www.stroud.gov.uk/core

Core Strategy Discussion Paper:
Towards a Preferred Strategy – pros and cons of potential locations for strategic growth

October 2011

[blank page: inside front cover]



Contents

Part 1 – The Alternative Strategies:

page 2

How do we get to a "preferred strategy"?

The Core Strategy will determine the distribution of various kinds of development around the District during the plan period (up to 2026) – including employment growth and the provision of 3,200 homes. As yet, no overall "strategy" for delivering this growth has been decided upon.

Following last year's public consultation on seven alternative strategies, three possible approaches emerged as more popular than the others: Strategy Options A, B and D. Part 1 of this paper explains the basics of these three strategies and introduces the next steps towards formulating a single "preferred strategy".

Part 2 – Potential Locations:

page 4

Where are the sites and what could they offer?

This section of the paper identifies each of the potential growth locations in turn and sets out details about the extent, potential capacity and limitations of the sites there.

Each of these locations is capable of providing development in accordance with Strategy Options A, B, D or some 'hybrid' of those strategies. Some locations have been highlighted as "preferred" locations; others have been included in this report because, despite having greater disadvantages, they could nevertheless provide an "alternative" to the preferred locations if necessary.

Part 3 – Pros and Cons comparison:

page 36

How do the various locations and strategies perform?

In this section of the discussion paper, the main pros and cons of each location are set out in table form, to allow comparison alongside other locations with similar potential. Hence it is possible to see that some locations and some strategy approaches are likely to be more sustainable than others, and some might work better in combination than others.

Part 4 – Recommendations:

page 70

Towards a "preferred strategy"...

The locations described in Part 2 and Part 3 are all capable of providing development in accordance with Strategy Options A, B, D or some 'hybrid' of those strategies. Taking account of the various strengths, weaknesses and opportunities associated with particular locations four "preferred" locations are recommended.



Part 1 – The Alternative Strategies: How do we get to a "preferred strategy"?

The Core Strategy will determine the distribution of various kinds of development around the district during the plan period (up to 2026), including the provision of about 3,200 homes and a target for employment growth equivalent to the creation of two new jobs for every new home built. It will establish broad principles about acceptable levels of development in both the towns and the countryside, creating a policy framework that will ultimately set the scene for more detailed planning policy decisions in the future. As yet, no overall "strategy" for delivering this growth has been decided upon.

Our Alternative Strategies consultation (spring 2010) set out seven spatial options (Strategy Options A-G). Each of the seven "alternative strategies" offered a way to deliver our target levels of new housing and employment development over the next 15 years.

Each of the seven had pros and cons, but the findings of our public consultation last year indicated that three strategies were more popular than the others:

Strategy Option A – the Concentrated Growth Point Strategy

2000 dwellings concentrated at either Cam, Eastington, or west of Stonehouse.

Concentrating development in one place makes it easier to deliver an integrated "package" of infrastructure and services. This scale of development provides great potential for improving transport infrastructure, such as bus services and cycle routes. The community could be served by a comprehensive renewable energy scheme – and this could potentially even supply homes and businesses in the surrounding area.

This strategy would mean minimal impact on the character of the rest of the district, but the impact on the chosen area might be profound. It's inevitable that development on this scale would involve greenfield development, as there is simply insufficient brownfield land available in the District. However, careful design of buildings and spaces could integrate such development with existing communities, creating a place with a distinctive character, an energy efficient and low-carbon community where natural habitats and biodiversity could be conserved and enhanced.

Strategy Option B - the Concentrated Development Strategy

1000 dwellings concentrated at **two** of the following settlements: Cam, Eastington, west of Stonehouse or Whitminster.

Like Option A, this scale of development does offer opportunities to build sustainable communities as well as to create a strong "sense of place", distinctive character and make environmental enhancements through design.

But the various locations differ in their potential to tap into and integrate with existing infrastructure, services and facilities in the surrounding area. Careful planning of a new community of this size would be essential to ensure the success of services and facilities developed for it/as part of it. Similar issues of greenfield development are likely to apply to both OPTIONS A and B.

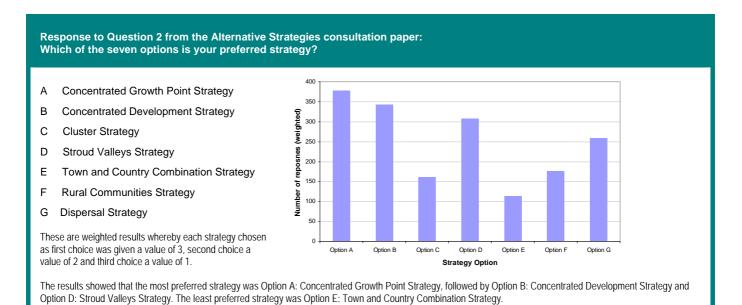
Strategy Option D – the Stroud Valleys Strategy

Three 200 dwelling sites and the remaining 1400 to be found through a variety of smaller sites within the Stroud valleys (with a degree of focus upon canal corridor regeneration sites).

This strategy offers an opportunity to create a distinctive living and working environment, making the most of the Stroud Valleys' rich legacy of historic mills and industrial heritage. Regeneration-focussed development could help to draw more creative and knowledge-based industries to the area, building on our District's existing skills base and cultural and artistic assets.

Many sites with development potential are on "brownfield" (previously developed) land in the industrial valley bottoms; but this brings associated constraints, risks and costs due to factors such as flooding, previous contamination and the area's many listed buildings and conservation areas. Traffic congestion is also a key issue in what is already the most densely populated part of the District, while this strategy might place pressure on valuable green spaces and gaps. Meanwhile, it might not deliver significant service or infrastructure benefits for the rest of the District.





Many people recognised that whilst greater dispersal of development may be possible, it cannot be accompanied with necessary infrastructure as it does not create the critical mass necessary for the funding to meet community aspirations associated with housing. Dispersal does not make the most effective use of existing economic infrastructure and drivers. Whilst small developments (say up to 50 dwellings) in smaller towns and larger villages may provide some limited support to ailing rural services, it is unlikely to lead to significant changes in service provision. Growth at villages would increase use of the car to access a wide range of jobs and services as public transport improvements remain largely unviable when associated with small developments. Where rural housing was supported in the responses, it was always the need for small scale, high quality affordable housing schemes that was requested.

Towards a "Preferred Strategy"...

On this basis, the final "preferred strategy" is likely to be some form of 'concentration' strategy (as opposed to a 'dispersal' approach). However, with none of the three favoured strategies being a really clear front runner, there is still a degree of flexibility in how the final strategy takes shape.

The following guidelines have been agreed by Cabinet and Council:

- In September 2010, Cabinet agreed that future work on the Core Strategy should be directed towards focussing development at one or more of the locations identified in Alternative Strategies **A**, **B** and **D**. (At the same time, the Strategy should develop the localism agenda and build in an element of organic growth that accommodates affordable housing and jobs at the more sustainable of our smaller settlements).
- * Following the revocation of the RSS, Council (September 2011) have agreed to use the DCLG projection of 9,350 dwellings as the base for housing requirements up to 2026. (i.e the total number of new homes that should be completed in the District between 2006 and 2026 is 9,350. This is an increase of 250 homes compared to the number quoted at Alternative Strategies stage, which was based upon the RSS targets). 1,994 homes were completed between April 2006 and the end of March 2011; a further 4,237 homes are already 'committed to' through planning permissions (up to 1st April 2011). This left a target "residual requirement" of 3,119 dwellings at 1st April 2011, for which land needs to found.

The Core Strategy will need to establish just how and where about 3,200 dwellings are to be located across the District.

A range of potential locations are being considered. These were set out in the Alternative Strategies consultation, but now also include Sharpness (a location put forward in representations to that consultation) and South of Gloucester (following the need to consider the allocations contained in the draft RSS that is due to be abolished). The following pages examine these in more detail.



Part 2 - Potential Locations Where are the sites and what could they offer?

These locations are all capable of providing development in accordance with Strategy Options A, B, D or some 'hybrid' of those strategies. Over the following pages, you will see more detail about the extent, potential capacity and limitations of sites in each of these locations.

South of Gloucester	Area of Search 1: Hardwicke		
This broad location was originally	1.1 Hunts Grove, Hardwicke	Page 7	PREFERRED
earmarked for 1,750 homes through the	1.2 Hardwicke village	Page 8	ALTERNATIVE
draft RSS (in addition to the 1,750			
already permitted at Hunts Grove). But	Area of Search 2: Whaddon		
with the abolition of the Regional Spatial	2.1 Whaddon	Page 9	ALTERNATIVE
Strategy, this is no longer an obligation. So debate can be had about an	Area of Caarab 2. Hataa Ct Lagranda		
appropriate quantum of development on	Area of Search 3: Upton St Leonards		
the southern fringe of Gloucester.	3.1 Upton St Leonards & Brockworth	Page 10	ALTERNATIVE
M5 Catchment	Area of Search 1: A419 corridor		
	1.1 West of Stonehouse	Page 12	PREFERRED
Potential locations for:	1.2 Eastington	Page 13	PREFERRED
 Strategy Option A: "Concentrated 	1.2 Lastington	rage 13	I KEI EKKED
Growth Point Strategy"	Area of Search 2: A38		
Strategy Option B: "Concentrated	2.1 Whitminster	Page 14	ALTERNATIVE
Development Strategy"	Z.1 VVIIIIIIIIIIIIII	r ago i i	
Cam & Dursley	Area of Search 1: Cam and Dursley		_
Potential location for:	1.1 Cam	Page 15	PREFERRED
 Strategy Option A: "Concentrated 			
Growth Point Strategy"			
 Strategy Option B: "Concentrated 			
Development Strategy"			
01	Area of Search 1: Sharpness and Newtown		
Sharpness		D 10	ALTERNATIVE
Alternative location for:	1.1 Sharpness and Newtown	Page 18	ALTERNATIVE
 Strategy Option A: "Concentrated 			
Growth Point Strategy"			
Stroud Valleys	Area of Search 1: A419 / River Frome / Canal	corridor	
•	1.1 Central Stroud / Wallbridge / Cheapside		PREFERRED
Potential locations for:	1.2 Lodgemore / Fromehall / Dudbridge	Page 24	PREFERRED
Strategy Option D:	1.3 London Road, Thrupp	Page 26	PREFERRED
"Stroud Valleys Strategy"	1.4 Brimscombe Port / Brimscombe Mills	Page 27	PREFERRED
	1.5 Knapp Lane	Page 29	ALTERNATIVE
	1.6 West of Stroud	Page 30	ALTERNATIVE
	Area of Search 2: A46 / Nailsworth valley		
	•	Dogo 21	ALTEDNATIVE
	2.1 A46 / Nailsworth valley	Page 31	ALTERNATIVE
	Area of Search 3: Edge of Settlement		
	3.1 North and east of Stroud	Page 33	ALTERNATIVE
	3.2 Rodborough	Page 35	ALTERNATIVE
	0		

M5 Catchment... ..at Stonehouse, Eastington or Whitminster?

cam & Dursleyat Cam?

Sharpness..

..at Sharpness and Newtown?

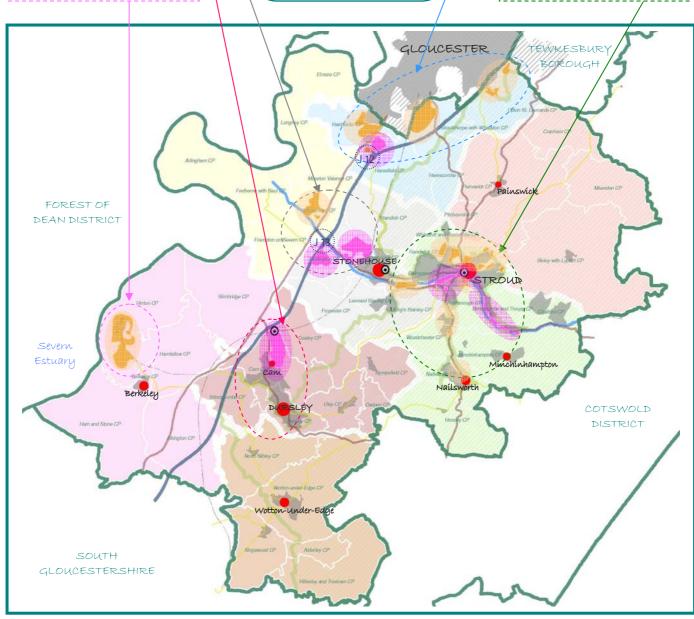
A choice of potential locations for strategic growth

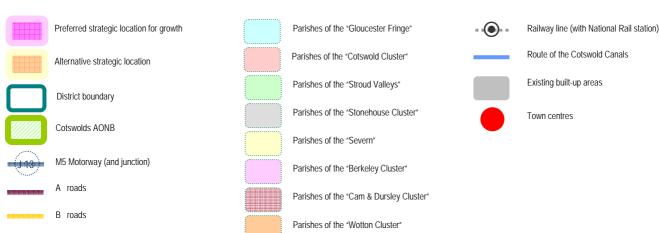


South of Gloucester...

..at Hardwicke, Whaddon or Upton St Leonards?

- Stroud Valleys...
 ...along the canal and River Frome corridor?
- ...On the A46 / Nailsworth valley? ...'edge of settlement' sites at Rodborough or to the north and east of Stroud?





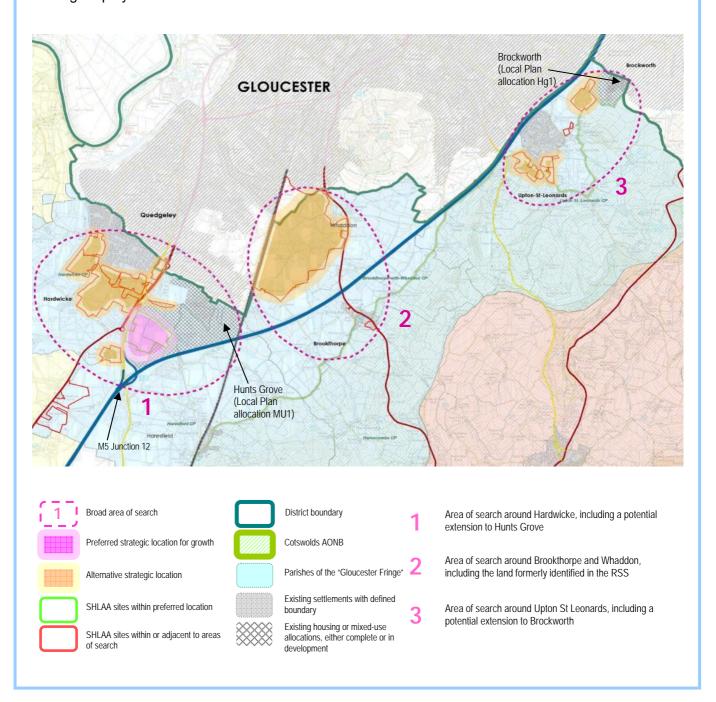


South of Gloucester

Development on land south of Gloucester was not explicitly set out as an 'Option' in the Alternative Strategies consultation. At the time, Policy HMA3 of the draft RSS required Stroud District to find land just south of Gloucester on which 3,500 new dwellings could be accommodated (1,750 of these have already been provided for through planning permissions at Hunts Grove). It was therefore taken as an assumption that there *would* be development in this part of the District over the Core Strategy plan period and hence this was not an "option" as such.

However, with the proposed abolition of the RSS, this is no longer a given. The demise of the RSS effectively opens up debate about whether growth south of Gloucester is appropriate, desirable and should form part of our Preferred Strategy. If not, the residual number of dwellings would need to be relocated elsewhere in the District.

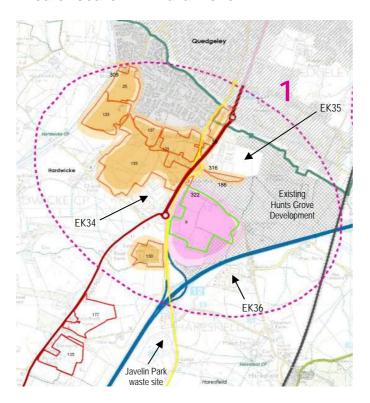
Three distinct areas of search on the southern edge of Gloucester offer a range of alternative locations, each theoretically capable of taking upwards of 300 new homes with a range of housing/employment combinations.





South of Gloucester

1 Area of search 1: Hardwicke



1.1 Preferred location for growth: Hunts Grove, Hardwicke

SHLAA Site ID	sites within the pr	source	Projected housing capacity (SHLAA 2011)	wth (Hardwicke): Housing capacity estimate, taking account of policy, constraints etc	Potential for mixed uses?	Notes	Brownfield/
9	Land south of Haresfield Lane, Hardwicke	Call for sites	795	750	elements – if opp comprehensive i	ial for some mixed use apportunity arises for the re-masterplanning of the Grove development	

So what sort of development, in terms of numbers and mix, might this site offer? And how might it contribute to an overall strategy?

Of the four potential locations south of Gloucester, this is currently the preferred option. In isolation, this site would not be capable of accommodating the residual 1,750 homes that were previously being "allocated" south of Gloucester through the draft RSS. The SHLAA suggested that the site theoretically has capacity for about 530 new homes during the plan period, rising to about 795 after 2026. It is not envisaged that the site would provide additional employment capacity on any significant level but, being adjacent to the ongoing mixed-use development at Hunts Grove, it could be a sustainable supplement to what is already a significant growth area. Taken together with the existing Hunts Grove development (where 1,750 homes have already been permitted), a development of, say, 750 new homes would put total growth in this location on a par with Strategy Option A (concentrated growth, up to 2,500 homes) and could allow for some growth beyond the plan period.



You can see how Hunts Grove might perform in comparison with the other potential <u>South Of Gloucester</u> locations (and compare its possible 'carbon footprint' with that of the Strategy Option A locations) by referring to the table of pros and cons on page 63.



1.2 Alternative location for growth: Hardwicke village

Site ID		source	Projected housing capacity (SHLAA 2011)	Housing capacity estimate, taking account of policy, constraints etc	Potential for mixed uses?	Notes	Brownfield/
25	Sellars Farm, Hardwicke	Call for sites	391		No		GF
35	Mayos Land, Hardwicke	Call for sites	104		No		GF
133	Hardwicke Green, Hardwicke	Call for sites	1654		Yes	Major development requiring employment and community facilities and services	GF
137	Green Farm, Green Lane, Hardwicke	Call for sites	190		Yes	Contiguous with above.	GF
153	Summerhill Equestrian Centre, Hardwicke	Call for sites	0				BF
186	Land at Shorn Brook, Hardwicke	Surplus Public Sector Land	69		No		GF
309	Land at the Pilot Inn, Hardwicke (new SHLAA site 2011)	Call for sites (2011)	26		No		GF
322	Land at Wynnstay, Hardwicke (new SHLAA site 2011)	Call for sites (2011)	8		No		BF
316	Land at Purton College (new SHLAA site 2011)	Call for sites (2011)	18		No		GF

So what sort of development, in terms of numbers and mix, might this site offer? And how might it contribute to an overall strategy?

In isolation, no single site here would be capable of accommodating the residual 1,750 homes that were previously being "allocated" south of Gloucester through the draft RSS. But together (according to SHLAA estimations), the sites theoretically have a total capacity just short of 2,500 – a very sizeable level of growth. There is plenty of land here, and some might be directed towards employment uses instead. But further growth on such a large scale at the periphery of the District (right next to Hunts Grove) would do little to boost the economy or support services in our existing towns and villages. Development on a more modest scale of 500 – 750 homes (comparable with what might be possible at the preferred location adjacent to Hunts Grove) might be insufficient 'critical mass' to trigger the provision of additional services and facilities for the new community; and this location does not offer the same opportunity to integrate with the growing community at Hunts Grove.

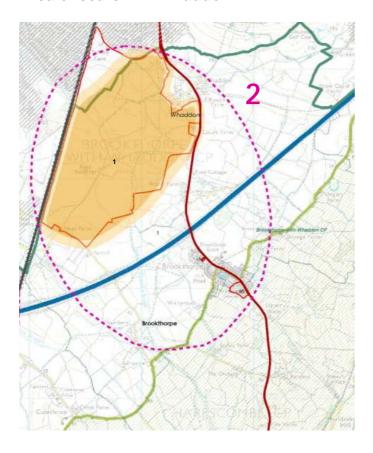


You can see how these sites at Hardwicke might perform in comparison with the other potential <u>South</u> of <u>Gloucester</u> locations by referring to the table of pros and cons on page 63



South of Gloucester

2 Area of search 2: Whaddon



So what sort of development, in terms of numbers and mix, might this site offer? And how might it contribute to an overall strategy?

This land was earmarked in the draft RSS as an appropriate location to accommodate 1,500 homes south of Gloucester. The site theoretically has capacity for almost double this number during the plan period (plus another 1,474 after 2026).

There is plenty of land available here for employment uses – but further growth on such a large scale at the periphery of the District would do little to boost the economy or support services in our existing towns and villages. Development on a more modest scale of 500 – 750 homes (comparable with what might be possible at the preferred location adjacent to Hunts Grove) would be isolated and far less sustainable.

2.1 Alternative location for growth: Whaddon

Site ID		source	Projected housing capacity (SHLAA 2011)	Housing capacity estimate, taking account of policy, constraints etc	Potential for mixed uses?	Notes	Brownfield/
1	Land south of Gloucester at Whaddon	Call for sites	4,422 (2,948 in two phases plus a further 1,474 after 2026)		Yes		GF

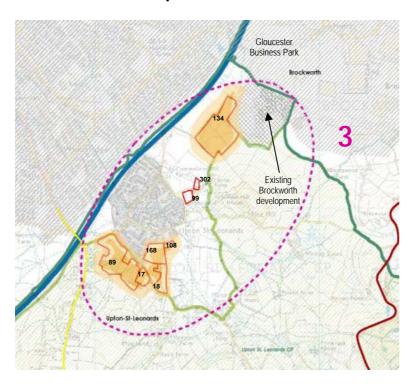


You can see how this site at Whaddon might perform in comparison with the other potential <u>South of Gloucester</u> locations by referring to the table of pros and cons on page 63.



South of Gloucester

3 Area of search 3: Upton St Leonards



So what sort of development, in terms of numbers and mix, might these sites offer? And how might they contribute to an overall strategy?

Even in combination, these sites would not be capable of accommodating the 1,750 homes that were previously being "allocated" south of Gloucester through the (now obsolete) RSS.

The sites theoretically have capacity for about 968 homes in total, with little scope for mixed use development. It is not envisaged that these locations would provide additional employment capacity on any significant level.

3.1 Alternative location for growth: Upton St Leonards

Site ID		source	Projected housing capacity (SHLAA 2011)	Housing capacity estimate, taking account of policy, constraints etc	Potential for mixed uses?	Notes	Brownfield/ Greenfield?
17	Land adj. to Pooles Farm, Upton St Leonards	Call for sites	37		No		GF
18	Land west of The Stanley, Upton St Leonards	Call for sites	58		No		GF
89	Land south of High Street, Upton St Leonards	Call for sites	340		No		GF
108	Land off The Stanley, Upton St Leonards	Call for sites	8		No		GF
134	Land adj. Brockworth Airfield, Upton St Leonards	Call for sites	448		No		GF
168	Rear of Perry Orchard, Upton St Leonards	Call for sites	82		No		GF



You can see how these sites at Upton St Leonards might perform in comparison with the other potential South of Gloucester locations by referring to the table of pros and cons on page 63.



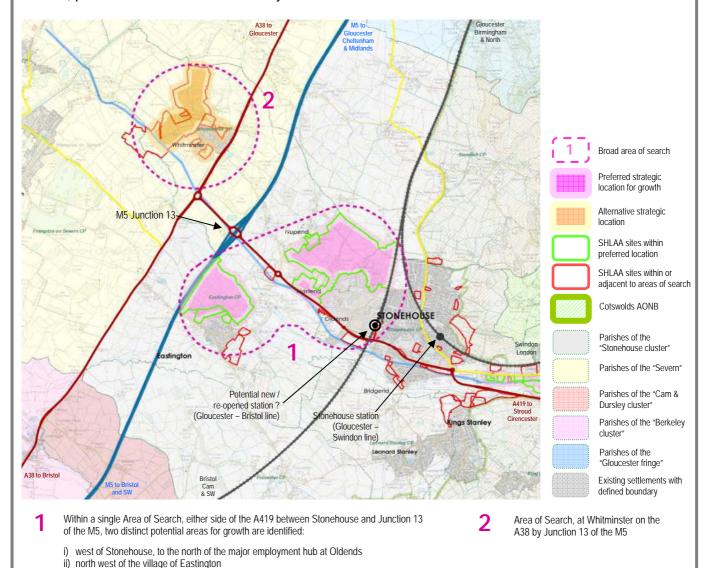
M5 catchment - Strategy Options A and B

Within this broad area, focussed to the west of Stonehouse and within the A419/M5/A38 catchment, *three distinct potential locations* for growth are identified. They share several similar pros and cons – particularly West of Stonehouse and Eastington. These may be assessed separately and treated as 'alternatives' (see note on following page).

Land to the west of Stonehouse and land to the north-west of Eastington were both identified as potential locations for growth in the two most favoured Strategy Options at Alternative Strategies stage: options A and B. Land to the west of Whitminster was identified as a potential location for growth in option B.

Both options A and B approached the strategy as an opportunity to integrate housing and employment, to create one or two major urban expansions: in Strategy Option A (the "Concentrated Growth Point Strategy") all 2000 dwellings plus employment premises would be focussed in **one** location (another possible location was identified at Cam); and in Strategy Option B (the "Concentrated Development Strategy"), the 2000 dwellings and employment floorspace would be spread across **two** separate locations (potentially, west of Stonehouse, Cam, Eastington, Brimscombe & Thrupp or Whitminster). Since Alternative Strategies stage, further work on the SHLAA has revealed that the initial hypothetical assessment of capacity at Brimscombe was an overestimate. Hence sufficient capacity for Strategy Option B no longer exists at Brimscombe.

So for the purposes of this assessment, land to the west of Stonehouse and land at Eastington should be considered in the same 'category' as land at Cam: land with a capacity to accommodate 2,000 homes, plus businesses and community facilities.

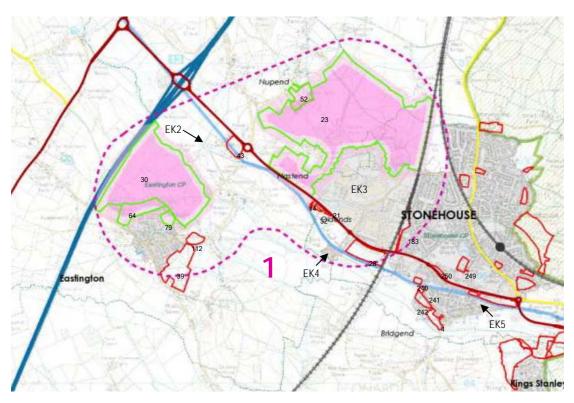




M5 Catchment: Stonehouse and Eastington

(Strategy Options A or B)

1 Area of search 1: A419 Corridor



NOTE: Within this area of search, focussed to the west of Stonehouse and within the A419/M5/A38 catchment, *two distinct potential locations* for growth are identified. These may be assessed separately and treated as 'alternatives': Strategy Option A proposes concentrated growth at just *one* location; while to combine or develop *both* locations at the levels indicated in Strategy Option B (i.e. upwards of 1000 dwellings, plus employment land) would still serve to concentrate growth in just one part of the District – thereby denying the opportunity for significant growth elsewhere and potentially setting up a functional imbalance beyond the western extent of the Stroud Urban Area, relative to Stroud town's strategic role as the principal settlement in the District.

1.1 Preferred location for growth: West of Stonehouse

SHLAA	sites within the	preferred I	ocation for g	growth (Stonehouse):			
Site ID		source	Projected housing capacity (SHLAA 2011)	Housing capacity estimate, taking account of policy, constraints etc	Potential for mixed uses?	Notes	Brownfield/ Greenfield?
23	Land west of Stonehouse	Call for sites	3,424	Probably considerably lower than this, to allow for mixed use, green/ open space, areas of lower density etc	Yes Target ratio of 2 jobs : 1 home	Part of site is currently allocated for employment (Local Plan EA9)	GF
52	Land to the rear of Nupend Farm	Call for sites	131	0?	No	Unlikely to be needed / appropriate, given the wider availability of land and need to 'buffer' existing Nupend hamlet.	GF



This land to the west of Stonehouse is essentially one large site in single ownership, which could simplify the process of taking it forward for development. It wraps around the existing industrial area north of the A419 at Stonehouse and is easily accessible from junction 13 on the M5. However, it is physically separated from the main town by the railway line, making accessibility to the town centre difficult. There is sufficient land to accommodate a range of development from around 800 to more than 2,000 homes and a further expansion of employment opportunities with associated infrastructure and community facilities and services. If this location is deemed appropriate, the scale of development accommodated would depend upon the final strategy to be pursued – whether a single location meets the Council's needs best or whether it is better to share the development needs between two or more communities.



You can see how growth to the west of Stonehouse might perform in comparison with other potential <u>Strategy Option A</u> locations by referring to the table of pros and cons on page 37; and in comparison with other potential <u>Strategy Option B</u> locations by referring to the table of pros and cons on page 47.

1.2 Preferred location for growth: Eastington

Site ID		source	Projected housing capacity (SHLAA 2011)	Housing capacity estimate, taking account of policy, constraints etc	Potential for mixed uses?	Notes	Brownfield/
30	Land north of Eastington	Call for sites	1,567	Probably considerably lower than this, to allow for mixed use	Yes	The SHLAA projections here did not account for a mixed use development including employment uses	GF
64	Land north of Broadfield road, Eastington	Call for sites	206				GF
79	Land off Cotswold Av., Eastington	Call for sites	49			Protected Outdoor Play Space in Local Plan	GF
39	Land b/n Millend Lane and Bath Rd	Call for sites	306			These two sites are outside the "preferred location" but would be	GF
112	Land north of Millend Lane	Call for sites	39			needed in order to implement Strategy A	GF

So what sort of development, in terms of numbers and mix, might these sites offer? And how might they contribute to an overall strategy?

Land at Eastington is split across two locations: in addition to the three sites at the "preferred location", two smaller sites lie to the east of the village. According to projections in the SHLAA, the full 2,000 homes suggested in Strategy Option A could only be accommodated at Eastington if site 39 was also developed. The SHLAA housing number projections also do not allow for a mixed use development including employment uses: incorporating this would further reduce the potential housing capacity, but without it the development would effectively produce a dormitory "new town", dependent on the wider area for jobs. These sites could accommodate a range of development from around 800 to more than 2,000 homes with associated infrastructure, community facilities and services. If this location is deemed appropriate, the scale of development accommodated would depend upon the final strategy to be pursued – whether a single location meets the Council's needs best or whether it is better to share the development needs between two or more communities.



You can see how growth at Eastington might perform in comparison with other potential <u>Strategy</u>

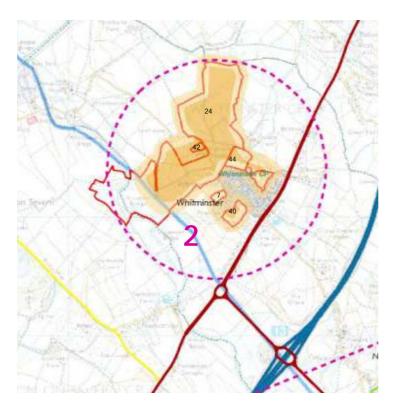
<u>Option A</u> locations by referring to the table of pros and cons on page 37; and in comparison with other potential <u>Strategy Option B</u> locations by referring to the table of pros and cons on page 47.



M5 Catchment: Whitminster

(Strategy Option B)

2 Area of search 2: A38 / Whitminster



So what sort of development, in terms of numbers and mix, might these sites offer? And how might it contribute to an overall strategy?

Together, these sites theoretically have capacity for 1,500 homes during the plan period (plus 650 after 2026). Strategy Option B would be based on 1,000 homes, plus employment development.

There is plenty of land available here for employment uses and motorway access is good. But such large scale growth in this location would effectively mean the creation of a "new town": the village currently has limited services and facilities, and employment premises would face competition with established employment areas at Stonehouse and Hardwicke. This location would do little to boost or support the District's existing settlements.

Whilst Whitminster has the theoretical capacity to achieve this scale of development, Cam, Eastington or West of Stonehouse are preferred as the more sustainable and viable options.

2.1 Alternative location for growth: Whitminster

Site ID		source	Projected housing capacity (SHLAA 2011)	Housing capacity estimate, taking account of policy, constraints etc	Potential for mixed uses?	Notes	Brownfield/ Greenfield?
24	Land north west of Whitminster	Call for sites	1,940 (1,293 during plan period, plus 647 after 2026)	Up to 1,000? Probably considerably lower than projected number: reduce site area and allow for mixed use;	Yes. Target jobs:homes ratio of at least 1:1, prefer 2:1.	Reduce site area to keep north of canal and avoid flood plain; SHLAA housing projections do not account for potential mixed uses	GF
44	Land off Hyde Lane	Call for sites	84				GF
42	Highfields Nursery	Call for sites	22				BF
7	Land at Parklands	Call for sites	9				GF
40	Land to rear of Parkland Farm	Call for sites	95				GF



You can see how Whitminster performs in comparison with the other potential <u>Strategy Option B</u> growth locations by referring to the table of pros and cons on page 47.

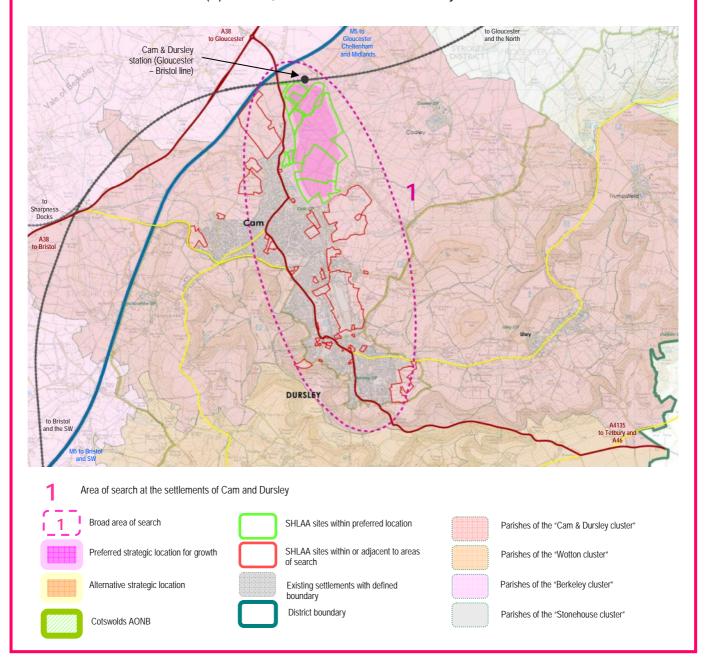


Cam & Dursley – Strategy Options A and B

Land at Cam was identified as a potential location for growth in the two most favoured Strategy Options at Alternative Strategies stage: options A and B. Both options A and B approached the strategy as an opportunity to integrate housing and employment, to create one or two major urban expansions. A preferred location for growth in this area has been identified to the east of the A4135, south of Cam railway station and north of Upthorpe.

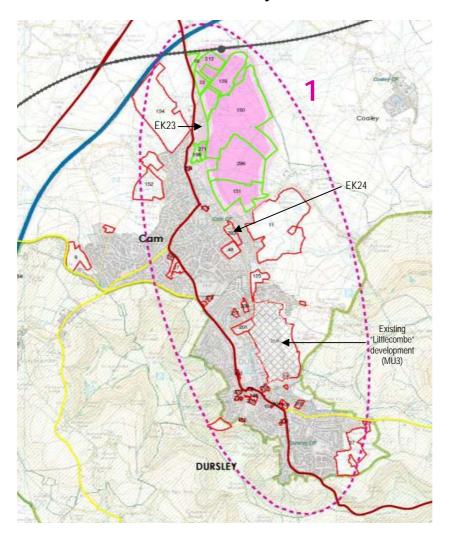
In Strategy Option A (the "Concentrated Growth Point Strategy") all 2000 dwellings plus employment premises would be focussed in one location (other possible locations were identified at Eastington and at Stonehouse); and in Strategy Option B (the "Concentrated Development Strategy"), the 2000 dwellings and employment floorspace would be spread across two separate locations (potentially, west of Stonehouse, Cam, Eastington, Brimscombe & Thrupp or Whitminster). Since Alternative Strategies stage, further work on the SHLAA has revealed that the initial hypothetical assessment of capacity at Brimscombe was an overestimate. Hence sufficient capacity for Strategy Option B no longer exists at Brimscombe.

So for the purposes of this assessment, land at Cam should be considered in the same 'category' as land west of Stonehouse, land at Eastington and land at Whitminster: land with a capacity to accommodate 1000 or 2000(+) homes, businesses and community facilities.



Cam and Dursley: (Strategy Options A or B)

1 Area of search: Cam and Dursley



1.1 Preferred location for growth: Cam

Site ID		source	Projected housing capacity (SHLAA 2011)	Housing capacity estimate, taking account of policy, constraints etc	Potential for mixed uses?	Notes	Brownfield/ Greenfield?
16	Land at Coaley Junction, Cam	Call for sites	72 @ dph of 40	Reduce: as a peripheral site, development likely to be at lower density than 40dph			BF
33	Land adj. to Tocknell Court, Box road, Cam	Call for sites	89 @ dph of 40	Reduce: as a peripheral site, development likely to be at lower density than 40dph		Site currently the subject of a planning application for 77 dwellings. Decision imminent.	GF
139	Land at Draycott, Cam	Call for sites	295 @ dph of 45	200? Reduce: to allow for some mixed use	Yes. Target jobs:homes ratio of at least 1:1	Pipeline and power lines running across site; electricity sub station and sewage works adjacent	GF

Locations: Cam and Dursley



150	Land to the east of Draycott Mills, Cam	Call for sites	919 @ dph of 45	400-700? Probably considerably lower than projected number: reduce site area and allow for mixed use;	Yes. Target jobs:homes ratio of at least 1:1, prefer 2:1.	Site area should be reduced: limit development to land lying below the 50m contour line. Part of site currently allocated for employment in Local Plan (EA1). Pipeline and power lines running across site	GF
151	Land between Rowley and Upthorpe, Cam	Call for sites	479 @ dph of 45	150-250?: Probably up to half the projected number: reduce site area and allow for mixed use	Yes. Target jobs:homes ratio of at least 1:1, prefer 2:1.	Site area should be reduced: limit development to land lying below the 50m contour line.	GF
198	Rear of 4-60 High Street, Cam	Urban capacity study 2002	62 @ dph of 45	0-30?: may be better suited to other uses instead?		Flood risk: may be better suited to non-residential uses	BF
271	Land south of Draycott Mills, High Street, Cam	NLUD 2008	-		(Could contribute employment numbers to the overall development)	Not included in SHLAA assessment: key employment site recommended for retention (EK23)	
296	Land east of Courthouse Gardens, Cam	Officer input	784 @ dph of 45	200-400?: Probably up to half the projected number: reduce site area and allow for mixed use	Yes. Target jobs:homes ratio of at least 1:1, prefer 2:1.	Site area should be reduced: limit development to land lying below the 50m contour line.	GF
313	Land at Box Road Avenue, Cam (new SHLAA site 2011)	Call for sites (2011)	198 @ dph of 40	50 -100? Reduce: as a peripheral site, development likely to be at lower density than 40dph			GF

So what sort of development, in terms of numbers and mix, might these sites offer? And how might they contribute to an overall strategy?

According to the theoretical SHLAA assessment, these sites have combined capacity for almost 2,900 new homes. It is unlikely that all the sites would be developed to their full "potential" capacity, even if Strategy Option A (2,000 homes, plus businesses) were to be implemented here. Various constraints and planning policies suggest that most of these sites would be better developed at a lower overall residential density than the SHLAA suggests – allowing capacity for other uses and leaving open spaces and landscape 'buffers' where necessary. The SHLAA projections do recognise the potential for mixed uses on some of these sites and the projected residential capacity is reduced accordingly; but it may be appropriate to place even more emphasis on employment growth here, with the aim of creating a more self-sustaining mixed development, providing jobs for the local community and wider District.

These sites could accommodate a range of development from around 800 to 2,000 homes with associated infrastructure, community facilities and services. If this location is deemed appropriate, the scale of development accommodated would depend upon the final strategy to be pursued – whether a single location meets the Council's needs best or whether it is better to share the development needs between two or more communities.



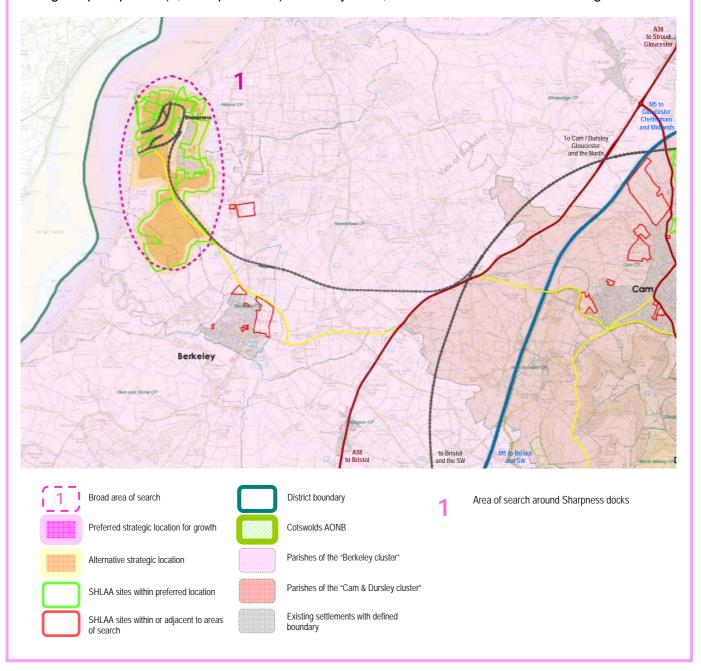
You can see growth at Cam might perform in comparison with other potential <u>Strategy Option A</u> locations by referring to the table of pros and cons on page 37; and in comparison with other potential <u>Strategy Option B</u> locations by referring to the table of pros and cons on page 47.



Sharpness – equivalent to Strategy Option A

Sharpness was not a location we identified at the Alternative Strategies stage. The seven Alternative Strategies were devised based upon known available sites, which would be capable of delivering the suggested housing numbers (i.e. sites promoted to us and/or included in the SHLAA). Most of the land included in the "Sharpness eco-town" proposal is greenfield, substantially comprising of agricultural land at Saniger and Oakhunger Farms. A large proportion of this land had not been submitted for consideration in the SHLAA process prior to the drafting of the Alternative Strategies, and hence was not consulted upon as a possible location for Strategy Option A or B.

In response to the Alternative Strategies consultation, Hunter Page Planning consultants submitted a proposal for an "eco town" at Sharpness on behalf of Saniger Farm (approximately 4,500 acres of agricultural land close to the docks). This proposal, which includes additional land outside the control of Sanigar Farm, would accommodate in the region of 2,000 homes (up to 2026) plus employment land, and would in effect be an equivalent to the locations proposed under Strategy Option A. The proposal also suggests that this location should be identified as a continuing growth point for the District, beyond the plan period. For the purposes of this exercise, the merits of growth in this location should be considered in the same 'category' as alternative locations for similar scaled development during the plan period (2,000 up to 2026) – namely Cam, west of Stonehouse and Eastington.

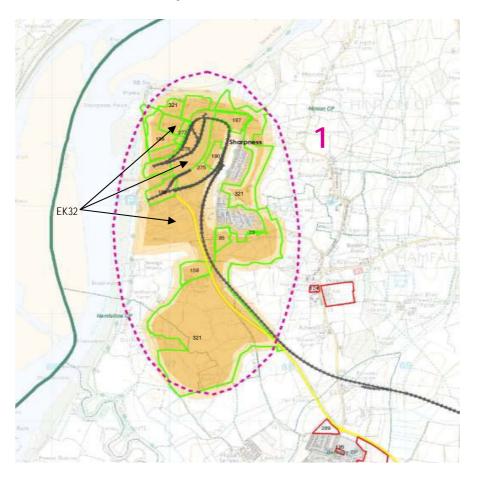


Locations: Sharpness 18

Sharpness

(equivalent to Strategy Option A)

1 Area of search: Sharpness and Newtown



1.1 Alternative location for growth

Site ID		source	Projected housing capacity (SHLAA 2011)	Housing capacity estimate, taking account of policy, constraints etc	Potential for mixed uses?	Notes	Brownfield/ Greenfield?
73	Land south of Bays Hill, Newtown, Sharpness	Call for sites	11				(BF) GF
85	Cromwell Farm, Newtown, Sharpness	Call for sites	-		No	No longer included in SHLAA: site now has full PP subject to S106	GF
158	Saniger Farm, Sharpness	Call for sites	151				GF
187	Bridge Road, Sharpness	GVA Grimley ELR	133		Yes	Currently Local Plan Employment allocation EA6	BF
188	Rear of Dock Road, Sharpness	GVA Grimley ELR	322		Yes	Currently Local Plan Employment allocation EA3	GF
189	Adj. tidal basin, Sharpness Dock, Sharpness	GVA Grimley ELR	159		Yes	Currently Local Plan Employment allocation EA5	GF and BF

Locations: Sharpness 19

fi	
II	
禮訓	H

190	Land east of dock, Sharpness Dock, Sharpness	GVA Grimley ELR	106		Yes	Currently Local Plan Employment allocation EA4	BF
275	Warehouses east of canal, land at Sharpness Dock, Sharpness	NLUD 2008	-	Might there be potential for some housing as part of mixed use master plan?	-	Not included in SHLAA assessment: Key Employment site, recommended for retention	BF
276	Warehouses west of canal, land at Sharpness Dock, Sharpness	NLUD 2008		Might there be potential for some housing as part of mixed use master plan?	-	Not included in SHLAA assessment: Key Employment site, recommended for retention	BF
277	Timber yard, land at Sharpness Dock, Sharpness	NLUD 2008	50		Yes	Part of current Local Plan Employment allocation EA3	BF
321	"Strategic land at Sharpness" (SHLAA sites 2011)	Officer input??	2,395 up to 2026 (plus an additional 1,189 beyond the plan period)	"Eco Town" proposal plans for up to 2,000 during the plan period	Yes. Target jobs:homes ratio of at least 1:1, prefer 2:1. Plus retain existing empl no's	This is the full extent of land identified in Hunter Page's "Eco Town" proposal – it overlaps (duplicates) most of the sites listed above.	GF and BF

So what sort of development, in terms of numbers and mix, might these sites offer? And how might they contribute to an overall strategy?

The 'Eco Town' proposal consists of 2,000 new homes south of Sharpness Docks, up to 2026, and would in effect be an equivalent to the locations proposed under Strategy Option A. This would be coupled with intensification of use on existing employment land, a new area of employment land south of current Local Plan employment site EK32, and a new district centre to serve the community. The proposal also suggests that this location should be identified as a continuing growth point for the District, designed with a view to accommodating the District's future growth for the next plan period (and potentially beyond). Thus removing future development pressures from other towns and villages.

Whilst Sharpness has the theoretical capacity to achieve this scale of development (and more), it is relatively remote from main employment centres and primary facilities and services in the District, would require significant new infrastructure and has flood risk and landscape impact issues. Cam, Eastington or West of Stonehouse are all preferred as the more sustainable and viable options, should this scale of development be considered desirable.



You can see how Sharpness performs in comparison with the other potential <u>Strategy Option A</u> growth locations by referring to the table of pros and cons on page 37.

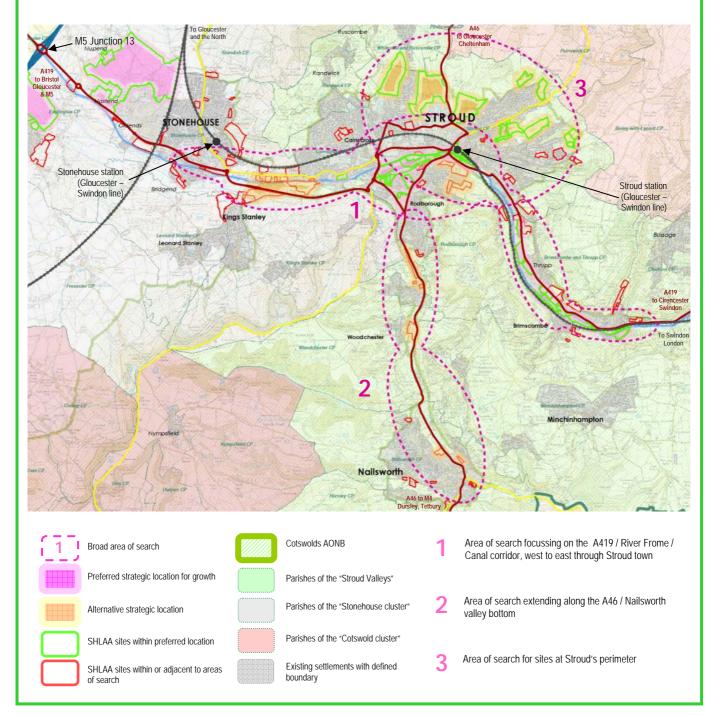
Locations: Sharpness 20



Stroud Valleys – Strategy Option D

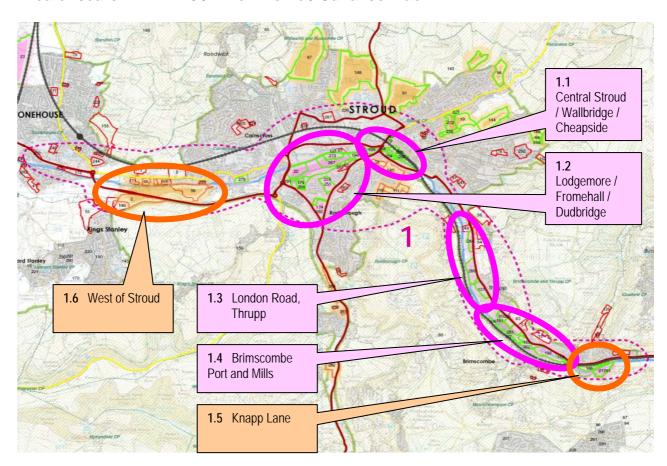
Strategy Option D, which proposed focussing development entirely within the Stroud Valleys, emerged as the third most popular of the six Alternative Strategies during consultation last year (spring 2010). One of the key tenets of this Strategy was the potential to make use of brownfield sites: regenerating ailing and vacant pieces of industrial land, with the aim of creating a distinctive living and working mixed-use environment, with a particular focus on the canals corridor.

But within the valley bottoms [Areas of Search 1 and 2], there are no obvious single sites where development of a thousand homes (or even the high hundreds) would be possible – unlike the three areas of search South of Gloucester or the locations identified in Strategies A and B. If the valley bottoms are to be a significant focus for development, it will have to be spread across a number of small and medium-sized sites, many of which are problematic and likely to incur higher development costs in terms of flooding, contaminated land etc. A less costly option, but one fraught with a range of other pros and cons, would be to utilise larger greenfield sites on Stroud's fringe [Area of Search 3]. This could offer an equivalent boost to the town, but might be considered tantamount to a 'change of strategy approach'.

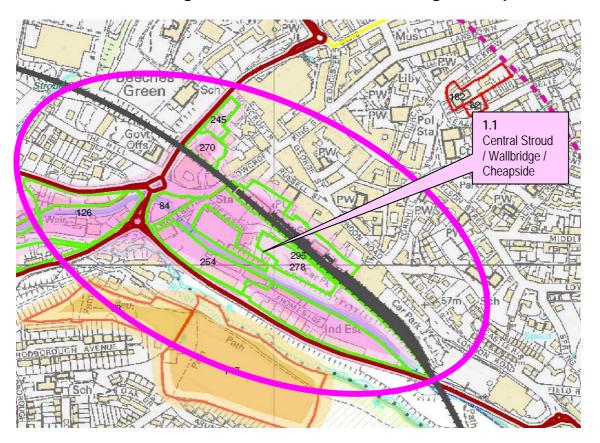


Stroud Valleys: (Strategy Option D)

1 Area of search 1: A419 / River Frome / Canal corridor



1.1 Preferred location for growth: central Stroud / Wallbridge / Cheapside





Site ID		source	Projected	Housing capacity	Potential	Notes	0
			housing capacity (SHLAA 2011)	estimate, taking account of policy, constraints etc	for mixed uses?		Brownfield
126	Wallbridge Quay, Stroud	Call for sites	64	Up to 64	Yes. Target at least 1:1 ratio (jobs: homes). Plus retain existing empl no.s	Part EK37. Overlapped by site 319 ("Strategic Land at Dudbridge"): beware SHLAA 'double counts' these projected housing numbers	BF
318	Strategic Land at Cheapside, Stroud	Officer input	144	* See individual entries for sites 84, 254, 278, 295 and 318 "X" below	Yes. Target at least 1:1 ratio (jobs: homes), prefer 2:1. Plus retain existing empl no.s	Introduced to SHLAA in 2011. This site is an amalgamation of sites 84, 254, 278 and 295, plus additional land (site 318 "X") adj Hill Paul Cheapside, land at the Station and Fromeside Ind Est.	BF
318 "X"	Land adj. to Hill Paul, Cheapside; & Land at Fromeside Ind Estate.	Officer input	* (see site 318).	50 – 100, mainly at Cheapside (likely to be lower density / fewer 1-2 bed flats than shown in lapsed Planning Perm.)	Yes. Target at least 1:1 ratio (jobs: homes), prefer 2:1. Plus retain existing empl no.s	Two parcels of land added to SHLAA in 2011 (part of site 318). Lapsed planning permission for up to 101 flats on land adj. Hill Paul. Fromeside is current Local Plan Key Employment land (EK10).	BF
84	Land at Wallbridge, Stroud	Call for sites	* (see site 318).	0 – 10 Very low numbers if anything.	Likely to be non- residential, if anything	Part of 318. Potentially important strategic site as part of 'gateway Stroud'. Assessed as not "achievable" in SHLAA.	BF
254	Travis Perkins, Wallbridge, Stroud	Officer input	* (see site 318).	Very low numbers if anything. Likely to remain in commercial use.	Likely to be non- residential, if anything	Part of 318 and overlapped/duplicated by 295.	BF
278	Cheapside car park, Stroud	NLUD 2008	* (see site 318).	Housing potential dependent on incorporating car parking.	?	Part of 318 and overlapped/duplicated by 295. Existing Council car parking needs to be retained	BF
295	Cheapside Wharf, Stroud	SDLP MU5A (un- implemented)	* (see site 318).	0 – 10 (along canalside): Very low numbers if anything. (plus see sites 254 and 278)	Yes. Target at least 1:1 ratio (jobs: homes). Plus retain existing empl no.s	Part of 318. Incorporates the railway station, Cheapside car park, and Travis Perkins (i.e. duplicates sites 254 and 278) but excludes land adj. Hill Paul (see 318 "X").	BF
245	Merrywalks Stroud	Urban Capacity Study 2002	13 @ dph of 60	0	?	Redevelopment unlikely. Part public carpark, part McDonalds forecourt. Assessed as not "achievable" in SHLAA.	BF
270	Bowls club, Merrywalks	-	-	-	-	Not included in 2011 SHLAA: now has outline PP.	BF

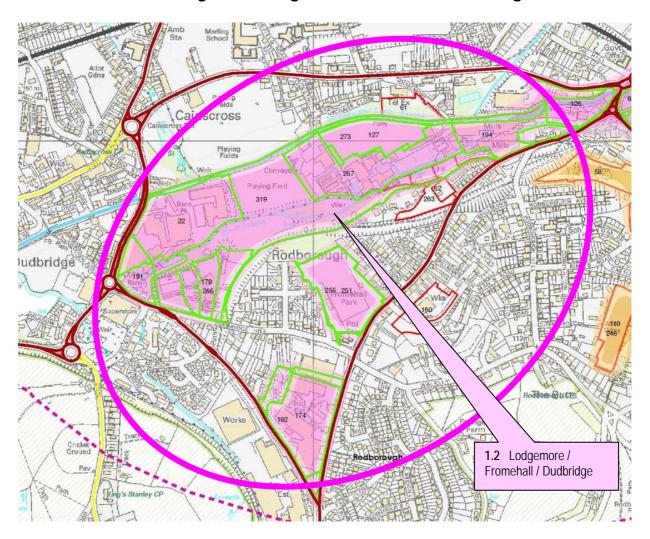
So what sort of development, in terms of numbers and mix, might these sites offer? And how might they contribute to an overall strategy?

This collection of sites at Wallbridge, Cheapside and Fromeside could be a strategically important growth area, representing significant regeneration opportunities at the 'gateway' to the town centre. The area of land lies between the canal and the town centre, strung along several key traffic throughroutes and incorporating the railway station. Together, these sites could be capable of delivering something between 100 and 180 homes, offset by an intensification of employment uses. However, this location consists of multiple sites in multiple ownerships and in some cases it is not known whether there is an interested or willing landowner/developer 'on board'.



You can see how this location performs in comparison with the other potential <u>Strategy Option D</u> growth locations by referring to the table of pros and cons on page 56.

1.2 Preferred location for growth: Lodgemore / Fromehall / Dudbridge



SHLAA s	sites within the pr	eferred loc	ation for gro	wth (Lodgemore / F	romehall / Dud	bridge):	
Site ID		source	Projected housing capacity (SHLAA 2011)	Housing capacity estimate, taking account of policy, constraints etc	Potential for mixed uses?	Notes	Brownfield/ Greenfield?
319	"Strategic Land at Dudbridge" (new SHLAA site 2011)	Officer input	220 * (plus 220 after 2026) @ overall dph of 50	* see individual entries for sites 126, 127/273, 194, 267, 22, 191 179/266 & 319"X". (approx 150-400?)	prefer 2:1. Plus retain	*NOTE: this land overlaps/duplicates sites 126, 127/273, 194, 267, 22, 191 and 179/266.	BF and GF
22	Land east of Dudbridge Road, Stroud	Call for sites	* (see site 319). (housing projection was 120 in the 2010 SHLAA)	50-120? May be scope for some housing as part of mixed use redevelopment to also intensify employment uses	Yes. Target at least 1:1 ratio (jobs: homes), prefer 2:1. Plus retain existing empl no.s	Current Local Plan Key Employment land (EK7). May be strategically important site in opening up access to sites further east (avoiding having to cross the canal)	BF
179/266	Land north of Dudbridge Road, Rodborough	SDLP Hg4 / NLUD 2008	* (see site 319). (housing projection was 49 in the 2010 SHLAA)	80-100: reduce density to 40dph (rather than 50), but keep to 100% residential, rather than mixed use.	No	Outstanding housing allocation (Hg4) from Local Plan.	BF



191	Dudbridge Industrial Area	GVA Grimley ELR	-	-	-	Not included in 2011 SHLAA assessment: is now developed/ residential conversion	BF
127/273	Land adj. Lodgemore Mills, Stroud/ Land north of Fromehall Mills, Chestnut Lane	Call for sites	* (see site 319) (housing projection was 0 in the 2010 SHLAA)	Very low numbers if anything. Important green space in IHCA conservation area.	Maybe. On a low key scale. Leisure use?	(273 duplicates site 127). Assessed as "not achievable" in 2010 SHLAA.	BF
267	Fromehall Mills, Chestnut Lane, Stroud	NLUD 2008	* (see site 319) (housing projection was 0 in the 2010 SHLAA)	0-50? May be some scope for housing as part of mixed use redevelopment to also intensify employment uses	Yes. Target at least 1:1 ratio (jobs: homes), prefer 2:1. Plus retain existing empl no.s	Assessed as "not achievable" in 2010 SHLAA. Any reduction on current employment numbers would be undesirable. Current Local Plan Key Empl. land (EK37).	BF
194	Lodgemore / Fromehall Mills, Stroud	GVA Grimley ELR	* (see site 319) (housing projection was 0 in the 2010 SHLAA)	0-20? (or very low numbers if anything)	Likely to remain in employment use	Assessed as "not achievable" in 2010 SHLAA. Any reduction on current employment numbers would be undesirable. Current Local Plan Key Empl. land (EK37).	BF
319 "X"	Land off Fromehall Lane; Marling old playing field; electricity sub station; River Frome corridor.	Officer input	* (see site 319).	0-50? Unlikely to yield much, due to a range of issues including access, floodplain, conservation area character, sub station etc		Several parcels of land, added to SHLAA in 2011 to 'link' the sites covered by 319. May be strategically important to open up access to sites further east (see also site 22)	BF and GF
174/192	Daniels Industrial Area, Dudbridge, Rodborough	Call for sites / GVA Grimley ELR	77	Up to 80 but emphasis must be on job creation	Yes. Target at least 1:1 ratio (jobs: homes), prefer 2:1. Plus retain existing empl no.s	Current Local Plan Key Employment land (EK8). Employment uses would have to change dramatically to be compatible with residential	BF
251/255	Fromehall Park, Dudbridge / Stroud Rugby Club	Outline PP/ Officer input	-	-	-	Not included in SHLAA assessment: has got outline planning permission	BF

So what sort of development, in terms of numbers and mix, might these sites offer? And how might they contribute to an overall strategy?

Some of these sites may be better suited to remaining in employment use – ideally with a degree of intensification, to provide more jobs on existing sites. But most have some scope to accommodate a bit of housing or alternative uses, as part of a strategic approach to the overall 'balance' of jobs and homes within the valleys.

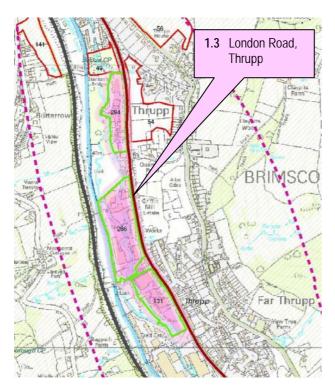
Like Wallbridge and Cheapside, the swathe of land between Dudbridge and Wallbridge (covered by site 319) could be a strategically important growth area. The area of land is close to the town centre and could be capable of delivering something between 150 and 400 homes (plus potentially up to 80 at site 174/192), offset by an intensification of employment uses. However, this location consists of multiple sites in multiple ownerships and in some cases it is not known whether there is an interested or willing landowner/developer 'on board'.



You can see how this location performs in comparison with the other potential <u>Strategy Option D</u> growth locations by referring to the table of pros and cons on page 56.



1.3 Preferred location for growth: London Road, Thrupp



Site ID		source	Projected housing capacity (SHLAA 2011)	Housing capacity estimate, taking account of policy, constraints etc	Potential for mixed uses?	Notes	Brownfield/
131	Ham Mill, London Road, Thrupp	Call for sites	45	20-40 (perhaps as a form of 'enabling development' to ensure new uses for listed buildings)	Yes. At least 1:1 ratio (jobs: homes)	Currently protected employment site EK14 in Local Plan. Site not actively in use and historic buildings suffering dereliction.	BF
284	Stafford Mills Industrial Estate, London Road, Thrupp	SDLP key employ- ment site	43	0 (or very low numbers if anything): may be best retained as an employment site	Likely to remain in employment use	Currently protected employment site EK12 in Local Plan.	BF
286	Griffin Mills, London Road, Thrupp	SDLP key employ- ment site	87	0 (or very low numbers if anything): may be best retained as an employment site	Likely to remain in employment use	Currently protected employment site EK13 in Local Plan.	BF

So what sort of development, in terms of numbers and mix, might these sites offer? And how might they contribute to an overall strategy?

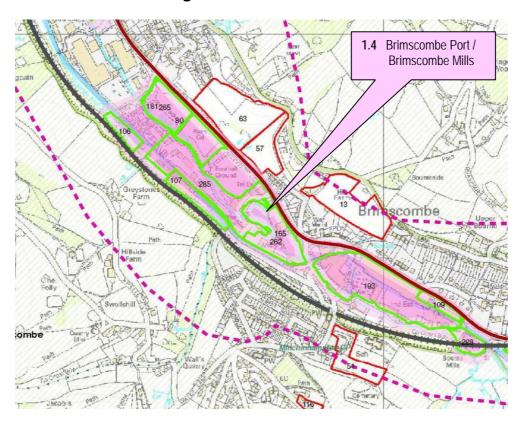
Within this location, it may be most appropriate to focus on employment growth, rather than new housing. Retention of existing job numbers (or ideally a degree of intensification) on these sites could contribute to the overall balance of housing and employment growth in the valleys.



You can see how this location performs in comparison with the other potential <u>Strategy Option D</u> growth locations by referring to the table of pros and cons on page 56.



1.4 Preferred location for growth: Brimscombe Port / Brimscombe Mills



Site ID		source	Projected housing capacity (SHLAA 2011)	Housing capacity estimate, taking account of policy, constraints etc	Potential for mixed uses?	Notes	Brownfield/ Greenfield?
80	Land adj. football ground, London Rd, Thrupp	Call for sites	96 @ dph of 40	30-50 on a significantly reduced site area.		Part former tip: potential land contamination. Part protected play space. Unlikely whole site will be developable. May have important 'strategic' role to play in providing access to site 285, as part of comprehensive development along with 165/193/265 etc	BF
181	Land between Hope Mill Lane and London Rd	SDLP Hg13	-	-	-	Both sites overlapped/ amalgamated by site 80. Site 181 is outstanding	BF
265	Land at Hope Mill Lane, Thrupp	NLUD 2008	-	-	-	housing allocation Hg13 from current Local Plan (for 30 homes).	BF
285	Hope Mills Industrial Estate	SDLP key employ- ment site	130	0 (or very low numbers if anything): may be best retained as an empl site	Yes. Target at least 1:1 ratio (jobs: homes), prefer 2:1. Plus retain existing empl no.s	Currently protected employment site EK15. Flood risk across most of site. Likely to remain in employment use. May be potential to intensify use of the site.	BF
106	Land west of Oak Villa, Brimscombe	Call for sites	19 @ dph of 45	O (in isolation, site is not of a 'strategic' scale or location for Core Strategy purposes)		Poor access; green space on canal off-side. Unlikely to be strategically essential. Certainly 45dph would be much too dense.	BF



28

107	Land south west of Canal Ironworks, Brimscombe	Call for sites	32 @ dph of 45	10-15 At reduced density and including mixed use (live-work units?)	Yes. Target at least 1:1 ratio (jobs: homes), prefer 2:1. Plus retain existing empl no.s	In isolation, site is not of a 'strategic' scale or location for Core Strategy purposes. Might have potential as part of comprehensive development along with 165/193/265 etc.	BF
165	Brimscombe Mills, Thrupp	Call for sites	77 @ dph of 45	30-50	Yes. Target at least 1:1 ratio (jobs: homes), prefer 2:1. Plus retain existing empl no.s	Currently part of protected employment site EK15. Flood risk across most of site. Reduce projected housing numbers to take account of mixed-use potential.	BF
262	Land at Brimscombe Corner	NLUD 2008	-	-	-	Duplicate of site 165. Not included in SHLAA assessment.	
193	Brimscombe Port, Brimscombe	GVA Grimley ELR	168 @ dph of 45	Up to 200? Increase housing density? To include mixed uses too.	Yes. Target at least 1:1 ratio (jobs: homes), prefer 2:1. Plus retain existing empl no.s	Currently part of protected employment site EK16. Strategic site, currently subject of (stalled) outline planning permission for 200+ homes and mixed uses. Area of flood risk across most of site.	BF
109	Former Golden valley Service Station, London Road	Call for sites	16 @ dph of 45	10-16 (in isolation, site is not of a 'strategic' scale or location for Core Strategy purposes)		Currently part of protected employment site EK16. Too small to justify strategic allocation in isolation, but may be key to accessing wider development of site 193.	BF
228	Bourne Mills, London Road, Brimscombe	Urban Capacity Study 2002	16 @ dph of 45	0-10 (or very low numbers if anything) on a much-reduced site area	Yes. Target at least 1:1 ratio (jobs: homes), prefer 2:1. Plus retain existing empl no.s	Flood risk across southernmost half of site. Likely to remain in employment use. May be potential to intensify use of the site. In isolation, site is not of a 'strategic' scale or location for Core Strategy purposes.	BF

So what sort of development, in terms of numbers and mix, might these sites offer? And how might they contribute to an overall strategy?

The collection of sites at Brimscombe and Thrupp was identified at Alternative Strategies stage as potentially being able to deliver Strategy Option B (i.e. 1000 homes here, plus 1000 at another location elsewhere in the District). Applying policy considerations and other constraints to the sites suggests that the capacity here is considerably lower – somewhere in the range of 280-340. Even in combination with the other sites identified at Thrupp (1.3 above), numbers would fall far short.

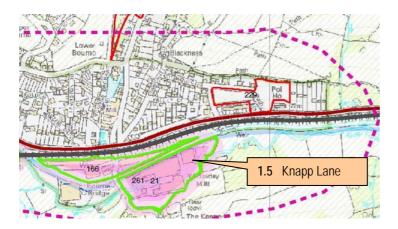
Some of these sites may be better suited to remaining in employment use – ideally with a degree of intensification, to provide more jobs on existing sites. But most have some scope to accommodate at least a bit of housing or alternative uses, as part of a strategic approach to the overall 'balance' of jobs and homes within the valleys.



You can see how this location performs in comparison with the other potential <u>Strategy Option D</u> growth locations by referring to the table of pros and cons on page 56.



1.5 Alternative location for growth: Knapp Lane



Site ID		source	Projected housing capacity (SHLAA 2011)	Housing capacity estimate, taking account of policy, constraints etc	Potential for mixed uses?	Notes	Brownfield/ Greenfield?
21	Land at Wimberley Mills, Brimscombe	Call for sites	87 @ dph of 45	0 - 87	Either housing or employment. Mix not considered appropriate	Poor access; flood plain across most of site. Olympic Varnish (site 166) is a "poor neighbour"	BF
261	Wimberley Mills, Bourne Bridge, Knapp Lane	NLUD 2008	-	-	-	Duplicate of site 21. Not included in SHLAA assessment.	BF
166	Dockyard works, off Knapp Lane, Brimscombe	Call for sites	49 @ dph of 45	0 - 49	Either housing or employment. Mix not considered appropriate	Poor access; flood plain across most of site; site currently in active employment use.	BF

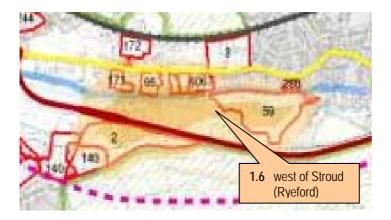
So what sort of development, in terms of numbers and mix, might these sites offer? And how might they contribute to an overall strategy?

Although these sites could accommodate a significant number of new homes, access along Knapp Lane and onto Toadsmoor Road is very poor and any acceptable number is likely to be dictated by Highways considerations. Also, these sites are relatively remote from services and facilities, compared to some of the preferred locations.



You can see how this location performs in comparison with the other potential <u>Strategy Option D</u> growth locations by referring to the table of pros and cons on page 56.

1.6 Alternative location for growth: West of Stroud



So what sort of development, in terms of numbers and mix, might these sites offer? And how might they contribute to an overall strategy?

Although re-development of some of the individual sites might be acceptable, this area is not considered a strong focus for "strategic growth" in the Stroud Valleys. There are existing employment uses in this location and some of these sites may be better suited to employment growth, while others should remain undeveloped. This is considered an important 'gap' between the built up settlements of Stroud and Stonehouse.

SHLAA	sites within the p	referred lo	cation for g	rowth (West of Stroud	d):		
Site ID		source	Projected housing capacity (SHLAA 2011)	Housing capacity estimate, taking account of policy, constraints etc	Potential for mixed uses?	Notes	Brownfield/ Greenfield?
2	Brunsdon Yard, Ryeford, Stonehouse	Call for sites	106 @ dph of 40	0 (or very low numbers if anything): may be best retained as an employment site	Likely to be non- residential if anything	Poor access; flood plain across much of site; part currently Local Plan Key Employment land (EK6).	BF
59	Land off Bridge Road, Ebley, Stroud	Call for sites	150 @ dph of 50 (plus 150 after 2026)	0 – 200 (max 30 dph = more appropriate density).	No	Poor access; former tip: potential contamination; important green space in IHCA conservation area. May not be realistically developable.	GF
60	Ebley Road, Stonehouse	Call for sites	75 @ dph of 50	0 - 20 max 30 dph = more appropriate density (if at all) on reduced site area.	No	Important green space in IHCA conservation area; avoid visual coalescence of Stroud/Stonehouse on Ebley Road	GF
66	Land between 9-11 Ebley Road, Stonehouse	Call for sites	36 @ dph of 40	0 - 20 max 30 dph = more appropriate density (if at all) on reduced site area.	No	Important open space in IHCA conservation area; avoid visual coalescence of Stroud/Stonehouse on Ebley Road	BF & GF
67	Land between 13-15 Ebley Road, Stonehouse		50 @ dph of 50	0 - 20 max 30 dph = more appropriate density (if at all) on reduced site area.	No	Partly overlaps/duplicates site 60: SHLAA double counts these housing projections	GF
140	Stanley Mills, Kings Stanley	-	1	-	-	Decision pending on planning application, LBC and CAC for mill conversion and residential newbuild.	
171	Garden Centre, off Ebley Road, Stonehouse		35 @ dph of 45	0 - 20 max 30 dph = more appropriate density	No	Reduce site area: part now occupied by Wycliffe pre-school	BF
323	Land at no.13 Ebley Road, Stonehouse	Call for sites (2011)	19 @ dph of 50	0 - 2 Road-frontage development only, if anything.		Important open space in IHCA conservation area; avoid visual coalescence of Stroud/Stonehouse on Ebley Road	GF

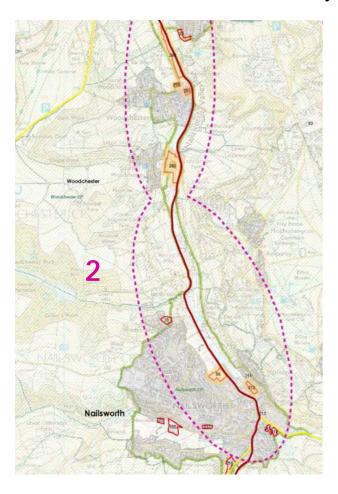


You can see how this location performs in comparison with the other potential <u>Strategy Option D</u> growth locations by referring to the table of pros and cons on page 56.



Stroud Valleys: (Strategy Option D)

2 Area of search 2: A46 / Nailsworth Valley



So what sort of development, in terms of numbers and mix, might these sites offer? And how might they contribute to an overall strategy?

The table below reveals that, despite appearances on the SHLAA map, Area of Search 2 has not proved fruitful in terms of identifying significant development sites.

Although re-development of some of the individual sites might be acceptable, the A46/Nailsworth Valley does not appear to be an appropriate focus as a potential "strategic location for growth" in the Stroud Valleys.



You can see how the Nailsworth Valley performs in comparison with the other potential <u>Strategy Option D</u> growth locations by referring to the table of pros and cons on page 56.

2.1 Alternative location for growth: A46 / Nailsworth Valley

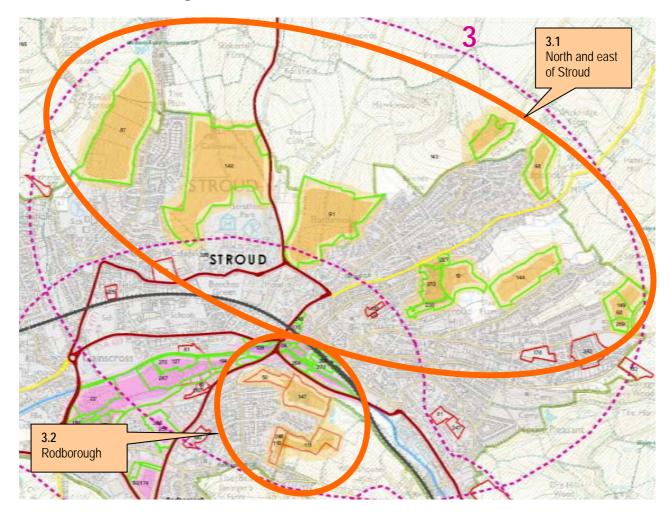
Site ID		source	Projected housing capacity (SHLAA 2011)	Housing capacity estimate, taking account of policy, constraints etc	Potential for mixed uses?	Notes	Brownfield/
282	South Woodchester Industrial Area	SDLP key employ- ment site	95	0-20 if anything	Yes. Some new employment + retain existing jobs on a low key scale	Currently protected employment site EK17 in Local Plan.	BF
256	Orchard House, Woodchester	Officer input	5	(site is not of a 'strategic' scale or location for Core Strategy purposes)			BF & GF
268	Rooksmoor Mills, Bath Road, Stroud	NLUD 2008	75	0 – 30 if anything	Yes. Some new employ- ment +	This site had been removed from the SHLAA as it had a planning permission for residential	BF

					retain existing jobs on a low key scale?	development – this permission has now expired so site re- assessed in 2011.	
281	Woodchester Piano Works, North Woodchester	NLUD 2008	-	-	-	This site has planning permission: no longer in SHLAA	
86	Land at Whitecroft, Nailsworth	Call for sites	16	(site is not of a 'strategic' scale or location for Core Strategy purposes)			GF
212	Rear of Egypt Mill, Nailsworth	Urban Capacity Study 2002	-	-	-	This site has planning permission: no longer in SHLAA	-



Stroud Valleys: (Strategy Option D)

3 Area of search 3: Edge of Settlement



So what sort of development, in terms of numbers and mix, might these sites offer? And how might they contribute to an overall strategy?

These sites offer a different approach to the Stroud Valleys strategy. Edge-of-settlement development could help to meet the housing need in Stroud and, like the other potential Stroud Valleys locations, it would still ensure that growth is focussed at the District's most sustainable towns and villages. But this approach would not produce such direct regeneration benefits, nor fulfil the desire to focus development on "brownfield" land wherever possible. Moreover, most of these sites are unlikely to be appropriate for anything other than residential development – meaning that employment growth would need to be accommodated elsewhere.

Essentially 100% residential, perhaps with some limited community uses on the largest sites. Options might include:

• 100 – 300 homes on one or two sites, as a supplement to valley-bottom / brownfield sites, if sufficient capacity cannot be found in the preferred locations.

Or;

 Up to 700 homes, spread over many sites, as an alternative to the strategic focus on valley-bottom / brownfield sites



You can see how these edge-of-settlement locations perform in comparison with the other potential Strategy Option D growth locations by referring to the table of pros and cons on page 56.



3.1 Alternative location for growth: North and east of Stroud

Site ID		source	Projected housing capacity (SHLAA 2011)	Housing capacity estimate, taking account of policy, constraints etc	Potential for mixed uses?	Notes	Brownfield/ Greenfield?
91	Grange Fields, Stroud	Call for sites	534	Up to 100 (reduce site area; more appropriate @ max dph of 30)	no	Part of site was LP omission site OS065. Site area should be reduced to 1/3 the full extent proposed to develop only southern portion.	GF
148	Land south of Callowell Farm	Call for sites	830	200 – 300 (reduce site area; more appropriate @ max dph of 30)	no	Part of site was LP omission site OS042 Site area could be reduced – maybe develop only top (western) portion?	GF
98	Wades Farm, Slad Road, Stroud	Call for sites	171	Fewer than 50 (reduce site area)	no	Part of site was LP omission site OS115 Developable site area should be halved.	GF
327	Amended Folly Lane site (SHLAA 2011)	Call for sites	32	0 (site is not of a 'strategic' scale or location for Core Strategy purposes)	no	This site was submitted at the 2011 SHLAA review, in place of larger site 143, which had a projected capacity of 324.	GF
87	Land behind Farmhill Lane, Stroud	Call for sites	392 (+ 196 after 2028)	Fewer than 100 (reduce site area)	no	Only a tiny portion of the site might be appropriate for development	GF
144	Land behind Summer Street, Stroud	Call for sites	283	0	no		GF
272	Lansdown Kennels, Stroud	NLUD 2002	-	-	-	Already developed: no longer in SHLAA	-
238	Middle Leazes, off Parliament Street, Stroud	Urban Capacity Study 2002	27	0	no	Not being actively promoted by a developer or landowner	(BF) GF
10	Land at Sladbrook, Stroud	Call for sites	161	0 – 100 (more appropriate @ max dph of 30, if at all)	no		GF
227	Libbys Drive, off Slad Road, Stroud	Urban Capacity Study 2002	17	0 -10 (in isolation, site is not of a 'strategic' scale or location for Core Strategy purposes)		Not being actively promoted by a developer or landowner. Could become a 'strategic' site only in combination with site 10, as a means of providing access	
68	Bisley Old Road: Kilminster Farm	Call for sites	122	Fewer than 100 (more appropriate @ max dph of 30)	no	Site is duplicated in larger site 149 (i.e. the projected numbers are 'double counted')	GF
149	Land off Bisley Old Road, Stroud	Call for sites	207	?	no	Site overlaps/duplicates site 68 (i.e. SHLAA numbers include 'double counting' of site 68)	BF & GF
259	Disused Reservoir by junction of Bisley Old Rd	NLUD 2008	-	-	-	Site overlaps/duplicates sites 149 and 68	-



Taking account of likely policy and the other constraints that might affect each site, the potential housing capacity of these sites totals 760 at most. However, it is not proposed that they should all be developed to full capacity. Utilising one or two of the largest sites – Grange Fields (site 91) and/or Callowell Farm (site 148)? – might bring forward between 100 and 300, possibly as a supplement to the valley-bottom brownfield focus.

3.2 Alternative location for growth: Rodborough

SHLAA	SHLAA sites within the alternative location for growth (Rodborough):						
Site ID		source	Projected housing capacity (SHLAA 2011)	Housing capacity estimate, taking account of policy, constraints etc	Potential for mixed uses?	Notes	Brownfield/ Greenfield?
58	Wallbridge Fields, Rodborough	Call for sites	67	0 -30	Maybe – or employment uses in preference to residential?	Could become a 'strategic' site in combination with site 147, as a means of providing access	GF
147	Rodborough Fields, Rodborough	Call for sites	171	0 – 50 (reduce site area; more appropriate @ max dph of 30, if at all)	No	Developable area should be significantly smaller, if at all	GF
110	Land off Butterow West, Rodborough	Call for sites	54	0	No	Allotments	GF
246	The Butts, Rodborough	Urban Capacity Study 2002	-	-	-	Site overlaps/duplicates site 110	
111	Land behind Woodhouse Drive, Rodborough	Call for sites	125	0	No		GF

Taking account of policy and the other site-specific constraints, the potential housing capacity of these sites totals 80 at most. However, there are significant practical obstacles (access in particular) at both sites 58 and 147. Should it be necessary to look for greenfield edge-of-settlement locations instead of / as a supplement to the valley-bottom brownfield focus, then it is considered that several of the sites to the north and east of Stroud present preferable, more viable alternatives.

Locations: Stroud valleys 35

page 63



Part 3 – Pros and Cons comparison How do the various locations and strategies perform?

The locations described over the preceding pages are all capable of providing development in accordance with Strategy Options A, B, D or some 'hybrid' of those strategies. However, they all have pros and cons; and it is important to consider how each of the locations might work together in our "preferred strategy": what the collective impact that development at more than one location is likely to be for the District as a whole.

In this section of the discussion paper, the main pros and cons of each location are set out for comparison alongside the others with similar potential. Hence it is possible to see that some locations and some strategy approaches are likely to be more sustainable than others, and some might work better in combination than others.

Table 1: Strategy Option A – Concentrated Growth Point Strategy page 37

Cam
Eastington
West of Stonehouse
Sharpness

Table 2: Strategy Option B – Concentrated Development Strategy page 47

Cam
Eastington
West of Stonehouse
Whitminster

Table 3: Strategy Option D – Stroud Valleys Strategy page 56

Valley bottom: A419 / River Frome / Canal Corridor (central)

Valley bottom: A419 / River Frome / Canal Corridor (Brimscombe & Thrupp)

Valley bottom (alternative locations)

Edge of Settlement locations

Table 4: South of Gloucester

Hunts Grove Hardwicke village Whaddon Upton St Leonards

Carbon footprint study

A key aspect of rating the likely sustainability of each strategy and each location is its potential "carbon footprint". A key part of our evidence base is the study recently completed by AMEC, comparing the probable carbon footprints of the "preferred locations". The headline findings of this study are set out here too. (Full report available online at http://www.stroud.gov.uk/docs/lp/amec.asp).



Strategy Option A – the Concentrated Growth Point Strategy

2,000 dwellings concentrated at either Cam, Eastington, west of Stonehouse or Sharpness.

Concentrating development in one place makes it easier to deliver an integrated "package" of infrastructure and services. This scale of development provides great potential for improving transport infrastructure, such as bus services and cycle routes. The community could be served by a comprehensive renewable energy scheme – and this could potentially even supply homes and businesses in the surrounding area.

This strategy would mean minimal impact on the character of the rest of the district, but the impact on the chosen area might be profound. It's also likely that development on this scale would involve greenfield development – contrary to the "brownfield" focus of Government policy. However, careful design of buildings and spaces could create a place with a distinctive character, an energy efficient and low-carbon community where natural habitats and biodiversity could be conserved and enhanced.

AMEC Carbon Footprinting study findings:

Development under the Option A scenario offers good potential for incorporating on-site low carbon energy technology. Since Option A effectively results in the construction of a new community, a large scale heating network could be developed with heat supplied via biomass, gas CHP or a source of waste heat (such as that from an EfW or AD plant). It should be possible to design an energy centre and associated access and fuel storage into the layout and generally there should be sufficient space to accommodate the necessary plant. Additional micro-generation systems, such as solar PV or small scale wind, could also contribute to reducing emissions.

The key findings for Option A are:

- * The absolute maximum CO2 emissions reduction over the baseline level via on-site generation is approximately 70%, though this assumes biomass CHP is installed which is still a relatively immature and expensive technology;
- ★ Using only commercially and technically proven technologies (e.g. biomass boilers or gas CHP combined with solar PV) the maximum reduction is approximately 40 45%; and
- * Maximum CO2 emissions reductions without using a communal heating network are approximately 20%, demonstrating the significant potential benefits associated with low carbon heating networks.

In terms of costs, a communal heating network fuelled by either gas CHP or biomass (or a combination of both) is expected to be the most cost effective means to reduce CO2 emissions, though upfront costs are still high (similar capital costs to PV but with considerably greater emissions reductions; 30% rather than 10%). The potential to reduce emissions by greater than 40% over current building regulations implies meeting CSH Level 4 should be broadly achievable, particularly when coupled with high specification building fabric, and it should be technically possible to achieve Level 5 if biomass CHP is installed.



Strategy Option A was based upon concentrating the majority of the District's growth in one place. Housing and employment development would be focussed on a single growth area, which would accommodate around 2,000 homes plus major employment land, community facilities and local services (convenience shopping etc).

Through the Strategic Housing Land Availability Assessment (SHLAA), three potential locations were identified where sufficient developable land exists (at Cam, Eastington and west of Stonehouse). A further possible location emerged through the consultation process: land at Sharpness was promoted (and subsequently added into the SHLAA) as a potential site for a new "Eco Town". Whilst Sharpness has the theoretical capacity to achieve this scale of development (and more), Cam, Eastington and West of Stonehouse are preferred as the more sustainable and viable options.

- ?
- If Strategy Option A were to form the basis of our "Preferred Strategy", which location would work best as a sustainable growth area for the District?
- If 2,000 homes could be accommodated in one of these locations, where should the residual number (1,200) be accommodated? ...South of Gloucester? in the Stroud valleys? At one of the 'Strategy Option B' locations? ... and if so, which combination of those locations would bring about the most balanced, sustainable and economically viable growth across the District as a whole?
- If there is a "preferred location", is there capacity there to allow it to grow further in the future? And would such a long-term focus on a single growth area be desirable?

		ALTERNATIVE		
OPTION 'A'	Cam	Eastington	West of Stonehouse	Sharpness
	This site consists of a number of SHLAA sites to the north east of Cam. The site is adjacent to Cam to the east and is close to the M5 motorway. It effectively forms a large urban extension to the settlement into predominantly greenfield land. A small area of the site (approx 20 ha) has been identified as being at risk of flooding from the River Cam to the west of the site. Road access is reasonable, though despite the close proximity to the M5 the closest junction is 8 km away. The Cam and Dursley railway station is situated at the northern extent of the site.	This site consists of several SHLAA sites on greenfield land surrounding the village of Eastington. Development of this site would dramatically increase the population of the village (x5). The site is adjacent to the M5, with good road links to both the motorway network and Stroud town. There is a railway station approx 3 km from the site in Stonehouse. The site is effectively in two parts, so development would not necessarily be entirely on one unbroken area of land. Part of the northern area of the site is at risk of flooding from the River Frome.	This site consists of greenfield land to the north west of the town of Stonehouse. The site surrounds the existing Stroudwater Business Park, a large employment area including a Dairy Crest factory, and is in close proximity to the M5 with good road links to the motorway network and Stroud town. There is also a railway station located in Stonehouse (on the Cheltenham to London line). A small area of the site is at risk of flooding from a stream that feeds the River Frome, which runs across land to the north of the business park.	This site consists of a number of SHLAA sites in and around the small port of Sharpness, on the River Severn. The site is relatively remote from the major service areas, with relatively poor road links. The port formerly had a railway station (on the Sharpness branch line which connects to the main Gloucester to Bristol line), but this is no longer open to passenger services. There may be potential to re-develop and restart passengers services should demand be sufficient. Land close to the River Severn is at risk from flooding and susceptible to climate change in the scenario of rising sea levels currently envisaged.
	 Comprises several parcels of land in different ownerships, which presents a significant challenge in taking it forward for development. This broad location was 'tested' through the Planning process when an extensive area of land was considered as Omission Site OS213 at the Local Plan Inquiry in 2002/03. The Inspector concluded that, "the land forms part of the rural setting of 	Essentially one large site (site RTPI 30) in single ownership: a relatively straightforward prospect in terms of taking it forward for development; two smaller sites provide supplementary opportunities. This location has not been 'tested' through the Planning process. A large part of this land area was submitted as an Omission Site for the Local Plan (OS126) but was	 ✓ Essentially one large site in single ownership: a relatively straightforward prospect in terms of taking it forward for development ✓ This location has already been 'tested' through the Planning process: the majority of this land was considered as Omission Site OS066 at the Local Plan Inquiry in 2002/3, where the Inspector concluded that, although "it is hard to conceive of any 	Multiple sites in multiple ownership. A complex prospect in terms of taking it forward for development (and not all land owners are 'on board'). The Eco Town proposal argues that, within the plan period, the concentration of new development for Stroud District should be focused at Sharpness. Moreover, the preliminary phases of the Eco-Town



OPTION 'A'	Cam	Eastington	West of Stonehouse	Sharpness
	the settlement and the proposed allocation should not be pursued in the Plan."	withdrawn before being considered by the Inspector. However, a large parcel of land immediately to the south (Alkerton Farm) was considered as Omission Site OS002 at the Local Plan Inquiry, where the Inspector rejected a proposal to accommodate between 530-830 dwellings at Eastington (a development on a significantly smaller and potentially less "self-sustaining" scale than strategy options A or B).	large site which would be entirely free of negative features", the land should not be allocated for development in preference to Hunts Grove.	could be designed with a view to accommodating the District's future growth for the next plan period (and potentially beyond). Thus removing future development pressures from other towns and villages.
Economic impacts, reger	neration, employment			
	 ✓ Good prospects for a viable mixeduse development and integrated housing and employment strategy. ✓ A good potential counterpoint/balance in relation to the Stroud urban area, boosting employment possibilities and strengthening the economic focus for the southern part of the District. ✓ Potential to work in tandem with Stroud Valleys strategy: ability to provide complementary employment premises – catering for gaps in the market that cannot be accommodated within the constraints of traditional valley-bottom employment sites, and vice versa. ✓ Adjacent to key employment land (EK23) at Draycott/Middle Mill – a natural extension to an existing employment area, with the potential to create an employment hub with 'critical mass': to boost the appeal and viability of both existing and new employment premises in the vicinity. ✓ Would the community provide a boost to regeneration or would it act in competition with Dursley? Potential boost for Dursley town centre could be significant (although not so direct as it would be if a large enough site close to the town centre could be found). Or is the location in fact too remote from Dursley town 	Good prospects for a viable mixeduse development and integrated housing and employment strategy, though not as obvious as West of Stonehouse in this respect. This broad location is where market demand naturally points to for business premises (driven by ease of access to M5 and major roads), but Stonehouse has the additional benefit of integration with the existing adjacent employment areas at Stroudwater/Oldends Lane. This location would be 'untested' and would need a wholly fresh start. May draw demand away from employment sites in Stroud valleys Potential to work in tandem with Stroud Valleys strategy: ability to provide complimentary employment premises — catering for gaps in the market that cannot be accommodated within the constraints of traditional valley-bottom employment sites, and vice versa. Close to M5 junction 13, which is good for both the residential and business market, but may lead to long out- and in-commutes (between Eastington and Gloucester, Cheltenham, Bristol in particular) Access to railway stations at both Stonehouse and Cam is within easy driving distance — again, good for	 ✓ Good prospects for a viable mixed-use development and integrated housing and employment strategy: this location is where market demand naturally points to for business premises (driven by ease of access to M5 and major roads). ✓ May draw demand away from employment sites in Stroud valleys ✓ Potential to work in tandem with Stroud Valleys strategy: ability to provide complimentary employment premises – catering for gaps in the market that cannot be accommodated within the constraints of traditional valley-bottom employment sites, and vice versa. ✓ Adjacent to key employment land at Oldends – a natural extension to one of the District's most significant employment areas (EK3). ✓ Close to M5 junction 13, which is good for both the residential and business market, but may lead to long out- and in-commutes (between Stonehouse and Gloucester, Cheltenham, Bristol in particular) ✓ Potential boost for Stonehouse town centre could be very significant ✓ Development at the highest possible intensity (i.e. 2000 homes plus businesses, as per Strategy Option A) might be an 'unbalanced' level of 	This proposal would effectively be the creation of a "new town" − complete with new services, facilities and employment opportunities. It would only 'work' sustainably as a location if there were sufficient onsite employment opportunities (in numbers and type of jobs) to enable genuine living and working within the community. The location is remote from any other major employment, retail or leisure hubs. As with other potential locations, it is likely that there will remain an element of both in- and out-commuting but the remoteness may make this more of an issue here than at some of the other potential locations. Could provide a powerful lifeline for ailing employment sites at the docks, including the Listed warehouse at Cullis Quay, which otherwise face an uncertain future and are difficult to keep in active use. Plenty of land available for employment uses and the location is already home to Key Employment site EK32 and several Employment allocations in the Local Plan − but is this the most appropriate location for major employment expansion? Very little market demand for employment development in this location: land has been allocated here (current Local Plan allocations



OPTION 'A'	Cam	Eastington	West of Stonehouse	Sharpness
	centre to generate enough frequent and regular visits by residents to provide the boost needed? Would the development instead demand a new service centre on site/at Cam?	residents, but also likely to enable commuter/dormitory behaviour. Potential to boost Stonehouse town centre Unlikely to benefit Stroud town centre significantly: too remote; Stroud's supermarkets aren't in the town centre; access to other major retail and leisure hubs is too convenient (e.g. Gloucester, Cheltenham, Bristol) Concentrated growth here would have little positive impact on ecomonic growth in the southern part of the District	growth for Stonehouse, located at the far western extreme of the Stroud Urban Area: potential to create a functional imbalance in relation to Stroud town's strategic role as the principal settlement in the District. The Local Plan Inspector questioned the potential for large scale development in this location to benefit the regeneration of Stroud town centre, particularly as the major supermarkets are not in the town centre and access to Gloucester is so good. Concentrated growth here would have little positive impact on ecomonic growth in the southern part of the District	EA3, 4, 5 and 6) for more than 30 years and development has yet to happen. Sharpness Dock Ltd currently has 120 year lease. The port operation and adjacent industrial uses can be noisy, smelly and incompatible as a neighbour to residential development. Closure of the port would require an Act of Parliament. May offer some degree of high street boost for nearby Berkeley but, aside from convenience purchases and community-based facilities (which could be provided on-site), many residents are likely to bypass Berkeley and make the longer journeys to Dursley, Thornbury, Gloucester or Bristol. Moreover, if a supermarket were provided as part of the longer-term 'Eco Town' growth, this might impact negatively on Berkeley's high street vitality. Berkeley could be dwarfed by its "new town" neighbour.
Climate change, renewak	oles, low carbon technologies:			
	 ✓ Opportunity for 'Macro' renewable energy schemes including CHP, backed up with 'Micro' installations. Scale sufficient to justify a scheme to supply whole community (and potential 'overflow' to serve surrounding existing community?) ✓ AMEC Carbon Footprinting study identified theoretical potential to develop wind farm nearby. ✓ Most of the site lies on a gentle northerly / north-westerly slope – not good for passive solar gain 	 ✓ Opportunity for 'Macro' renewable energy schemes, backed up with 'Micro' installations. Scale sufficient to justify a scheme to supply whole community (and potential 'overflow' to serve surrounding existing community?) ✓ However, no significant advantage over other sites of this scale: potential for renewable energy generation is similar to that available to any site of this sort of scale ✓ The site lies on a gentle northerly slope: not good for passive solar gain 	 ✓ Opportunity for 'Macro' renewable energy schemes, backed up with 'Micro' installations. Scale sufficient to justify a scheme to supply whole community ✓ Proximity to major energy-use 'hotspots' (e.g. Dairy Crest): potential district heating scheme? (possibly even to the benefit existing neighbouring communities/businesses) ✓ Just over half the site lies on a gentle southerly slope (good for passive solar gain), while half lies on a gentle north-easterly slope 	 ✓ Opportunity for 'Macro' renewable energy schemes, backed up with 'Micro' installations. Scale sufficient to justify a scheme to supply whole community ✓ However, no significant advantage over other sites of this scale: potential for renewable energy generation is similar to that available on any site of this sort of scale ✗ This location has a significant additional long term 'risk factor', not present at other potential locations: one of the objectives stated in the government's draft NPPF (paragraph 148) is to: "…reduce risk from coastal change by avoiding inappropriate development in vulnerable areas or adding to the impacts of physical changes to the coast". ✓ The 'Eco town' proposal stresses a



OPTI	ON 'A'	Cam	Eastington	West of Stonehouse	Sharpness
					range of sustainability and 'future-proofing' features as a selling point for development here. Including: 1. Built to Code Level 4 and above; 2. Meet life time homes standards; 3. Have real time energy monitoring systems; 4. Have real time public transport information; 5. Access to high speed broadband; 6. An element of affordable housing. However, there is no reason why these should be <i>unique</i> selling points — such features could (and should!) theoretically be built-in to similarly scaled developments at any of the potential Option A or Option B locations.
	Potential for district heating network	Good: single site	Mostly good but site is split – may be limited scope in smaller site to south east.	Very good – near existing employment and industry (Dairy Crest)	Mostly good, but site is split – may be limited scope in smaller sites.
	Opportunity to use surplus heat from existing industry?	No	Possibly from Dairy Crest facility	Possibly from Dairy Crest facility	No
District heating	Opportunity to use surplus heat from potential new industry?	Unknown	Unknown	Unknown	Unknown
Distric	Specific constraints/ opportunities	Potentially good location for AD plant, using wetland biomass	-	-	Industrial location favourable. Some possibility of importing biomass via water or rail.
	tunities to tap into able energy ce	Potential for medium/large scale wind identified nearby. May be potential to develop community wind farm, possibly directly supplying development	None identified	May be potential to export heat to or import heat from Dairy Crest	A biomass plant at or near the site could receive biomass deliveries by river or train. Large scale wind maybe?
	nstraints	None identified	None identified	None identified	None identified
	ial to deplete g resource	None identified	None identified	None identified	None identified
Flood		Small area at risk from flooding of River Cam	Significant area in northern part of site at risk of flood from River Frome	Small area at risk of flood from a tributary to the River Frome	Land close to the River Severn is at risk of flooding
Servic	Services, facilities and self-containment:				
		Development likely to be on a scale which would justify the provision of some on-site services and community facilities, as well as providing a boost and enabling enhancements to those available for the wider Cam community and	Development likely to be on a scale which would justify the provision of some on-site services and community facilities, as well as providing a boost and enabling enhancements to those available for the wider Eastington community and	Development likely to be on a scale which would justify the provision of some on-site services and community facilities, as well as providing a boost and enabling enhancements to those available for the wider Stonehouse community	Development likely to be on a scale which would justify the provision of some on-site services, community facilities and convenience shopping. Although there are already some basic shops and services in Sharpness and Newtown, the "Eco



OPTION 'A'	Cam	Eastington	West of Stonehouse	Sharpness
	Dursley catchment. Scale also enables integration of housing and employment – providing the opportunity to live and work within walking distance. ✓ Cam town centre (Tesco supermarket, small range of highstreet facilities) is very close and within walking distance. This is a good, accessible local service centre and development could be mutually beneficial. ✓ District hospital has been relocated from Berkeley to Dursley. Dursley town centre (supermarket, good range of high-street facilities, pubs, secondary school) is close but beyond reasonable walking distance. M5 junction 14 is about 8 miles from the site. M5 junction 13 is about 5.5 miles from the site. There is the danger that proximity to the M5 may invite long out- and in-commutes (between Cam and Bristol/Gloucester in particular) and produce a "dormitory" type of community to some extent.	catchment. Good access to existing services and facilities in Eastington village (primary school, mini market, one or two small independent shops, good community centre and recreation grounds) However, the village facilities are limited. New on-site and off-site provision, together with the scale of the development itself, could be seen as tantamount to a "new settlement". Should Eastington grow this much? Stonehouse town centre (small supermarket, good range of high-street facilities, pubs, restaurants, secondary school) is close but beyond reasonable walking distance. Most journeys would be by motor vehicle, via the busy A419 Bristol Road. Close to M5 junction 13, which may lead to long out- and in-commutes (between Eastington and Gloucester, Cheltenham, Bristol in particular) and encourage "dormitory" type of community	and catchment. Stonehouse town centre (small supermarket, good range of high-street facilities, pubs, restaurants, secondary school) is close and within reasonable walking distance, but connectivity for pedestrians, cyclists and vehicles is poor: access along Oldends Lane is restricted due to railway bridge (see points in "infrastructure, transport and accessibility", below) and most journeys would have to take a longer route via the busy A419 Bristol Road. Close to M5 junction 13, which may lead to long out- and in-commutes (between Stonehouse and Gloucester, Cheltenham, Bristol in particular) and encourage "dormitory" type of community	Town" proposal includes the creation of a new local centre, to support the long-term large-scale growth of the settlement, up to and beyond the plan period. This proposal would effectively be the creation of a "new town" – complete with new services, facilities and employment opportunities. However, as with all the potential Option A or B locations, it is likely that there will remain an element of both in- and out-commuting, and the remoteness of Sharpness from the District's other employment, leisure, retail and educational centres means that travel distances for most purposes would be further and more cross-country than would be the case for some of the alternative locations. The location is remote from any other major employment, retail or leisure hubs. District hospital has been relocated from Berkeley to Dursley Berkeley town centre (minimarket/convenience store, limited range of high-street facilities, pubs, etc) is close, but beyond reasonable walking distance. Connectivity for cyclists and vehicles is good – but would a new community at Sharpness be likely to view Berkeley as their local service centre? More likely that residents would bypass Berkeley and journey further to Cam, Dursley or Thornbury for anything other than basic convenience shopping, or even further to Bristol, Gloucester, Cheltenham. Vale of Berkeley College (secondary) has closed. Is there any realistic prospect of reopening? More likely residents would have to journey a minimum of 10km to Dursley (Rednock) or further to



OPTION 'A'	Cam	Eastington	West of Stonehouse	Sharpness
				Wotton-under-Edge (Katherine Lady Berkeley) or Stonehouse (Maidenhill).
Infrastructure, transport	and accessibility:			
	 ☑ Dursley town centre (supermarket, good range of high-street facilities, pubs, secondary school) is close but beyond reasonable walking distance. Most journeys would have to be via car or public transport, placing additional traffic burden on the A4135. ☑ Good public transport (buses) to and from Cam and Dursley, and providing access to Stroud, Gloucester, etc. Potential for further improvements. ☑ Existing railway station in Cam (Gloucester-Bristol line), within walking distance, providing regular connections to local, regional and national destinations. ☑ A4135 forms a single major route through Cam and Dursley, and this nears the limits of its capacity at peak times. Significant intensification of traffic on A4135 would cause congestion and require infrastructure upgrades, but development may be on sufficient scale to enable high street relief for Cam. ☑ M5 junction 14 at Falfield is not as 'on the doorstep' as Junction 13 is for Stonehouse/Eastington or Junction 12 is for Hardwicke – potentially placing additional burden on cross-country routes (A38 and A4135, particularly). Proximity may nevertheless invite long out- and incommutes (between Cam and Bristol/Gloucester in particular) and produce a "dormitory" type of community to some extent. ☑ Several options for site access 	Stonehouse town centre is too remote to be reasonably accessed on foot or by cycle (although links for pedestrians and cyclists via canal towpath are good, with potential to improve connectivity from the village centre). Most trips to Stonehouse, Stroud and beyond would be by car. Limited public transport (buses), but potential to improve and intensify, to the benefit of the wider community. Good access to canal and towpath (with potential to improve/upgrade) — important amenity value and sustainable route for cycle commute across much of Stroud urban area. Existing railway station in Stonehouse (Gloucester-Swindon line), but too remote to be walkable. The railway stations at both Stonehouse and Cam are both within easy driving distance — good for residents, but also likely to enable commuter/dormitory behaviour Land at former station on Bristol Road (SHLAA site 183) presents opportunity for reinstating a station on the Gloucester-Bristol line, to the benefit of the wider District community — but how feasible is this? Development would have to be high value and at a very high intensity to "enable" this. More likely to be a related but unconnected project, if it ever happened. Issues of walkablilty apply here too. Significant intensification of traffic on A419 may require infrastructure upgrades Close to M5 junction 13: good for	 ✓ Stonehouse town centre is close and within reasonable walking distance, but connectivity for pedestrians, cyclists and vehicles is poor: access along Oldends Lane is restricted due to railway bridge. Most journeys would have to take a longer route via the busy A419 Bristol Road. Railway line presents a significant obstacle and there is limited scope for improving connectivity/permeability between the site and the town. ✓ Good public transport (buses) from Stonehouse town centre/B4008 and via A419, providing access to Stroud, Gloucester, etc. Potential for further improvements. ✓ Existing railway station in Stonehouse (Gloucester-Swindon line), although issues of walkability apply here too ✓ Land at former station on Bristol Road (SHLAA site 183) presents opportunity for reinstating a station on the Gloucester-Bristol line, to the benefit of the wider District community – but how feasible is this? Development would have to be high value and at a very high intensity to "enable" this. More likely to be a related but unconnected project, if it ever happened. ✓ Significant intensification of traffic on A419 may require infrastructure upgrades (see also points about intensification of 'urban' character/"Gateway to Stroud", below) ✓ Close to M5 junction 13: good for accessibility and mobility; but equally 	 ✓ Sharpness is a traffic 'cul-de-sac'. All road traffic to and from the settlement could be accommodated on B4066 – a good road, which bypasses Berkeley and could probably cope with dramatically increased volumes, without placing too much strain on surrounding lanes and neighbouring settlements. Possible peak-time congestion at junction with A38 (Berkeley Heath) though. ✓ Motorway access (via B4066 and A38) is less convenient than at some of the other potential growth areas (e.g. Hardwicke, Stonehouse, Eastington): 12.7km (7.9miles) to M5 junction 14; 18.8km (11.6 miles) to junction 13. Whilst this may incentivise "self-containment", it is likely that there will remain an element of both in- and outcommuting, as with other potential locations but the remoteness may make this more of an issue here than at some of the other potential locations. ✓ Poor public transport at present. Development of this scale would necessitate significant upgrades. Served by a railway branch line (connecting to Gloucester-Bristol line) but no guarantee that it could be opened for passenger travel, particularly if development was on a smaller scale than 2000+ (Strategy A or bigger). ✓ National cycle route 41 passes close by (through Wanswell – linking to Berkeley, Slimbridge and beyond). ✓ Good access to canal and towpath.
	points, providing some versatility in terms of development design, layout,	Close to M5 junction 13: good for accessibility and mobility; but equally likely to enable commuter/dormitory	likely to enable commuter/dormitory behaviour. Trips to out-of-District	Good access to canal and towpath. Severn Way footpath passes through Sharpness and Newtown



OPTION 'A'		Cam	Eastington	West of Stonehouse	Sharpness
		functionality, traffic flow etc. Potentially enables completion of Cam Valley Cycleway, connecting the southernmost extent of Dursley (Lister Petter) with Cam & Dursley Railway Station: important amenity value and sustainable route for cycle/train commute across much of Stroud district and beyond.	Multiple options for site access points (to A38 via Claypits; to A419 via Spring Hill without having to pass through the village core): versatility in	employment/retail/leisure hubs are likely to be longer than they might be from alternative potential growth areas (e.g. from Hardwicke via junction 13, where journeys to Gloucester or Cheltenham would be shorter or Cam via junction 14, where journeys south to Bristol would be more appealing). ✓ Multiple options for site access points (A419; B4008; Oldends Lane): versatility in terms of development design, layout, functionality, traffic flow etc. ✓ Good access to canal and towpath (with potential to improve/upgrade) – important amenity value and sustainable route for cycle commute across much of Stroud urban area.	and along Glos-Sharpness canal – important amenity value. Potential to improve/upgrade canal path for multi-use and link with cycle routes at Slimbridge, Cambridge etc?
Distance to Stro	ud	18.3 km	7.9 km	7.1 km	24.4 km
Distance to Glos	5	20.2 km	14.5 km	15.4 km	29.0 km
Distance to Bris (shortest distance b		39.9 km	44.8 km	46.4 km	37.3 km
Nearest operation railway station		Cam & Dursley 1 km	Stonehouse 4 km	Stonehouse 2 km	Cam & Dursley 11 km
Nearest motorw junction	ay	M5 J13 8.3 km M5 J14 14.3 km	M5 J13 2.0 km	M5 J13 2.0 km	M5 J14 12.7 km M5 J13 18.8 km
Estimated CO ₂	Total	$3,827 \rightarrow \text{ reduced by } 15\% = 3,253^{-2}$	2,891	$2,775 \rightarrow \text{ reduced by } 15\% = 2,359^{2}$	6,178
emissions (commuting and local travel only) ¹ (tonnes per year)	Per household	1.6	1.4	1.2	3.1
		associated with development at Cam are	distinctly higher due to the greater distance f	al travel are slightly higher, but comparable w rom Stroud and Gloucester, but this is mitiga n any major settlement and lack of (operation	ted by the proximity to Cam & Dursley

1

^{1 [}SOURCE: AMEC <u>Development Location Comparison and Carbon Footprinting Study</u> August 2011]. For each site, a total CO₂ emissions figure (tonnes per year) is estimated for commuting and local travel. These figures are for comparative purposes and are expected to be broadly indicative of the likely actual emissions. They do not include the contribution of commercial transport and travel significantly beyond the district. In order to understand the actual emissions associated with vehicle movements from each site, a detailed transport appraisal and modelling exercise would be required, which is beyond the study. However, this analysis does clearly demonstrate that some sites are likely to perform better than others.

Figure adjusted to take account of proximity to railway stations – the closer the better, particularly where the station is on a major line or has good connections as this will encourage less personal mileage in cars. Research carried out by Leeds University suggests mixed-use development around a transport node such as a station typically reduces emissions by 15% compared to a stand-alone development [SOURCE: AMEC report, paragraph 7.1.1].



OPTION 'A'	Cam	Eastington	West of Stonehouse	Sharpness			
Environmental sensitivitie	Environmental sensitivities: habitats, heritage, landscape, character etc						
	A green field site. Large scale development could potentially make a conspicuous impact on the rural character of approaches to Cam from the north, quite an important role as a 'gateway' to Cam and Dursley: design, massing, layout and landscaping therefore highly sensitive. X Lies within the escarpment footslopes quite close to AONB (though more distant than the West of Stonehouse location or some of the South of Gloucester alternatives). However, it lies on lower ground, sloping away from the Cotswold escarpment and below/behind the hamlet of Upthorpe. May be a conspicuous feature in long-range views to and from the Cotswold escarpment if not sensitively designed There are no environmental protection designations on the site Mostly Grade 3 agricultural land but some of Grade 2, which would be lost if the site were developed.	Less visually conspicuous than the west of Stonehouse location, and would not contribute in the same way to the sense of creeping urbanisation effected by development strung along the A419 corridor and the way that this acts as a 'gateway' to Stroud. Would be conspicuous from southbound M5 – northbound, to some extent screened by the northerly sloping topography, combined with the motorway cutting and embankments around the A419 junction 13 roundabout. More distant from AONB than west of Stonehouse is. Although development on this scale would inevitably have a major landscape impact, this location is less likely to be a conspicuous feature in longrange views to and from the Cotswold escarpment, and would not have the same "cumulative" impact of significant bulk being added to the visible urban mass around Stonehouse. The site would dwarf the village of Eastington, enclosing it to the north and west and changing the nature of the settlement. However, this location mostly abuts the north western edge of the village, which principally consists of modern development; the visual impact on the historic core and sensitive/ conspicuous 'hot spots' (such as Spring Hill and listed Alkerton Court) could potentially be limited through layout and design. Mostly Grade 3a and 3b agricultural land, which would be lost if the site were developed. Stroud Industrial Heritage Conservation Area (IHCA) abuts the site at its north eastern corner	Increasing role of development strung along the A419 corridor as a conspicuous 'gateway' to Stroud, and feeding a sense of creeping urbanisation. Design, massing, layout and landscaping therefore highly sensitive. Closer to AONB than Eastington and likely to be a conspicuous feature in long-range views to and from the Cotswold escarpment. Dairy Crest is already a major landmark in this respect and this development would contribute a significant bulk to the visible urban mass around Stonehouse. High quality landscape, with much of the historic field pattern intact, ancient established hedgerows, remnants of ridge-and-furrow farming, old Perry pear trees, listed buildings, tracks, bridlepaths and footpaths, tree preservation orders. Local Plan Inspector noted the "overall character of the area which, in spite of being located between the edge of an extensive urban area and a motorway corridor, has survived remarkably unchanged" and advised that "the character of the localityhas a value which suggests to me that it would require a pressing need for development to be placed here to justify allocating the site". The site would envelope the rural hamlets of Nupend and Nastend, effectively drawing them into the urban mass of Stonehouse – even with generous landscape and layout 'buffers', development on this scale would be likely to harm the character of the settlements and compromise the setting of their listed buildings to some extent, despite the impact already felt from the industrial development at Oldends.	 ✓ Could provide a lifeline for the Listed docks warehouse, which otherwise is difficult to keep in active use. ✓ Conservation Area at Sharpness Old Docks (abutting far northern end of the development area). Design and massing likely to be a sensitive issue. ✓ Could be viewed as "enabling development", to help preserve vulnerable heritage assets which face an uncertain future; on the other hand, development on this scale is likely to have a profound effect on the character and appearance of the docks and settlement – potentially eroding the setting of listed buildings and conservation area and compromising aspects of special architectural and historic interest. ✓ Adjacent to nationally and internationally important wildlife designations (estuarine SSSI, SPA, SAC and RAMSAR sites). However, to some extent the impacts might be mitigated by design, layout, landscaping and use 'zoning': ✓ The Eco Town proposal argues that it would be possible to keep the development separated from the shoreline and to accommodate the recreational needs of the population within the designated areas (but with no additional public access points to the shore). Development could be separated from the foreshore by a strip of fields that would continue in agricultural use. ✓ Abuts a strip of land designated as a Key Wildlife Site (between Bridge Rd and Oldminster Rd) – sensitive landscaping, massing, layout and design needed adjacent to this area ✓ Outside Cotswold AONB; however: ✓ Very visible site from public 			



OPTION 'A'	Cam	Eastington	West of Stonehouse	Sharpness
		(Meadow Mill and Churchend. Likely to impact on the character and setting of the conservation area, particularly long range views to/from Meadow Mill and the historic line of the Stroudwater canal. May be mitigated to some extent if development on floodrisk land is avoided. Key Wildlife site (local designation) covers almost 1/3 of the area, a large swathe of land along the northeastern edge of site 30, abutting the River Frome	Mostly Grade 3a and 3b agricultural land, which would be lost if the site were developed. Stroud Industrial Heritage Conservation Area (IHCA) runs south of the A419 but the impact on the setting of the conservation area could probably be adequately mitigated through landscaping and layout	viewpoints in Forest of Dean AONB, across the River Severn. Thought to be considerable amount of high grade (2) agricultural land which would be lost if the site were to be developed. Unknown whether there are archaeology issues. Many of the dockland buildings are of a very large scale and are clearly visible from across the Severn and from adjoining high ground.
Topography and physica	al constraints (including flood risk	s)		
	 ✓ Good 'containment' to east (existing settlement/built form and A4135), but more ambiguous 'boundaries' to the rest of the site. Could be contained below 50m contour with reinforced landscaping but little by way of obvious natural or built features except field boundaries to provide limits to westward expansion. ✓ Some flood risk: a fairly well-constrained strip of Flood Zones 2, 3a and 3b bisects the area along the River Cam, between sites 139 and 150. ✓ Reasonably flat site, relatively easy to develop. ✓ Mainly greenfield: easy to develop with minimal contaminated land risk. 	 ✓ Good 'containment': M5/River Frome/and the existing village structure provide clear limits, beyond which growth and expansion would be illogical or difficult. ✓ But, once developed and once the village has grown, are the physical constraints too great to allow future expansion and sustainable long term growth? Would this end up being a 'dead end' settlement? ✓ Proximity to motorway 'bad neighbour': noisy for residents. ✓ Significant flood risk across almost 1/3 of the area: Flood Zones 2, 3a and 3b cover a large swathe of land along the north-eastern edge of site 30, abutting the River Frome. ✓ Reasonably flat site, relatively easy to develop. ✓ Greenfield: easy to develop with minimal contaminated land risk. ✓ Site 79 is designated Protected Outdoor Playspace in Local Plan. 	Good 'containment' to south (A419) and east (existing settlement/built form and railway line), but more ambiguous 'boundaries' to the west and particularly north, with little by way of obvious natural or built features to provide limits to northward expansion. Some flood risk: fairly isolated area of Flood Zones 2, 3a and 3b, which snakes across the western edge and passes between Nastend and the main road (A419). Reasonably flat site, relatively easy to develop. Greenfield: easy to develop with minimal contaminated land risk.	 ✓ Railway line and B4066 provide good 'containment' to the east of Saniger Farm, while the river and estuarine landscape defines the limits of potential expansion to the west and north. Poor containment to the east of Newtown, though, or to the south: with little to naturally limit future growth between Saniger Farm and Berkeley's settlement boundary. ✓ Significant areas of flood risk: large swathes of Flood Zones 2, 3a and 3b snake through the heart of the development area: at the Old Docks, along the route of the Gloucester-Sharpness canal and the docks basin (EK32 – just outside the development area), along the estuary coastline and skirting the edges of Sanigar Farm (site 158 and the southernmost 'bulk' of site 321). ✓ Additional long term risk from potential coastal changes/rising sea levels. ✓ Reasonably flat site, relatively easy to develop. ✓ Significant portion is greenfield: easy to develop with minimal contaminated land risk. ✓ Some contaminated land risk – especially to north eastern tip (historic chemical and gas works)



Strategy Option B - the Concentrated Development Strategy

1000 dwellings concentrated at **two** of the following settlements: Cam, Eastington, west of Stonehouse or Whitminster.

Like Option A, this sort of scale of development does offer opportunities to build sustainable communities as well as to create a strong "sense of place", distinctive character and make environmental enhancements through design.

But the various locations differ in their potential to tap into and integrate with existing infrastructure, services and facilities in the surrounding area and it is questionable whether a new community of this size would be sufficient to sustain the services and facilities developed for it/as part of it. Similar issues of greenfield development are likely to apply to both OPTIONS A and B.

AMEC Carbon Footprinting study findings:

The results for this scenario are essentially the same as for Option A. There will be small differences in the economics as each development is half the size, but the same technologies are expected to be technically feasible. Since the mix of development and applicable technologies are essentially the same for both options, so are the potential emissions reductions

As with Option A, this scenario offers good potential for incorporating on-site low carbon energy technology: a large scale heating network could be developed with heat supplied via biomass, gas CHP or a source of waste heat (such as that from an EfW or AD plant). It should be possible to design an energy centre and associated access and fuel storage into the layout and generally there should be sufficient space to accommodate the necessary plant. Additional micro-generation systems, such as solar PV or small scale wind, could also contribute to reducing emissions.

The key findings for Option B are:

- * The absolute maximum CO2 emissions reduction over the baseline level via on-site generation is approximately 70%, though this assumes biomass CHP is installed which is still a relatively immature and expensive technology;
- ★ Using only commercially and technically proven technologies (e.g. biomass boilers or gas CHP combined with solar PV) the maximum reduction is approximately 40 45%; and
- * Maximum CO2 emissions reductions without using a communal heating network are approximately 20%, demonstrating the significant potential benefits associated with low carbon heating networks.

In terms of costs, a communal heating network fuelled by either gas CHP or biomass (or a combination of both) is expected to be the most cost effective means to reduce CO2 emissions, though upfront costs are still high (similar capital costs to PV but with considerably greater emissions reductions; 30% rather than 10%). The potential to reduce emissions by greater than 40% over current building regulations implies meeting CSH Level 4 should be broadly achievable, particularly when coupled with high specification building fabric, and it should be technically possible to achieve Level 5 if biomass CHP is installed.



Strategy Option B was conceived around the idea of splitting 2000 homes across *two* locations. Housing and employment development would be concentrated in two distinct growth areas – each one accommodating around 1000 homes plus major employment land, community facilities and local services (convenience shopping etc). Through the Strategic Housing Land Availability Assessment (SHLAA), four potential locations were identified where sufficient developable land exists. Whilst Whitminster has the theoretical capacity to achieve this scale of development. Cam. Eastington and West of Stonehouse are preferred as the more sustainable and viable options.

?

If Strategy Option B were to form the basis of our "Preferred Strategy", which two locations would work best together as growth areas?

?

If 2000 homes could be accommodated across two of these locations, where should the residual number (1,200) be accommodated? ... South of Gloucester? in the Stroud valleys?

Could development at *one* of these locations be combined with some variant of Strategy Option D? (e.g. development of around 1000 homes plus employment land in the Stroud valleys) ... and if so, which of these locations would bring about the most balanced, sustainable and economically viable growth across the District as a whole?

		PREFERRED LOCATIONS	ALTERNATIVE		
OPTION 'B'	Cam	Eastington	West of Stonehouse	Whitminster	
		Within this broad area, focussed to the west of Stonehouse and within the A419/M5/A38 catchment, <i>three distinct potential locations</i> for growth are identified. They share several similar pros and cons – particularly West of Stonehouse and Easting These three may be assessed separately and treated as 'alternatives':			
		While Strategy Option A proposes concentrated growth at just <i>one</i> location, to combine or develop <i>two</i> of these locations at the levels indicated in Strategy Option B (i.e. upwards of 1000 dwellings, plus employment land) would still serve to concentrate growth in just one part of the District (which is not the intention of Strategy Option B) – thereby denying the opportunity for significant growth elsewhere and potentially setting up a functional imbalance beyond the western extent of the Stroud Urban Area, relative to Stroud town's strategic role as the principal settlement in the District.			
	This site consists of a number of SHLAA sites to the north east of the large village of Cam. The site is close to the M5 motorway and effectively forms a large urban extension to the village into predominantly greenfield land. A small area of the site (approximately 20 ha) has been identified as being at risk of flooding from the River Cam which runs to the west of the site. Road access is reasonable, though despite the very close proximity to the M5 the closest junction is several miles away. The Cam and Dursley railway station is situated at the northern extent of the site.	This site consists of several SHLAA sites on greenfield land surrounding the village of Eastington. Development at this site would considerably increase the population of the village (x3). The site is adjacent to the M5, with good road links to both the motorway network and Stroud town. There is a railway station approximately 3 km from the site in Stonehouse. The site is effectively in two parts, so development would not necessarily be entirely on one unbroken area of land. A significant part of the northern area of the site is at risk of flooding from the River Frome.	This site consists of greenfield land to the north west of the town of Stonehouse. The site surrounds the existing Stroudwater Business Park, a large employment area including a Dairy Crest factory, and is in close proximity to the M5 with good road links to the motorway network and Stroud town. There is also a railway station located in Stonehouse. A small area of the site is at risk of flooding from a stream that feeds the River Frome, which runs across land to the north of the business park.	This site consists of several SHLAA sites to the north and west of the small village of Whitminster. The site is very close to the A38 and the M5 connecting Gloucester and Bristol, and is relatively close to Stroud town. There is no railway station nearby. A significant proportion of the land to the west of the site is at risk from flooding of the River Frome. The site is close to Moreton Valence, which is a possible location for a strategic-scale energy from waste plant. Were such a plant to be built in this location there could be significant potential to supply surplus heat to new development in this area.	
	Comprises several parcels of land in different ownerships, which presents a significant challenge in taking it forward for development.	Essentially one large site (site RTPI 30) in single ownership: a relatively straightforward prospect in terms of taking it forward for development	Essentially one large site in single ownership: a relatively straightforward prospect in terms of taking it forward for development	Principally one large site in single ownership, supplemented by smaller peripheral sites: a relatively straightforward prospect in terms of	



OPTION 'B'	Cam	Eastington	West of Stonehouse	Whitminster
X	This broad location was 'tested' through the Planning process when an extensive area of land was considered as Omission Site OS213 at the Local Plan Inquiry in 2002/03. The Inspector concluded that, "the land forms part of the rural setting of the settlement and the proposed allocation should not be pursued in the Plan."	This location has not been 'tested' through the Planning process. A large part of this land area was submitted as an Omission Site for the Local Plan (OS126) but was withdrawn before being considered by the Inspector. However, a large parcel of land immediately to the south (Alkerton Farm) was considered as Omission Site OS002 at the Local Plan Inquiry, where the Inspector rejected a proposal to accommodate between 530-830 dwellings at Eastington (a development on a significantly smaller and potentially less "self-sustaining" scale than strategy options A or B).	This location has already been 'tested' through the Planning process: the majority of this land was considered as Omission Site OS066 at the Local Plan Inquiry in 2002/3, where the Inspector concluded that, although "it is hard to conceive of any large site which would be entirely free of negative features", the land should not be allocated for development in preference to Hunts Grove.	taking it forward for development
Economic impacts, regener	ration, employment			
▼ ▼	Stroud Valleys strategy: ability to provide complementary employment premises – catering for gaps in the market that cannot be accommodated within the constraints of traditional valley-bottom employment sites, and vice versa.	Good prospects for a viable mixed- use development and integrated housing and employment strategy, though not as obvious as West of Stonehouse in this respect. This broad location is where market demand naturally points to for business premises (driven by ease of access to M5 and major roads), but Stonehouse has the additional benefit of integration with the existing adjacent employment areas at Stroudwater/Oldends Lane. This location would be 'untested' and would need a wholly fresh start. May draw demand away from employment sites in Stroud valleys Potential to work in tandem with Stroud Valleys strategy: ability to provide complimentary employment premises – catering for gaps in the market that cannot be accommodated within the constraints of traditional valley-bottom employment sites, and vice versa. Close to M5 junction 13, which is good for both the residential and business market, but may lead to long out- and in-commutes (between Eastington and Gloucester, Cheltenham, Bristol in particular)	 ✓ Good prospects for a viable mixeduse development and integrated housing and employment strategy: this location is where market demand naturally points to for business premises (driven by ease of access to M5 and major roads). ✓ May draw demand away from employment sites in Stroud valleys ✓ Potential to work in tandem with Stroud Valleys strategy: ability to provide complimentary employment premises – catering for gaps in the market that cannot be accommodated within the constraints of traditional valley-bottom employment sites, and vice versa. ✓ Adjacent to key employment land at Oldends – a natural extension to one of the District's most significant employment areas (EK3). ✓ Close to M5 junction 13, which is good for both the residential and business market, but may lead to long out- and in-commutes (between Stonehouse and Gloucester, Cheltenham, Bristol in particular) ✓ Potential boost for Stonehouse town centre could be very significant ✓ Development at the highest possible 	Sufficient land for a mixed-use development and integrated housing and employment strategy. Although market demand for business premises naturally points to locations west of Stonehouse (driven by ease of access to M5 and major roads), Whitminster is 'untested' and somewhat out on a limb, remote from other employment areas and facilities. As a major employment area, this location would need a wholly fresh start, whereas Stonehouse has the additional benefit of integration with the existing adjacent employment areas at Stroudwater/Oldends Lane. Close to M5 junction 13, which is good for both the residential and business market, but may lead to long out- and in-commutes (between Whitminster and Gloucester, Cheltenham, Bristol in particular) May draw demand away from employment sites in Stroud valleys and established employment areas in nearby Stonehouse Some potential to boost Stonehouse town centre a little, but too remote from either Stonehouse or Stroud town centre to provide any help with



OPTI	ON 'B'	Cam	Eastington	West of Stonehouse	Whitminster
		found). Or is the location in fact too remote from Dursley town centre to generate enough frequent and regular visits by residents to provide the boost needed? Would the development instead demand a new service centre on site/at Cam?	Access to railway stations at both Stonehouse and Cam is within easy driving distance − again, good for residents, but also likely to enable commuter/dormitory behaviour. Potential to boost Stonehouse town centre Unlikely to benefit Stroud town centre significantly: too remote; Stroud's supermarkets aren't in the town centre; access to other major retail and leisure hubs is too convenient (e.g. Gloucester, Cheltenham, Bristol)	intensity (i.e. 2000 homes plus businesses, as per Strategy Option A) might be an 'unbalanced' level of growth for Stonehouse, located at the far western extreme of the Stroud Urban Area: potential to create a functional imbalance in relation to Stroud town's strategic role as the principal settlement in the District. The Local Plan Inspector questioned the potential for large scale development in this location to benefit the regeneration of Stroud town centre, particularly as the major supermarkets are not in the town centre and access to Gloucester is so good.	regeneration or vitality, particularly as the major supermarkets are not located within Stroud town centre and access to Gloucester is so good.
Climat	e change, renewab	les, low carbon technologies:			
		 ✓ Opportunity for 'Macro' renewable energy schemes including CHP, backed up with 'Micro' installations. Scale sufficient to justify a scheme to supply whole community (and potential 'overflow' to serve surrounding existing community?) ✓ AMEC Carbon Footprinting study identified theoretical potential to develop wind farm nearby. ✓ Most of the site lies on a gentle northerly / north-westerly slope – not good for passive solar gain 	 ✓ Opportunity for 'Macro' renewable energy schemes, backed up with 'Micro' installations. Scale sufficient to justify a scheme to supply whole community (and potential 'overflow' to serve surrounding existing community?) ✓ However, no significant advantage over other sites of this scale: potential for renewable energy generation is similar to that available to any site of this sort of scale ✓ The site lies on a gentle northerly slope: not good for passive solar gain 	 ✓ Opportunity for 'Macro' renewable energy schemes, backed up with 'Micro' installations. Scale sufficient to justify a scheme to supply whole community ✓ Proximity to major energy-use 'hotspots' (e.g. Dairy Crest): potential district heating scheme? (possibly even to the benefit existing neighbouring communities/businesses) ✓ Just over half the site lies on a gentle southerly slope (good for passive solar gain), while half lies on a gentle north-easterly slope 	Opportunity for 'Macro' renewable energy schemes, backed up with 'Micro' installations. Scale sufficient to justify a scheme to supply whole community (and potential 'overflow' to serve surrounding existing community?) The site is close to Moreton Valence, which is a possible location for a strategic-scale energy from waste plant. Were such a plant to be built in this location there could be significant potential to supply surplus heat to new development in this area. Much of the site lies on a southerly or south-westerly slope (good for passive solar gain)
	Potential for district heating network	Good: single site	Mostly good but site is split – may be limited scope in smaller site to south east	Very good – near existing employment and industry (Dairy Crest)	Good
heating	Opportunity to use surplus heat from existing industry?	No	Possibly from Dairy Crest facility	Possibly from Dairy Crest facility	No
District heating	Opportunity to use surplus heat from potential new industry?	Unknown	Unknown	Unknown	Very good opportunity if Energy From Waste plant were to be built at nearby Moreton Valence

OPTION 'B'	Cam	Eastington	West of Stonehouse	Whitminster
Specific constraints/ opportunities	Potentially good location for Anaerobic Digestion plant, using wetland biomass	-	-	-
Opportunities to tap into renewable energy resource	Good wind potential identified nearby. May be potential to develop community wind farm, possibly directly supplying development	None identified	May be potential to export heat to or import heat from Dairy Crest	Possible Energy From Waste plant nearby (Moreton Valence)
Site constraints	None identified	None identified	None identified	None identified
Potential to deplete existing resource	None identified	None identified	None identified	None identified
Flood risk	Small area at risk from flooding of River Cam	Significant area in northern part of site at risk of flood from River Frome	Small area at risk of flood from a tributary to the River Frome	Significant portion of land to west of site at risk of flood from River Frome
Services, facilities and se	elf-containment:			
	 ✓ Development likely to be on a scale which would justify the provision of some on-site services and community facilities, as well as providing a boost and enabling enhancements to those available for the wider Cam community and Dursley catchment. Scale also enables integration of housing and employment – providing the opportunity to live and work within walking distance. ✓ Cam town centre (Tesco supermarket, small range of high-street facilities) is very close and within walking distance. This is a good, accessible local service centre and development could be mutually beneficial. ✓ District hospital has been relocated from Berkeley to Dursley. ✓ Dursley town centre (supermarket, good range of high-street facilities, pubs, secondary school) is close but beyond reasonable walking distance. ✓ M5 junction 14 is about 8 miles from the site. M5 junction 13 is about 5.5 miles from the site. There is the danger that proximity to the M5 may invite long out- and in-commutes (between Cam and Bristol/Gloucester in particular) and produce a "dormitory" type of community to some extent. 	 ✓ Development likely to be on a scale which would justify the provision of some on-site services and community facilities, as well as providing a boost and enabling enhancements to those available for the wider Eastington community and catchment. ✓ Good access to existing services and facilities in Eastington village (primary school, mini market, one or two small independent shops, good community centre and recreation grounds) ✓ However, the village facilities are limited. New on-site and off-site provision, together with the scale of the development itself, could be seen as tantamount to a "new settlement". Should Eastington grow this much? ✓ Stonehouse town centre (small supermarket, good range of high-street facilities, pubs, restaurants, secondary school) is close but beyond reasonable walking distance. Most journeys would be by motor vehicle, via the busy A419 Bristol Road. ✓ Close to M5 junction 13, which may lead to long out- and in-commutes (between Eastington and Gloucester, Cheltenham, Bristol in particular) and encourage "dormitory" type of community 	 ✓ Development likely to be on a scale which would justify the provision of some on-site services and community facilities, as well as providing a boost and enabling enhancements to those available for the wider Stonehouse community and catchment. ✓ Stonehouse town centre (small supermarket, good range of highstreet facilities, pubs, restaurants, secondary school) is close and within reasonable walking distance, but connectivity for pedestrians, cyclists and vehicles is poor: access along Oldends Lane is restricted due to railway bridge (see points in "infrastructure, transport and accessibility", below) and most journeys would have to take a longer route via the busy A419 Bristol Road. ✓ Close to M5 junction 13, which may lead to long out- and in-commutes (between Stonehouse and Gloucester, Cheltenham, Bristol in particular) and encourage "dormitory" type of community 	 ✓ Development likely to be on a scale which would justify limited provision of on-site services and community facilities, as well as enabling some enhancements to those already available for the wider Whitminster community and catchment. ✓ No supermarkets or major food shopping areas within easy reach: all journeys for shopping (aside from minor convenience purchases) would be by car or public transport, either to Stroud supermarkets or (given location on A38), the Tesco in Quedgeley. ✓ Limited convenience shopping at the garden centre ✓ Many of the current village amenities and services are located on the eastern side of the A38 (i.e. separated from the village and potential development areas by a busy road). ✓ Close to M5 junction 13, which may lead to long out- and in-commutes (between Whitminster and Stroud, Gloucester, Cheltenham, Bristol in particular) and encourage "dormitory" type of community ✓ During the Local Plan Inquiry, the inspector considered Whitminster would not be a sustainable location for growth (re. omission site OS087)



OPTION 'B'	Cam	Eastington	West of Stonehouse	Whitminster			
Infrastructure, transport a	Infrastructure, transport and accessibility:						
	Dursley town centre (supermarket, good range of high-street facilities, pubs, secondary school) is close but beyond reasonable walking distance. Most journeys would have to be via car or public transport, placing additional traffic burden on the A4135. Good public transport (buses) to and from Cam and Dursley, and providing access to Stroud, Gloucester, etc.	Stonehouse town centre is too remote to be reasonably accessed on foot or by cycle (although links for pedestrians and cyclists via canal towpath are good, with potential to improve connectivity from the village centre). Most trips to Stonehouse, Stroud and beyond would be by car. Limited public transport (buses), but potential to improve and intensify, to	Stonehouse town centre is close and within reasonable walking distance, but connectivity for pedestrians, cyclists and vehicles is poor: access along Oldends Lane is restricted due to railway bridge. Most journeys would have to take a longer route via the busy A419 Bristol Road. Railway line presents a significant obstacle and there is limited scope for improving	Stonehouse town centre is too remote to be reasonably accessed on foot or by cycle (although links for pedestrians and cyclists via canal towpath could be upgraded, improving connectivity across the M5 corridor). Most trips to Stonehouse, Stroud and beyond would be by car. Limited public transport (buses), but			
	Potential for further improvements. Existing railway station in Cam	the benefit of the wider community. Good access to canal and towpath	connectivity/permeability between the site and the town.	potential to improve and intensify, to the benefit of the wider community.			
	(Gloucester-Bristol line), within walking distance, providing regular connections to local, regional and national destinations.	(with potential to improve/upgrade) – important amenity value and sustainable route for cycle commute across much of Stroud urban area.	Good public transport (buses) from Stonehouse town centre/B4008 and via A419, providing access to Stroud, Gloucester, etc. Potential for further improvements.	Existing railway station in Stonehouse (Gloucester-Swindon line), but too remote to be walkable. The railway stations at both Stonehouse and Cam are both			
	A4135 forms a single major route through Cam and Dursley, and this nears the limits of its capacity at peak times. Significant intensification of traffic on A4135 would cause	Existing railway station in Stonehouse (Gloucester-Swindon line), but too remote to be walkable. The railway stations at both Stonehouse and Cam are both within easy driving distance –	 ✓ Existing railway station in Stonehouse (Gloucester-Swindon line), although issues of walkability apply here too ✓ Land at former station on Bristol Road 	within easy driving distance – good for residents, but also likely to enable commuter/dormitory behaviour			
	congestion and require infrastructure upgrades, but development may be on sufficient scale to enable high street relief for Cam. M5 junction 14 at Falfield is not as 'on the doorstep' as Junction 13 is for Stonehouse/Eastington or Junction 12	good for residents, but also likely to enable commuter/dormitory behaviour Land at former station on Bristol Road (SHLAA site 183) presents opportunity for reinstating a station on the Gloucester-Bristol line, to the benefit of the wider District community	(SHLAA site 183) presents opportunity for reinstating a station on the Gloucester-Bristol line, to the benefit of the wider District community – but how feasible is this? Development would have to be high value and at a very high intensity to "enable" this. More likely to be a	Close to M5 junction 13: good for accessibility and mobility; but equally likely to enable commuter/dormitory behaviour. Trips to out-of-District employment/retail/leisure hubs are likely to be longer than they might be from alternative potential growth areas (e.g. from Hardwicke via			
	is for Hardwicke – potentially placing additional burden on cross-country routes (A38 and A4135, particularly). Proximity may nevertheless invite long out- and in-commutes (between Cam and Bristol/Gloucester in particular) and produce a "dormitory"	 but how feasible is this? Development would have to be high value and at a very high intensity to "enable" this. More likely to be a related but unconnected project, if it ever happened. Issues of walkablilty apply here too. 	related but unconnected project, if it ever happened. Significant intensification of traffic on A419 may require infrastructure upgrades (see also points about intensification of 'urban'	junction 13, where journeys to Gloucester or Cheltenham would be shorter or Cam via junction 14, where journeys south to Bristol would be more appealing). Good potential access to disused			
	type of community to some extent. Several options for site access points, providing some versatility in terms of development design, layout,	Significant intensification of traffic on A419 may require infrastructure upgrades Close to M5 junction 13: good for	character/"Gateway to Stroud", below) Close to M5 junction 13: good for accessibility and mobility; but equally likely to enable commuter/dormitory	canal and towpath (with potential to improve/upgrade and potential to contribute towards restoration) – important amenity value and			
	functionality, traffic flow etc. Potentially enables completion of Cam Valley Cycleway, connecting the southernmost extent of Dursley (Lister Petter) with Cam & Dursley Railway Station: important amenity value and sustainable route for cycle/train	Close to M5 junction 13: good for accessibility and mobility; but equally likely to enable commuter/dormitory behaviour. Trips to out-of-District employment/retail/leisure hubs are likely to be longer than they might be from alternative potential growth areas (e.g. from Hardwicke via junction 13,	behaviour. Trips to out-of-District employment/retail/leisure hubs are likely to be longer than they might be from alternative potential growth areas (e.g. from Hardwicke via junction 13, where journeys to Gloucester or Cheltenham would be shorter or Cam via junction 14, where journeys south	sustainable route for cycle commute to/from Stonehouse, Stroud and other nearby settlements.			



OPTION 'B'		Cam	Eastington	West of Stonehouse	Whitminster
		commute across much of Stroud district and beyond.	where journeys to Gloucester or Cheltenham would be shorter or Cam via junction 14, where journeys south to Bristol would be more appealing). Multiple options for site access points (to A38 via Claypits; to A419 via Spring Hill without having to pass through the village core): versatility in terms of development design, layout, functionality, traffic flow etc. A38/Claypits 'diversion' could be advantage over west of Stonehouse: particularly useful in easing any additional load on the A419.	to Bristol would be more appealing). ✓ Multiple options for site access points (A419; B4008; Oldends Lane): versatility in terms of development design, layout, functionality, traffic flow etc. ✓ Good access to canal and towpath (with potential to improve/upgrade) – important amenity value and sustainable route for cycle commute across much of Stroud urban area.	
Distance to Stro	oud	18.3 km	7.9 km	7.1 km	24.4 km
Distance to Glos	S	20.2 km	14.5 km	15.4 km	29.0 km
Distance to Bris	tol	39.9 km	44.8 km	46.4 km	37.3 km
(shortest distance by Nearest operation railway station		Cam & Dursley 1 km	Stonehouse 4 km	Stonehouse 2 km	Cam & Dursley 11 km
Nearest motorw junction	ay	M5 J13 8.3 km M5 J14 14.3 km	M5 J13 2.0 km	M5 J13 2.0 km	M5 J14 12.7 km M5 J13 18.8 km
Estimated CO ₂	Total	1,914 → reduced by 15% = 1,627 ⁴	1,446	1,388 → reduced by 15% = 1,180 ⁴	1,508
emissions (commuting	Per household	1.6	1.4	1.2	1.5
and local travel only) ³ (tonnes per year)		local travel are slightly higher, but compara	ngton are proportionally the same as for Optible with Stonehouse. Road transport emission gated by the proximity to Cam & Dursley railw	ns associated with development at Cam are	distinctly higher due to the greater distance

2

^{3 [}SOURCE: AMEC <u>Development Location Comparison and Carbon Footprinting Study</u> August 2011]. For each site, a total CO₂ emissions figure (tonnes per year) is estimated for commuting and local travel. These figures are for comparative purposes and are expected to be broadly indicative of the likely actual emissions. They do not include the contribution of commercial transport and travel significantly beyond the district. In order to understand the actual emissions associated with vehicle movements from each site, a detailed transport appraisal and modelling exercise would be required, which is beyond the scope of the study. However, this analysis does clearly demonstrate that some sites are likely to perform better than others.

Figure adjusted to take account of proximity to railway stations – the closer the better, particularly where the station is on a major line or has good connections as this will encourage less personal mileage in cars. Research carried out by Leeds University suggests mixed-use development around a transport node such as a station typically reduces emissions by 15% compared to a stand-alone development [SOURCE: AMEC report, paragraph 7.1.1].



OPTION 'B'	Cam	Eastington	West of Stonehouse	Whitminster
Environmental sensitivities	s: habitats, heritage, landscape,	character etc		
	A green field site. Large scale development could potentially make a conspicuous impact on the rural character of approaches to Cam from the north, quite an important role as a 'gateway' to Cam and Dursley: design, massing, layout and landscaping therefore highly sensitive. Lies within the escarpment footslopes quite close to AONB (though more distant than the West of Stonehouse location or some of the South of Gloucester alternatives). However, it lies on lower ground, sloping away from the Cotswold escarpment and below/behind the hamlet of Upthorpe. May be a conspicuous feature in long-range views to and from the Cotswold escarpment if not sensitively designed There are no environmental protection designations on the site Mostly Grade 3 agricultural land but some Grade 2, which would be lost if the site were developed.	 ✓ Less visually conspicuous than the west of Stonehouse location, and would not contribute in the same way to the sense of creeping urbanisation effected by development strung along the A419 corridor and the way that this acts as a 'gateway' to Stroud. ✓ Would be conspicuous from southbound M5 – northbound, to some extent screened by the northerly sloping topography, combined with the motorway cutting and embankments around the A419 junction 13 roundabout. ✓ More distant from AONB than west of Stonehouse is. Although development on this scale would inevitably have a major landscape impact, this location is less likely to be a conspicuous feature in long-range views to and from the Cotswold escarpment, and would not have the same "cumulative" impact of significant bulk being added to the visible urban mass around Stonehouse. ✓ The site would dwarf the village of Eastington, enclosing it to the north and west and changing the nature of the settlement. ✓ However, this location mostly abuts the north western edge of the village, which principally consists of modern development; the visual impact on the historic core and sensitive/ conspicuous 'hot spots' (such as Spring Hill and listed Alkerton Court) could potentially be limited through layout and design. ✓ Mostly Grade 3a and 3b agricultural land, which would be lost if the site were developed. ✓ Stroud Industrial Heritage Conservation Area (IHCA) abuts the site at its north eastern corner (Meadow Mill and Churchend. Likely to impact on the character and setting 	Increasing role of development strung along the A419 corridor as a conspicuous 'gateway' to Stroud, and feeding a sense of creeping urbanisation. Design, massing, layout and landscaping therefore highly sensitive. Closer to AONB than Eastington and likely to be a conspicuous feature in long-range views to and from the Cotswold escarpment. Dairy Crest is already a major landmark in this respect and this development would contribute a significant bulk to the visible urban mass around Stonehouse. High quality landscape, with much of the historic field pattern intact, ancient established hedgerows, remnants of ridge-and-furrow farming, old Perry pear trees, listed buildings, tracks, bridlepaths and footpaths, tree preservation orders. Local Plan Inspector noted the "overall character of the area which, in spite of being located between the edge of an extensive urban area and a motorway corridor, has survived remarkably unchanged" and advised that "the character of the localityhas a value which suggests to me that it would require a pressing need for development to be placed here to justify allocating the site". The site would envelope the rural hamlets of Nupend and Nastend, effectively drawing them into the urban mass of Stonehouse — even with generous landscape and layout 'buffers', development on this scale would be likely to harm the character of the settlements and compromise the setting of their listed buildings to some extent, despite the impact already felt from the industrial development at Oldends. Mostly Grade 3a and 3b agricultural	Highly conspicuous site, due to sloping topography. Whitminster village is perched on higher land, overlooking the Frome vale – at present the settlement is discreetly compact and does not have an overbearing impact on the largely empty landscape. Outside AONB and significantly more remote from it than either Stonehouse or Eastington. The site would envelop the village of Whitminster and radically change its character Stroud Industrial Heritage Conservation Area (IHCA) runs along the route of the former canal and covers Fromebridge and Wheatenhurst (which lie within sight to the north-west and the south-east and both contain landmark listed buildings). The impact on the setting of the conservation area could be profoundy affected and its rural, remote character at this point would be significantly compromised. Thought to be of low agricultural land quality with water retention issues.



OPTION 'B'	Cam	Eastington	West of Stonehouse	Whitminster
		of the conservation area, particularly long range views to/from Meadow Mill and the historic line of the Stroudwater canal. May be mitigated to some extent if development on floodrisk land is avoided. Key Wildlife site (local designation) covers almost 1/3 of the area, a large swathe of land along the northeastern edge of site 30, abutting the River Frome	land, which would be lost if the site were developed. Stroud Industrial Heritage Conservation Area (IHCA) runs south of the A419 but the impact on the setting of the conservation area could probably be adequately mitigated through landscaping and layout	
Topography and physica	I constraints (including flood risk)			
	 ✓ Good 'containment' to east (existing settlement/built form and A4135), but more ambiguous 'boundaries' to the rest of the site. Could be contained below 50m contour with reinforced landscaping but little by way of obvious natural or built features except field boundaries to provide limits to westward expansion. ✓ Some flood risk: a fairly well-constrained strip of Flood Zones 2, 3a and 3b bisects the area along the River Cam, between sites 139 and 150. ✓ Reasonably flat site, relatively easy to develop. ✓ Mainly greenfield: easy to develop with minimal contaminated land risk. 	 ✓ Good 'containment': M5/River Frome/and the existing village structure provide clear limits, beyond which growth and expansion would be illogical or difficult. ✓ But, once developed and once the village has grown, are the physical constraints too great to allow future expansion and sustainable long term growth? Would this end up being a 'dead end' settlement? ✓ Proximity to motorway 'bad neighbour': noisy for residents. ✓ Significant flood risk across almost 1/3 of the area: Flood Zones 2, 3a and 3b cover a large swathe of land along the north-eastern edge of site 30, abutting the River Frome. ✓ Reasonably flat site, relatively easy to develop. ✓ Greenfield: easy to develop with minimal contaminated land risk. ✓ Site 79 is designated Protected Outdoor Playspace in Local Plan. 	Good 'containment' to south (A419) and east (existing settlement/built form and railway line), but more ambiguous 'boundaries' to the west and particularly north, with little by way of obvious natural or built features to provide limits to northward expansion. Some flood risk: fairly isolated area of Flood Zones 2, 3a and 3b, which snakes across the western edge and passes between Nastend and the main road (A419). ✓ Reasonably flat site, relatively easy to develop. ✓ Greenfield: easy to develop with minimal contaminated land risk.	 Poor 'containment': very little by way of natural or built barriers, which would limit further growth or expansion Significant area of flood risk covering a large portion of site 24 ✓ Greenfield: easy to develop with minimal contaminated land risk.



Strategy Option D – the Stroud Valleys Strategy

Three 200 dwelling sites and the remaining 1400 to be found through a variety of smaller sites within the Stroud valleys (with a degree of focus upon canal corridor regeneration sites).

This strategy offers an opportunity to create a distinctive living and working environment, making the most of the Stroud Valleys' rich legacy of historic mills and industrial heritage. Regeneration-focussed development could help to draw more creative and knowledge-based industries to the area, building on our District's existing skills base and cultural and artistic assets.

Many sites with development potential are on "brownfield" (previously developed) land in the industrial valley bottoms; but this brings associated constraints, risks and costs due to factors such as flooding, previous contamination and the area's many listed buildings and conservation areas. Traffic congestion is also a key issue in what is already the most densely populated part of the District, while this strategy might place pressure on valuable green spaces and gaps. Meanwhile, it might not deliver significant service or infrastructure benefits for the rest of the District.

AMEC Carbon Footprinting study findings:

For Option D the situation is more complex due to the large number of individual sites. None of the sites is expected to be large enough or have a suitable mix of uses (load diversity) to be well suited to biomass CHP which limits the maximum emissions reductions at any site to around 50%. The smallest sites in this scenario will not generally be suited to a communal heating system of any kind (except when connected to a larger network) and it may be challenging to locate an energy centre at some sites where space is at a premium.

- * A medium-sized mixed-use development (of, say, 200 dwellings plus various employment uses) is likely to be able to support a district heating network, though is unlikely to be suited to biomass CHP which limits the maximum emissions reductions to around 40 45%.
- * A housing-only development of around 100 units may offer potential to install a heating network but biomass CHP is again unsuitable. Due to the higher heat use than a mixed-use development, potential emissions reductions are slightly higher at 45 50%; similar potential would exist for a small 50 unit residential development, though the smaller scale means a heating network may be slightly less well suited technically (due primarily to reduced load diversity).
- * Anything of a scale around 10-25 residential units is likely to be too small and with insufficient mix of uses to support a low carbon heating network, hence micro-generation technologies expected to be the only realistic option, with potential emissions reductions up to approximately 25%.
- * Some sites may be employment-only sites. In some cases, district heating networks may be feasible, though this will depend on the type of industry. It may be that only some units would be suitable, in which case emissions reductions potential will be low.

The above analysis is valid under the assumption that each individual site is developed independently, i.e. as entirely separate projects. However, depending on the exact location it may be possible to link sites together, e.g. provide a single district heating network supplying numerous smaller sites that on their own would not support such a scheme. Many of the sites identified in the SHLAA in the Brimscombe and Thrupp area are adjacent to each other and the majority are clustered around the River Frome. Further guidance regarding the potential to maximise such opportunities is given in the full report.



Strategy Option D was based upon focussing both housing and employment growth within the Stroud Valleys, with the intention of regenerating valley-bottom "brownfield" sites, providing a boost for Stroud (the District's principal town) and complimenting the ongoing restoration of the Cotswold Canals. The intention of Strategy Option D was to accommodate 2,000 homes plus employment development across a number of sites within the valleys – targeting previously developed land in valley-bottom and 'canal corridor' locations in particular. Through the Strategic Housing Land Availability Assessment (SHLAA), a large number of potential sites were identified – in theory providing ample capacity for such development. However, once policy matters and more detailed constraints are applied to particular sites, in many cases the theoretical capacity indicted in the SHLAA is considerably higher than the likely 'real life' capacity that might be achieved if development did happen there.

So, if there is not enough capacity for all 2000 homes plus employment development in the valley bottoms, is there an acceptable alternative?

- If Strategy Option D were to form the basis of our "Preferred Strategy", which locations would be the most appropriate growth areas? If necessary, could valley-bottom locations be supplemented by an urban extension on "Greenfield" land at the edge of the settlement? Might some of the employment growth be accommodated elsewhere, in order to free up more brownfield land for residential development or should we aim to retain and intensify employment uses within the Stroud Valleys as much as possible?
- If 2,000 homes could be accommodated within the Stroud Valleys, where should the residual number (1,200) be accommodated? ...South of Gloucester? At one of the 'Strategy Option B' locations? ... and if so, which combination of those locations would bring about the most balanced, sustainable and economically viable growth across the District as a whole?
- Could the Stroud Valleys provide a reduced level of growth instead? Perhaps between 700 1,500 homes, in combination with growth at one of the Option A locations or two of the Option B locations? ... and if so, which of those locations would bring about the most balanced, sustainable and economically viable growth across the District as a whole?

	PREFERRED LOCATIONS		ALTERNATIVE	
OPTION 'D'	Valley bottom: A419 / River Frome / Canal corridor (central):	Valley bottom: A419 / River Frome / canal corridor (Brimscombe & Thrupp):	Valley bottom:	Edge of settlement ("green fields"):
	1.1 Central Stroud / Wallbridge / Cheapside1.2 Lodgemore / Fromehall / Dudbridge	1.3 London Road, Thrupp 1.4 Brimscombe Port /Mills	1.5 Knapp Lane1.6 A419 / River Frome / canal corridor (west of Stroud)2.1 A46 / Nailsworth valley	3.1 North / east of Stroud 3.2 Rodborough
	Some of these sites may be better suited to remaining in employment use – ideally with a degree of intensification, to provide more jobs on existing sites. But most have some scope to accommodate at least some housing or alternative uses, as part of a strategic approach to the overall 'balance' of jobs and homes within the valleys. Both these locations could be strategically important growth areas, relatively close to the town centre. However, both locations consist of multiple sites in multiple ownerships –	1.3: London Road, Thrupp: Within this location, it may be most appropriate to focus on employment growth, rather than new housing. Retention of existing job numbers (or ideally a degree of intensification) on these sites could contribute to the overall balance of housing and employment growth in the valleys. 1.4: Brimscombe Port / Mills: Like 1.1 and 1.2, this location has the potential to be a strategically important growth area. It does consist of multiple sites in multiple ownerships —	1.5: Knapp Lane, Brimscombe: The sites off Knapp Lane have very significant access issues, the road being constrained by the railway bridge. Highways issues will largely dictate the types and intensity of use to which these sites could be put. 1.6: west of Stroud: Within this location, it may be most appropriate to focus on employment growth if anything, rather than new housing. Retention of existing job numbers (or ideally a degree of intensification) on these sites could	3.1: Sites to the north / east of Stroud: Taking account of likely policy and the other constraints that might affect each site, the potential housing capacity of these sites totals 760 at most. However, it is not proposed that they should all be developed to full capacity. Utilising one or two of the largest sites – Grange Fields (site 91) and/or Callowell Farm (site 148)? – might bring forward between 100 and 300, possibly as a supplement to the valley-bottom brownfield focus. 3.2: Sites at Rodborough: The potential housing capacity of the



OPTION 'D'	Valley bottom: A419 / River Frome / Canal corridor (central): representing a significant challenge in	Valley bottom: A419 / River Frome / canal corridor (Brimscombe & Thrupp): representing a significant challenge in	Valley bottom: contribute to the overall balance of	Edge of settlement ("green fields"): Rodborough sites totals 80 at most.
	terms of bringing about co-ordinated redevelopment. 1.1: central Stroud / Wallbridge / Cheapside: Could be capable of delivering something between 100-180 homes, offset by intensification of employment uses. 1.2: Lodgemore/Fromehall/Dudbridge: Could be capable of delivering something between 150-480 homes, offset by intensification of employment uses.	terms of bringing about co-ordinated redevelopment. Could be capable of delivering something in the region of 280-340 homes, offset by intensification of employment uses.	housing and employment growth in the valleys. 2.1: Nailsworth valley: Along the A46 at Woodchester and Nailsworth, few sites of significant scale have been identified. Although redevelopment of some of the individual sites might be acceptable, other locations are preferred as potentially more sustainable, appropriate and beneficial places to focus the Stroud Valleys' strategic growth.	However, there are significant practical obstacles (access in particular) at both sites 58 and 147. Should it be necessary to look for greenfield edge-of-settlement locations instead of / as a supplement to the valley-bottom brownfield focus, then it is considered that several of the sites to the north and east of Stroud present preferable, more viable alternatives.
Economic impacts, reger	neration, employment			
	 ✓ Location 1.1 (central Stroud/Wallbridg Stroud town centre: very important role integration with canal. Good opportuni ✓ Great potential to create a distinctive, environment: these locations lend ther development. This is already a densel design), it should be possible to development the inherent character of the conserva ✓ Opportunity to intensify uses on existing that generate higher numbers of jobs profession of the local workforce (high numbers of creative industries), and employment the development/residential neighbours. ✓ Mixed use development, which included land and property values: improving the maintaining and/or refurbishing run-dopremises ✓ Potential to work in tandem with Strate complimentary employment premises well suited to the constraints of tradition factories, logistics etc), and vice versa ✓ Employment element of this strategy in the properties. 	settlement (Stroud): potentially very y boost to town centre. eneration potential associated with the particularly tourism and leisure benefits. e/ Cheapside) is a crucial strategic area for e as potential "gateway", providing ty for comprehensive 'masterplan'. visually interesting, living and working mselves to lively, varied, mixed-use y built-up area and (subject to careful op at quite high densities, whilst maintaining tion area. Ing employment sites — encouraging uses per sqm., responding to the skills and needs of small businesses, self-employment, expes that are compatible with mixed-use eas an element of residential, can help boost be appeal and financial viability of ewn, vacant or under-used employment egy Option B, which could provide elsewhere — catering for uses that are not enal valley bottom sites (warehousing, and the provide elsewhere in employment growth and place elevelopment. Need to avoid displacing	Potential to work in tandem with Strategy Option B, which could provide complimentary employment premises elsewhere – catering for uses that are not well suited to the constraints of traditional valley bottom sites (warehousing, factories, logistics etc), and vice versa. These locations are more peripheral than the preferred locations along the more central stretches of the canal. Although there would be regeneration and economic benefits for Stroud, they would be less direct than those generated by development at the preferred locations.	Not a 'joined up' approach to a housing and employment strategy: none of these sites would be appropriate for mixed use development – essentially this would be 100% residential development (perhaps with some limited community uses on the largest sites). An alternative location would need to be found for employment growth. Might be an alternative way of focussing growth at Stroud: in combination with protecting and intensifying active use on existing employment sites (mostly brownfield land in the valley bottoms), housing growth could be accommodated at some of these sites.



OPT	ION 'D'	Valley bottom: A419 / River Frome / Canal corridor (central):	Valley bottom: A419 / River Frome / canal corridor (Brimscombe & Thrupp):	Valley bottom:	Edge of settlement ("green fields"):
		many listed buildings, are subject to ri	nich lie within a conservation area, include sks of flooding and contaminated land) are lopment costs than building on Greenfields.		
Clima	te change, renewab	oles, low carbon technologies:			
	For Strategy Option D the situation is complex, due to the large number of individual sites – this places it at a disadvantage in comparison to Strategies A or B. None of the sites is expected to be large enough or have a suitable mix of uses (load diversity) to be well suited to biomass CHP, which limits the maximum emissions reductions at any site type to around 50%. The smallest sites in this scenario will not generally be suited to a communal heating system of any kind (except when connected to a larger network) and it may be challenging to locate an energy centre at some sites where space is at a premium. The above analysis is valid under the assumption that each individual site is developed independently, i.e. as entirely separate projects. However, depending on the exact location it may be possible to link sites together, e.g. provide a single district heating network supplying numerous smaller sites that on their own would not support such a scheme. Many of the sites identified are adjacent to each other and the majority are clustered around the River Frome (hydro potential?). Good potential for micro generation schemes				
	NOTE:	SHLAA sites at Brimscombe and at Thrupp	s only carried out in respect of possible growtl b). However, findings are broadly relevant for one mployment development at Brimscombe & Thi s.	other potential sites and growth areas in the v	alley bottoms. The study was nominally
	Potential for district heating network	-	Mixed: Potential to link into existing buildings, extend network to town and likely high density are all positive points. But this "growth area" consists of a large number of small sites, which means that installing a large scale District Heat network would be challenging (noncontiguous sites, numerous developers, timescales etc)	-	-
District heating	Opportunity to use surplus heat from existing industry?	-	Unlikely	-	-
	Opportunity to use surplus heat from potential new industry?	-	Unknown	-	-
Distric	Specific constraints/ opportunities	-	Space for an energy centre may be limited on some of the sites (particularly for biomass boilers)	-	-



OPTION 'D'	Valley bottom: A419 / River Frome / Canal corridor (central):	Valley bottom: A419 / River Frome / canal corridor (Brimscombe & Thrupp):	Valley bottom:	Edge of settlement ("green fields"):		
Opportunities to tap into renewable energy resource	-	Small hydro schemes may be possible	-	-		
Site constraints	-	Limited space on numerous SHLAA sites may limit opportunities for on-site generation (such as biomass and ground source heat pumps)	-	-		
Potential to deplete existing resource	-	None identified	-	-		
Flood risk	-	Areas close to the River Frome on the valley bottom are at risk of flooding.	-	-		
Services, facilities and se	elf-containment:					
Infrastructure, transport a	With the possible exception of Brimscombe, none of these locations would generate sufficient volumes of development to warrant their own new 'local centres', and this is considered appropriate, given the proximity of these locations to the town centre and Stroud's amenities and facilities. However, it is likely that some facilities and services would be incorporated into larger mixed use schemes, to benefit the wider community as well as the new development itself – particularly at Wallbridge/Cheapside (1.1), Dudbridge (1.2) and Brimscombe (1.4). These locations have the potential to boost the local economy and enhance amenities for the whole community (the town and the wider District), particularly where improvements to connectivity between different parts of the town can be achieved (e.g. improving links between the town centre and canal). Focusing high quality growth on locations close to Stroud town could help to improve the 'self-containment' of the town and the District as a whole: improving the town's retail, leisure and employment offer, as well as meeting its housing needs, and thereby reducing the need/incentive to travel out of the District. Infrastructure, transport and accessibility: Infrastructure, transport and accessibility: Infrastructure, transport and accessibility: Infrastructure, transport and accessibility: Infrastructure, transport and accessibility: Infrastructure, transport and accessibility: Infrastructure, transport and accessibility: Infrastructure, transport and accessibility: Infrastructure, transport and accessibility: Infrastructure, transport and accessibility: Infrastructure, transport and accessibility: Infrastructure, transport and accessibility: Infrastructure, transport and accessibility: Infrastructure, transport and accessibility: Infrastructure, transport and accessibility: Infrastructure, transport and accessibility: Infrastructure, transport and accessibility: Infrastructure, transport and accessibility: Infrastructure, transport a					
	traffic through-routes and incorporating the railway station. Potential to enhance connectivity and improve access 1.2 is also a good sustainable location with similar potential to bring about enhancements to connectivity. But successful development will hinge upon resolving access through from Dudbridge to Fromehall.		the canal. The sites off Knapp Lane (1.5) have very significant access issues, the road being constrained by the railway bridge. Likely to dictate the types and intensity of use to which these sites could be put.	station etc. A good sustainable location. Most of the other sites are within walking distance of the town centre. Slad Road (B4070) already suffers congestion; additional development would add to the load		
Distance to Stroud		2.5 km				
Distance to Glos Distance to Bristol (shortest distance by road)	-	23.5 km 55 km	-	-		
Nearest operational railway station	-	Stroud 2.5 km	-	-		
Nearest motorway junction	-	M5 J13 11.7 km	-	-		



OPTION 'D'		Valley bottom: A419 / River Frome / Canal corridor (central):	Valley bottom: A419 / River Frome / canal corridor (Brimscombe & Thrupp):	Valley bottom:	Edge of settlement ("green fields"):
Estimated CO ₂	Total	-	1,200 → reduced by 15% = 1,020 ⁶	-	-
emissions (commuting	Per household	-	1.0	-	-
and local travel only) ⁵ (tonnes per year)		SHLAA sites at Brimscombe and at Thrupp). However, findings are broadly relevant for	h around Brimscombe (including the Port, Bri other potential sites and growth areas in the v rupp – so for comparison, these figures can b	ralley bottoms. The study was nominally
Environmenta	sensitivitie	es: habitats, heritage, landscape,	character etc		
		 ✓ 1.1 (central Stroud/Wallbridge/ Cheapside) is potentially a crucial "gateway" to Stroud town centre: very important role, providing integration with canal and a positive 'face' to the world. Good opportunity for comprehensive 'masterplan'. ✓ Industrial Heritage Conservation Area (IHCA): sensitive environment, requiring high design standards. (A Design Guide SPD already applies to this conservation area) ✓ Good opportunity for conservation and creative re-use of historic buildings (many listed buildings and features of industrial heritage). ✓ However, few of these sites are 'blank canvases'; the historic buildings and conservation area status will present significant development constraints and costs. ✓ This strategy might also place pressure on valuable green spaces and gaps (particularly along the canal), which contribute to the character and distinctiveness of the area (some protection through conservation area status). 	 ✓ 1.4 (Brimscombe) is potentially an important strategic location: very important role, providing integration with canal at the Port and adjacent sites. Good opportunity for comprehensive 'masterplan'. ☐ Industrial Heritage Conservation Area (IHCA): sensitive environment, requiring high design standards. (A Design Guide SPD already applies to this conservation area) ✓ Good opportunity for conservation and creative re-use of historic buildings (many listed buildings and features of industrial heritage). ✓ However, few of these sites are 'blank canvases'; the historic buildings and conservation area status will present significant development constraints and costs. ✓ This strategy might also place pressure on valuable green spaces and gaps (particularly along the canal), which contribute to the character and distinctiveness of the area (some protection through conservation area status). 	Industrial Heritage Conservation Area (IHCA): sensitive environment, requiring high design standards. (A Design Guide SPD already applies to this conservation area) ✓ Good opportunity for conservation and creative re-use of historic buildings (many listed buildings and features of industrial heritage). ✓ However, few of these sites are 'blank canvases'; the historic buildings and conservation area status will present significant development constraints and costs. ✓ This strategy might also place pressure on valuable green spaces and gaps (particularly along the canal), which contribute to the character and distinctiveness of the area (some protection through conservation area status). ✓ This is already a densely built-up area and (subject to careful design, respect for open spaces and key views etc), it should be possible to develop at quite high residential and/or mixed-use densities, whilst maintaining the inherent character of	 ✓ Sites 148 (Callowell), 10 and 227 (Slad Road), 68 and 149 (Bisley Old Road), 58 and 147 (Wallbridge/Rodborough) are all outside the AONB. But some abut the boundary and/or are visually conspicuous in the landscape. ✓ Sites 91(Grange Fields), 87 (land behind Farmhill), 327 (Folly Lane) and 98 (Wades Farm) all lie within the Cotswold AONB. In some cases, the impact might be minimised through sensitive design, massing and landscaping. ✓ Apart from sites 58 and 147 (Wallbridge/Rodborough) none of the sites are affected by wildlife designations ✓ None of the sites are affected by Conservation Area designations ✓ Potentially Grange Fields and/or Callowell could impact on character of approach to Stroud: urbanisation of one of the 'green fingers' that extend from the countryside into the town. However, topography means that the impact on key views might be mitigated through design,

[[]SOURCE: AMEC <u>Development Location Comparison and Carbon Footprinting Study</u> August 2011]. For each site, a total CO₂ emissions figure (tonnes per year) is estimated for commuting and local travel. These figures are for comparative purposes and are expected to be broadly indicative of the likely actual emissions. They do not include the contribution of commercial transport and travel significantly beyond the district. In order to understand the actual emissions associated with vehicle movements from each site, a detailed transport appraisal and modelling exercise would be required, which is beyond the scope of the study. However, this analysis does clearly demonstrate that some sites are likely to perform better than others.

Figure adjusted to take account of proximity to railway stations – the closer the better, particularly where the station is on a major line or has good connections as this will encourage less personal mileage in cars. Research carried out by Leeds University suggests mixed-use development around a transport node such as a station typically reduces emissions by 15% compared to a stand-alone development [SOURCE: AMEC report, paragraph 7.1.1].



OPTION 'D'	Valley bottom: A419 / River Frome / Canal corridor (central):	Valley bottom: A419 / River Frome / canal corridor (Brimscombe & Thrupp):	Valley bottom:	Edge of settlement ("green fields"):
	 ✓ This is already a densely built-up area and (subject to careful design, respect for open spaces and key views etc), it should be possible to develop at quite high residential and/or mixed-use densities, whilst maintaining the inherent character of the conservation area these 'scattered' locations may achieve better visual and physical integration of development than more conspicuous concentrated growth areas (i.e Strategy Option A or B locations). ✓ The valley bottom sites are outside the AONB (although in some cases, views to and from the AONB valley sides/hilltops could be impacted upon but this may be mitigated through sensitive design and massing). ✓ Some small key wildlife sites abut both potential locations; however, impact could be minimised through sensitive design, massing and landscaping. ✓ Potential to bolster the canal's role as a 'green corridor', through the design and landscaping of new development. 	 ✓ This is already a densely built-up area and (subject to careful design, respect for open spaces and key views etc), it should be possible to develop at quite high residential and/or mixed-use densities, whilst maintaining the inherent character of the conservation area these 'scattered' locations may achieve better visual and physical integration of development than more conspicuous concentrated growth areas (i.e Strategy Option A or B locations). ✓ The valley bottom sites are outside the AONB (although in some cases, views to and from the AONB valley sides/hilltops could be impacted upon but this may be mitigated through sensitive design and massing). ✓ Some small key wildlife sites abut both potential locations; however, impact could be minimised through sensitive design, massing and landscaping. ✓ Potential to bolster the canal's role as a 'green corridor', through the design and landscaping of new development. 	the conservation area these 'scattered' locations may achieve better visual and physical integration of development than more conspicuous concentrated growth areas (i.e Strategy Option A or B locations). The valley bottom sites are outside the AONB (although in some cases, views to and from the AONB valley sides/hilltops could be impacted upon but this may be mitigated through sensitive design and massing). A significant portion of the land at Ryeford/Stanley Mill (1.6) is a key wildlife site. Potential to bolster the canal's role as a 'green corridor', through the design and landscaping of new development.	massing and landscaping (restricting the developable extent of the sites) Sites in the Slad Valley are visually conspicuous and could profoundly affect the character of this approach to Stroud: another of the town's 'green fingers'. Less potential to mitigate impact here. These are "Greenfield" sites
Topography and physical	l constraints (including flood risk)		
	large swathe of land along the River F uses that can be developed (i.e. resid but there may be opportunities to add Brownfield sites: high risk of land com Many of these sites are physically cor sandwiched between river, canal, rail issue. These are not 'blank canvas' si and structures of historic interest (or v	tamination in many cases.	Similar issues of flood risk, land contamination and the topographical constraints that affect the preferred locations apply to many of these sites too. In addition, the sites off Knapp Lane (1.5) have very significant access issues, the road being constrained by the railway bridge. Likely to dictate the types and intensity of use to which these sites could be put.	 ✓ Apart from sites 10 and 227 on Slad Rd and 147 (Rodborough), all sites lie outside of floodplain. ✓ Greenfield sites: relatively easy to develop, with minimal contaminated land risk. ✓ Several of the sites are steeply sloping, adding to complexity and expense of development



Development on land south of Gloucester was not explicitly set out as an 'Option' in the Alternative Strategies consultation. At the time, Policy HMA3 of the draft RSS required Stroud District to find land just south of Gloucester on which 3,500 new dwellings could be accommodated (1,750 of these have already been provided for through planning permissions at Hunts Grove). It was therefore taken as an assumption that there *would* be development in this part of the District over the Core Strategy plan period and hence this was not an "option" as such.

However, with the proposed abolition of the RSS, this is no longer a given. The demise of the RSS effectively opens up debate about whether growth south of Gloucester is appropriate, desirable and should form part of our Preferred Strategy. If not, the residual number of dwellings would need to be relocated elsewhere in the District.

?

If 2,000 homes could be accommodated elsewhere in the District (through Strategy Option A, B, D or some hybrid of these), is the area south of Gloucester the most appropriate location to put all the remaining 1,200 homes that we need to provide for? If so, which combination of the four potential "growth areas" south of Gloucester would be most sustainable and most economically viable?



If not here, where should the residual 1,200 go?



Could one or more of these locations provide for a reduced level of growth instead? How would development of 500 or more units perform? And where would the most sustainable location be? Would this prohibit mixed-use development and therefore what how would this impact the District's future employment strategy?

	PREFERRED LOCATION		ALTERNATIVES	
SOUTH OF GLOS.	Hardwicke: Hunts Grove	Hardwicke village	Whaddon	Upton St Leonards
	 ✓ Essentially one large site in single ownership: a relatively straightforward prospect in terms of taking it forward for development ✓ This location has already been 'tested' through the Planning process: it was proposed in the former draft RSS, and (apart from Glos City) met with no significant opposition. □ Taken together with the existing Hunts Grove development (where 1,750 homes have already been permitted), a development of, say, 500-750 new homes would put total growth in this location on a par with Strategy Option A (concentrated growth, up to 2,500 homes) and could allow for some growth beyond the plan period. 	 ✓ Dominated by one site (site 133) in single ownership, which makes it a relatively straightforward prospect in terms of taking it forward for development (although site 133 is actually physically split over three adjacent locations) ✓ This is a very large area, potentially providing much more capacity than is needed at this stage. Even within the limits of the A38/Hardwicke village (Pound Lane/Church Lane/Green Lane)/the Gloucester-Sharpness Canal and the existing Hardwicke development, well over the "residual" number of 1,200 could be provided (theoretically, based on SHLAA estimations), with room to grow further. An allocation of this scale in the Central Severn Vale/Gloucester "fringe" would concentrate too many houses in this part of the District, at the expense of other towns elsewhere in the District 	Essentially one large site in single ownership: a relatively straightforward prospect in terms of taking it forward for development This is a very large area, potentially providing much more capacity than is needed at this stage (theoretically more than 4,000 homes, according to the SHLAA assessment). An allocation of this scale in the Central Severn Vale/Gloucester "fringe" would concentrate too many houses in this part of the District, at the expense of other towns elsewhere in the District. Development on a more modest scale of 500 – 750 homes (comparable with what might be possible at the preferred location adjacent to Hunts Grove) would be isolated and far less sustainable. This location has already been 'tested' through the Planning process: it was proposed in the former draft RSS, and met with a great deal of opposition	Growth area at Brockworth is one large site in single ownership: a relatively straightforward prospect in terms of taking it forward for development Growth area south of Upton St Leonards consists of multiple small sites, split into a number of ownerships



SOUTH OF GLOS.	Hardwicke: Hunts Grove	Hardwicke village	Whaddon	Upton St Leonards
		This location has already been 'tested' through the Planning process: Hardwicke Green (site 133) was a Local Plan Omission Site (OS064), which was dismissed by the Inspector in preference for Hunts Grove MU1 allocation, although he found it to have many similar qualities and issues. Sellars Farm (site 25) was also an Omission Site (OS125), which was dismissed by the Inspector as he found it would be in competition with other large housing developments in the vicinity and would create an imbalance of housing in the district (oversupply in the Central Severn Vale), when taken together with e.g. Hunts Grove. However, he found it to be "a natural and logical extension to Hardwicke, if additional land were required in the vicinity". A planning application for development at Sellars Farm was received in June 2011 and a decision is pending. Mayo's Land (site 35) was also dealt with at the Local Plan Inquiry, where the Inspector found no in-principle reason why housing development on the land would be unacceptable, but that it was unnecessary due to adequate supply being met by other sites in the locality.	A small part of the site at the far northern tip was also 'tested' at the Local Plan Inquiry. As omission site OS028, this land was rejected by the Inspector.	
Economic impacts, regen				
	Close to key employment land and the mixed use development at Hunts Grove, with good connectivity. Close to Gloucester city centre: commuter journeys and trips to out-of-District employment/leisure/retail hubs are likely to be shorter than they might be elsewhere (e.g. from Stonehouse or Eastington via junction 13, where journeys to Gloucester or Cheltenham would be longer and journeys south to Bristol more appealing) Gloucester City Council opposes	 ✓ Close to key employment land and the mixed use development at Hunts Grove, with good vehicular connectivity (but unfriendly pedestrian environment across A38 dual carriageway). ✓ Close to Gloucester city centre: commuter journeys and trips to out-of-District employment/leisure/retail hubs are likely to be shorter than they might be elsewhere (e.g. from Stonehouse or Eastington via junction 13, where journeys to Gloucester or Cheltenham would be longer and journeys south to 	Close to Gloucester city centre: commuter journeys and trips to out- of-District employment/leisure/retail hubs are likely to be shorter than they might be elsewhere (e.g. from Stonehouse or Eastington via junction 13, where journeys to Gloucester or Cheltenham would be longer and journeys south to Bristol more appealing) Gloucester City Council opposes further edge-of-city development to the south of the City, on the basis that it is a less sustainable location	Site 134 is adjacent to Gloucester Business Park, a major area of employment land at Brockworth (outside Stroud District), with good vehicular and pedestrian connectivity. Sites south of Upton St Leonards are more remote from Brockworth and with poorer connectivity. Close to Gloucester city centre: commuter journeys and trips to out- of-District employment/leisure/retail hubs are likely to be shorter than they might be elsewhere (e.g. from



SOUTH OF GLOS.	Hardwicke: Hunts Grove	Hardwicke village	Whaddon	Upton St Leonards
	further edge-of-city development to the south of the City, on the basis that it is a less sustainable location than more central locations and would inhibit city-centre regeneration.	Bristol more appealing) Gloucester City Council opposes further edge-of-city development to the south of the City, on the basis that it is a less sustainable location than more central locations and would inhibit city-centre regeneration.	than more central locations and would inhibit city-centre regeneration. Poor connectivity to other existing employment hubs Plenty of land available for employment uses – but is this the most appropriate location for major employment expansion? Concentrated growth here would have little positive impact on economic growth in the southern part of the District	Stonehouse or Eastington via junction 13, where journeys to Gloucester or Cheltenham would be longer and journeys south to Bristol more appealing) Gloucester City Council opposes further edge-of-city development to the south of the City, on the basis that it is a less sustainable location than more central locations and would inhibit city-centre regeneration. Poor connectivity to other existing employment hubs Is mixed use a viable proposition? The two locations do not have the scale to each support fully mixeduse developments and the land south of Upton St Leonards may be unsuited to many employment uses. Most likely that these developments would be strongly housing-led, with insufficient scale to justify/support significant on-site community facilities either. Unlikely to boost the District's employment provision
Climate change, renewab	les, low carbon technologies:			
	Proximity to Javelin Park (potential Gloucestershire County Council site for waste incineration): potential for converting energy from waste? Source for district heating? Opportunity for 'Macro' renewable energy schemes, backed up with	 ✓ More distant from Javelin Park (potential Gloucestershire County Council site for waste incineration) than the preferred Hunts Grove site: however, still some potential for linking in? Converting energy from waste? Source for district heating? ✓ Opportunity for 'Macro' renewable energy schemes, backed up with 'Micro' installations. Scale sufficient to justify a scheme to supply whole community (and potential 'overflow' to serve surrounding existing community?) 	Opportunity for 'Macro' renewable energy schemes, backed up with 'Micro' installations. Scale sufficient to justify a scheme to supply whole community (and potential 'overflow' to serve surrounding existing community?) However, no significant advantage over other sites of this scale: potential for renewable energy generation is similar to that available to any site of this sort of scale	Certainly potential for neighbourhood or individual 'Micro' installations, but no more advantage than any other sites of similar scale May be some opportunity for 'Macro' renewable energy schemes at site 134 (Brockworth), but the scale may be insufficient to justify a scheme to supply whole community or supply neighbouring areas. Difficult to integrate a comprehensive 'joined up' scheme on the smaller, multiple sites south of Upton St Leonards. At a disadvantage compared to other potential locations south of Gloucester and compared to sites of larger scale in terms of potential for renewable energy generation Brockworth: essentially flat land but



SOUT	TH OF GLOS.	Hardwicke: Hunts Grove	Hardwicke village	Whaddon	Upton St Leonards
					with a very slightly north-facing slope Upton St Leonards: north-east facing slope: poor orientation for passive solar gain
Work by AMEC on Carbon Footprinting was only carried out in respect of possible growth at Hunts Grove. Calculations were based upon total growth of 2 location: i.e. taking into account the 1,750 already permitted at Hunts Grove, as well as the potential 'extension' under discussion here. For the purposes of Footprinting study, it was estimated that the Hunts Grove extension could accommodate in the region of 750 homes (hence 1,750 + 750 = 2,500).		e. For the purposes of the Carbon			
	Potential for district heating network	Moderate – for new site(s) without existing detailed planning permissions, potential would be good. But virtually zero potential across the majority of the site (where planning permission is already in place and no network has been proposed).	-	-	-
	Opportunity to use surplus heat from existing industry?	No	-	-	-
District heating	Opportunity to use surplus heat from potential new industry?	Very good opportunity if Energy from Waste plant were to be built at nearby Javelin Park	-	-	-
Distric	Specific constraints/ opportunities	none	-	-	-
	unities to tap into ble energy	Possibility of accepting heat, should a strategic-scale Energy from Waste plant be developed at Javelin Park.	-	-	-
	nstraints	Site is partly developed already, and planning permission already exists across the majority of the site, so potential to exploit existing resource may be limited.	-	-	-
	al to deplete g resource	None identified	-	-	-
Flood r		Low risk.	-	-	-
Servic	Services, facilities and self-containment:				
		Bolt-on to Hunts Grove (existing MU1 allocation), so can benefit from facilities already planned/provided for. Also potential to enrich and supplement services and facilities, to serve what would be a larger and potentially more self-sustaining community. Other local service centres are	Bolt-on to Hardwicke estate – although main shopping, community and health facilities would remain beyond reasonable walking distance for most residents. Some potential to enrich and supplement services and facilities, to serve what would be a larger and potentially more self-sustaining community.	 ✓ Sufficient land to allow development on a scale large enough to warrant the provision of services and facilities that could make this a self-sustaining community. ✓ Other local service centres are within reach (Quedgeley, city centre), but connectivity is poor (particularly the barrier formed by the railway line) 	Site 134 would be a 'bolt-on' to the existing Brockworth development, while the other potential growth area would be a clear appendage to the village of Upton St Leonards. Neither location provides sufficient land to allow development on a scale large enough to warrant the provision of services and facilities that could make this a self-sustaining



SOUTH OF GLOS.	Hardwicke: Hunts Grove	Hardwicke village	Whaddon	Upton St Leonards
	within reach (Quedgeley, city centre) (although not walkable)	✓ Other local service centres are within reach (Quedgeley, Hunts Grove, city centre) (although not reasonably walkable) ✓ Primary school immediately adjacent		community. Upton St Leonards has only very limited, basic facilities (primary school, recreation ground, pub etc) – appropriate to the small scale of the village
				Other local service centres are within reach (Matson, Abbeymead, Abbeydale, Hucclecote, city centre – all outside the District), but connectivity is relatively poor and not really within walking distance
				Unlikley to boost the self- containment of either Upton St Leonards or Brockworth
Infrastructure, transport a	and accessibility:			
	Good road links to city centre and southwards (A38, B4008)	Good road links to city centre and southwards (A38, B4008)	Poor connectivity, despite proximity to city centre, railway line, M5 etc.	Major roads (A436, A46, B4073 particularly) are nearby but
	Locals fear intensification of traffic on A38 and roads in and around Quedgeley and Hardwicke	Locals fear intensification of traffic on A38 and roads in and around Quedgeley and Hardwicke	Access (primarily via A4173) would be circuitous.	connectivity from both locations is poor. Access to and from the Brockworth site would be circuitous, while all journeys for new residents
	Close to M5 junction 12: good for accessibility and mobility; but equally likely to enable commuter/dormitory behaviour. However, due to proximity of Gloucester city, commuter journeys and trips to out-of-District employment/leisure/retail hubs are likely to be shorter than they might be elsewhere (e.g. from Stonehouse or Eastington via junction 13, where journeys to Gloucester or Cheltenham would be longer and journeys south to Bristol more appealing). Section 106 agreement on existing Hunts Grove permission identifies land that will be reserved for 12 years for a potential railway station – but how feasible is this project?	Close to M5 junction 12: good for accessibility and mobility; but equally likely to enable commuter/dormitory behaviour. However, due to proximity of Gloucester city, commuter journeys and trips to out-of-District employment/leisure/retail hubs are likely to be shorter than they might be elsewhere (e.g. from Stonehouse or Eastington via junction 13, where journeys to Gloucester or Cheltenham would be longer and journeys south to Bristol more appealing). ✓ Section 106 agreement on neighbouring Hunts Grove development identifies land that will be reserved for 12 years for a potential railway station (Nass Lane) – but clearly more remote and less convenient for pedestrians than the preferred Hunte Grove site. And how		of any development on land south of Upton St Leonards would involve traffic passing through the village (except trips southwards, up the steep escarpment, to the A46)
	Section 106 agreement on existing Hunts Grove permission to improve connectivity with National Cycle Route on nearby Gloucester-Sharpness Canal.	preferred Hunts Grove site. And how feasible is this project? ✓ Potential to improve connectivity with National Cycle Route on nearby Gloucester-Sharpness Canal, and		



SOUTH OF	GLOS.	Hardwicke: Hunts Grove	Hardwicke village	Whaddon	Upton St Leonards
			enhance links to/from Hunts Grove. Criss-crossed by well used footpaths, which could be incorporated into the development layout to retain and enhance pedestrian linkages and permeability		
Distance to Stro	ud	12.5 km	12.5 km	11.5 km	11.4 km
Distance to Glos	5	8 km	8 km	6.7 km	6.6 km
Distance to Bris		50 km	50 km	54 km	58.2 km
Nearest operation railway station		Stroud 12.5 km	Stroud 12.5 km	Gloucester 5.4 km-	Gloucester 5.4 km
Nearest motorw junction	ay	M5 J12 1.5 km	M5 J12 1.5 km	M5 J12 7.2 km	M5 J12 11.3 km M5 J13 5.6 km
Estimated CO ₂	Total	2,586	1,200 → reduced by 15% = 1,020 ⁸	-	-
emissions (commuting and local	Per household	1.03	1.0	-	-
travel only) ⁷ (tonnes per year)		location: i.e. taking into account the 1,750 a	s only carried out in respect of possible growt already permitted at Hunts Grove, <i>as well as</i> t e Hunts Grove extension could accommodate	he potential 'extension' under discussion here	. For the purposes of the Carbon
Environmental	sensitiviti	es: habitats, heritage, landscape,	character etc		
		Increasing role of Hunts Grove as a conspicuous 'gateway' to Gloucester and feeding a sense of creeping urbanisation (despite the actual physical constraints/containment of this particular site). Design, massing, layout and landscaping therefore highly sensitive. More visually remote from AONB and other sensitive landscape features (e.g. Robinswood Hill) than	 ✓ More visually remote from AONB and other sensitive landscape features (e.g. Robinswood Hill) than sites in alternative Areas of Search 2 and 3 (Brookthorpe/Whaddon and Upton St Leonards). ✓ Site 133 (Hardwicke Green) would envelope neighbouring Hardwicke village, drawing the village into the city fringe – likely to harm the character of the settlement and compromise the 	 ✓ Degraded landscape; agriculturally improved. Few hedgerows, poor quality habitats and not rich in biodiversity. ✓ Outside AONB ✓ Nevertheless, the land plays an important role as part of the green edge of Gloucester and forms a setting for Robinswood Hill (which itself acts as an important visual and physical constraint to the city). Would 	Likely to have significant impact on AONB and views to and from the Cotswold escarpment: both locations abut the AONB boundary, while half the sites proposed at Upton St Leonards actually lie within the designated area – and these sites are on rising ground, which would be quite conspicuous from the village and B4073. M5 currently forms a good natural

^{7 [}SOURCE: AMEC <u>Development Location Comparison and Carbon Footprinting Study</u> August 2011]. For each site, a total CO₂ emissions figure (tonnes per year) is estimated for commuting and local travel. These figures are for comparative purposes and are expected to be broadly indicative of the likely actual emissions. They do not include the contribution of commercial transport and travel significantly beyond the district. In order to understand the actual emissions associated with vehicle movements from each site, a detailed transport appraisal and modelling exercise would be required, which is beyond the scope of the study. However, this analysis does clearly demonstrate that some sites are likely to perform better than others.

Figure adjusted to take account of proximity to railway stations – the closer the better, particularly where the station is on a major line or has good connections as this will encourage less personal mileage in cars. Research carried out by Leeds University suggests mixed-use development around a transport node such as a station typically reduces emissions by 15% compared to a stand-alone development [SOURCE: AMEC report, paragraph 7.1.1].



SOUTH OF GLOS.	Hardwicke: Hunts Grove	Hardwicke village	Whaddon	Upton St Leonards
	sites in alternative Areas of Search 2 and 3 (Brookthorpe/Whaddon and Upton St Leonards). Physically and visually distinct from neighbouring Hardwicke village – preserves character and historic interest of the settlement and the setting of its listed buildings Good quality and versatile agricultural land, which would be lost if the site were developed (as compared to Hardwicke Green, where none such exists).	setting of its listed buildings to some extent. Local Plan Inspector advised that mitigation through landscaping and layout may be possible, but "it is better to leave well alone". ✓ Local Plan Inspector found Hardwicke Green to have advantage over Hunts Grove in terms of agricultural land quality: Hunts Grove consists of good quality and versatile agricultural land, which would be lost to development, while Hardwicke Green has none such. ✓ Criss-crossed by well used footpaths, which allow appreciation of the character and landscape setting of Hardwicke village and its environs – a pleasant and characterful amenity and piece of green infrastructure for existing surrounding communities	impact on setting of AONB and views to and from the Cotswold escarpment — limited scope to mitigate this through landscaping and design/layout Would harm the setting, character and rural nature of Whaddon, enveloping much of the settlement and drawing it into the city fringe	boundary to Gloucester's expansion here: there is a clear point of distinction between urban and rural, which would become blurred by significant growth south and west of Upton St Leonards
Topography and physica	l constraints (including flood risk)		
	Good 'containment': A38/B4008/M5 and the existing Hunts Grove development provide clear limits, beyond which growth and expansion would be illogical or difficult. Minimal flood risk: small area of Flood Zone 3a at western extremity Good flat site Greenfield: easy to develop with minimal contaminated land risk.	Fairly good 'containment': A38/Hardwicke village (Pound Lane/Church Lane/Green Lane)/the Gloucester-Sharpness Canal and the existing Hardwicke development do all provide quite clear limits, beyond which growth and expansion would be illogical. However, even within these limits this is a very large area, potentially providing much more room for growth than is needed at this stage. Some flood risk: Flood Zone 3a and 3b running east-west across a significant portion of the site (Local Plan Inspector's report noted drainage may be an issue and that relying on pumping would not be a very sustainable solution. Good flat site High pressure gas and oil pipelines running across site: not insuperable, but a significant additional development cost. Minimal contaminated land risk.	Not very strong 'containment': A4173 /railway line/M5 provide clear limits, beyond which growth and expansion would be illogical or difficult. However, within these limits there is still a lot of 'room to grow' over a much larger area, with few defensible barriers south of the site until reaching the motorway. Site bisected by an area at flood risk: Flood Zone 3a and 3b running north- south across the site. ✓ A good flat site ✓ Greenfield: easy to develop with minimal contaminated land risk.	Neither location has very strong site 'containment': while the M5 currently forms a good natural boundary to Gloucester's expansion here, the clear distinction between urban and rural would become blurred by significant growth south and west of Upton St Leonards and there is little to act as a 'limit' beyond that, aside from the rapidly rising ground of the escarpment. Greenfield: easy to develop with minimal contaminated land risk.



Part 4 – Recommendations

Towards a "preferred strategy"...

The locations described in Part 2 and Part 3 are all capable of providing development in accordance with Strategy Options A, B, D or some 'hybrid' of those strategies. Taking account of the various strengths, weaknesses and opportunities associated with particular locations, the following four locations are recommended:

Recommendation:

That the focus of development to satisfy the agreed housing numbers (3,200 homes, up to 2026) should be distributed between some or all of the following locations

- i) Stroud Valleys (various sites) 600 -1,000 homes
- ii) North East of Cam 750 1,250 homes
- iii) West of Stonehouse 1000-1,500 homes
- iv) Hunts Grove extension 500 750 homes

Employment growth should also be broadly targeted at these areas, with an overall aspiration for growth that is equivalent to the creation of two new jobs for every new home built.

In addition, to ensure that the District is able to meet the emerging future needs of its communities (and in the spirit of the Government's Localism Bill), it is recommended that part of the Strategy should allow a flexible approach to housing over and above the agreed housing numbers: development sites outside the locations listed above should be supported *if they come forward as part of a formally adopted Neighbourhood Plan* and are consistent with both national and Local Plan policies.

Further details about these recommendations and the evidence behind them can be found in the Cabinet Report for November 2011.

The distribution of development across sites at these locations shall be subject to further consultation, leading to the Preferred Strategy. There is considerable flexibility in terms of exactly how and where the overall levels of housing and employment growth are delivered within these four "preferred" locations:

Hunts Grove: 500 – 750 homes

It is unlikely that development here would bring forward significant levels of employment growth. But this location is close to Gloucester and several major employment 'hubs', and would be integrated with the wider mixed-use Hunts Grove development (already permitted).

Up to 750 could be accommodated at the preferred location (site 322), as an extension to the mixed-use Hunts Grove development

Stroud Valleys: 600 – 1,000 homes; and a target of 1,200 – 2,000(+) new jobs generated

The Stroud Valleys are considered an appropriate focus for employment growth. As well as housing, redevelopment of valley-bottom sites could facilitate the intensification of employment uses on under-used or vacant sites; the town centre economy could also be boosted and employment growth might also be possible at peripheral locations, such as Aston Down (potentially to compensate for any employment losses from redeveloped valley-bottom sites, should they occur).



500 – 1,000	could be accommodated on a range of brownfield sites within the preferred valley-bottom locations. Though 1,000 is theoretically possible, the actual achievable number will be dependent on the viability and availability of each individual site.
	To achieve the highest possible housing numbers in the valleys might involve developing some of the alternative locations as well:
100 – 300	could be accommodated on one or two large greenfield sites on the edge of Stroud
Up to 50	might be accommodated on alternative valley-bottom sites along the Nailsworth Valley
Up to 100	might be accommodated on alternative valley-bottom sites to the west of Stroud (Ryeford), although this may be a location better suited to employment growth.

Aston Down: Intensification of employment offer

At the request of Members on the Planning Strategy Advisory Panel, consideration has been given to the potential for intensification of employment uses at Aston Down, following the Appeal outcome in which a number of employment uses were found acceptable by the Inspector. The site owners have provided a concept plan to indicate how further employment premises could be accommodated within the 'main site'. A number of Members have requested that this should form the basis for further public engagement and consideration of whether there is a case for limited associated residential development.

The residual number of homes could be concentrated in a single location (as per Strategy Option A), or it could be split across two locations (as per Strategy Option B). This Discussion Paper has acted upon Cabinet's mandate to further consider Alternative Strategies A, B and D. However, it should be noted that the option of locating all growth in one location (Strategy Option A) is no longer supported: it is considered that a 'hybrid' approach presents the most sustainable option for meeting development needs across the district. Hence it is recommended that residual growth should be split across two locations, as follows:

North East of Cam: 750 – 1,250 homes; and a target of 1,500 – 2,500 new jobs generated

This location could accommodate a significant mixed-use development, which would integrate with the existing settlement, benefiting from local services and providing additional facilities for the wider community. This could become a major employment hub for the Cam & Dursley locality, and the wider District. To maximise potential sustainability and viability (e.g. provision of services, infrastructure, new primary school etc), it is recommended that 750 homes should be the lowest threshold for development here.

750 – 1,250 could be accommodated on some, all or parts of the sites at the preferred location, to the north east of Cam.

West of Stonehouse: 1,000 – 1,500 homes; and a target of 2,000 – 3,000 new jobs generated

This location could accommodate a mixed use development by wrapping around the current northern limits of the Oldends Lane / Stroudwater industrial areas. Given that ease of access to Stonehouse town centre from this site is compromised by the railway line, a higher threshold of development is considered necessary here, to help ensure the provision of an on-site local centre for the new community.

1,000 – 1,500 could be accommodated at the preferred location (site 23).

The Planning Strategy Team Development Services Stroud District Council Ebley Mill Stroud Gloucestershire GL5 4UB

01453 766321 core@stroud.gov.uk

visit www.stroud.gov.uk/core