the Council may consider a policy requiring development above a certain threshold to provide a percentage (10-15%) wheelchair accessible homes. Typically, people downsize to more manageable properties as they age and there is often a significant degree of under occupation in older households. This may be out of personal choice but can often be due to lack of suitable smaller, more adaptable/ accessible homes that older residents can move into. Therefore, the proposed additions are likely to have **positive effects** on housing as they would help release larger properties back into the market and may also have positive effects on affordable housing as smaller dwellings/ older people development schemes are generally more affordable than larger homes. There are also likely to be **positive effects** on equality, diversity and community development as the schemes could engender a sense of social inclusion and reduce isolation. **Positive effects** on health and wellbeing are also envisaged as the provision of adaptable/ accessible homes would allow older and/ or less abled residents to live in accessible (including wheelchair accessible) more suited to their needs helping them live more independently.

- 6.8 **Purpose built student accommodation:** The change being considered pertains to setting limits on the extent of student accommodation so as to avoid large concentrations in particular areas (e.g. in the City Centre, Selly Oak and Edgbaston).
- 6.9 The HEDNA identified this issue as impacting the provision of a more balanced housing mix. Selly Oak is identified as an area where a need for a higher proportion of larger homes is maybe required and where the conversion of larger homes to shared student housing may be a limiting factor. Clearly students make up a substantial proportion of the City's residents as there are five universities in Birmingham. They bring multiple benefits to the city economically and in the form of research, education and innovation. If the proposed policy additions result in limiting the provision of student accommodation this may have adverse effects as it may make the City less attractive to students. Site or area specific policies may be more effective in ensuring that new development meets local housing need, providing a mix that is appropriate to the location. Also, the aforementioned Article 4 direction and the SPD (paragraph 4.2) can also safeguard larger homes from being converted to student accommodation. Ultimately the effects will depend on the requirements of the policy to be included but at this stage, **uncertain negative effects** on housing, as policy can reduce availability of student accommodation. Similar effects are also likely pertaining to economy and employment as the universities are major contributors to the economy and employment in Birmingham and the policy could make the City less attractive to students. From a **positive perspective**, limiting student accommodation could be positive with regards to housing choice in the city, whilst also helping to maintain vibrancy in the city outside of term times.
- 6.10 **Built to rent:** The NPPF defines built-to-rent housing as '*purpose built housing that is typically 100% rented out. It can form part of a wider multi-tenure development comprising either flats or houses but should be on the same site and/or contiguous with the main development*'. Such schemes are likely to help meet some of the demand for private rents thus helping increase housing supply and improving choice in the market. The HEDNA identifies several recently implemented built-to-rent schemes in Birmingham and highlights the important contributions such schemes make to housing supply and choice. Therefore, the inclusion of a policy seeking the provision of built-to-rent developments maybe helpful, but such schemes are already being implemented in the City even though there is not a currently adopted policy promoting built-to-rent. Therefore, only **minor positive effects** are likely with regards to housing.
- 6.11 **Large-scale shared accommodation:** This considers including a policy on co-living schemes. In this form of accommodation, residents rent a room within a purpose-built (or converted) development which has shared amenities and facilities. Other services and facilities are often provided including cleaning, gyms, communal workspaces and a concierge. This type of accommodation is likely to be beneficial in reducing land supply required (as it is often higher density than traditional dwellings) can provide an alternative to traditional flat or house shares which may help address some of the housing shortfall in the City. This form of living may also be more affordable than flats and may help reduce isolation with positive effects on health and wellbeing and is likely to be more sustainable particularly if located in areas with good access to services and

transport. It may also be amenable and suited to regeneration/ conversion of under used office/ commercial buildings.

- 6.12 The HEDNA recommends that this type of accommodation be supported through a policy on co-living housing, noting a demonstrable market for such developments, particularly in student concentrations with the City Centre, southern Edgbaston and Selly Oak.
- 6.13 The proposed policy addition is therefore likely to produce **positive effects** on housing through increased provision and reduced land requirements due to the higher densities such schemes produce. Potentially **positive effects** are also envisaged on health and wellbeing and equality, diversity and community as the communal living aspect (through shared facilities) may help reduce isolation and engender a sense of community and belonging and may help provide better quality affordable accommodation.
- 6.14 **Gypsies, travellers and travelling show people:** This considers the option of including a policy allocating at least 5 years supply of sites required as demonstrated by the latest assessed needs. The Council has a pressing need to provide transit sites to cope with the increasing occurrence of unauthorised encampments. This has led to the 2 BDP allocated sites being utilised as transit sites. The HEDNA estimates a need for 30 pitches up to 2042. Therefore, the proposed policy addition could help ensure adequate provision for the Gypsy/ Traveller community's needs in future. This is predicted to have **likely significant positive effects** on health and wellbeing as currently the community has significantly shorter life expectancies, 10-15 years, shorter than the general population (HEDNA). The provision of healthy, safe sites can help improve the community's health and wellbeing it is also likely to improve the health and wellbeing of other residents who may be negatively impacted by the ad-hoc encampments. There could also be positive effects with regards to equality and diversity. The choice of sites will determine other possible effects such as accessibility, environmental impacts and so on. At this stage though, uncertain effects are recorded.
- 6.15 **Healthy neighbourhoods:** Considers adding a requirement in policy that all developments above a certain threshold be subject to a Health Impact Assessment (HIA). This is likely to be **positive** on health and wellbeing as it will help identify early on in the planning process the proposal's potential positives and negatives on health and wellbeing thus offering the opportunity to maximise positives and reduce or eliminate negatives. This requirement is unlikely to lead to any significant negative effects with regards to development.
- 6.16 **Climate change:** The proposed policy changes consider setting higher energy efficiency standards for new development and incorporating renewable energy and/ or connection to a heat network. The proposed changes require policies to consider the whole life carbon associated with proposals seeking to '*get as close to zero-carbon onsite*'. These more rigorous requirements in the form of policy are likely to have **significant positive effects** on the achieving zero carbon living SA topic as it is likely to result in more energy efficient developments and facilitate renewable energy and low carbon district heating schemes. However, the requirement may be too onerous for developers with negative implications on viability due to the initial costs involved which will also impact AH provision. Therefore, mixed effects are predicted at this stage: likely significant positives

effects on achieving zero carbon living and potentially **negative effects** on housing due to the potential viability issues raised.

- 6.17 **Sustainable design and construction:** Considers the development of policy to improve the resilience of new development to the effects of climate change including minimising internal heat gain to reduce the impact of the urban heat island effect and addressing water shortage by specifying higher water efficiency standards than currently specified in the building regulations.
- 6.18 The proposed changes include reducing the threshold above which non-residential developments aim for achieving BREEAM standard Excellent. Again, mixed effects are possible: **Positive effects** on health and wellbeing, as there would be a requirement to reduce the impact of urban heat island effects which can have serious health implications particularly for the youngest and oldest residents and those with chronic health conditions. **Positive effects** are also likely on the waste and resource use topic as the higher water efficiency requirements will help conserve water resources into the future. The proposed changes also highlight the need to address surface water flood risk which is also beneficial, as it may help reduce flood risk in the future (**positive effects** on flooding). Conversely, there may be some **negative effects** on the economy and employment topic as these changes may make some employment / commercial developments less viable due to the costs involved.
- 6.19 **Low and zero carbon infrastructure:** The proposed changes relate to utilising heat networks (3 have been identified in the City) to provide a decarbonised source of heating and cooling to existing buildings and new development. The policy envisages Heat Network Zoning that would identify 'Energy Zones' where greater carbon reductions can be achieved. Furthermore, through policy the Council could seek to ensure that new residential/ employment schemes are provided with the infrastructure to link them into the heat networks. As above mixed effects are potentially likely; **positive effects** on the achieving zero carbon living SA objective as the policy will likely result in an overall carbon reduction but there may also be **negative effects** on viability of affected developments due to the cost implications of linking to the networks and adapting development to utilise the networks. There could also be some short term disruptions with regards to infrastructure works (e.g. congestion, noise etc), which could be **negative** for health and wellbeing.
- 6.20 **Flood risk and water management:** Considers including a policy seeking to reduce flood risk from all sources. This is to be achieved by directing development away from areas at highest risk of flooding such that they are safe for their lifetime without increasing flood risk elsewhere. New policy could also emphasise the need to attenuate and use storm water for irrigation for example. The policies are likely to have **positive effects** on health and wellbeing as they will reduce the impacts of future flood events on residents with **positive effects** on flooding as the policy will help reduce the impact of flood events by directing development to areas at lower risk of flooding.
- 6.21 **Sustainable waste management:** Considers strengthening policy to ensure that the reduce/ reuse/ recycle approach to solid waste and resource management is implemented as a part of new development. This would include applying circular economy principles to new buildings and extending the useful life of buildings including salvaging building materials for reuse. This is likely to have **positive effects** on carbon emissions (achieving zero carbon living) and the waste and

resource use SA objectives as it will help recycle embedded carbon in buildings and construction materials.

- 6.22 Further beneficial effects are possible due the inclusions of a requirement that major developments provide onsite recycling such as composting and suitable waste disposal to reduce landfill.
- 6.23 **Green infrastructure:** Considers including policy that seeks a more proactive approach to GI provision by protecting and enhancing the green infrastructure network using Local Nature Recovery Strategy and Birmingham’s Urban Forest Master Plan. This likely to have **positive effects** on biodiversity as the planned scale of growth will inevitably lead to some loss of habitats and the biodiversity associated with them. This policy approach could help mitigate / partially offset some of resulting loss and fragmentation reducing the overall magnitude of negative effects.
- 6.24 **Biodiversity net gain:** Proposes to explore going above the mandatory 10% biodiversity net gain e.g. 20%. Again, this is likely to have **positive effects** on biodiversity, potentially mitigate/ partially offset any resulting loss and fragmentation predicted as a result of new development. Conversely, this may place an added burden on new development in terms of space required and costs which may **negatively** impact viability and consequently housing delivery.
- 6.25 **Urban greening:** Proposes to include policy changes to strengthen the urban greening approach ensuring that major development include urban greening as part of their design. This may also include an Urban Greening Factor to identify the amount of urban greening required in new developments. Again, this is likely to have beneficial (**positive**) effects on biodiversity, potentially helping mitigate some of the loss due to the scale of new development. There could also be knock on benefits with regards to health and wellbeing and climate change resilience. As discussed above this may also have negative implications on viability of new development with potentially **negative effects** on the provision of housing.
- 6.26 **Open space and playing fields:** Considers introducing a policy requiring new open space standards to be applied. This will increase the requirement from 2ha per 1000 persons to 2.35 ha/ 1000 persons. Introducing the new standard would imply a 17.5% increase of provision of open / recreational space in new development. Open space is currently underprovided in the City and therefore this policy approach is likely to have **positive effects** on health and wellbeing due to the additional open and recreational space. The additional provision can also have beneficial effects on biodiversity potentially reducing fragmentation and providing spaces that serve as stepping stones for species. **Positive effects** are also likely on the equality, diversity and community development topic due to the enhanced provision and improved access to open space and recreational space. Conversely, some potential **negative effects** are possible on the housing topic as the increased open space provision may impact housing land supply.
- 6.27 **Minimising environmental pollution:** No policy changes are proposed therefore it is not possible to predict effects at this stage.
- 6.28 **Tall buildings:** Considers whether to introduce a tall buildings policy that indicates appropriate locations and design. Effects would depend on the wording of the policy which are yet to be formulated.

- 6.29 **Portfolio of employment land:** This proposes a policy change to revise the employment land portfolio in order to continue providing an ongoing 5-year supply of readily available employment land with a reduced target of 67 ha as evidenced by the recent HEDNA. The new portfolio will focus on delivering small-medium sized sites. This is likely to have **positive effects** on the economy and employment topic as it will help ensure the council meets future demand for sites.
- 6.30 The HEDNA identified an unmet demand for small/ medium sites and this policy would help address this need. Effects upon other factors would be dependent on the choice of sites.
- 6.31 **Regional Investment Sites:** proposes removing the designation of Regional Investment Sites (term inherited from the revoked West Midlands Regional Spatial Strategy) and maintaining their designation as Core Employment Areas. If deemed appropriate within the Growth Options to continue with the Regional Investment Sites designation, then developments in these locations will need to be restricted to B2 uses only due to the government's changes to the Use Classes Order. This change in designation is unlikely to produce significant effects on employment as it unlikely to produce a substantial increase or reduction in employment land.
- 6.32 **Core Employment Areas:** Considers introducing a policy that redefines the Core Employment Areas boundaries according to the findings of the HEDNA. The majority of areas making up the CEAs will remain as they are, but some will be retained with amended boundaries to reflect current distribution of uses and where further development potential exists, and some will be de-designated as they no longer contain predominantly employment uses. Furthermore, the policy will require exceptional justification for non-employment uses in CEAs. Whilst this is likely to have **positive effects** on economy and employment as it safeguards existing employment land in these well connected locations but it may adversely impact growth options seeking to introduce some residential/ mixed uses into CEAs thereby **negatively** impacting housing land supply and housing delivery.
- 6.33 **Protection of employment land:** Seeks to introduce greater flexibility in re-purposing non-conforming employment sites (ones in predominantly residential areas) outside the CEAs for residential use. This would include measures to ensure that sites which are capable of providing a valued contribution to employment and economy are not lost, including viability assessments. The proposed policy approach is likely to be **positive** with respect to housing as it would help improve housing land supply and housing provision. Potential negative effects on employment land are unlikely given the proposed policy requirements that valuable employment land is not lost. Overall, positive effects are predicted on the housing topic with knock on **positive effects** on health and wellbeing (due to improved housing provision, choice and potentially affordability).
- 6.34 **Offices:** Proposes not to include a detailed policy to guide future office development, opting for a broader policy setting out locations for development under Use Class E. The post Covid-19 pandemic increase in homeworking and hybrid working will mean there could be less need for office floorspace supply.

The HEDNA also reduced the projected office floorspace needs by 30% up to 2042.

- 6.35 This is unlikely to have significant effects (**neutral**) as the changes in Use Classes Order mean offices are in the same class as other commercial uses (retail and food and drink) and the introduction of new Permitted development rights would enable the conversion of class E buildings to residential dwellings without requiring a planning application.
- 6.36 **Urban centres:** This states the council intention to review the centre hierarchy and boundaries seeking to designate new centres and possibly amend some existing centre boundaries.
- 6.37 The policy would also remove the requirement for 50%/55% of uses in centres to be retained for retail use. The approach taken will be informed by the Retail and Leisure Needs Assessment. The proposed policies are potentially **positive** on economy and employment as they will help reduce empty shops in town centres and repurpose empty spaces above shops to various uses including as affordable workspaces promoting local enterprises, offices and homes. This is likely to improve the vitality of centres and attract more footfall producing positive effects on the local economy and employment. There may also be **positive** effects on housing through the conversion of empty premises or above ground floor spaces into residential accommodation. There are potential positive and negative impacts upon the character of the built environment and heritage, but these are uncertainties at this stage.
- 6.38 **Tourism, culture and the night-time economy:** Considers the inclusion of a policy seeking to enable evening and night-time economic activity. This may include protecting public houses, theatres, live music venues and night clubs from change of use. Other measures considered include supporting the night-time economy by better provision of evening/ night-time public transport services. The potential policy measures are likely to have **positive effects** on the local economy and employment as they are likely to improve the vitality of leisure, cultural and social venues, helping to increase visitors through the improved public transport provision. There are potential **minor negative effects** with regards to housing provision, as it prevents changes in use that may otherwise occur.
- 6.39 **Key growth areas - opportunity areas:** Outlines the Council's intention to identify new areas to focus growth. These new opportunity areas will be within existing urban areas, in locations that benefit from good public transport, services and cycling and walking infrastructure. They will be in areas where clusters of development opportunities exist and will be developed through a masterplanning/ area framework approaches. The proposed policy changes include more focussed growth (in size and purpose) in locations where clusters of opportunity sites / infrastructure improvement would bring about wider change in the area. Each growth area is to have a policy setting out key requirements including land, scale, density and site specific requirements. Growth areas identified would be supported by a masterplan SPD. The Council proposes to name such growth areas as 'Strategic Regeneration Areas' or 'Opportunity Areas'. The effects will depend on the eventual policies drafted but generally beneficial effects are likely as the focused regeneration approach is likely to engender multiple benefits including improved design, better housing, employment and infrastructure

provision through the proposed masterplanning approach with **positive effects** predicted on housing and economy and employment in particular.

Summary

- 6.40 The appraisal of the proposed policy approaches and changes (to adopted policy) identified mostly positive effects with respect to the housing, health and wellbeing, economy and employment, equality, diversity and community, waste and resource use, flooding and biodiversity SA topics. **Likely significant positives** were identified with respect to the health and wellbeing, and achieving net zero carbon living, SA topics. The former is due to the addition of a policy seeking to ensure adequate provision for the Gypsy/ Traveller community's needs in future.
- 6.41 This community has significantly shorter life expectancies, 10-15 years shorter than the general population, therefore, the provision of healthy and safe sites can help improve the community's health and wellbeing.
- 6.42 Proposed policy changes considering the setting of higher energy efficiency standards, incorporating renewable energy and/ or connections to heat networks, the requirement for proposals to consider whole life carbon and seeking to 'get as close to zero-carbon onsite' are anticipated to produce **likely significant positive effects** with respect to the achieving net zero carbon living SA topic. These more rigorous requirements in the form of policy are likely to produce concrete contributions to lowering the carbon footprint associated with new development.
- 6.43 Some **negative effects** were predicted for the Housing and Economy and Employment SA topics due to the risk that some policies may reduce housing / employment development due to viability issues through the requirement for more rigorous energy efficiency standards, and restrictions on certain types of dwellings (HMOs, student housing). No likely significant negative effects were identified.
- 6.44 Table 6-1 summarises the potential effects of the proposed policy changes visually. For each policy, where effects have been identified for at least one of the SA topics, a colour is provided for specific SA topics to represent whether effects are broadly likely to be positive or negative.
- 6.45 For some policies, neutral effects have been identified against all the SA topics, so these are not shown in the table.

Table 6-1 Summary of findings: Proposed policy changes

Proposed policy changes	Potential effects			
Affordable housing	Housing	Health & wellbieng		
Housing for older people	Health & wellbieng	Equality, diversity & community	Housing	
Purpose built student accommodation	Housing	Housing		
Built-to-rent	Housing			
Large scale shared accommodation	Housing	Health & wellbieng	Equality, diversity & community	
Gypsies, travellers and travelling show people	Health & wellbeing			
Healthy neighbourhoods	Health & wellbeing	Equality, diversity & community		
Climate change	Achieving net zero carbon living	Housing		
Sustainable design and construction	Health & wellbeing	Waste & resource use	Flooding	Economy & employment
Low and zero carbon infrastructure	Achieving net zero carbon living	Health and wellbeing		
Flood risk and water management:	Health & wellbeing	Flooding	Water quality	
Sustainable waste management:	Achieving net zero carbon living	Waste & resource use		
Green infrastructure	Biodiversity	Health and wellbeing	Water quality	
Biodiversity net gain	Housing	Biodiversity		
Urban greening	Housing	Biodiversity	Health and wellbeing	
Open space and playing fields	Housing	Equality, diversity & community	Health and wellbeing	Biodiversity
Portfolio of employment land:	Economy & employment			
Core Employment Areas	Housing	Economy & employment		
Protection of employment land	Health & Wellbeing	Housing		
Urban centres:	Housing	Economy & Employment	Historic Environment?	Historic Environment?
Tourism, culture and the night-time economy	Economy & employment	Housing		
Key growth areas - opportunity areas	Housing	Economy & employment	?	

Light green is a potential positive effect

Dark green is a potentially significant positive effect

Amber is a potential negative effect

7. Next Steps

Consultation

- 7.1 The Council has prepared an Issues and Options document, with the prime purpose of consulting with stakeholders to invite feedback and suggestions with regards to how the Local Plan Review should progress.
- 7.2 Following the consultation stage, the Council will work on developing the Plan further, and this will draw upon a wide range of evidence, stakeholder feedback and technical studies.
- 7.3 The SA process will continue alongside Plan making activities, with a particular focus on the appraisal of site options and more detailed reasonable alternatives.

Developing reasonable alternatives

- 7.4 The focus in the interim SA Report has been on the appraisal of high-level options and policy approaches. Whilst options appraisals are helpful to help refine plan-making and stimulate debate, they should not be confused with 'reasonable alternatives' in the context of the SEA Regulations. The Regulations state that alternatives to the 'Draft Plan' should be considered (rather than every element of the plan individually), and this will be the focus of SA work at the next stages of Plan making.
- 7.5 The appraisal of options (including individual site options) should therefore be viewed as steps towards identifying reasonable alternatives.
- 7.6 Following consultation on the Issues and Options Document (and this interim SA Report), the Council will work towards developing a spatial strategy, and exploring changes to plan approaches / policies in further detail. At some point it should be possible to identify a draft plan approach and any reasonable alternatives with regards to key issues such as housing and employment growth.
- 7.7 Ideally, this will take the form of a series of 'alternative key diagrams', illustrating different combinations of growth locations / sites that could be explored to meet the plan objectives. The reasonable alternatives will explore distribution of growth as well as the overall quantum (with the two intrinsically linked).
- 7.8 Consultation on this interim SA Report alongside the Issues and Options document provides an opportunity for stakeholders to provide input in relation to several key elements of the SA process:
 - The appraisal findings in relation to the high-level options and proposed policy approaches.
 - Are there other high level options that ought to be considered?
 - What detailed reasonable alternatives might look like and which locations should be focused upon?

Recommendations

7.9 When developing the options / policies, the following high level recommendations can be drawn from this interim SA exercise.

- It is unlikely that any of the housing options will be capable of meeting the shortfall in housing on their own (at least not without generating significant negative effects on particular SA topics). It is therefore recommended that a mix of the options are utilised to develop a series of reasonable strategies for growth.
- Undertake sustainability appraisal of reasonable site options to help inform the development of reasonable strategies for growth.
- Support patterns of growth that will help to create 20 minute neighbourhoods.
- Ensure that new development in urban areas brings with it improvements to open space and urban greening.
- The accessibility of some Green Belt areas is poorer than the urban areas. Small scale incremental growth in such locations would likely result in increased car trips and / or poor access to services and should be avoided in such instances. Green Belt should only be released in exceptional circumstances where the locations are sustainable or can be made so, which is more likely to be achieved through a SUE.
- It will be important to ensure that increased densities, intensification and repurposing of land in the urban areas does not result in a significant increase in car travel as this could exacerbate air quality issues. The Plan should therefore seek to provide strong support for walking, cycling and public transport throughout the urban areas.
- Consider the use of poorer performing sites (in terms of sustainably located housing) for biodiversity / open space provision (linked to a Local Nature Recovery Strategy).

APPENDIX A – The SA Framework

SA Topics	SA Objectives	Guide questions	Potential monitoring indicators	Topic in the SEA Directive
1. Housing	1a) To meet housing needs of the current and future resident and by providing decent affordable homes of right quality and type.	Will it reduce homelessness? Will it provide a mix of good quality housing, including affordable homes?	Number of people recorded as homeless Net additional dwellings. Housing mix (types, size, tenure) Net additional pitches Number of extra care homes	Human Health Material Assets Population
2. Equality, diversity and community development	2a) To promote safer communities and reduce the fear of crime and antisocial behaviour.	Will it reduce the fear of crime in all age and cultural groups? Will it reduce antisocial behaviour amongst the population? Will it promote design that discourages crime?	Community safety crime rates in the city. Serious acquisitive crime rate. Reducing arson incidents. Serious violent crime rate. The number of gun crimes committed in Birmingham.	Population Human Health
2. Equality, diversity and community development	2b) To reduce Index of Multiple Deprivation (IMD) to address poverty and help improve access to facilities and services for disadvantaged individuals and communities	Will it reduce deprivation and improve access to services and facilities?	Reduction in IMD score at ward and super output area level.	Population Human Health

SA Topics	SA Objectives	Guide questions	Potential monitoring indicators	Topic in the SEA Directive
<p>2. Equality, diversity and community development</p>	<p>2c) Ensure easy and equitable access to services, facilities and opportunities.</p>	<p>Will it improve access to services and facilities?</p> <p>Will it maintain and improve access to key services and facilities for all sectors of the population?</p> <p>Does it promote accessibility for disabled people?</p>		<p>Population</p> <p>Material Assets</p>
<p>2. Equality, diversity and community development</p>	<p>2d) Support, empower and connect communities to create a healthier and just society.</p>	<p>Will it help to create a better healthier and just society?</p> <p>Will it empower and connect communities?</p>	<p>Number of schemes with adequate infrastructure to improve social inclusion and connectivity</p> <p>Number of developments/schemes taking account of health as a material asset</p>	<p>Population</p> <p>Human Health</p>

SA Topics	SA Objectives	Guide questions	Potential monitoring indicators	Topic in the SEA Directive
<p>3.Health and wellbeing</p>	<p>3a) To improve the health of the population and reduce health inequalities.</p>	<p>Will it improve access to health facilities and social care facilities?</p> <p>Does it help provide equitable access to health services?</p> <p>Will it encourage healthy lifestyles?</p> <p>Will it support the diverse range of health needs within the community?</p> <p>Will it contribute to a healthy living environment? (noise, odour etc?)</p> <p>Will it avoid locating development in locations that could adversely affect people's health?</p> <p>Will it improve accessibility for people with disabilities?</p> <p>Will it provide sufficient areas of accessible green multifunctional spaces?</p> <p>Will it provide opportunities for contact with nature?</p>	<p>Condition of residents general health(ONS/Local datasets)</p> <p>Change in the amount of Accessible Natural Greenspace (Natural England)</p> <p>Decent homes – council housing and RSLs.</p> <p>Percentage of the city's population having access to a natural greenspace within 400 metres of their home</p> <p>Hectares of accessible open space per 1,000 population in each ward</p> <p>Tree canopy cover in each ward (the threshold is 25%)</p> <p>Gap between the areas with the worst health and deprivation indicators and the population as a whole.</p> <p>Number of planning applications meeting ANGSt</p> <p>Number of people using parks & greenspaces after improvements</p>	<p>Population</p> <p>Human Health</p> <p>Climatic Factors</p> <p>Flora</p> <p>Fauna</p> <p>Biodiversity</p>

SA Topics	SA Objectives	Guide questions	Potential monitoring indicators	Topic in the SEA Directive
3.Health and wellbeing	3b) To improve access and availability of sports and recreation facilities.	Will it improve accessibility and availability of sports and recreation facilities?	Number of new sports pitches or other leisure facilities delivered annually through development.	Population Human health
3.Health and wellbeing	3c). To improve access and availability to open spaces.	Will it improve access and availability of open spaces? Will it improve access and wayfinding to the local canals?	Percentage of the city's population having access to a natural greenspace within 400 metres of their home Length of greenways constructed. Hectares of accessible open space per 1,000 population	Population Human health
4. Waste and resource use	4a) Encourage and enable waste minimisation, reuse, recycling and recovery.	Will it reduce household waste generated/ head of population? Will it reduce commercial and industrial waste generated/ head of population? Will it increase rate/head of population of waste reuse and recycling? Does it divert resources away from the waste stream, including the use of recycled materials where possible?	Capacity of new waste management facilities by type (AMR). Percentage of household waste sent for reuse, recycling or composting. Municipal waste sent to landfill Residual waste per household.	Waste Climatic Factors
4. Waste and resource use	4b) To ensure efficient use of natural resources such as water and minerals.	Will it improve use of natural resources like water and minerals?	Usage of water and minerals	Population Material Assets

SA Topics	SA Objectives	Guide questions	Potential monitoring indicators	Topic in the SEA Directive
<p>5. Economy and employment</p>	<p>5a). Achieve a strong, stable and sustainable economy and prosperity for the benefit of all of Birmingham’s inhabitants.</p>	<p>Does it encourage and support a culture of enterprise and innovation, including social enterprise?</p> <p>Will it reduce unemployment, especially amongst disadvantaged groups?</p> <p>Will it improve the resilience of business and the economy?</p> <p>Will it improve economic performance in disadvantaged areas?</p> <p>Will it encourage indigenous business?</p>	<p>Vacancy rates</p> <p>Loss of employment land to other uses (AMR).</p> <p>Working age people claiming out of work benefits in the worst performing neighbourhoods.</p> <p>Number of business paying business rates</p>	<p>Population</p> <p>Material assets</p> <p>Human health</p>
<p>5. Economy and employment</p>	<p>5b) To achieve sustainable levels of prosperity and growth throughout the city.</p>	<p>Will it improve business development and enhance competitiveness?</p> <p>Will it promote growth in key sectors?</p> <p>Will it encourage inward investment?</p> <p>Will it make land available for business development?</p>	<p>Amount of land developed for employment by type (AMR).</p> <p>Employment land supply by type (AMR)</p> <p>Percentage of small businesses in an area showing employment growth</p> <p>Estimated new job creation</p> <p>Increased levels of investment.</p>	<p>Population</p> <p>Material assets</p> <p>Human health</p>

SA Topics	SA Objectives	Guide questions	Potential monitoring indicators	Topic in the SEA Directive
5. Economy and employment	5c) To improve educational skills of the overall population	<p>Will it improve qualifications and skills of young people and adults?</p> <p>Does it ensure that Birmingham's workforce is equipped with the skills to access high quality employment opportunities suited to the changing needs of Birmingham's economy whilst recognising the value and contribution of unpaid work?</p>	<p>Working age population qualified to at least Level 2 or higher.</p> <p>Working age population qualified to at least Level 4 or higher.</p> <p>Achievement of 5 or more 9-4 grades at GCSE or equivalent including English and Maths.</p> <p>Children in care achieving 5, 9-4 GCSEs (or equivalent) at Key Stage 4 (including English and Maths).</p>	<p>Population</p> <p>Material assets</p> <p>Human health</p>
5. Economy and employment	5d) To maintain and enhance the vitality and viability of town and retail centres	<p>Will it increase the range of employment opportunities, shops and services available in town centres?</p> <p>Will it decrease the number of vacant units in town centres?</p>	<p>Number of vacant units in town centres.</p> <p>Increased levels of spend.</p> <p>Enhanced retail facilities.</p>	<p>Population</p> <p>Material assets</p> <p>Human health</p>
7. Air quality	7a). Minimise air pollution levels and create good quality air.	<p>Will it improve air quality?</p> <p>Will it avoid exacerbating existing air quality issues in designated AQMAs?</p> <p>Will it reduce CO₂ emissions?</p> <p>Will it contribute to a healthy environment?</p>	<p>Estimated CO₂ emissions in the city</p> <p>Nitrogen dioxide levels.</p> <p>Number of publicly available long stay parking spaces in the City Centre.</p>	<p>Air</p> <p>Climatic factors</p> <p>Population</p>

SA Topics	SA Objectives	Guide questions	Potential monitoring indicators	Topic in the SEA Directive
<p>7. Air quality</p>	<p>7b) Increase use of public transport, cycling and walking as a proportion of total travel and ensure development is primarily focused in the major urban areas, making efficient use of existing physical transport infrastructure</p>	<p>Does it reduce road traffic congestion, pollution and accidents?</p> <p>Will it encourage walking and cycling?</p> <p>Does it help to reduce travel by private car?</p> <p>Will it improve access to or encourage the use of the canal network for sustainable travel?</p>	<p>Net additional dwellings in the City Centre (AMR).</p> <p>Percentage of new residential development within 30 mins public transport time of a GP, hospital, primary and secondary school, employment and a major shopping centre (AMR).</p> <p>Percentage of trips by public transport into Birmingham City Centre (AMR).</p> <p>Percentage of completed retail, office and leisure development in town centres (AMR).</p> <p>Number of people killed or seriously injured in road accidents in Birmingham.</p> <p>Number of children killed or seriously injured in road accidents in Birmingham.</p>	<p>Material Assets</p> <p>Population</p> <p>Air quality</p>

SA Topics	SA Objectives	Guide questions	Potential monitoring indicators	Topic in the SEA Directive
<p>8. Water quality</p>	<p>8a) Minimise water pollution levels and create good quality water.</p>	<p>Will it improve water quality?</p> <p>Will it support the achievement of Water Framework Directive Targets?</p> <p>Will it promote sustainable use of water?</p> <p>Will it support the provision of sufficient water supply and treatment infrastructure in a timely manner to support new development?</p> <p>Will it improve water quality on the canal network?</p>	<p>Number of planning permissions granted contrary to the advice of the Environment Agency on either flood defence grounds or water quality (AMR).</p> <p>Biological quality of rivers (Working with the Grain of Nature).</p> <p>Percentage of water bodies classified as being of 'good ecological status'.</p> <p>Creation and retrofitting of SUDs in the city</p>	<p>Water</p> <p>Material assets</p> <p>Fauna</p>

SA Topics	SA Objectives	Guide questions	Potential monitoring indicators	Topic in the SEA Directive
<p>9. Land and soil</p>	<p>9a) Minimise soil pollution levels and create good quality soil.</p>	<p>Will it maintain and enhance soil quality?</p> <p>Will it encourage the efficient use of land?</p> <p>Will it minimise the loss of soils to development?</p> <p>Will it encourage the use of previously developed land and/or the reuse of existing buildings?</p> <p>Will it prevent land contamination and facilitate remediation of contaminated sites?</p>	<p>Area of contaminated land.</p> <p>Percentage of development recorded on greenfield / brownfield land</p>	<p>Soil</p>
<p>9. Land and soil</p>	<p>9b) Encourage land use and development that creates and sustain well-designed, high quality distinctive and sustainable places.</p>	<p>Will it encourage development of well-designed and sustainable places?</p>	<p>Number of well-designed places</p>	<p>Population</p> <p>Human Health</p> <p>Material Assets</p>

SA Topics	SA Objectives	Guide questions	Potential monitoring indicators	Topic in the SEA Directive
<p>9. Land and soil</p>	<p>9c) Encourage the efficient use of previously developed land and buildings and encourage efficient use of land.</p>	<p>Will it improve sustainable use of previously developed land?</p> <p>Will it encourage the efficient use of land and minimise the loss of greenfield land?</p> <p>Will it value and protect the biodiversity/geodiversity (of previously developed land and buildings)?</p>	<p>% of permissions granted on previously developed land as a % of previously developed land available within the city.</p> <p>Percentage of employment land, by type which is on previously developed land (AMR).</p>	<p>Population</p> <p>Material Assets</p> <p>Biodiversity</p>

SA Topics	SA Objectives	Guide questions	Potential monitoring indicators	Topic in the SEA Directive
<p>10. Achieving zero carbon living</p>	<p>10a) Minimise Birmingham’s contribution to the cause of climate change by reducing emissions of greenhouse gases from transport, domestic commercial and industrial sources.</p>	<p>Will it contribute to Council’s decarbonisation agenda?</p> <p>Will it reduce emissions of greenhouse gases by reducing energy consumption?</p> <p>Will it increase the proportion of energy needs being met by renewable sources?</p> <p>Does it help reduce dependence on fossil fuels?</p> <p>Will it reduce reliance on carbon hungry materials e.g. bedding plants in parks?</p>	<p>Carbon dioxide emissions and Greenhouse gas emissions.</p>	<p>Climatic factors</p> <p>Population</p> <p>Flora</p> <p>Fauna</p> <p>Human Health</p> <p>Biodiversity</p> <p>Landscape</p> <p>Water</p> <p>Material assets</p> <p>Air Quality</p>

SA Topics	SA Objectives	Guide questions	Potential monitoring indicators	Topic in the SEA Directive
<p>10. Achieving zero carbon living</p>	<p>10b) Promote and ensure high standards of sustainable resource efficient design, construction and maintenance of buildings</p>	<p>Has the installation of water source heat pumps using water from the canal been considered?</p> <p>Will it increase the number of buildings which meet recognised standards for sustainability?</p> <p>Will it reduce the need for unnecessary carbon costs maintenance? e.g., reduce mowing of amenity grassland via creation of pollinator areas flowering perennials & scrub.</p>	<p>Number of buildings meeting Code for Sustainable homes/BREEAM Standards</p>	<p>Climatic factors</p> <p>Population</p> <p>Flora</p> <p>Fauna</p> <p>Human Health</p> <p>Biodiversity</p> <p>Landscape</p> <p>Water</p> <p>Material assets</p> <p>Air Quality</p>

SA Topics	SA Objectives	Guide questions	Potential monitoring indicators	Topic in the SEA Directive
<p>10. Achieving zero carbon living</p>	<p>10c) Urgently and drastically reduce carbon emissions from transport to contribute to the Council's decarbonisation commitment.</p>	<p>Will it reduce the emissions associated with transport?</p>	<p>Reduction in the amount of emissions associated with transport.</p>	<p>Climatic factors Population Flora Fauna Human Health Biodiversity Landscape Water Material assets Air Quality</p>

SA Topics	SA Objectives	Guide questions	Potential monitoring indicators	Topic in the SEA Directive
<p>11. Flooding</p>	<p>11a) To reduce vulnerability to climatic events and flooding.</p>	<p>Will it minimise the risk of flooding from rivers and watercourses to people and property?</p> <p>Will it reduce the risk of damage to property from storm events?</p> <p>Will it help reduce surface water flooding</p> <p>Will it safeguard land for future flood defences?</p> <p>Will development allow sufficient easement (8-20m) from the top of the bank of a watercourse / river?</p> <p>Will area flood more often or to a greater depth due to climate change ?</p>	<p>Estimated number of properties at risk from flooding</p> <p>Number of schemes incorporating nature based SUDs mechanisms</p> <p>Number of planning permissions granted contrary to the advice of the Environment Agency on either flood defence grounds or water quality</p> <p>Land available for future flood defences</p>	<p>Water</p> <p>Biodiversity</p>

<p>12. Historic environment</p>	<p>12a) Value, conserve, enhance and restore Birmingham’s built and historic and archaeological environment and landscape.</p>	<p>Will it conserve and enhance buildings, monuments, sites, places, areas and landscapes of heritage interest or cultural value (including their setting) meriting consideration in planning decisions?</p> <p>Will it conserve and enhance features of built and historic environment and landscape?</p> <p>Will it conserve and enhance sites, features and areas or archaeological value?</p> <p>Will it safeguard and enhance the character of the local landscape and local distinctiveness?</p> <p>Will it provide opportunities to enhance the historic environment?</p> <p>Will it safeguard and enhance the character of the city’s historic canal network?</p>	<p>Number of heritage assets recorded as ‘at risk’</p> <p>Number of Conservation Areas with an up to date character appraisal and a published Management Plan.</p> <p>Number of Grade II Buildings considered to be buildings at risk. Number of buildings of historic or architectural interest brought back into active use.</p> <p>Number, or % or area of historic buildings, sites and areas and their settings (both designated and non-designated) damaged.</p> <p>Loss of historic landscape features, erosion of character and distinctiveness (HLC).</p> <p>Extent and use of detailed characterisation studies informing development proposals (HLC).</p> <p>The proportion of housing completions on sites of 10 or more which have been supported, at the planning application stage by an appropriate and effective</p>	<p>Cultural Heritage</p> <p>Landscape</p>
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SA Topics	SA Objectives	Guide questions	Potential monitoring indicators	Topic in the SEA Directive
			landscape character and visual assessments with appropriate landscape proposals.	
13.Natural landscape	13a) Value, protect, enhance and restore Birmingham’s natural landscape.	<p>Will it safeguard and enhance the character of the local landscape and local distinctiveness?</p> <p>Will it improve the landscape quality and character of the countryside?</p> <p>Will it reduce the amount of derelict, degraded and underused land?</p>	<p>Number of planning applications accompanied by a landscape appraisal</p> <p>Development brought forward through regeneration projects.</p>	<p>Air</p> <p>Landscape</p> <p>Population</p> <p>Material Assets</p> <p>Climatic factors</p> <p>Biodiversity</p>

<p>14. Biodiversity and geodiversity</p>	<p>14a) To conserve and enhance biodiversity and geodiversity.</p>	<p>Will it conserve and enhance natural/semi natural habitats and conserve and enhance species diversity?</p> <p>Will it maintain and enhance European designated nature conservation sites?</p> <p>Will it maintain and enhance nationally designated nature conservation sites?</p> <p>Will it maintain and enhance locally designated nature conservation sites?</p> <p>Will it help deliver the targets and actions in the Biodiversity Action Plan?</p> <p>Will it help to reverse the national decline in at risk species?</p> <p>Will it protect and enhance sites, features and areas of geological value in both urban and rural areas?</p> <p>Will it lead to the creation of new habitat?</p> <p>Does it ensure current ecological networks are not compromised, and future improvements are not prejudiced?</p>	<p>Change in the number and area of designated ecological sites Impact on the Local Nature Recovery Network</p> <p>Recorded condition/status of designated ecological sites</p> <p>Number of planning approvals that generated any adverse impacts on sites of acknowledged biodiversity importance</p> <p>Percentage of major developments generating overall biodiversity enhancement</p> <p>Hectares of biodiversity habitat delivered through strategic site allocations</p>	<p>Biodiversity</p> <p>Flora</p> <p>Fauna</p> <p>Climatic factors</p> <p>Population</p> <p>Water</p> <p>Landscape</p>
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SA Topics	SA Objectives	Guide questions	Potential monitoring indicators	Topic in the SEA Directive
		<p>Does it encourage and facilitate the creation of new ecological networks?</p> <p>Does it encourage multi-functional use of green blue corridors e.g. SUDs, sustainable transport?</p>		
<p>15. Accessibility and transport</p>	<p>15a) Increase use of public transport, cycling and walking as a proportion of total travel and ensure development is primarily focused in the major urban areas, making efficient use of existing physical transport infrastructure</p>	<p>Does it reduce road traffic congestion, pollution and accidents?</p> <p>Will it encourage walking and cycling?</p> <p>Does it help to reduce travel by private car?</p> <p>Does it promote accessibility for disabled people?</p> <p>Will it improve access to or encourage the use of the canal network for a sustainable travel?</p>	<p>Net additional dwellings in the City Centre (AMR).</p> <p>Percentage of new residential development within 30 mins public transport time of a GP, hospital, primary and secondary school, employment and a major shopping centre (AMR).</p> <p>Percentage of trips by public transport into Birmingham City Centre (AMR).</p> <p>Percentage of completed retail, office and leisure development in town centres (AMR).</p> <p>Number of people killed or seriously injured in road accidents in Birmingham.</p> <p>Number of children killed or seriously injured in road accidents in Birmingham.</p>	<p>Material Assets</p> <p>Population</p> <p>Air quality</p> <p>Human health</p>

SA Topics	SA Objectives	Guide questions	Potential monitoring indicators	Topic in the SEA Directive
<p>15. Accessibility and transport</p>	<p>15b) Ensure development reduces the need to travel and reduce the negative impacts of transport on the environment</p>	<p>Will it reduce traffic volumes? Will it reduce average journey length? Will it reduce the negative impact of transport?</p>	<p>Increase in road traffic. Workplace Travel Plans. Number of people working from home. Reduction in number of journeys</p>	<p>Material Assets Population Air quality Human health</p>
<p>15. Accessibility and transport</p>	<p>15c). Urgently and drastically reduce carbon emissions from transport to contribute to the Council's decarbonisation commitment.</p>	<p>Will it reduce the emissions associated with transport? Will it contribute to Council's decarbonisation agenda?</p>	<p>Reduction in the amount of emissions associated with transport.</p>	<p>Material Assets Population Air quality Human health</p>

APPENDIX B – Appraisal of Housing Options

Option 1 Increased Housing Densities

- 7.10 This option seeks to maximise housing densities (dwellings per hectare of land) on sites allocated for residential development within the City Centre. The adopted BDP (policy TP30) specifies densities ranging from 40 to 100 dwellings per hectare (dph) depending on location with the highest density (100 dph) proposed for City Centre sites, 50 dph in areas well served by public transport and 40 dph elsewhere. Following analyses of recent planning permissions and sites completed within the last 3 years the Council concluded that average densities in and around urban centres is around 70 dph which is substantially higher than the density specified in TP30 for ‘areas well served by public transport’. The analyses also showed that densities (for developments granted consent / completed) in the City Centre average 400 dph; four times the target specified in TP30. Birmingham contains a large network of centres ranging from the City Centre that holds a national position as a retail destination to local centres which meet immediate day-to-day needs. More than 70 other (local) centres are identified in the Birmingham Development Plan. These centres are varied in terms of size and play a vital role in providing for the every-day needs of residents, providing a varied retail offer, employment, banking and administrative needs, leisure and social opportunities. Some of these serve not only local residents but are often utilised by visitors from the wider region and further afield. Birmingham's centres are diverse and have a range of uses, particularly retail but also other focal points for the local communities which they serve, for example places of worship, community centres, universities and offices.
- 7.11 **Housing:** This option could contribute towards **significant positive effects** for housing as it would deliver a higher number of dwellings than otherwise would be the case, in locations that are likely to be more sustainable in terms of transport, services and employment provision. Furthermore, the increased density may help deliver a greater proportion of affordable housing due to the potential for improved viability obtained as a result of lower land acquisition costs per dwelling. The approach may also help in meeting the significant strategic challenge of meeting Birmingham’s housing need, and reducing the shortfall arising from the Birmingham Plan.
- 7.12 **Equality, diversity and community development:** The increased growth within the City Centre and urban centres implemented through this approach can significantly help improve accessibility to jobs, education and employment. This is particularly helpful for residents living in deprived neighbourhoods around the City Centre and inner city areas, as it is likely to provide improved outcomes through improved access to health, education, employment and services.
- 7.13 The increased housing growth is also likely to improve affordability in these locations through increased affordable housing delivery and increased choice in term of type, tenure and size of dwellings. Therefore, potential **positive effects** are predicted.
- 7.14 Conversely, increasing densities fourfold could lead to more cramped urban living environments that do not achieve good standards of living for communities

living here, which is likely to affect those most disadvantaged groups. This is a potential **negative effect** that would need to be addressed. It is envisaged that plan policies would be applied to ensure minimum space standards and seek good design. However, higher densities still present potential issues in relation to living environments. Whilst negative effects are not a certainty, they are a possibility.

7.15 Health and wellbeing: As discussed above, the increased housing growth within some of the more deprived areas in the City Centre and urban centres is likely to produce beneficial outcomes due to improved access to services, jobs and facilities. The increased density is also likely to produce improvements in the existing infrastructure (e.g. transport, education and healthcare) and potentially attract investment for new infrastructure. The increased densification can potentially have positive effects on open/ green space provision as it is likely to limit encroachment on existing areas of open space and green space. This would be particularly effective if brownfield and previously developed land were to be fully utilised under this approach. Conversely there are potential negative effects as the increased density in already congested City Centre and urban centre locations is likely to exacerbate issues such as traffic, noise and pollution which would adversely impact residents' health and wellbeing. The approach can also exacerbate urban heat island effects rendering the city more vulnerable to heat waves. It may be possible to mitigate some of these effects through site specific policies for example through the implementation of a clean or low emission zones, car free neighbourhoods and park and ride schemes. Overall mixed effects are predicted with potential **positive effects** due to enhanced accessibility to services and jobs, the likely preservation of green and open space and the improved housing choice and affordability with some uncertain **negative effects** due to increased vulnerability to urban heat island effects and pollution associated with traffic congestion and other urban activities.

7.16 Waste and resource use: Recycling rates are significantly lower than the national average⁵. The proposed growth can potentially exacerbate the issue as more household waste would be generated. However, densification in the City Centre and urban centres may help make more efficient technologies such as district heating systems more viable due to the economies of scale and higher densities. Overall, whilst the proposed growth will lead to increased household waste, the location of growth is unlikely to significantly influence the waste recycling rates or collection regimes (though it will be important to ensure adequate solutions for waste management at very high densities). However, this approach may facilitate more efficient district / neighbourhood wide energy systems and may provide more scope for incorporating water recycling systems into new buildings, but this remains uncertain at this stage. Therefore, uncertain **positive effects** are envisaged at this stage. There is an opportunity for the BLP to promote the use of water recycling/ reuse systems such as grey water systems within new buildings. The Plan can also promote the more energy efficient buildings to minimise energy use etc.

7.17 Economy and employment: Further concentration of growth within the City Centre and urban centres is likely to provide improved accessibility to employment opportunities within these locations.

⁵ DEFRA [Statistics on waste managed by local authorities in England 2020/21](#)

- 7.18 It is also likely to improve footfall with positive knock on effects on businesses located in centres. Development may further help to improve the attractiveness of City Centre areas through regeneration of neglected parts of the centre and brownfield sites thus making them more attractive to visitors.
- 7.19 Overall, this approach could help to contribute towards **significant positive effects** due to improved access to jobs, increased footfall and enhanced attractiveness of City centre and urban centres with the potential to improve the local economy and local employment opportunities.
- 7.20 **Air quality:** The whole of Birmingham has been designated an Air Quality Management Area (AQMA) declared for Nitrogen Dioxide (NO₂) in 2010. The Council stated its commitment to reducing exposure levels in its Air Quality Action Plan (2021) and introduced a Clean Air Zone in June 2021. The latter operates in the central Birmingham area within the A4540 Middleway (excluding the ring road itself). The Clean Air Zone, which operates 24-hours a day, throughout the year has so far helped reduce NO₂ levels an average of 13% (compared to 2019 baseline)⁶. Whilst the Clean Air Zone and increased use of EV vehicles will help reduce vehicular emissions in the future, further growth in the City Centre and urban centres will inevitably lead to increased traffic and congestion and therefore likely to exacerbate the current air quality issues. It also places more new homes in areas at risk of experiencing poor air quality. Therefore, potential **negative effects** are envisaged at this stage. There is an opportunity through the BLP to promote further mitigation measures such as car free neighbourhoods, and more public transport provision (including low emissions public transport) to help reduce adverse effects.
- 7.21 **Water quality:** The additional growth proposed can potentially adversely impact the quality of water bodies in the City, none of which currently meet 'good' ecological status. Additional pollution is potentially likely from surface water runoff and treated wastewater effluent. This can potentially be mitigated through policy requiring the installation of SuDS and ensuring there is sufficient wastewater treatment capacity. Additionally, pollution from the additional development is generally less of problematic (provided adequate mitigation is in place) than that caused through agricultural (e.g. farm effluents, nutrients) and Industrial waste. The increased densification would potentially allow enhanced SuDS provision (e.g. blue infrastructure and permeable areas) by allowing more space for SuDS and improved permeability. Overall, with mitigation in place through BLP policies, significant negative effects can likely be avoided, leaving potential **negative effects** due to the additional pollution likely to be generated from surface run-off and combined sewer over-flow events.
- 7.22 **Land and soil:** The densification approach proposed under this option is likely to have positive effects on land and soil. Increasing densities within the City centre and urban centres will reduce development pressure on agricultural land elsewhere in Birmingham. Therefore, this option is envisaged to contribute **positive effects** on land and soil as it is likely to reduce the loss of agricultural land to development.
- 7.23 **Achieving zero carbon living:** The scale of growth involved is likely to create more vehicular traffic leading to increased congestion and emissions. On the other hand, the City Centre and urban centres are well connected by existing

⁶ [Clean Air Zone six month report \(March 2022\)](#)

public transport infrastructure and contain the bulk of services, retail and employment.

- 7.24 Therefore, increasing densities in such locations is likely to be more sustainable as it would help reduce reliance on cars and encourage active travel (walking/cycling) and public transport use. It also has the potential to facilitate enhanced and /or new transport infrastructure. Conversely increased housing densities in urban centres can exacerbate urban heat island effects which would lead to increased use of cooling/ air conditioning and increased emissions. The increased use of electric vehicles in future and the recently implemented clean air zone are also likely to lead to reductions in emissions in the City.
- 7.25 Therefore, the increased emissions associated with growth would be partly mitigated by sustainably located growth (with respect to transport and services) and improved transport infrastructure. The BLP has the potential to further reduce emissions through car-free zones, enhanced EV and active travel infrastructure. Plan policies can also promote the use of more sustainable building materials, more energy efficient building design and low carbon district heating / cooling systems and more projects such as the Tyseley Energy Park energy from waste plant. At this stage, this option is likely to contribute towards **positive effects** with regards to minimising per capita emissions.
- 7.26 **Flooding:** The higher urban densities approach can potentially reduce land area taken up by new development thus allowing more room for SuDS and enhanced permeability. The majority of the City Centre and urban centre areas are at low risk of flooding (flood zone 1). Therefore, **positive effects** are envisaged under this approach as the increased density within central locations may help to avoid the need to place developments within areas at greater risk of flooding. The BLP presents further opportunities to reduce flood risk through policies aimed at improving permeability, implementation SuDS and enhanced blue/ green infrastructure provision.
- 7.27 **Historic environment:** There are numerous heritage assets and 29 Conservation Areas within Birmingham. These are predominately concentrated within the City Centre and urban centres. Densification in such locations can potentially have negative effects on heritage as the higher densities may not be in keeping with the existing scale, massing and overall character of historic areas. Therefore, the potential for **significant negative effects** should be noted under this option at this high level of assessment. Having said this, there are locations that are less sensitive with regards to heritage across the City. Including within parts of the central areas where concentrations of heritage are highest. The effects that arise will be very dependent upon the location of sites and the nature of development. Furthermore, the Plan presents opportunities to conserve and bring back into use some of the heritage assets, including ones that are currently on the at risk register. If this is carried out through a masterplanning approach with appropriate design, sensitive to the surrounding townscape and historic character, positive effects may be possible, but this remains uncertain at this stage.
- 7.28 **Natural landscape:** The densification of development in City Centre and urban centres is potentially beneficial as it is likely to reduce development pressure on areas of high landscape sensitivity outside the centres and in the countryside.

Therefore, **positive effects** are envisaged under this option as it is likely to reduce encroachment on sensitive landscapes and the countryside (as well as possibly better protecting open space throughout the urban areas themselves).

- 7.29 **Biodiversity and geodiversity:** There are a number of areas within Birmingham that are protected for their nature conservation value including 2 Sites of Special Scientific Interest (SSSIs), National Nature Reserve (NNR) and 11 Local Nature Reserves (LNRs).
- 7.30 Additionally, there over 50 Sites of Importance for Nature Conservation (SINCs) comprising ancient woodlands, grasslands, lakes, streams, and other important wildlife habitats. These are generally located outside of the City Centre and urban centres. Therefore, the higher densities sought in centres under this option would potentially alleviate some of the development pressure on designated biodiversity sites elsewhere in Birmingham. However, there are Sites of Local Importance for Nature Conservation (SLINCs) within the City Centre along the canal network and the River Rea and development near these locations could potentially create additional disturbance and recreational pressures on biodiversity. Therefore, the positive effects associated with pursuing higher densities in centres could be offset by the potential for adverse effects on SLINCs within the City Centre resulting in **neutral effects** overall.
- 7.31 **Accessibility and transport:** This option is expected to have beneficial effects on accessibility as it focuses growth in central locations where the bulk of services, retail and employment opportunities exist. Furthermore, urban centres benefit from Birmingham's extensive transport links. The City is currently pursuing several initiatives aimed at enhanced/ expanded Metro, Bus and Sprint Rapid Transit links. HS2 will help reduce travel times between Birmingham and London which will further enhance accessibility to employment and education opportunities. In view of the above, potential **significant positive effects** are anticipated.

Option 2 More active public sector land assembly

- 7.32 Under this option the Council proposes to pursue a proactive approach to land assembly. This could help address the issue of land supply for development. The public sector can play an important role in unlocking sites by assembling parcels of land for development. This approach also has the potential to give the local planning authority some degree of control over shaping development including placemaking and the provision of affordable housing. The Council also expects larger sites to produce wider regeneration benefits through this option; though acknowledges there are few within the City. This option would entail acquiring land parcels (often in multiple ownerships) and assembling them into larger sites. National planning policy makes this possible through compulsory purchase powers. The effects of this option would clearly depend on the nature, size and location of the actual sites created through this approach. As this is unknown at this stage, the appraisal below is necessarily very high level.
- 7.33 **Housing:** This option is likely to produce beneficial effects with respect to housing as it is likely to boost land supply in the city helping to deliver a higher number of dwellings. It may also enable the provision of more affordable housing, particularly on larger sites where this becomes more viable. This approach may

also allow the reuse of currently underutilised land (e.g. unsuitably located industrial facilities and vacant retail facilities) and facilitate the regeneration of neglected/ run-down locations within inner city areas, although the availability of larger sites may be limited within the city. Overall, whilst the acquisition process is likely to be complex and lengthy this option is predicted to produce some **positive effects** as it is likely to help meet some of Birmingham's housing shortfall.

- 7.34 **Equality, diversity and community development:** The land assembly approach would enable the Council to exercise greater influence in shaping developments in the City. However, effects would be largely dependent on the location of such developments and associated site specific policies. Having said that, the approach is likely to facilitate greater provision of affordable housing, particularly on larger sites which can be particularly helpful to more deprived households and those who are unable to afford suitable housing. In this respect the approach is **potentially positive** with respect to equality. The approach can also facilitate regeneration of more deprived neighbourhoods, particularly on larger inner city sites where some of the most deprived communities reside, though this is uncertain at this stage and would depend on the Council's ability to acquire and assemble the required sites in such locations.
- 7.35 **Health and wellbeing:** potentially **positive effects** are predicted for the reasons outlined in the preceding paragraph. The land assembly approach may facilitate regeneration of run down areas helping to improve their attractiveness and provide more affordable housing which would have positive impacts on the health and wellbeing of communities. The Council would also have more control over place making on such sites, including the provision of green space and community facilities which will have further positive effects. Again, this is largely dependent on the location of the resulting developments and site specific policies.
- 7.36 **Waste and resource use:** Under this approach the Council may be able to influence the design of developments including for example the recycling of existing buildings or reusing construction materials from existing structures in order to recycle embedded carbon and specifying more energy efficient design. Other options likely to have beneficial outcomes include the installation of water recycling systems (e.g. grey water systems), district heating and cooling systems and on site recycling facilities. This would largely depend on the site chosen and site specific policies, therefore uncertain **positive effects** are predicted at this stage.
- 7.37 **Economy and employment:** The greater potential for regeneration may have positive consequences on improving the attractiveness of previously run down areas. It may also help improve land values and attract more investment to the regenerated areas. These factors are likely to have positive effects on the economy. On the other hand, this approach may also lead to the loss of some employment land (e.g. commercial/ industrial premises in unsuitable locations). At this stage therefore, **neutral effects** are predicted as the benefits of potential regeneration may be negated by the loss of employment land.
- 7.38 **Air quality:** The approach has limited scope to impact air quality though the housing growth will inevitably lead to increased traffic and congestion and therefore likely to exacerbate the current air quality issues. The Council may be

able to implement measures such as car free neighbourhoods but this uncertain at this stage and therefore, **negative effects** are envisaged at this stage.

- 7.39 **Water quality:** as with other options discussed the additional growth proposed can potentially adversely impact the quality of water bodies through surface water runoff and treated wastewater effluent. The land assembly approach may give the Council more opportunity for instigating the provision of SuDS but this remains uncertain at this stage.
- 7.40 Possible **negative effects** are predicted due to the additional pollution likely from surface run-off and combined sewer over-flow events.
- 7.41 **Land and soil:** The locations of parcels to be identified and assembled under this approach are more likely to be within existing urban areas where there is very little (if any) good quality agricultural land. The approach may therefore help relieve some of the development pressures on non-urban areas (e.g. in the countryside) which are more likely to contain valuable agricultural land. Therefore, the effects are predicted to be **positive** but there remains a degree of uncertainty until the sites are identified.
- 7.42 **Achieving zero carbon living:** As discussed under the other options the scale of growth proposed is likely to create more vehicular traffic leading to increased congestion and emissions. This approach may enable the Council to positively influence the development by promoting more energy efficient design, active travel /public transport infrastructure provision and sustainably located neighbourhoods (with respect to services and employment). Assembled sites can also provide opportunities for the provision of low carbon or more efficient district heating/ cooling systems. Therefore, the adverse effects associated with increased traffic are partly offset by the additional control this approach provides enabling the inclusion of more sustainable design, low carbon transport infrastructure and low carbon heating/ cooling systems but this would largely depend on the ability of the Council to acquire sufficient land parcels, in suitable locations and the implementation of site specific policies. Therefore, residual **negative effects** are predicted at this stage.
- 7.43 **Flooding:** Effects would largely depend on the location of sites but in general terms, the approach should provide more scope for the Council to implement SuDS and greater provision of green / blue infrastructure which would alleviate flood risk in the future. However, the number and location of sites likely to be assembled remain unknown at this stage and therefore **neutral effects** are predicted at this juncture.
- 7.44 **Historic environment:** Again, effects would be dictated by the location and size of sites assembled through this approach. If sites are located in less constrained areas (away from heritage assets / conservation areas) adverse effects would be less likely to occur. The approach may give the Council more control as to how developments in heritage constrained areas are shaped helping ensure that new development is appropriate in terms of design and scale to the character of its surroundings.
- 7.45 However, given the scale of growth proposed and numerous heritage assets and conservation areas within the City, it is unlikely that development in heritage constrained locations can be entirely avoided. Therefore, at this stage, uncertain

effects are predicted on the historic environment (these could be positive and / or negative).

- 7.46 **Natural landscape:** effects would be largely dependent on the location of sites assembled. If these are focused on areas of low landscape sensitivity, then adverse effects would be less likely. The approach may give the Council more say on the design, layout and landscaping of new development on such sites. However, effects remain uncertain until the sites can be identified.
- 7.47 **Biodiversity and geodiversity:** Sites in environmentally constrained locations (within or in proximity to SSSIs, NNR, LNRs and SINCs) would be more likely to engender adverse effects. Effects specifically associated with this approach remain uncertain until the locations and sizes of sites to be assembled can be ascertained. However, given the overall scale of development expected, this approach could result in an overall reduction in open / green spaces in the City which would reduce biodiversity mobility and increase fragmentation leading to **negative effects** on biodiversity.
- 7.48 **Accessibility and transport:** As discussed above this option is likely to give the Council more control over how development is shaped on assembled sites. This could include the requirement to integrate new development with existing public transport and the provision of walkways and cycle routes for example. Accessibility would be largely dependent on the actual location of sites and therefore effects are uncertain at this stage. However, given the extensive public transport links (Bus, Metro, Sprint Rapid Transit and HS2) it is likely that development under this option would be well connected to the transport system therefore enabling better accessibility. In view of the above, **uncertain positive effects** are predicted at this stage.

Option 3 Further comprehensive housing regeneration

- 7.49 This option involves identifying housing regeneration areas such as large residential estates which do not currently provide high quality of life for residents. Several such schemes have been completed over recent years in Birmingham to provide new housing with enhanced community facilities and open space.
- 7.50 **Housing:** This option is likely to produce beneficial effects with respect to quality and choice of housing, but it is likely to have limited benefit in terms of net delivery of new housing as it would involve demolishing existing dwellings and replacing them with new ones on the same sites. A net increase in dwellings would only be possible if a higher density approach is applied to such sites. Furthermore, this approach would initially lead to a reduction in available housing including affordable housing and social rents during the initial phases as existing housing is demolished and new housing constructed. This could take several years exacerbating the housing shortfall in the interim. On the plus side this approach could produce better quality housing with more community facilities and open space to provide a healthier environment to residents. Therefore, in the short term the effects are potentially **negative** (due to the initial reduction in housing stock) with **neutral or positive effects** on housing in the longer term.
- 7.51 **Equality, diversity and community development:** Following the initial period of demolition and construction this option can generate benefits on equality and community development as it is likely to improve the quality, choice, and potentially affordability, of housing for the community including those within the

most deprived areas and households who rely on affordable / social rents. However, in the short term negative effects are possible as there would be a decrease in overall housing stock which would disproportionately impact those in the most need for social housing. Therefore, mixed effects are likely: short term **negative** ones due to the initial decrease in housing with **positive effects** in the longer term due to the improved quality of housing, improved environment, community facilities and open space.

- 7.52 **Health and wellbeing:** Localised beneficial effects on health and wellbeing are likely under this approach. The regeneration of rundown estates is likely to produce better quality housing, community facilities and more open space which would have beneficial effects on local residents in the long run. However, there are potential adverse impacts in the short/ medium term during the demolition and construction works as existing residents may lose their homes and need to be suitably re-homed in the interim. The extent of potential regeneration is unknown at this stage, but effects (positive or negative) are likely to be localised and small scale (compared to the overall scale of growth proposed) therefore **neutral effects** are predicted at this stage.
- 7.53 **Waste and resource use:** Under this approach the Council would be able to influence the design of developments including for example the recycling of existing buildings or reusing construction materials from existing structures and specifying more energy efficient design. Other options likely to have beneficial outcomes include the installation of water recycling systems (e.g. grey water systems), district heating and cooling systems and on site recycling facilities. However, any such benefits are likely to be relatively small scale and localised, therefore **neutral effects** are predicted at this stage.
- 7.54 **Economy and employment:** The greater potential for regeneration may have positive consequences on improving the attractiveness of previously run down areas which may improve land values and attract more investment to the regenerated areas. However, effects are likely to be localised and therefore, significant effects are considered unlikely (**neutral effects**).
- 7.55 **Air quality:** The approach has limited scope to impact air quality and may result in localised deterioration in air quality during the demolition/ construction phases of regeneration. At this stage it is envisaged that any effects would be localised, and small scale compared to the overall scale of growth proposed which will inevitably lead to increased traffic. Therefore, **negative effects** are envisaged at this stage due.
- 7.56 **Water quality:** The additional growth proposed in the BLP can potentially adversely impact the quality of water bodies through surface water runoff and treated wastewater effluent. The regeneration approach may provide beneficial mitigation measures such as the installation of SuDS and stricter specification aimed at limiting run off rates from new development. However, such measures are likely to be relatively small in scale compared to the overall growth and distribution of growth proposed in the BLP. As such, **neutral effects** are predicted overall.
- 7.57 **Land and soil:** The option is unlikely to produce significant effects as the regeneration would take place on existing estates and not produce a significant impact on the net new dwellings delivered. Whilst, it is unlikely to significantly reduce the overall amount of housing required, it will help to improve stock,

potentially increase density (and therefore reduce the shortfall), and would take place in urban areas, helping reduce pressure on greenfield sites. Therefore, minor **positive effects** are predicted at this stage.

- 7.58 **Achieving zero carbon living:** Under this approach the Council can positively influence the regenerated estates by promoting more energy efficient design and active travel /public transport infrastructure.
- 7.59 The option presents opportunities to incorporate low carbon or more efficient district heating/ cooling systems. However, any such effects are likely to be localised and small in scale and therefore unlikely to significantly impact the adverse effects associated with the overall scale of development proposed. Consequently, **neutral effects** are predicted at this stage.
- 7.60 **Flooding:** The approach may produce beneficial localised effects where SuDS are implemented, and green/ blue infrastructure are provided within development. However, the effects are not expected to be significant therefore **neutral effects** are predicted at this stage.
- 7.61 **Historic environment:** The effects would be dictated by the location and size of regenerated sites. Locations in less constrained areas are less likely to give rise to adverse effects. The approach presents opportunities to improve rundown areas providing designs that are more sympathetic in design and character to surrounding areas and potentially improving the attractiveness of estates located in proximity to heritage assets. However, such effects are likely to be relatively small and localised compared to the overall scale of growth proposed. The option is unlikely to lead to the complete avoidance of development in heritage constrained locations, but likewise, regeneration areas are unlikely to be affected in a negative way in terms of heritage. Therefore, **neutral / uncertain effects** are predicted.
- 7.62 **Natural landscape:** effects would be largely dependent on the location of regeneration sites. If these are focused on areas of low landscape sensitivity, then adverse effects would be less likely. The approach may also give the Council more say in the design, layout and landscaping of regenerated estates. However, effects are likely to be localised and small in scale producing **neutral effects** overall.
- 7.63 **Biodiversity and geodiversity:** The regeneration approach is unlikely to produce significant effects as these would be localised within existing estates. There may be opportunities to improve the amount and connectivity of GI. However, for the reasons discussed above, the approach is unlikely to result in the complete avoidance of growth in environmentally constrained locations; therefore **neutral effects** are predicted.
- 7.64 **Accessibility and transport:** As discussed above this option may present localised, small scale, opportunities to improve development within regenerated areas. For example the integration of regenerated sites with existing walkways/ cycle routes and bus routes would be beneficial.
- 7.65 However, accessibility would be largely dependent on the actual location of sites and therefore effects are uncertain at this stage. Potential positive effects are likely to be localised and small in scale producing **neutral effects** overall.

Option 4 Utilise poor quality under-used open space for housing

- 7.66 This option involves identifying underused, poor quality open space that is currently of limited value and utilising it for residential development. The Council envisages that such sites would be in accessible locations.
- 7.67 **Housing:** This option is likely to produce beneficial effects with respect to housing as it is likely to boost land supply and help meet the housing growth required in the BLP. It may also enable the provision of more affordable housing, particularly on larger sites. Furthermore, the locations are likely to be in centrally located areas with good access to transport, services and employment. Therefore, this option is predicted to produce some **positive effects** as it is likely to boost land supply thus helping meet some of Birmingham's housing shortfall.
- 7.68 **Equality, diversity and community development:** Some of the open spaces likely to be utilised for this option are within some of the more deprived areas of the City. The provision of more housing in such locations, particularly social affordable/ housing can be particularly helpful to more deprived households who are unable to afford suitable accommodation. In this respect the approach is **potentially positive** with respect to equality. The approach can improve accessibility to jobs, transport and service for the more deprived neighbourhoods. Having said that, there is a degree of uncertainty at this stage as the above would depend on the Council's ability to identify a sufficient number of open space sites to utilise.
- 7.69 Conversely, by changing open space sites to housing, it removes the amount of recreational in the urban area, and the potential for these to be enhanced for community use (despite these not being used proactively at this time). In this respect, potential **negative effects** are predicted.
- 7.70 **Health and wellbeing:** Mixed effects are likely; **positive ones** due to the enhanced housing provision (including affordable housing) and potentially **negative** implications due to the reduction of open space which is already underprovided in the City. The option may present opportunities to provide higher quality open/ green spaces within new developments, but this would largely depend on the sites chosen and associated site specific policies.
- 7.71 **Waste and resource use:** No direct significant effects are anticipated from this approach. Any effects (positive or negative) would largely depend on the sites chosen and site specific policies, therefore **neutral effects** are predicted at this stage.
- 7.72 **Economy and employment:** The replacement of poor quality / underutilised open space may improve the attractiveness of previously run down areas. It may also help improve land values and attract more investment particularly if new development were to include higher quality open/ green spaces. These factors are likely to have generally positive effects on the economy.
- 7.73 The location of such sites in areas in close proximity to employment (e.g. City Centre and inner city areas) would help increase footfall in existing employment / commercial areas which could further improve the local economy and employment. Again, this would be largely dependent on the location and number of sites identified under this approach therefore, **uncertain positive effects** are predicted at this stage.

- 7.74 **Air quality:** The approach has limited scope to impact air quality though the overall housing growth will inevitably lead to increased traffic and congestion and therefore likely to exacerbate the current air quality issues. The Council may be able to implement measures such as car free neighbourhoods but this uncertain at this stage and therefore, **negative effects** are envisaged at this stage.
- 7.75 **Water quality:** As with other options discussed the additional growth proposed can potentially adversely impact the quality of water bodies through surface water runoff and treated wastewater effluent. There may be opportunities to implement SuDS as part of new development, but this remains uncertain at this stage with **negative effects** predicted due to the additional pollution likely from surface run-off and combined sewer over-flow events.
- 7.76 **Land and soil:** This approach has potentially **positive effects** on land and soil as it will likely enhance housing provision in existing urban/ built-up areas, improving land supply and reducing the need to utilise high quality agricultural land elsewhere.
- 7.77 **Achieving zero carbon living:** As discussed under the other options the scale of growth proposed is likely to create more vehicular traffic leading to increased congestion and emissions. The effects associated with this approach would be largely dependent on the location of sites identified and site specific policies. There may be scope for new development to implement more energy efficient design and provide more active travel /public transport links, but this is uncertain at this stage. The location of sites under this option are generally sustainably located (with respect to services and employment) in accessible locations which would reduce the need to travel. Therefore, some of the adverse effects associated with increased traffic are partly offset by the more sustainable/ better connected locations. Therefore, neutral effects are predicted at this stage.
- 7.78 **Flooding:** This approach will result in the loss of open space within the City which could have adverse effects on permeability and may exacerbate surface water flood risk. There may be opportunities to implement SuDS and provide replacement green space but this is uncertain at this stage. Therefore, **negative effects** are predicted at this stage due to the loss of open space and associated impacts on flood risk.
- 7.79 **Historic environment:** Effects would be dictated by the location and size of sites utilised through this approach. If sites are located in less constrained areas (away from heritage assets/ conservation areas) adverse effects would be less likely to occur. However, given the scale of growth proposed and numerous heritage assets and conservation areas within the City, it is possible that development in heritage constrained locations would occur under this approach. Therefore, there could be some **negative effects** on the historic environment, particularly where open space contributes to the setting of heritage assets.
- 7.80 There is uncertainty at this stage, as effects will depend on the specific sites involved and the amount of open space sites that were released. A precautionary approach is taken at this high level of appraisal.
- 7.81 **Natural landscape:** Effects would be largely dependent on the location of sites identified. If these are focused on areas of low landscape sensitivity, then significant effects would be less likely. That said, open space constitutes an important aspect of landscape and townscape therefore its loss can potentially

substantially alter the character of the landscape. Additionally, the removal of open space may result in some loss of amenity to nearby residents/ receptors. Conversely, the approach may present opportunities to improve current landscape through the provision of higher quality open/ green spaces.

- 7.82 Overall, uncertain mixed effects are predicted at this stage: potentially **negative effects** are predicted due to the loss of amenity and change to the existing landscape/ townscape character with potential **positive effects** as the approach may help reduce encroachment on areas of high landscape sensitivity (outside of the urban area) and may engender improvements by providing higher quality open/ green space.
- 7.83 **Biodiversity and geodiversity:** Effects would be dependent on the location of sites selected for development. The approach is likely to lead to some loss of urban greenspace, which potentially includes natural / semi-natural and artificial habitats that occur frequently in urban settings, such as parks and community gardens, wasteland (derelict/ unmanaged), amenity or recreational greenspaces etc. Such areas often have an important role to play in reducing habitat fragmentation and retaining some connectivity between habitats in developed areas. Therefore, this option may lead to **negative effects**, though there is scope for new development to offset some of the fragmentation by providing new kinds of habitats such as community woodland and by linking green spaces to facilitate the movement of species.
- 7.84 **Accessibility and transport:** This option is likely to engender positive effects on accessibility as the sites would be in accessible locations benefitting from the city's extensive public transport links (Bus, Metro, Sprint Rapid Transit and HS2). Therefore, **positive effects** are predicted at this stage.

Option 5 Utilise some employment land for housing

- 7.85 This option involves converting some of the City's employment land for mixed use or residential use. Some of the city's employment land is poor quality and under occupied and so might present opportunities to be redeveloped for other uses.
- 7.86 **Housing:** This option is likely to produce beneficial effects with respect to housing as it is likely to boost housing land supply thus contributing towards the housing growth required in the BLP. It may also enable the provision of more affordable housing, particularly on larger sites. Furthermore, the land involved is well located with respect to transport and employment. Therefore, this option is predicted to produce some **positive effects**.
- 7.87 **Equality, diversity and community development:** The majority of the CEAs overlap some of the most deprived areas in the City. The provision of more housing in such locations, particularly social affordable/ housing can be particularly helpful to more deprived households who are unable to afford suitable accommodation. In this respect the approach is potentially positive with respect to equality. The approach can also improve accessibility to jobs as the sites would be located within employment areas and the locations are well connected to the roads and rail networks within Birmingham. However, some of the locations may not be well placed with respect of community services such healthcare and education which may adversely impact the ability of residents to access such

services. Additionally, some of the locations may not lend themselves to active travel modes such as walking and cycling. Therefore, whilst some positive effects are likely due to improved housing provision and access to jobs this is counterbalanced by the potential lack of services and active travel networks leaving **neutral effects** overall.

- 7.88 **Health and wellbeing:** Mixed effects are likely; **positive ones** due to the enhanced housing provision (including affordable housing) and potentially **negative** implications due to the location of new housing within employment areas which may not be suited to residential use for example there may be issues around pollution or noise associated with remaining industrial/ commercial premises. Furthermore, some employment sites may not lend themselves to active travel such as walking/ cycling which could impact residents' health and wellbeing.
- 7.89 **Waste and resource use:** No direct significant effects are anticipated from this approach. Any effects (positive or negative) would largely depend on the sites chosen and site specific policies, therefore **neutral effects** are predicted at this stage.
- 7.90 **Economy and employment:** The approach will lead to some loss of employment land which could adversely impact future employment land supply. The planned transport improvements along with HS2 are likely to attract more businesses to the City which is likely to increase future employment land demand. Conversely, the introduction of residential and mixed-use sites within existing employment areas may provide a boost to businesses through the increased footfall generated. Additionally, the option may help bring back into productive use sites which may have been vacant for a long time with poor prospects of future employment use. Also, at a time of personnel shortage, businesses may potentially benefit from having a potential workforce pool in their immediate vicinity. The recent Birmingham Housing and Economic Development Needs Assessment (HEDNA)⁷ which assessed employment land supply and demand up to 2042, estimated that there will be a gross need for 319 ha of land to 2042 (split into 23.5 ha offices and 295.6 ha industrial). When the employment land supply is taken into account a potential oversupply of office employment land is predicted with a shortfall of 73.64 ha for industrial land, however the report adds that this can potentially be met from sites released from the HS2 works and / or the proposed West Midlands Interchange Site in South Staffordshire District.
- 7.91 Therefore, mixed effects are predicted at this stage with **positive effects** likely due to the increased footfall and proximity of potential workforce to employment locations and **uncertain negative effects** due to the potential loss in employment land. The latter may potentially be overcome by the release of HS2 (or other) land but this remains uncertain at this stage.
- 7.92 **Air quality:** The approach has limited scope to impact air quality though the overall housing growth will inevitably lead to increased traffic and congestion and therefore likely to exacerbate the current air quality issues. Whilst employment areas are well connected to the existing transport networks they may not be well connected or in close proximity to community services such as schools and healthcare which makes walking/ cycling less likely thus increasing reliance on car journeys. Therefore, **negative effects** are envisaged at this stage.

⁷ [Iceni Projects report \(2022\): Birmingham Housing and Economic Development Needs Assessment \(HEDNA\)](#)

- 7.93 **Water quality:** As with other options discussed the additional growth proposed can potentially adversely impact the quality of water bodies through surface water runoff and treated wastewater effluent. There may be opportunities to implement SuDS as part of new development, but this remains uncertain at this stage.
- 7.94 Given that much of the land involved is already likely to be previously developed, the potential for pollution and flooding issues are considered to be low, thus **neutral effects** are predicted.
- 7.95 **Land and soil:** This approach has potentially **positive effects** on land and soil as it will likely enhance housing provision in existing industrial/ commercial non-agricultural areas, improving land supply and reducing the need to utilise high quality agricultural land elsewhere.
- 7.96 **Achieving zero carbon living:** As discussed under the other options the scale of growth proposed is likely to create more vehicular traffic leading to increased congestion and emissions. Employment areas may not be within walking/ cycling distance from community services such as schools, shops and GP surgeries which may increase reliance on cars for such journeys. The effects would be largely dependent on the location of sites identified and site specific policies. There may be scope for new development to provide these community services locally, but this is uncertain at this stage. Conversely, the location of sites under this option are generally sustainably located with respect to roads/ railway transport and employment in accessible locations which would reduce the need to travel to work. However, the overall scale of growth proposed will inevitably lead to increased vehicular traffic and congestion with associated increases in emissions. Therefore, residual **negative effects** remain at this stage.
- 7.97 **Flooding:** This approach is not expected to produce significant effects therefore **neutral** effects are predicted. However, some employment uses are considered suitable in areas at risk of flooding, whilst residential development would not be. As such, a change of use in this respect could be negative.
- 7.98 **Historic environment:** effects would be dictated by the location and size of sites utilised through this approach. If sites are located in less constrained areas (away from heritage assets/ conservation areas) adverse effects would be less likely to occur. Employment land is less likely to contain heritage assets therefore the provision of housing here can potentially reduce pressure on other locations in more constrained locations (e.g. conservation areas).
- 7.99 However, given the scale of growth proposed and numerous heritage assets within the City, it is unlikely that development in heritage constrained locations can be entirely avoided. **Neutral effects** are predicted in relation to development within CEAs.
- 7.100 **Natural landscape:** Existing employment land is generally within less sensitive landscape areas therefore the introduction of residential development into such locations is unlikely to adversely impact the landscape. There may be **positive effects** as the approach can help reduce encroachment on areas of high landscape sensitivity.
- 7.101 **Biodiversity and geodiversity:** Employment land is generally less environmentally constrained, therefore this approach is unlikely to lead to adverse effects and would potentially help reduce development pressure on

other more constrained areas. Therefore, this option could have some **positive effects** overall.

7.102 Accessibility and transport: This option is likely to engender some positive effects on accessibility as the sites would be in accessible locations benefitting from the city's extensive public transport links (Bus, Metro, Sprint Rapid Transit and HS2).

7.103 However, this is offset by the potential lack of walking/ cycling infrastructure within the employment locations and the lack of community services such as healthcare and education within employment areas. Therefore, **neutral effects** are predicted overall at this stage.

Option 6 Release Green Belt for housing

7.104 This option proposes Green Belt release for new residential development. The majority of Green Belt land is concentrated within the north and north east of Birmingham but there are smaller Green Belt areas (green wedges) to the east, west and south west along the city's boundary. The Green Belt covers around 15% of the total area of Birmingham. The adopted BDP set a precedent for Green Belt release, proposing a 6,000 dwelling sustainable Urban Extension (SUE) in the green belt at Langley in Sutton Coldfield, north east of Birmingham.

7.105 **Housing:** This option is likely to produce beneficial effects with respect to housing as it is likely to boost housing land supply thus contributing towards the housing growth required in the BLP. It may also enable the provision of more affordable housing, particularly on larger sites and could provide a different type of housing than would be possible at higher densities in the City. Whilst the locations are relatively remote from the rest of the City, development in the form of SUE's would partly compensate for this by providing necessary infrastructure and community services (e.g. health, education and retail) and some of the locations are in close proximity to local centres (e.g. Sutton Coldfield). Importantly, this option may be critical to fulfilling the unmet housing need, as such, it is predicted to produce **likely significant positive effects** on housing.

7.106 **Equality, diversity and community development:** Whilst there are relatively small areas of deprived neighbourhoods in the north east, the majority of Green Belt areas are less deprived than more central locations in Birmingham. In this context development in the Green Belt is less likely to help those in the most deprived locations.

7.107 However, large schemes (e.g. Langley SUE) can provide more affordable housing, new employment opportunities and new community services which would be particularly beneficial to the deprived households in Birmingham. However, this would only apply to large scale SUE schemes, smaller scale development within the Green Belt may not be well placed with respect to employment and community services (e.g. healthcare and education) which may adversely impact the ability of residents to access such services. Therefore, whilst some positive effects are possible due to improved housing provision and access to jobs and services, this would depend on the location and size of development proposed which remains unknown at this stage. Therefore, **neutral effects** are predicted overall.

7.108 **Health and wellbeing:** Large scale development within the Green Belt has the potential to produce attractive new neighbourhoods with better provision of open

green space and active travel infrastructure, particularly if these are in the form of SUEs. Furthermore, the enhanced housing provision, including affordable housing would have beneficial impact on health and wellbeing. However, these positive effects are offset by the negative effects associated with the net loss of open/ green space, particularly in areas of high landscape value (e.g. in Sutton Coldfield). Therefore, mixed effects are likely; **positive ones** due to the enhanced housing provision (including affordable housing) and potentially **negative** implications due to loss of high quality green/ open space which is currently underprovided in Birmingham.

7.109 **Waste and resource use:** No direct significant effects are anticipated to arise specifically due to this approach. Any effects would depend on the relevant BLP site specific policies, therefore **neutral effects** are predicted at this stage.

7.110 **Economy and employment:** The approach may produce some new employment, retail and offices if a mixed use SUE development approach is implemented. The boost in housing would also help support future economic growth. Therefore, **positive effects** are envisaged.

7.111 **Air quality:** The overall housing growth will inevitably lead to increased traffic and congestion and therefore likely to exacerbate the current air quality issues. Green Belt locations could potentially be less accessible to facilities and services by sustainable modes, and this could lead to increased car trips and associated air quality issues. These are potential minor **negative effects**.

7.112 **Water quality:** As with other options discussed the additional growth proposed can potentially adversely impact the quality of water bodies through surface water runoff and treated wastewater effluent. There may be opportunities to implement SuDS as part of new development, but this remains uncertain at this stage with **negative effects** predicted due to the additional pollution likely from surface run-off and combined sewer over-flow events.

7.113 **Land and soil:** Under this option there would some loss of non-urban land in the Green Belt areas some which is best and versatile agricultural land (BVM) including grades 2 and 3a area in the north east of the City. This is likely to be significant if the proposed sites are similar in scale to the Langley SUE scheme. Therefore, this approach has **likely significant negative effects** on land and soil due to the encroachment on non-urban land within the green belt in locations likely to contain high quality agricultural land.

7.114 **Achieving zero carbon living:** As discussed under the other options the scale of growth proposed is likely to create more vehicular traffic leading to increased congestion and emissions. The Green Belt areas may not be within walking/ cycling distance from community services such as schools, shops and GP surgeries which may increase reliance on cars. The relative remoteness of the potential sites from existing employment and the larger centres may lead to greater reliance on cars. Conversely if development is to take the form of large scale SUEs then these would provide significant new community services and infrastructure which could reduce reliance on cars and may facilitate modal shift. That said, the overall scale of growth proposed will inevitably lead to increased vehicular traffic and congestion with associated increases in emissions. Therefore, residual **negative effects** are likely to remain.

7.115 Flooding: Some Green Belt locations are in areas of low flood risk. Though there are areas that contain flood zone 2 and 3, it is presumed that these would be sequentially avoided. Therefore, this approach is predicted to have **neutral effects**.

7.116 Historic environment: Green Belt areas within Birmingham present varied sensitivities with regards to heritage. Though the number of assets are reduced compared to urban areas, there are still sensitive assets such as scheduled monuments and listed buildings near or within potential development locations. It is considered unlikely that these assets would be directly affected, but there is certainly the potential for the setting of assets to be affected, as open countryside is important to several of these historic features. On the other hand, if less sensitive Green Belt locations are involved, it could help to take pressure from the urban areas where the prevalence of heritage is much higher. On balance, given the relative shortage of open space around the urban areas, it is considered that some residual **negative effects** on the historic environment would arise. It is unclear whether these would be significant, as the precise locations are unknown at this stage.

7.117 Natural landscape: The Green Belt locations are varied in relation to landscape sensitivity. However, much of the remaining areas contain parcels assessed to be of high landscape sensitivity to development⁸. Further encroachment into Green Belt could therefore have negative effects. Development in Green Belt locations is more likely to be of a scale that supports new facilities (to ensure that they are sustainable), and therefore, the potential for **significant negative effects** is higher in this respect. Smaller piecemeal development could be more acceptable from a landscape perspective, but would be more likely to have poor accessibility (which is contrary to the NPPF). Again, the effects will depend on the exact location and extent and nature of growth.

7.118 Biodiversity and geodiversity: The Green Belt locations include a number of habitats of moderate to high ecological values including (to varying extents) Local Nature Reserves, Sites of Special Scientific Interest (SSSI), Sites of Importance for Nature Conservation (SLINCs) and Tree Preservation Orders (TPOs). Therefore, this option is likely to lead to some development in environmentally constrained locations with potentially **negative effects** on biodiversity. That said, there may be scope for mitigation in the form of providing new, connected green spaces and seeking biodiversity net gain within new development schemes.

7.119 Accessibility and transport: Generally speaking, growth in Green Belt locations would be in proximity to suburban areas with either poor or reasonable access to facilities and services. There are also locations where the existing road infrastructure is congested particularly at peak times. Also, the choice of travel modes may be limited which may lead to increased car journeys due to the relative remoteness from the main employment sites in Birmingham. Furthermore, walking/ cycling infrastructure is likely to be more limited. Therefore, some **negative effects** are envisaged. Larger scale developments such as SUEs may provide the scale of investment required to enhance existing infrastructure and provide new transport services, but this remains uncertain at this point.

⁸ [Green belt assessment \(2013\)](#)

APPENDIX C – Appraisal of Employment Options

Employment Option 1 Continue investigating and identifying further sources of land supply to address the shortfall

- 7.1 This option would involve identifying further opportunities for employment development within the city, including in existing employment areas such as the CEAs, and other locations identified by the Council. Effects would ultimately depend on the locations of sites identified; if these are located in the existing core employment locations (CEAs) then positive synergies would be likely as these areas already benefits from good transport links and are located close to other businesses and services. Conversely, if the chosen locations are in remote or less well connected locations which may not be well located with respect to transport infrastructure and services, potentially negative effects would be likely due to the less sustainable locations. Furthermore, if the identified sites lie in non-employment use areas, e.g. residential neighbourhoods, there may be adverse effects on existing uses. Overall, uncertain mixed effects are likely at this stage; uncertain positive effects if identified sites are in existing employment areas such as the CEAs and uncertain negative effects if the selected sites are relatively remote from services and infrastructure or in non-employment related use.
- 7.2 **Housing:** Effects would depend on the location of sites identified, if these are located outside residential areas, within employment areas such as the CEAs then effects are neutral. However, if identified sites are within residential neighbourhoods there may be **negative effects** on housing as the new employment areas may lead to disturbance, loss of privacy, road congestion, parking issues and potentially pollution. Some areas identified for employment expansion might also be potential sites options for housing, so a balance would need to be struck.
- 7.3 **Equality, diversity and community development:** As discussed above, effects are dependent on locations chosen. If sites are located within the CEAs, which overlap some of the most deprived areas in the City, there may be **positive effects** pertaining to improved accessibility to new employment opportunities. Conversely if sites selected are distant from the more deprived areas, there are less likely to be any beneficial effects (neutral). Increased employment in the City could also potentially add to air quality issues, which could disproportionately affect deprived communities (**negative effects**).
- 7.4 **Health and wellbeing:** Effects depend on the location of the additional employment land. As discussed above, if sites are placed in residential locations there is potential for **negative effects** on the health and wellbeing of residents due to issues around parking, congestion, noise and pollution. If sites are within existing employment locations, no significant effects would be expected in this respect. **Positive effects** may also arise if communities are able to access new employment opportunities.
- 7.5 **Waste and resource use:** Locations within existing CEAs may offer more scope for waste reuse / circular economy production due to the concertation of different industrial/ commercial and business uses in the same location where by-products or waste from one industry may be useful as a resource for another neighbouring facility, but this is uncertain as it depends on the exact location chosen and type

of commercial/ industrial uses in the area chosen. Therefore, **uncertain positive effects** are envisaged at this stage for sites located in existing employment areas, otherwise effects are unlikely to be significant for sites located outside the CEAs (i.e. **neutral**).

- 7.6 **Economy and employment:** Accommodating the employment land shortfall within the City is likely to engender positive effects as it would create more job opportunities; directly benefitting Birmingham's economy, generating growth and revenue locally. Location will have an important bearing on the magnitude of such effects, sites within existing employment areas and CEAs are likely to be more positive due to the synergies with exiting uses, transport infrastructure and services. However there may be some locational specific factors for some industries that mean areas outside of the CEAs are more favourable. Potential **significant positive effects** are identified at this stage.
- 7.7 **Air quality:** Whilst effects depend on locations chosen and the type of employment use proposed, placing the employment land shortfall within the City is generally positive as it will benefit from existing transport infrastructure and services, particularly in the existing employment areas. It also means residents will travel shorter distances to access employment. Allocating employment land in more remote locations would be more likely to lead to longer journeys and increased reliance on car journeys. Having said that the scale of growth proposed will generate more industry associated emissions (e.g. from HGV traffic) and traffic leading to **negative effects** overall. These may be made worse if the shortfall is allocated in relatively remote, less well connected areas.
- 7.8 **Water quality:** No additional or significant effects are envisaged; neutral effects.
- 7.9 **Land and soil:** Mixed effects are predicted; locations within existing employment areas are not anticipated to produce significant effects as land would most likely be brownfield. However, negative effects would be more likely if sites were allocated in non-urban and rural/ semi-rural areas as this could lead to loss of BVM agricultural land. Potential / uncertain **negative effects** are predicted.
- 7.10 **Achieving zero carbon living:** Uncertain effects are envisaged at this stage; placing the employment land shortfall within the City is generally positive as it will benefit from existing transport infrastructure and services, particularly in the existing employment areas. This should help to reduce emissions arising from the construction of new infrastructure, and limit additional emissions due to transport and travel. However, allocating employment land in more remote locations would be more likely to lead to longer journeys and increased reliance on car journey. It is difficult to predict whether per capita emissions would increase or decrease without understanding where growth would be located.
- 7.11 **Flooding:** Effects would be dependent on the exact locations and therefore, effects are uncertain at this stage. Some parts of the existing CEAs fall within flood risk zones 2 and 3, as well as being at risk of surface water and groundwater flooding. Development here could therefore have negative effects.
- 7.12 However, given the need to apply a sequential approach with regards to flood risk, and the less sensitive nature of some employment land uses, it is anticipated that effects would not be significant.
- 7.13 **Historic environment:** Effects would be dictated by the location and nature of sites identified. If sites are located in less constrained areas (away from heritage

assets/ conservation areas) adverse effects would be less likely to occur. For example, employment areas are less likely to contain heritage assets, and therefore the provision of additional employment here can potentially reduce pressure on other more constrained locations; leading to **positive effects**. However, if employment land is allocated in more constrained locations such as, in the vicinity of heritage assets or conservation areas, **negative effects** would be more likely due to the potential adverse impacts on the character and settings of the historic environment resulting from incompatible employment type uses.

- 7.14 **Natural landscape:** Existing employment areas are generally in less sensitive landscape areas therefore locating more employment land in these locations is unlikely to adversely impact the landscape, and could potentially reduce pressure in more sensitive locations (i.e. **positive effects**) Location of employment land in more sensitive landscape areas would potentially lead to negative effects as the allocations are likely to be out of character with the existing landscape character.
- 7.15 **Biodiversity and geodiversity:** Effects would be dependent on the location of sites selected for development. Locations in existing employment areas are unlikely to lead to development in environmentally constrained areas, and could reduce pressure elsewhere, which is **potentially positive**. However, if employment land is located in more environmentally constrained areas, this option may lead to **negative effects**, due to potential loss of habitats and fragmentation as well as disturbance and pollution impacts.
- 7.16 **Accessibility and transport:** Locating more employment land within existing employment areas is likely to have **positive effects** as these already benefit from transport infrastructure and services. However, not all of these locations would necessarily support sustainable travel, and so significant positives cannot be presumed at this stage. Selecting more remote locations could be more likely to have **negative effects** as they would likely be less well connected to transport and services; leading to increased reliance on car journeys.

Employment Option 2 Accommodate the shortfall within other authorities in the wider Housing Market Area (HMA):

- 7.17 This option would involve working with other authorities within the wider Housing Market Area (HMA) to address the shortfall. The Council would discuss this with other HMA authorities to determine whether any employment land proposed in their forthcoming plans can meet some of Birmingham's need. For example, evidence for the Black Country Plan has identified 53 hectares of potential development land at the West Midlands Strategic Rail Freight Interchange in South Staffordshire that can cater for a share of Birmingham's B8 warehousing needs.
- 7.18 **Housing:** There are unlikely to be significant effects on housing under this option. However, less requirement to deliver surplus employment could open opportunities to promote housing on land within the City, which is a potential **positive effect**.
- 7.19 **Equality, diversity and community development:** Effects would depend on the locations of employment sites. If these are in areas in proximity to more deprived areas in neighbouring authorities (in the HMA), there may be beneficial effects associated with improved accessibility to new employment opportunities (however, this would not necessarily have direct effects in Birmingham unless deprived communities can access these jobs). If employment sites are distant from the more deprived areas and are not accessible via commuting for Birmingham residents, then there are less likely to be any beneficial effects for the City itself. At this stage, potential **minor negative effects** are predicted, as opportunities to access jobs could be more difficult for certain communities in Birmingham that have less social mobility.
- 7.20 **Health and wellbeing:** Effects depend on the location of the additional employment land, however as these are expected to be met outside of Birmingham itself, it is considered unlikely that significant effects would arise for the health of residents in Birmingham itself. Therefore, neutral effects are predicted.
- 7.21 **Waste and resource use:** Employment will generate waste and use resources during construction and operation, regardless of location. However, in terms of how resources and waste are managed, if the shortfall in employment land is met outside of Birmingham, it would mean that lower amounts of waste are generated in the City itself and fewer resources utilised. This could be considered a **positive effect** for Birmingham, but the effects would be very minor, and depending upon waste disposal and recycling arrangements, waste could very well be brought back into the City to be processed (which would not be effective with regards to the movement of waste).
- 7.22 **Economy and employment:** Accommodating the employment land shortfall outside the City may have adverse effects on the local economy and employment (In Birmingham itself), but this would not be anticipated to be significant given the existing stock of employment land and pipeline development in the City. Furthermore, provision within the HMA is also likely to have direct / indirect economic benefits for Birmingham due to growth produced in the regional / HMA economy. Therefore, effects are predicted to be **minor positive**.

- 7.23 Such an approach may also offer better opportunities to identify high quality employment land if the scope of sites is widened beyond Birmingham City itself.
- 7.24 **Air quality:** Placing the employment land shortfall outside the City could lead to some degree of out commuting with adverse consequences on air quality. On the other hand, this may reduce further deterioration in the AQMA which covers the whole of Birmingham. As discussed above effects are likely to be insignificant when considered in proportion to the overall growth in employment land, the majority of which is to be provided within the City. On balance, **neutral effects** are predicted.
- 7.25 **Water quality:** No additional or significant effects envisaged; **neutral effects**.
- 7.26 **Land and soil:** The effects of growth in other HMA areas is difficult to predict without knowing the nature of the land involved. However, it is possible that this could involve some greenfield agricultural land, which are potential negative effects in those locations (but not from a Birmingham City only perspective). If growth is on land that has already been identified for employment growth, then the additional effects on land are neutral / **positive** as it would reduce pressure for further land use in Birmingham.
- 7.27 **Achieving zero carbon living:** Seeking to meet a shortfall in employment land outside of the City could have mixed effects. In one respect, it could lead to increased travel /commuting from residents out of Birmingham, which could increase emissions from transport. On the other, it would reduce emissions being generated within Birmingham at new employment locations. These emissions would still arise elsewhere though, so overall, **neutral effects** are predicted.
- 7.28 **Flooding:** Meeting employment land shortfalls outside of the City would mean that there are **neutral effects** in terms of flooding and flood risk in the City itself. The nature of effects in the wider HMA are difficult to predict without knowing the location of development (and is beyond the scope of this SA).
- 7.29 **Historic Environment:** Effects would be dictated by the location and nature of sites identified. If sites are located in less constrained areas (away from heritage assets/ conservation areas) adverse effects would be less likely to occur. Generally existing employment areas (in the City or wider HMA) are less likely to contain heritage assets therefore the provision of further employment land here can potentially reduce pressure on other more constrained locations leading to positive effects. However, land could be identified in greenfield locations in the wider HMAs. For the City itself, the reduced need to identify land for employment would most likely be beneficial for heritage, as it would reduce pressure to develop locations that are more sensitive (whether this be for employment or housing). Therefore, minor positive effects are predicted).
- 7.30 **Natural landscape:** The existing employment areas are generally in less sensitive landscape areas therefore locating more employment land in such locations is unlikely to adversely impact the landscape. If new land is involved, this could lead to negative effects, but this is an uncertainty, and the effects would be outside of Birmingham City itself (though potentially on the periphery) From a Birmingham perspective, this approach could reduce pressure to release Green Belt land (whether this be for housing or employment), and so is potentially **positive** with regards to landscape.

- 7.31 **Biodiversity and geodiversity:** Effects would be dependent on the location of sites selected for development in the wider HMA. From a Birmingham perspective, this approach would reduce pressure to release land in sensitive locations (whether this be for housing or employment, and so potentially is **positive** with regards to biodiversity).
- 7.32 **Accessibility and transport:** Locating more employment land within the wider HMA could lead to increased commuting (from Birmingham to the HMA) to access employment. This is negative, as it increases the length of trips and could lead to more car travel and poorer access to jobs for some communities. On the other hand, some HMA employment locations have good accessibility by sustainable modes of travel, and this could be preferable to poorly located sites in Birmingham itself. These are potential **positive effects**, but a degree of uncertainty exists.

