CONTENTS

EXECUTIVE SUMMARY .........................................................................................................................3
1. INTRODUCTION ..........................................................................................................................5
2. PROPERTY MARKET OVERVIEW .............................................................................................8
3. ECONOMIC FORECASTING .........................................................................................................29
4. FUTURE ADDITIONAL EMPLOYMENT LAND & PREMISES REQUIREMENTS .......37
5. DEMAND IMPLICATIONS & ANALYSIS OF BUSINESS SURVEY ..................................47
6. SUMMARY & RECOMMENDATIONS .........................................................................................51
EXECUTIVE SUMMARY

The following report provides an overview of the key employment demand implications arising from the economic modelling, property market review and business survey exercises undertaken.

Overview: In general terms, the South Gloucestershire property market has experienced strong growth and is based on a broad mix of business sectors. Whilst the current short term picture is one of economic downturn, areas such as the North Fringe have attracted continued demand for office accommodation with increasing pressures reported on industrial land for office occupiers. Severnside is still experiencing demand for distribution uses and now also to an extent, manufacturing which potentially has impacts on traditional manufacturing areas such as Filton. The S Park development now being brought forward is a key development for Emersons Green although demand for space in the short term at least is to be tested. The remaining areas of Kingswood, Yate and the Rural Areas are likely to experience demand from more local businesses looking for more affordable and often smaller units or sites.

Property Market & Business Survey: In terms of the business survey results, the key findings indicate a requirement for cheap rents and good security, particularly within the Emersons Green and Severnside areas. On-site parking is also a key consideration for businesses, and is particularly important within the North Fringe and Emersons Green. One further key finding was the business profile of the respondents suggesting a low average length of presence for occupiers, however there was a general picture that relocation was not a likely future option and if it was it would be within the District or at least the wider Bristol area.

Economic Modelling: The forecasting exercise has indicated an employment growth total of 19% between 2006 – 2026 (using standard 2.8% base case growth) within South Gloucestershire. The major growth sectors are expected to be Other Business Services (62% growth), Distribution (33%) and Education and Health (29%). In terms of land requirements the forecast employment growth has been translated into floorspace demand by using standard employment densities. In summary the employment floorspace within South Gloucestershire is expected to increase by 215,668 sq.m. (2006 – 2026) with significant growth in office floorspace demand (267,949 sq m), slight growth in Warehouse (77,531 sq m) and decline in other business space (-129,812 sq m).

Summary: Once windfall and churn are taken into account, we project the following floor space and land requirements for employment uses in South Gloucestershire:
<table>
<thead>
<tr>
<th></th>
<th>Low Growth Scenario (2.5% growth)</th>
<th>Base Case Scenario (2.8% growth)</th>
<th>High Growth Scenario (3.2% growth)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Office (B)</td>
<td>265,442 (-1,688 growth on base case scenario)</td>
<td>287,108</td>
<td>297,108 (+6 growth on base case scenario)</td>
</tr>
<tr>
<td>Other business space (B)</td>
<td>-75,343 (-617 growth on base case scenario)</td>
<td>-74,723</td>
<td>-32,707 (+42,016 growth on base case scenario)</td>
</tr>
<tr>
<td>Warehousing (G)</td>
<td>99,232 (-515 growth on base case scenario)</td>
<td>96,747</td>
<td>115,192 (-18,445 growth on base case scenario)</td>
</tr>
<tr>
<td>Total</td>
<td>347,847 (-2,708 growth on base case scenario)</td>
<td>336,865</td>
<td>379,476 (-58,867 growth on base case scenario)</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th></th>
<th>Low Growth Scenario (2.5% growth)</th>
<th>Base Case Scenario (2.8% growth)</th>
<th>High Growth Scenario (3.2% growth)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Office (B)</td>
<td>36.6 (-0.2 ha on base case scenario)</td>
<td>37</td>
<td>37 (+0 growth based on base case scenario)</td>
</tr>
<tr>
<td>Industrial</td>
<td>5.7 (-0.2 ha on base case scenario)</td>
<td>8</td>
<td>10.8 (-4.8 ha on base case scenario)</td>
</tr>
<tr>
<td>Total</td>
<td>42.5 (-0.5 ha on base case scenario)</td>
<td>45</td>
<td>57.6</td>
</tr>
</tbody>
</table>
1. INTRODUCTION

Context

1.1 GVA Grimley Ltd has been appointed by South Gloucestershire Council to assist in the preparation of an employment land review (ELR), which will form part of the Council’s evidence base for the Local Development Framework Core Strategy. The ELR is being carried out in three stages in accordance with the guidance set out by the Department for Communities and Local Government (DCLG) in their note, “Employment Land Reviews”.

1.2 The Brief issued by South Gloucestershire Council identified a number of key tasks which would be undertaken by GVA Grimley Ltd in conjunction with the Council who would undertake the remaining elements of the ELR ‘in house’. GVA’s input would be focused on elements of Stage 1 and Stage 2.

Supply Side Findings

1.3 This report deals with elements of Stage 2 and looks at the demand for employment land. A stand alone document considering the supply of employment has also been prepared.

Methodology

1.4 Stage 2 of the ELR is made up of the following elements which will be undertaken by the Council or GVA Grimley Ltd. The full methodology for undertaking Stages 1 and 3 is provided within section 2 of the Supply Side Report.

<table>
<thead>
<tr>
<th>EMPLOYMENT LAND REVIEW STAGE 2 DEMAND SIDE REPORT</th>
</tr>
</thead>
<tbody>
<tr>
<td>Stage</td>
</tr>
<tr>
<td>-------</td>
</tr>
<tr>
<td>2.1</td>
</tr>
<tr>
<td>2.2</td>
</tr>
<tr>
<td>2.3</td>
</tr>
<tr>
<td>2.4</td>
</tr>
<tr>
<td>2.5</td>
</tr>
</tbody>
</table>
### 2.6 Assessment by market segment and policy area of the future demand for sites and premises from business sector expansion and employment growth in S. Glous.

### 2.7 Assessment by market segment and policy area of the future demand for sites and premises from businesses currently located outside of S. Glous.

### 2.8 Production of Business Survey comprising a sample postal survey of businesses on industrial estates and business parks in South Gloucestershire to ascertain future land and premises requirements.

### 2.9 Analysis of Business Survey results broken down by market segment and policy area.

### 2.10 Research into factors influencing future employment land and premises requirements / demand (by market segment) supported by consultation with key property market specialists – considering factors such as changing locational requirements in each market segment, sector growth patterns, relocation pressures, strategic planning and transport policies etc.

### 2.11 Production of a detailed report on future additional land and premises requirements in South Gloucestershire broken down by market segment and policy area using the evidence collected by tasks undertaken by GVA and the Council during Stage 2 of the Employment Land Review.

### Structure of Report

1.5 The rest of this report is therefore structured as follows:

- **Chapter 2** provides an overview of the South Gloucestershire commercial property market which is informed by discussions with property agents.

- **Chapter 3** looks to establish future gross employment floorspace requirements in South Gloucestershire through economic forecasting and sets out the methodology used.

- **Chapter 4** provides an overview of future additional employment land and premises based on the forecasting.
- **Chapter 5** provides an analysis of the business survey commissioned as part of this ELR and provides a report on future additional land and premises requirements by market segment and policy area using evidence above.

- **Chapter 6** seeks to provide a summary and series of preliminary recommendations for taking forward into Stage 3 of the ELR process.
2. PROPERTY MARKET OVERVIEW

2.1 This section of the report provides a summary of the market position from a national perspective, generally for South Gloucestershire and the South West, and then in more detail for the specific market areas identified earlier in this report. It has been written on the basis of information provided by the GVA Research team based in London, GVA local office and industrial agents and with reference to conversations and correspondence with other local agents operating in the South Gloucestershire area. We would emphasise that whilst this is a long term assessment to 2026, as noted below (paragraph 2.5) prospects maybe influenced by the current recession and projected rate of recovery.

NATIONAL MARKET OVERVIEW

2.2 In reviewing the South Gloucestershire property market we should consider the national market context. The GVA Research Team produces a UK Commercial Property Market Update which provides an overview of:

- UK Economic Outlook.
- Recent occupier market outlook.
- Recent investment market performance.

2.3 The main headlines within the February 2009 update find:

- Forecasts for economic growth continue to be revised downwards and expectations for rental growth reduced accordingly.
- In terms of total returns from property (i.e. rental and capital) negative returns are expected for 2009 but there is some considerable downside risk. Positive returns are however expected in 2010 moving to double figures by 2011.
- In terms of economic outlook, the forecasts for 2009 weaken on a month by month basis with a figure of -2.8% output growth now expected (0% in October). Bank of England and CBI now envisage contraction in 2009 of at least 3% which will make this recession noticeably worse than the last one in the early 90s.
However, the recent Government and Bank of England initiatives may start to have benefits by the second half of 2009 with a weak upturn in growth expected from 2010 strengthening from 2011.

Capital values fell by a record 4.3% during October 2008 and the investment market is seeing a double dip downturn.

Average rental values have been falling for more than six months, and are forecast to fall across all sectors for the next three years.

The average All Property equivalent yield was 8.7% at the end of January 2009 however this was the smallest monthly increase since September 2008. The IPD Monthly index suggests capital values as at the end of January 2009 had fallen by 38% since the peak of the market in mid-2007.

2009 is expected to be the third consecutive year of negative total returns for UK commercial property. We forecast an All Property total return this year of around -8.9%, rising to 5.6% in 2010 and 10.3% in 2011.

2.4 In terms of outlook in the market GVA Research indicates that there will continue to be falls in capital growth in 2009 and 2010, but not as great as in 2008. In October 2008 transaction levels had tumbled by almost two thirds with UK institutions being the largest sellers and overseas buyers being the largest net investors.

2.5 The overall headlines set out above provide the current market context, however, it has been extremely volatile in the last 2 months since, and there remains a high degree of downside risk to the forecasts. We must note, however, that this Study is long term and predicting long term future market conditions can never be accurate. GVA’s Economic Outlook information provides a limited steer in the short to medium term with an “all property forecasts” summary noted in table 1 below.

2.6 In summary, the table illustrates that the current market conditions indicate a marked decline in rental and capital growth and subsequently total return through to the end of 2009. However, the longer term forecast into 2010 is one of weak growth followed by steady growth which would reflect to a more limited extent the position after the early 1990s recession. Therefore, for the purposes of undertaking this employment land review which is medium term in nature, the current market forecasts indicate that a context of weaker property return growth should be assumed, but this context should be kept under review given the unprecedented wider market volatility at present. 2009/10 will be difficult years with similar conditions expected to be worse those of the recession in the early 1990’s.
### Table 1 – All-Property Forecasts Summary (%)

<table>
<thead>
<tr>
<th>Year</th>
<th>Rental Growth</th>
<th>Capital Growth</th>
<th>Total Return</th>
</tr>
</thead>
<tbody>
<tr>
<td>2008</td>
<td>-2.1%</td>
<td>-27.7%</td>
<td>-23.5%</td>
</tr>
<tr>
<td>2009</td>
<td>-9.6%</td>
<td>-15.0%</td>
<td>-8.9%</td>
</tr>
<tr>
<td>2010</td>
<td>-7.2%</td>
<td>-1.8%</td>
<td>5.6%</td>
</tr>
<tr>
<td>2011</td>
<td>-3.0%</td>
<td>2.9%</td>
<td>10.3%</td>
</tr>
<tr>
<td>2012</td>
<td>0.1%</td>
<td>3.3%</td>
<td>10.4%</td>
</tr>
<tr>
<td>2013</td>
<td>1.8%</td>
<td>3.2%</td>
<td>10.1%</td>
</tr>
</tbody>
</table>

*Source: Real Estate Forecasting, GVA Grimley, Experian (March 2009)*

### OVERVIEW OF SOUTH GLOUCESTERSHIRE MARKET

#### 2.7

The South Gloucestershire Property Market comprises of a diverse set of market areas. Each of these is discussed in more detail later in this chapter but in summary, there are six distinct areas.

(i) **The North Fringe** comprises the area within the motorway triangle created by the M5 and M4 motorways at the north end of Bristol urban area. The area provides a significant employment base for greater Bristol and includes major business parks such as Aztec West and Bristol Business Park. The area is therefore dominated by existing major occupiers such as Airbus, BAE Systems and its Filton Airfield, the University of West of England, MOD, AXA, Rolls Royce, Orange, Hewlett Packard, Royal Mail etc, with major strategic sites available as well as expansion land for existing occupiers.

(ii) **Emersons Green** includes the science park designation east of the A4174 and west of the M4, based on existing and extended employment allocations and an emerging Harlequin Office Park (formerly Viceroy Gate). The area’s residential population is growing rapidly and with strategic sites still to be delivered will provide a significant workforce for future employment developments.

(iii) **Kingswood** is a well established existing urban area to the east of the M32 motorway on the north and east edge of Bristol. The Kingswood area provides for a large number of mainly smaller sites primarily general industrial and light industrial. A significant number of these sites are in a poor state of repair and under increasing pressure for re-development to other uses, although some of these older sites do add to company choice and provide relatively affordable business premises which can be essential for new starts. However, there are
areas such as Longwell Green which are delivering modern facilities taking advantage of the transport links provided by the Avon Ring Road.

(iv) **Severnside** is centred on established existing major and specialist industrial sites such as AstraZeneca, the former Terra nitrogen site and the Severn view industrial park. The area has a complex planning history dating back to the 1950s and there is significant developer interest in both brownfield and greenfield land in the area covered by historic planning permissions for employment development. Significant storage and distribution uses are now coming forward, including the recently developed Western Approach (G Park) which is now a major regional distribution hub. Due to its industrial nature, scale of available land, and distance from significant residential populations the area is attractive to special industrial uses and major distribution uses.

(v) **Yate** is to the north of the M4 with the employment land being centred on Beeches Industrial estate, Great Western Business Park and Stover Trading Estate on its western side. These employment areas create a significant employment mass of mainly B2/B8 uses and serve a very important role for the town and the wider sub region. There is an apparent under representation of office development however this will become increasingly important should the major urban extension identified within the RSS come forward. Chipping Sodbury provides a limited supporting role largely attributed to its historic nature and lack of available land.

(vi) The **Rural Areas** of South Gloucestershire represents the balance of the market area and as would be expected comprises generally smaller sites in general/light industrial use, site specific occupiers, only few office locations and some warehouse and distribution. There are however a number of significant employment locations such as Thornbury and Pucklechurch Industrial Estates which serve a purpose over and above that of simply meeting the needs of the settlement in which they are located. Some rural sites are under pressure for redevelopment and if lost to employment use would be likely to result in increased pressure for commuting into the more urban areas.

2.8 **The South Gloucestershire area has a vibrant economy and it has seen high growth in jobs, low unemployment with a robust and diverse economic structure. The strength is evidenced by the presence of a number of world class companies with concentrations in aerospace, defence, IT, financial services and higher education (with the university) as**
well as excellent access to the strategic motorway network and the national rail network. The employment rate is well above the national rate and unemployment has been significantly less. However the impacts of the recession have not gone un-noticed within South Gloucestershire, for example in January 2009, 2,075 of South Gloucestershire’s resident population were claiming Job Seekers Allowance (about 1,500 were claiming the benefit 12 months earlier), an increase therefore of approximately 126%. This rate of increase is significantly higher than has been experienced nationally and regionally (an increase of 54% and 87% respectively (NOMIS 2009).

2.9 In assessing future demand by market area we can consider previous take up rates within South Gloucestershire. Table 2a below illustrates the take up of employment land for the period April 1996 – April 2007 based on monitoring undertaken by the Council. Whilst the sub areas are slightly different to those used for this study (i.e. Thornbury is considered with Chipping Sodbury / Yate rather than within the Rural Area) the dominance of the North Fringe and Severnside is still clear. The patterns of historic take up reflect the demand identified by commercial agents discussed in the remainder of this section, with identified demand focusing in the North Fringe for office market enquires, and Severnside for warehouse and distribution demand.

Table 2a Employment Take Up April 1996 – April 2007 (Source S. Gloucs. Council)

<table>
<thead>
<tr>
<th>Sub - Area</th>
<th>Employment Site Completions (ha)</th>
<th>Floorspace Completions (sq m)</th>
</tr>
</thead>
<tbody>
<tr>
<td>North Fringe</td>
<td>79.5</td>
<td>323,970</td>
</tr>
<tr>
<td>Kingswood</td>
<td>21.92</td>
<td>67,993</td>
</tr>
<tr>
<td>Severnside</td>
<td>34.4</td>
<td>146,506</td>
</tr>
<tr>
<td>Thornbury / Yate &amp; Chipping Sodbury</td>
<td>17.4</td>
<td>60,093</td>
</tr>
<tr>
<td>Rest of South Gloucestershire</td>
<td>9.32</td>
<td>23,923</td>
</tr>
<tr>
<td>(Assumed to be Rural Area)</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>162.54</strong></td>
<td><strong>622,485</strong></td>
</tr>
</tbody>
</table>
2.10 Table 2a indicates a take up rate of 14.77 hectares / 56,589.55 sq.m. a year over the 11 years 1996 – 2007. This past demand rate is significantly higher than the projected rate of future demand to 2026. One contributory factor to this difference however is that the forecast model derived from economic growth projections uses land lost to non employment use as a proxy for property market influence. This is to avoid double counting but it may contribute to a reduction in the future demand figures.

2.11 Table 2b below provides an overview of vacant floorspace as provided by South Gloucestershire Council at August 2007. The most noticeable vacancies are within the North Fringe however this is relative to the scale of the employment base. There are also a number of anomalies which have a significant effect on the figures, most notably; the former Safeway Depot (35,760 sq.m.) at Cribbs Causeway in the North Fringe; the former Kleeneze site in Warmely (9,850 sq.m.) in the Kingswood area; and Great Stoke House Stoke Gifford (9,200 sq.m. office) in the North Fringe. It is also worth noting that the rural vacancies are made up of a single office building (Beluga House – Whale Wharf) and also include a number of industrial units at Ashville Park Thornbury which have since been sold.

**Table 2b Vacant floorspace August 2007** (Source S. Gloucs. Council)

<table>
<thead>
<tr>
<th>Sub - Area</th>
<th>Vacant Office (sq.m.) (Only includes units over 300 sq.m.)</th>
<th>Vacant Industrial and Warehousing (sq m) (Only includes units over 300 sq.m.)</th>
</tr>
</thead>
<tbody>
<tr>
<td>North Fringe</td>
<td>24,300</td>
<td>67,000</td>
</tr>
<tr>
<td>Kingswood East Fringe</td>
<td>2,600</td>
<td>32,320</td>
</tr>
<tr>
<td>Severnside</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>Yate &amp; Chipping</td>
<td>-</td>
<td>40,900</td>
</tr>
<tr>
<td>Sodbury</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>Emersons Green</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>Rural Area/ Thornbury</td>
<td>2490</td>
<td>6,135</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>29,390</strong></td>
<td><strong>146,355</strong></td>
</tr>
</tbody>
</table>
Office Market

2.12 GVA office agents comment that the Bristol out of town market in 2008 has been quieter than 2007, which was an exceptional year. The picture in South Gloucestershire therefore reflects the national market position (albeit at a delayed rate in terms of notable decline) as discussed within paragraphs 2.3-2.6 which identifies the decline in 2008 and 2009. In 2007, office take-up (leasehold/freehold) reached an all time high of 412,000 sq ft / 38,290 sq.m. compared to the five year average of 317,000 sq ft / 29,461 sq.m. 2008 saw 224,000 sq ft / 20,819 sq.m. recorded in the first three quarters while the year end is likely to fall slightly short of the five-year average of 317,000 sq ft / 29,461 sq.m.

2.13 In the wider region, GVA still sees office occupier competition in key centres such as Exeter and Swindon. However, other towns are much quieter in market terms than in 2007. There is still significant activity on prime business parks such as at Gloucester business park. GVA anticipates that in the medium term a number of regeneration schemes will be emerging across the region which will provide wider choice and competition for occupiers in more provincial locations outside of South Gloucestershire and Bristol.

2.14 Within the Greater Bristol area grade A office space is generally being marketed leasehold at a high of £24 per sq ft / £258 sq.m. and sometimes £24.50 sq.ft / £264 sq.m, with deals happening in the Summer 2008 at £23.50 per sq ft / £253 sq.m. Freehold values in North Fringe/Emersons Green in 2007 ranged between £1 million and £1.25 million per acre. At the lower end, existing buildings in Parkway and Aztec West are being marketed at £17.50 and £18.50 sq ft / £188 and £199 sq.m respectively.

2.15 In summary agents indicate that the following average (i.e new and old stock) leasehold office values apply:

- **Aztec West:** £18 - £20 sq ft / £194 - £215 sq.m
- **Almondsbury Business Park:** £14 - £15 sq ft / £151 - £161 sq.m
- **Thornbury:** £12 - £13 sq ft / £129 - £140 sq.m
- **Emersons Green:** £15 - £16 sq ft / £161 - £172
- **Bristol Business Park:** £20 - £22 sq ft / £215 - £237

2.16 Overall, the office market has cooled considerably in the past 3 months and all agents are cautious regarding the outlook as to when the property market may stabilise and begin to grow again. However, rental levels in prime office locations such as Bristol Business Park and Aztec West remain high. The South Gloucestershire market is well placed to...
harness demand for offices, when the market comes back, with its concentration of a highly accessible supply of sites in the North Fringe and Emersons Green. It is also attractive because of the cluster of world class occupiers and the collaboration of the 3 universities in the area.

2.17 In terms of tenure, agents report that 12 months ago there was a demand for freehold office agreements, however a lack of freehold supply potentially attributable to tax regulation changes has reduced freehold opportunities so there has been a move back to leasehold.

2.18 In terms of overall demand for office space, agents report this being reduced for lower quality stock in the current climate with high supply due to many vacant buildings as mentioned below in the reviews by market area. There are however some high quality sites such as the Bristol Business Park and Aztec West which are still in high demand.

Industrial/Distribution Market

2.19 GVA industrial agents comment that industrial take-up in the greater Bristol area in the first half of the year stood at 814,400 sq ft / 75,688 sq.m (IAS – South West), which was 30% down on the figure for the same period in 2007. But in terms of the number of individual transactions, only 9% down. Notable deals in the wider South West region continued to show stability including an 86,000 sq ft / 7,993 sq.m distribution pre-let to John Lewis PLC at Avonmouth, Bristol where GVA Grimley acted for CPP. Other deals include a 36 hectare (90 acre) Bristol land sale to Tesco for a new regional distribution centre and a significant letting of 330,000 sq ft / 30,669 sq.m to GKN/Airbus at G Park at Severnside.

2.20 Compared to the other large industrial conurbations, the Bristol industrial occupier market has remained relatively strong. However, during the last six months, as with the rest of the UK, there has been an investment drought as funds, property companies and more recently occupiers either lack finance, lack confidence in their own growth plans or believe that returns and values will be more attractive during mid 2009. Speculative development has halted across the region, compounded by void rate concerns, uncertain exit yields and high original land purchase costs, dictating that pre-let development is the only viable or sensible option. One example is the planned investment by ProLogis in the 25ha Rolls Royce East Works site which has been put on hold and the site will be cleared and ‘mothballed’ pending economic recovery.
2.21 GVA does not believe that the regional industrial / distribution market entered this uncertain period with significant over supply of built stock in any sub region or size range, save for perhaps at 100,000 sq ft plus / 9,294 sq.m. Indeed the lack of choice in sites has been a common complaint with potential investors.

2.22 Whilst supply is increasing through rationalisation and sporadic insolvencies, the halt to new build may ultimately result in a shortage of space in late 2009 or early 2010. This is particularly true if occupiers focus on energy efficient space through a drive for corporate sustainability. Constrained supply has helped in part to sustain capital and rental values to date for occupational property, particularly as there has been some latent demand in the market from occupiers who have a business need to move but viewed the market as overheated last year. Incentives for leasehold deals are certainly increasing, with 9 – 12 months rent free becoming more common, but quoting rentals have held firm for prime space at £6 psf - £7 psf / £65 - £75 sq.m. Alder King has quoted £5.50 - £7.50 per sq ft / £59 - £81 sq.m in Emkers Green and £6.75 to £8.50 / £73 - £91 sq.m in the North Fringe.

2.23 Land values are currently very hard to predict as developers have dropped out of the market and there are comparatively few occupier purchasers to demonstrate a pattern of price change. Bid levels do seem to show as much as a 30% fall in some cases from their 2006/2007 peak which was probably somewhere in the region of £600,000 per acre. However, the market is currently very much opportunity led as there are only a few developers in the market and they tend to have finance leading to less competition. It is therefore more about what such developers feel is reasonable to pay. Some agents do however report a shortage of industrial land in light of lower profit margins compared to office development. There is a concern that in a weak market it may prove difficult to bring forward larger sites for development where they require comprehensive investment and firm commitments from prospective employers.

2.24 The halt of industrial property purchase for alternative uses such as mixed development, quasi retail (trade counter/showroom/self store) and residential has probably had the biggest impact in the region as some stock now coming to the market conceivably has no market, save for longer term speculators. Rates on empty properties are also starting to encourage owners to undertake selective demolition of some stock without a solid plan for redevelopment, a position which has been anticipated by economic commentators on the introduction of the rates.
2.25 In summary, the picture for industrial land in South Gloucestershire and the wider South West is mixed but in a better position than in a number of other regions.

REVIEW BY MARKET AREA

North Fringe

2.26 Much of the growth over the last decade and more has occurred in the North Fringe area with the presence of the Ministry of Defence at Abbey Wood, relocations by major employers and the development of the regional Shopping Centre at Cribbs Causeway. It accounts for over 50% (an estimated 75,000) of the jobs in South Gloucestershire. Bristol Business Park, Aztec West, Vantage Office Park and major occupier sites at Filton make this the most economically vibrant market area in the district.

2.27 In the North Fringe, headline office rents rose slightly at the beginning of 2008 when Thales leased 33,000 sq ft / 3,066 sq m at £23.50 per sq ft / £253 sq m in Building 630, Bristol Business Park. One of the most significant lettings was 100,000 sq ft / 9,293 sq.m pre let to Atkins @ The Hub on Aztec West for £22.50 sq ft / £242 sq.m which will alone leave 9 vacant buildings on Aztec West when Atkins consolidate their activities. Other notable lettings include VT Group leasing 30,175 sq ft / 2,804 sq m at £17 per sq ft / £183 sq m at Building 1300, Parkway North, and Co-op Legal Services which leased 12,500 sq ft / 1,162 sq m at £19.25 per sq ft / £207 sq m at Building 650 Aztec West. Haydon BS took 10,000sq ft / 929 sq m at £23.50 per sq ft. / £253 sq m in the Gemini Buildings, Aztec West in August 2008. The remainder of deals have been below 15,000 sq ft / 1,394 sq.m with an average deal size of 3,500 sq ft / 325 sq m.

2.28 Total availability of grade A new build stock is approximately 200,000 sq ft / 18,587 sq m, with a further 90,000 sq ft / 8,364 sq m under construction. Due to the Atkins move at Aztec West and other leases expiring there is expected to be a total 16 vacant buildings on Aztec West in 2009.

2.29 Industrial rents can be up to £8.50 per sq ft / £91 sq m in this area, previously Alder King suggested that this may increase with the redevelopment of the Rolls Royce East Works, however the deal with ProLogis is now off in light of the commercial climate. The previous deal with ProLogis was believed to be for 60 acres / 24.3 hectares for £40 million, equating to over £600,000 per acre / £1.65m per hectare. In the short term, agents therefore report difficulties in bringing strategic sites such as Pro Logis and the Northfield forward due to wider market influences. Despite the perception of increase in supply of stock, agents do not necessarily report this to be the case on the ground and therefore it...
cannot be considered that an increase in supply is leading to a downward pressure on rents. Whilst increased incentives are being offered, industrial agents still report a general reluctance of landlords to reduce quoting prices. As of December 2008 Prologis were quoting £8 sq.ft.

**Emersons Green**

2.30 Emersons Green is the newest of the employment market areas within South Gloucestershire largely forming a new urban extension to the north east of Bristol. The number of jobs is therefore relatively low in comparison to the other urban market areas although significant employment development is expected to come forward within the strategic developments in the pipeline. The area therefore consists of significant areas of undeveloped land. In terms of existing centres, the area includes the largely completed 30 ha Emerald Park employment area accommodating Sainsbury’s distribution (11 ha), and the SEGRO development known as Emerald Park East which includes B1,B2 and B8 units.

2.31 In terms of pipeline development the area also includes the proposed Bristol and Bath Science Park (SPark) which is a 25 ha site owned by SWERDA in joint venture with Quantum Property Partnership (itself a JV between Quintain and Morley) which is expected to deliver 3-5,000 jobs. It is located adjacent to the Avon Ring Road and is proposed to accommodate 828,520 sq.ft / 77,000 sq.m. of floorspace. This is seen as a key support area to the universities and existing industries aimed to improve competitiveness and increase jobs in the future. Agents see SPark as essential to maintain international competitiveness in the district and the region.

2.32 Quantum’s role will be to fund and develop roads, services and initial buildings for the first 22 hectare phase of the park. This includes the first proposed building a 34,432 sq ft / 3,200 sq m Innovation Centre (for the 3 major universities, Bath, Bristol and UWE) which will act as the hub building and a ‘grow on’ centre which will provide stepping stone space for companies as they grow. This first phase will have an anticipated value of £200 million.

2.33 The second building which was intended to open for occupation alongside the Innovation Centre in the autumn of 2009, is designed for companies looking for their first stand-alone office. This will be a flexible space that can be adapted to suit the requirements of accelerating businesses, supporting their research and development objectives as well as facilitating their research ambitions.
2.34 In terms of values, Alliance Medical took 30,000 sq ft / 2,788 sq m of space at Brook Office Park in June 2007 purchasing the 2.2 acres at £1.25 million per acre. Home Farm Trust took office units 5 & 6 at Brook Office Park in January 2008 at £20.37 per sq ft / £219 sq m.

2.35 Shepherd developments is quoting £23.50 per sq ft / £253 sq m for its speculative office development at Harlequin (formerly Viceroy Gate) which was planned to be available in 2009, although given market conditions this may slip.

**Kingswood**

2.36 The Kingswood area has an estimated 30,000 jobs but the area has lost about 1000 jobs in recent years. As stated above it is the focus of smaller scale traditional manufacturing industries and these tend to be dispersed throughout established residential areas. It has a history of sectors in printing, packaging and engineering. These sectors have been in decline and have been particularly hard hit in the recent economic downturn.

2.37 Decline has been as a result of increased international competition with lower cost bases which has resulted in closures or scaling down of industries in Kingswood to retain competitiveness. Much of the employment building stock is outdated and the area in general has poor direct access to the motorway network, however areas such as Longwell Green served by the Avon Ring Road are experiencing new developments, and there is a continuing demand for premises to serve purely local needs e.g. for construction and motor trades. The availability of larger sites is limited and therefore the area is unable to compete for larger distribution requirements that have dominated the market in recent years and which would be attracted to sites in Severnside as an alternative locally. Generally, agents consider that the area suffers from a lack of available skilled workforce, and this is evidenced in statistics for employment rates and young persons in education or training.

2.38 A number of sites are coming under increasing pressure for redevelopment for alternative uses, most notably the former Kleeneze site in Hanham which has been purchased by Tesco’s. The Council has however maintained a strong stance to protect such sites and this is evident through decisions such as the refusal of residential development on the Siston Centre site which was backed up by an Inspector at appeal who concluded that the loss of such a site would be contrary to the Development Plan in terms of policies seeking to protect sites for employment purposes (reference APP/P0119/A/05/1101786).
2.39 Vacant industrial units include a refurbished industrial / warehouse unit (1,055sq.ft / 98sqm) on Oatley Trading Centre, Kingswood leasehold at £6.45 per sq.ft (£69.40 sq.m) and a detached industrial unit (9,012 sq.ft/837.2 sq.m.) for £6.10 sq.ft / £65.60 sq.m. In terms of office space various premises on Lodge Court Business Park, Kingswood are being offered leasehold at £15 per sq.ft (£161 per sq.m). Elsewhere Westgate House (1,715sq.ft / 159.3sq.m) and Kingsgate House (3,430 sq.ft / 318.6sq.m) are both being offered leasehold at £11.50 per sq.ft. (£124 per sq.m.). Outside of Kingswood on Longwell Green Office Park a 2,000 sq.ft (185.8 sq.m.) office is being offered leasehold at £17.5 per sq ft (£188 per sq.m.) and freehold at £200 per sq.ft (£2,152 per sq.m.).

Severnside

2.40 Employment numbers in Severnside were recorded at 1,800 in 2003 and 1,900 in 2005 (South Gloucestershire Economic Review March 2007), however this figure will have increased in light of recent developments. Severnside includes Gazeley’s Western Approach Distribution Park (WAP) which has developed rapidly and has attracted occupiers including the Royal Mail, Constellation Europe, Next and Dixons. At the end of 2007 Gazeley completed construction of two of the largest speculative warehouses ever to be constructed in the South West. The units comprise 117,500 sq ft / 10,920 sq m and 205,000sq ft / 19,052 sq m and offer ‘eco template initiatives’ (the developer’s package of eco measures including solar thermal panels). We understand that GKN/Airbus will take both buildings as they fit their staff location needs as well as space needs. Warburtons bakery has also recently taken occupation of a purpose built unit, but Focus has vacated 40,000 sq ft / 3,717 sq.m and the MFI unit is also likely to come onto the market. There are other plots being marketed by DTZ for bespoke proposals of between 80,000 / 7,435 sq m and 600,000 sq ft / 55,762 sq m.

2.41 The area has excellent motorway connectivity being close to the M49, and the M4/M5 junction and with a cluster of similar large scale distribution uses. Agents consider there to be further potential for the area to develop and regenerate with surplus previously developed land and green field sites likely to come forward in the future.

2.42 In terms of values, the 50 acre site (20.23ha) that Gazeley bought from Redrow Commercial Developments Ltd to build G Park was being marketed in 2005 at £200,000 per acre (£494,194 per hectare). In 2005 when the site was purchased quoting rents were expected to be in the region of £5.50 per sq.ft. (£59.20 per sq.m.). Recent
transactional evidence indicates that the market peaked in late 2008 with the transaction to Tesco of approximately 96 acres of unserviced land (the Santon distribution site, East of the M49) at a reported £400,000 per acre (£988,000 per hectare). According to agents (logisticsmanager.com article “Sweetness and Light - 1st December 2008) since the Tesco deal “little land has been transacted in the market to support the suggestion that land values have dropped by 20%”. Currently industrial / distribution leasehold prices within the Severnside and Avonmouth areas range from £4-£6.75 per sq.ft (£43 – £72.6 per sq.m). For example Unit 3A on Severnside Industrial Estate is being quoted at £4.25 Freehold values for top end industrial units are typically £100 per sq.ft (£1'075 sq.m.).

Yate

2.43 The Yate and Chipping Sodbury area accounts for 18,160 jobs (2001 Census) and is an established industrial base dominated by manufacturing, distribution and retailing. The employment developments are centred to the western end of the urban area on five industrial estates comprising Beeches Industrial estate, Great Western Business Park, Stover Trading Estate, Badminton Road Estate and Westerleigh Business Park. These employment areas create a significant employment mass of mainly B2/B8 uses and serve a very important role for the town and the wider sub region. There is an apparent under representation of office development however developments have taken place at Westerleigh Business Park and at Station Road, Chipping Sodbury. The office sector will become increasingly important should the major urban extension identified within the RSS come forward. Chipping Sodbury provides a limited supporting role largely attributed to its historic nature and lack of available land. The development of the South Gloucestershire Council new offices at Badminton Road may result in the release of leasehold office space within the town.

2.44 As noted within the Supply Side report there are a number of employment sites within the Yate area that are coming under pressure for alternative uses. To date the Council have resisted the loss of such sites, of particular note is the former Excel Cold Store on Armstrong Way which has been subject to an unsuccessful appeal for the erection of a gospel hall and industrial units. The Inspector found (appeal reference APP/P0119/A/06/2011716) that the proposal was contrary to development plan policies which sought to safeguard sites and premises for employment uses and that there are no other material considerations sufficient to outweigh this. There is also reported pressure for retail uses on those vacant employment sites in close proximity to the Town Centre.

2.45 The main industrial areas are fully developed and therefore supply is limited to second hand properties or redevelopment opportunities. The supply of good quality industrial
stock is low with the majority of stock being occupied. Over the seven year period April 1999 – March 2006 a total of 13.31 hectares of new employment land was taken up by industrial, distribution and office uses in Yate, an annual average take up of almost 2 hectares per annum (source: South Gloucestershire Proof of Evidence Cold Store Appeal APP/P0119/A/06/2011716/NWF).

2.46 Agents consider the employment areas to be important in terms of the industrial supply but confirm that Yate is not currently an office destination. The existing employment areas provide a valuable role in terms of reasonably priced stock and unit mix, however there is a perception that the existing sites and units do not meet larger modern business requirements; this is particularly the case with the vacant distribution units which do not possess the scale and modern facilities being offered at Severnside.

2.47 In terms of values, at the top end Chancery Gate purchased freehold about 6.5 acres at the Yate cold store for £4 million which equates to just over £600,000 per acre. Leasehold opportunities are available at Beeches Industrial Estate (units 29 and 33, which are industrial units of reasonable quality and circa 7,000sq.ft / 700 sq.m.) at £5.95 sq.ft. / £64 sq.m. A warehouse / trade counter unit (no. 56 Beeches Trading Estate) is also being marketed at £8.75 sq.m.

Rural Areas

2.48 The rural areas of South Gloucestershire also have a significant contribution to employment in the district. The rural area represents the balance of the market area and as would be expected comprises generally smaller sites in general/light industrial use, site specific occupiers, only few office locations and some warehouse and distribution. There are however a number of significant employment locations such as Thornbury Industrial Estate and Pucklechurch Industrial Estate which serve a purpose over and above that of simply meeting the needs of the settlement in which they are located. There is however a number of former employment sites under pressure for alternative uses which may contribute towards out-commuting should they be brought forward for residential uses.

2.49 The feedback from Agents on the rural areas is fairly limited given that the sites are scattered around the area and represent generally smaller sites or sites in single occupation where it is difficult to provide a generic assessment of market conditions.

2.50 It is clear that areas closer to the main Bristol conurbation are influenced by it and are likely to be more attractive than the remoter rural areas, albeit that access to the strategic
road network is an important factor in attracting some occupiers. The rural areas are characterised by some major employers which have grown over many years into established businesses such as The Alderly Group HQ at Arnolds Field Estate at Wickwar, the Heritage Wine Company at The Old Brewery, Wickwar. Some sites like the 4 ha (10 acre) former Intier Automotive site at Bitton are not safeguarded in policy, and may be lost to residential development. In light of the M4/M5 some of the rural areas such as Badminton do however have excellent motorway access.

2.51 In considering the rural areas it is important to acknowledge that significant new employment developments are coming forward, for example Bristol developer Ashville Group built a 60,000 sq.ft. speculative industrial scheme on Thornbury Industrial Estate comprising 18 business units (phase two completed in summer 2006). At the time of completion the developers commented that the scheme was one of the first significant speculative small industrial schemes for several years in the area and the speed with which the space has been taken highlights the growing demand for this type of product allowing occupiers to fit out the space to suit their individual requirements. The marketing agents (DTZ) commented at the time that there is very limited supply of this size of unit in the Bristol area on a freehold basis, which coupled with motorway access and environment has resulted in a high level of demand for these buildings (Property Mall website 25 April 2007).

2.52 In terms of market values, these vary significantly across the rural areas in light of proximity to the motorway network or greater Bristol urban area. Therefore we provide a selection as follows. Office space (30,648 sq.ft / 2,847 sq.m) is on the market at Whale Wharf, Littleton-upon-Severn being offered leasehold at £16.50 per sq.ft (£178 per sq.m). SEGRO who own Pucklechurch Trading Estate recently had the 13,528 sq.ft / 1,256 sq.m unit 2C (industrial / warehouse reasonably modern) available for approximately £6 sq.ft. (£65 sq.m.). Transaction records indicated that at least 6 units at Ashville Park (new units on Thornbury Industrial Estate explained above) were sold freehold in 2006 for values equating to £105 - £107 per sq.ft. / £1,230 - £1,151 per sq.m.

**SUMMARY OF MAIN ISSUES**

2.53 The South Gloucestershire economy is vibrant, and has experienced strong growth. Employment rates are high compared to the national rate and this translates into a strong property market particularly focused on the fringe of the Bristol conurbation, and in areas with good access to the motorway network. Account needs to be taken to the strategic aims arising from national policy, the emerging RSS and the Council’s Community and
Economic Development Strategies. These include meeting needs (employment and residential) ensuring choice and affordability, improving sustainability, spreading the benefits of investment and wealth within the District and wider sub-region.

2.54 In light of the above market analysis we hereby summarise the main market issues and a number of policy recommendations for each market area:

North Fringe

- Includes major business centres and key occupiers.
- Pressures for redevelopment and reuse of land for a variety of purposes
- Strong values and rents achieved to date.
- North Fringe is attractive to the office market and industrial agents have commented that the pressures are on industrial land from office development.
- The aim should be to maintain a strong supply of employment land and balance the pressures for introducing non-employment uses against such supply.
- Potential requirement for small business strategy particularly if sites being looked at for alternative uses leading to relocation of smaller / vulnerable businesses.
- Work to ensure North Fringe complementary to Embersons Green (and vice versa).
- Role of B8 development should be considered carefully in light of strategic location and potential loss of higher employment generating uses.
- Includes significant cluster of aerospace industries which must be addressed in policy.

Emersons Green

- Emersons Green provides a major focus for new office and science park development which complements and supports the North Fringe.
- Target occupiers will enable strong working and innovation between universities, major occupiers and potential new occupiers as well as providing for seed beds for new businesses.
- The science park should cater for demand from high technology businesses.
- Delivery of the non-science park employment land allocation element for smaller / local businesses will need to be considered further in light of it’s strategic location which may lead to pressures from larger scale businesses such as distribution. However, any form of control will need to be balanced against the perception of being seen to stifle the market.
Careful policy consideration regarding links between existing and future residential population and employment development to maximise reduction in commuting distances.

Severnside

- Highly accessible area in strategic location attractive to special industries, major manufacturing and distribution and which has seen major speculative investment in property not seen previously at such scale in the South West.
- It will be important to ensure that supply is maintained in the medium term through proactive reuse of previously developed land and to agree a strategy for bringing forward the greenfield land.
- Waste Management and energy related developments have difficulty in finding appropriate sites, apart from at Severnside so ensure policy plans for this.
- Links with Avonmouth and Bristol Port need to be considered.
- In light of development now coming forward, full consideration needs to be given to the implications of the historic 1957/58 planning permissions.

Kingswood

- Large number of mainly smaller sites primarily general industrial and light industrial. A significant number of these sites are in a poor state of repair and under increasing pressure for re-development to other uses. However, there are areas such as Longwell Green which are delivering modern facilities.
- Careful management of the employment land supply required to ensure that key sites are protected and potential realised, and that non key sites are released for alternative uses where this would have environmental benefits and generally result in regeneration within the local area.
- The area is attractive to smaller businesses but there is significant scope for improvement in the existing stock which may not occur solely on market pressures. There is scope for effective masterplanning of some areas to overcome constraints.
- Agents felt that generally industrial land supply is tight around Bristol due to the pressures for office development on general employment land and that developers in those sectors find it difficult to compete.
- There is suggestion from the agents that more land should be released around the edge of Kingswood to provide for choice for the industrial and distribution market (outside of Severnside). Agents consider that the planning policy
restriction of “significant” (greater than 10,000 sq ft / 929.4 sq m) being only suitable for the Severnside area is naïve and is a low threshold leading to constraints particularly in East Bristol.

- The RSS Proposed Changes indicate a potential urban extension of 8,000 dwellings to the east of Bristol (Area of Search 1C) which will have significant impact on Kingswood. This increasing pressure to deliver housing in the Kingswood area may lead to additional pressures for residential uses on urban brownfield sites.

Yate

- Employment land centred on Beeches Industrial estate, Great Western Business Park and Stover Trading Estate on its western side. These employment areas create a significant employment mass of mainly B2/B8 uses and serve a very important role for the town and the wider sub region.
- Under representation of office stock and supply within the town suggesting that further land should or could be made available to complement the well established light and general industrial base in the area.
- Employment opportunities will become increasingly important should the major urban extension identified within the RSS come forward. Appropriate balance of employment floorspace to residential development will need to be considered.
- Market perception of town as a low to mid quality employment location needs to be addressed in order to attract high end occupiers and reduce out – commuting of the existing and future working population.
- Pressures from alternative uses will need to be carefully managed particularly on those sites closest to the Town Centre which may perform reasonably against retail sequential test requirements.

Rural Areas

- The supply is geographically spread with a wide mix and variety of types of employment. Different sites will require varying solutions based on their local circumstances and specifics.
- The rural area does however contain a number of significant employment locations such as Thornbury Industrial Estate and Pucklechurch Industrial Estate which serve a purpose over and above that of simply meeting the needs of the settlement in which they are located. The sub-regional role of these sites needs to be protected and enhanced.
The market is for smaller scale uses, but where larger accessible sites are available or sites close to the conurbation, these may be attractive to occupiers seeking more rural environments.

There is however a number of significant former employment sites under pressure for alternative uses which may contribute towards out-commuting should they be brought forward for solely residential uses. The balance of uses will therefore need to be considered carefully, taking into consideration however, that they may not be viable as solely employment sites as they may have served the specific purposes a single owner occupier and therefore may not be compatible with modern requirements.

2.55 The above commentary is largely based on commercial property agent feedback who will by nature generally consider short term market issues rather than long term forecasts or historic trends. The overall picture of South Gloucestershire appears to be one of a broad economic base explained by a number of defining factors including; available land and strategic access for distribution (Severnside); the critical mass of businesses and population (North Fringe, Emersons Green); and strong sectors such as aerospace and the public sector (MoD). Therefore, within Stage 3 of this employment study the Council will need to consider whether South Gloucestershire is in a strong position in comparison to other areas (which appears to be the case), and therefore can ride the current economic trends, or whether there is a need to establish policy to assist in off-setting the trends.
3. ECONOMIC FORECASTING

3.1 This chapter provides an overview of the methodology used to forecast future additional land and premises requirements within South Gloucestershire. Chapter 5 then provides a breakdown of the results of the forecasting exercise.

Method

3.2 In order to establish the future gross employment floorspace requirements in South Gloucestershire up to 2026 a four step approach has been applied based on:

(i) Allowance for Economic Growth
(ii) Allowance for Windfall Losses
(iii) Allowance for Churn
(iv) Allowance for Economic Development Aspirations

3.3 This allows for a robust assessment of the baseline future employment needs within South Gloucestershire which is based on a trend based economic model as well as changes in the property market over recent years. Each of these steps is described in more detail below.

(i) Allowance for Economic Growth

3.4 The allowance for economic growth takes into account the projected employment changes based on a macroeconomic model provided by Cambridge Econometrics, who also provide the employment figures. The forecast is supplied for 19 economic sectors. Employment in the 19 sectors is then converted into employment in four floorspace use types as follows:

- **Office (B1a/b):** pure office space, not including office space in shopping areas such as banks, estate agents and betting shops (A2 office space) and premises for research and development of products or processes.

- **Other Business Space (B1c, B2):** including premises for light industry and general industry.

- **Warehousing (B8):** premises used for storage or distribution centres.
3.5 For the conversion of the 19 economic sectors into the four floorspace use types a matrix has been used which is based on the ODPM Employment Land Review Guidance with some refinements based on 4-digit-SIC analysis of current employment in the District. The conversion matrix assigns a proportion of the employees in each of the 30 economic sectors from the employment forecast to one or more of the four floorspace use types.

3.6 As a next step the employment in the three B-Use-Class floorspace types is converted into floorspace using the following employment densities which are in line with the ODPM Employment Land Review Guidance:

- Office: 18 sq m per employee
- Other business space: 32 sq m per employee
- Warehousing: 55 sq m per employee

3.7 These assumptions are widely considered as robust using current best practice guidance. The RSS Employment Provisions : Spatial Implications Guidance suggest 35 sq m per employee, however, our site surveys shows that there are a number of current and potential future large warehouse sites within the district, as such we believe that 55 sq m per employee provides a more robust representation of the local warehouse employment situation in South Gloucestershire.

(ii) Allowance for Windfall Losses

3.8 The allowance for windfall losses takes into account that a proportion of designated employment land will not be entirely used by traditional B-Use-Class employment.

3.9 A significant part of the projected employment growth arises from sectors which have traditionally not been located on employment land such as healthcare, education, hotels and leisure. Recent planning experience has shown that under specific circumstances and where appropriate such uses might be allocated on employment land. However this has to be monitored carefully to ensure there is enough available land for B-Use-Class employment on employment land.

1 Warehousing employment densities typically range between 50 sq m for general warehousing and 80 sq m for large scale and high bay warehouses. As large parts of the sub-region are not suitable / attractive for large scale warehousing we have used an employment density only slightly higher than for general warehousing.

2 Roger Tym & Partners, August 2008
3.10 It is therefore necessary to factor in the effect that the loss of non B-class employment land can have on the requirements for B-Class employment land. For example the higher the rate of land lost to non B-Class employment uses the more likely it is to have an effect on the future supply of traditional B-Class employment.

3.11 The allowance for windfall losses also takes into account the need for a flexible supply of employment land. Allowance has to be made for a range of different needs by the economy which might change over the next 20 years.

3.12 To estimate the amount of land needed for windfall losses historic losses have been used as a guideline as reported in the District’s Annual Monitoring Report.

(iii) Allowance for Churn

3.13 Locational and premises needs of businesses change over time. This requires businesses to move. In other cases an existing business might cease its operations and a new business takes over a site for redevelopment. For this to happen smoothly there is a need for certain level of vacant land. This type of demand has been called ‘churn’ demand or ‘frictional vacancy’.

3.14 In our experience it takes typically around two years time for achieving planning consent, site preparation and construction after a site has changed hands. To estimate the churn demand we have taken the annual net take-up of employment floorspace and multiplied it by two.

3.15 While acknowledging that using this data from AMR’s or internal monitoring data has its drawbacks, principally this information has only been collected in a coherent manner for around four years, it is still viewed as the most robust measure of losses to non employment uses. In the absence of any other reliable proxies we use this data with the proviso that it should be monitored each year to give a longer term projection of losses of employment land.

(iv) Allowance for Economic Development Aspirations and Other Factors

3.16 So far the employment land projection is based on macroeconomic forecasting; a robust measure of future employment land needs which also considers the effect of employment land lost to other uses and that developed on previously developed land. This allows the model to consider both the effects of forecasted economic growth but also key property market indicators. The outputs behind this forecast is driven by national and regional trends, growth trends in specific sectors and takes into account the local sector
distribution and performance. Macroeconomic models however do not take into account local economic development activities. In this step of the forecasting process the local economic development aspirations are considered and their quantitative and qualitative effect on future employment floorspace requirements. We also consider the future effect of the current recession on employment land requirements. Major projects such as S-Park are potentially vulnerable to the current economic downturn so the impact of the recession was a factor at this point.

3.17 At this stage other factors which might influence future employment floorspace demand, such as changes in working practice, are also considered.

3.18 In the remaining part of this Chapter the data for each of the steps of the employment floorspace demand forecast is presented. This provides demand based requirements for our “base case” scenario of 2.8% annual growth and two scenarios based on a high (3.2%) and a low (2.5%) annual GVA growth between 2006 and 2026.

3.19 The employment floorspace supply has been assessed as part of this Study; the current employment land supply will be compared with the projected gross demand again for our base case and two specified scenarios. The resulting net demand is then translated from floorspace into land demand by use types (office, other business space and warehouses). At this stage final employment land requirements are produced for office (B1a and B1b) and Other Business Space and Warehousing are combined to give employment land requirements for industrial (B1c/B2/B8) uses. This results in a more robust forecast and is justified due to the similar land requirements that other business space and warehousing have. Floorspace demand is translated into employment land applying the following plot ratios which are in line with the ODPM Guidance on employment land reviews:

- Office: 0.8 Plot Ratio
- Industrial: 0.4 Plot Ratio

3.20 These ratios are consistent with what GVA, as a commercial property firm, view as realistic plot ratios. While no ratios can ever be entirely accurate our previous work throughout the UK has suggested these act as a guide to apply within South Gloucestershire.

Allowance for Economic Growth

3.21 Cambridge Economics forecast data, which is used to inform the RSS, indicates that total employment is projected to grow by 19% between 2006 and 2026 in South
Gloucestershire. This is based on an assumption of annual GVA growth of 2.8% between 2006 and 2026 and it is the figure we use as part of our “base case” scenario in this study. A full explanation of the justification for using the “base case” scenario is provided at Paragraph 4.13.

3.22 The major growth sectors forecast for South Gloucestershire District are Other Business Services which includes a range of service sector activities such as estate agents and business consultancy (62% employment growth between 2006 and 2026), Distribution (33%) and Education & Health (29%). Comparing these forecasted growth sectors to those for South West shows that the Other Business Services sector is the major growth sector but is forecast to grow by only 36%. Miscellaneous services are also forecast to grow in South West by 26% and Distribution is forecast to grow by 25%. This demonstrates the comparatively smaller rates of growth within individual sectors in the South West compared to South Gloucestershire. This is shown in Table 2c below:
### Table 2c – “Base Case” Projected Growth by Sector in South Gloucestershire and the South West 06 – 26

<table>
<thead>
<tr>
<th>Sector</th>
<th>Employees in S Glouc 2006 000’s</th>
<th>Change 06 – 26 %</th>
<th>Employees in S Glouc 2026 000’s</th>
<th>Employees in SW 2006 000’s</th>
<th>Change 06 - 26 %</th>
<th>Employees in SW 2026 000’s</th>
</tr>
</thead>
<tbody>
<tr>
<td>Agriculture etc</td>
<td>1.4</td>
<td>-43%</td>
<td>0.8</td>
<td>63.1</td>
<td>-22%</td>
<td>49.5</td>
</tr>
<tr>
<td>Mining &amp; Quarrying</td>
<td>0.4</td>
<td>-25%</td>
<td>0.3</td>
<td>5</td>
<td>-32%</td>
<td>3.4</td>
</tr>
<tr>
<td>Food, Textiles &amp; Wood</td>
<td>3.4</td>
<td>-35%</td>
<td>2.2</td>
<td>58.2</td>
<td>-30%</td>
<td>41</td>
</tr>
<tr>
<td>Printing &amp; Publishing</td>
<td>1</td>
<td>10%</td>
<td>1.1</td>
<td>28.8</td>
<td>9%</td>
<td>31.4</td>
</tr>
<tr>
<td>Chemicals &amp; Minerals</td>
<td>2.1</td>
<td>-19%</td>
<td>1.7</td>
<td>37.7</td>
<td>-25%</td>
<td>28.2</td>
</tr>
<tr>
<td>Metals &amp; Engineering</td>
<td>3.2</td>
<td>-19%</td>
<td>2.6</td>
<td>55.8</td>
<td>-27%</td>
<td>41.6</td>
</tr>
<tr>
<td>Electronics</td>
<td>2.4</td>
<td>-8%</td>
<td>2.2</td>
<td>39.1</td>
<td>-35%</td>
<td>26.4</td>
</tr>
<tr>
<td>Transport Equipment</td>
<td>8.6</td>
<td>-60%</td>
<td>3.4</td>
<td>42.2</td>
<td>-36%</td>
<td>27.6</td>
</tr>
<tr>
<td>Manufacturing</td>
<td>0.5</td>
<td>0%</td>
<td>0.5</td>
<td>19.5</td>
<td>-1%</td>
<td>19.4</td>
</tr>
<tr>
<td>Electricity, Gas &amp; Water</td>
<td>0.7</td>
<td>-29%</td>
<td>0.5</td>
<td>11.1</td>
<td>-32%</td>
<td>7.7</td>
</tr>
<tr>
<td>Construction</td>
<td>14.2</td>
<td>20%</td>
<td>17.1</td>
<td>184.1</td>
<td>10%</td>
<td>212</td>
</tr>
<tr>
<td>Distribution</td>
<td>27.2</td>
<td>33%</td>
<td>36.3</td>
<td>450.4</td>
<td>25%</td>
<td>572.7</td>
</tr>
<tr>
<td>Hotels &amp; Catering</td>
<td>6.8</td>
<td>28%</td>
<td>8.7</td>
<td>200.9</td>
<td>19%</td>
<td>250.3</td>
</tr>
<tr>
<td>Transport &amp; Comms.</td>
<td>11.7</td>
<td>-1%</td>
<td>11.6</td>
<td>118.9</td>
<td>8%</td>
<td>131.9</td>
</tr>
<tr>
<td>Banking &amp; Insurance</td>
<td>8.4</td>
<td>21%</td>
<td>10.2</td>
<td>94.2</td>
<td>3%</td>
<td>99.8</td>
</tr>
<tr>
<td>Other Business Services.</td>
<td>21.9</td>
<td>62%</td>
<td>35.4</td>
<td>368.9</td>
<td>36%</td>
<td>515.6</td>
</tr>
<tr>
<td>Public Admin. &amp; Defence.</td>
<td>12</td>
<td>0%</td>
<td>12</td>
<td>186.1</td>
<td>-4%</td>
<td>184.4</td>
</tr>
<tr>
<td>Education &amp; Health</td>
<td>24.2</td>
<td>29%</td>
<td>31.1</td>
<td>500.9</td>
<td>21%</td>
<td>635.8</td>
</tr>
<tr>
<td>Miscellaneous Services</td>
<td>7</td>
<td>24%</td>
<td>8.7</td>
<td>148.5</td>
<td>26%</td>
<td>198.6</td>
</tr>
<tr>
<td><strong>Total Employment</strong></td>
<td><strong>157</strong></td>
<td><strong>19%</strong></td>
<td><strong>186.1</strong></td>
<td><strong>2613.3</strong></td>
<td><strong>14%</strong></td>
<td><strong>3077.3</strong></td>
</tr>
</tbody>
</table>

Source: Cambridge Econometrics

3.23 Another point worth noting in relation to Table 2c is the projected decrease in employment in the Transport Equipment sector. Given that the manufacture of aircraft sector is a major employer within the District this forecast reduction reflects the broader UK trends of a decline in traditional manufacturing. The retention of this sector would clearly make a large difference in land requirements in the District throughout the planning period. This is something that should be considered in any future employment land strategies or business retention strategies for the area.
3.24 Our business survey shows that despite the economic downturn businesses expectations for future growth remain strong. Despite the recent economic downturn, almost 90% of respondents did not believe that market conditions would contract significantly over the next five years. This view was particularly strong within the Financial & Business Services sector which is an indication of the continued growth in the service sector within the District. However, given the subsequent severity of the downturn in financial services since August 2008 the strength of such a view may have altered. It is advised that South Gloucestershire Council continue to keep this matter under review through the Council’s Economic Development function.

3.25 The sectors forecast to experience large decreases in employment levels include Transport Equipment (60% employment decline between 2006 and 2026), Agriculture (-43%) and Food, Textiles & Wood (-35%). The South West region is forecast to see large decreases in employment levels in the sectors of Transport Equipment (-36%), Electronics (-35%) and Electricity, Gas & Water (-32%).

3.26 While the sectors outlined in Table 2c can not be fully apportioned to the different B-use Classes Table 3 below lists the predominant use class associated with each sector:
Table 3 – Predominant Use Class of Economic sectors

<table>
<thead>
<tr>
<th>Sector Name</th>
<th>Predominant Use Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>Agriculture etc</td>
<td>Non B Use</td>
</tr>
<tr>
<td>Mining &amp; Quarrying</td>
<td>Non B Use</td>
</tr>
<tr>
<td>Food, Textiles &amp; Wood</td>
<td>Other Business Space</td>
</tr>
<tr>
<td>Printing &amp; Publishing</td>
<td>Office / Other Business Space</td>
</tr>
<tr>
<td>Chemicals &amp; Minerals</td>
<td>Other Business Space</td>
</tr>
<tr>
<td>Metals &amp; Engineering</td>
<td>Other Business Space</td>
</tr>
<tr>
<td>Electronics</td>
<td>Other Business Space</td>
</tr>
<tr>
<td>Transport Equipment</td>
<td>Other Business Space</td>
</tr>
<tr>
<td>Manufacturing</td>
<td>Other Business Space</td>
</tr>
<tr>
<td>Electricity, Gas &amp; Water</td>
<td>Non B Use</td>
</tr>
<tr>
<td>Construction</td>
<td>Other Business Space / Non B Class</td>
</tr>
<tr>
<td>Distribution</td>
<td>Warehousing / Non B Class</td>
</tr>
<tr>
<td>Hotels &amp; Catering</td>
<td>Non B Class</td>
</tr>
<tr>
<td>Transport &amp; Comms.</td>
<td>Office / Warehousing</td>
</tr>
<tr>
<td>Banking &amp; Insurance</td>
<td>Office</td>
</tr>
<tr>
<td>Other Business Services.</td>
<td>Office</td>
</tr>
<tr>
<td>Public Admin. &amp; Defence.</td>
<td>Office</td>
</tr>
<tr>
<td>Education &amp; Health</td>
<td>Non B Use</td>
</tr>
<tr>
<td>Miscellaneous Services</td>
<td>Non B Use</td>
</tr>
</tbody>
</table>

3.27 Aggregating the employment changes into employee numbers based on floorspace type shows that the highest numbers of employees are currently, and will continue to be, in the Non-B-Class sectors. Employment in office space is significantly below the numbers employed in Non-B-Class sectors but is projected to increase in the years up to 2026. The number of employees in other business space is set to decline slightly until 2026 and warehousing is set to remain steady. This is shown in Figure 1 below.
Figure 1 – Employee numbers by use type and projections until 2026

Source: GVA Grimley / Cambridge Econometrics
4. FUTURE ADDITIONAL EMPLOYMENT LAND & PREMISES REQUIREMENTS

4.1 Following completion of the steps outlined within Chapter 4 above and the consideration of the forecast employment growth as shown in Figure 1, the employment demand from the B-Use-Class floorspace types (Office, Other Business Space and Warehouses) is translated into floorspace demand using standard employment densities. The demand from the Non-B-Use-Class floorspace type is not quantified as it is not the focus of the Employment Land Study.

4.2 The result is that demand for employment floorspace resulting from economic growth is forecast to increase by 215,668 square metres between 2006 and 2026. This is broken down into the various floorspace types in Table 4.

Table 4 – Changes in Floorspace in South Gloucestershire 2006 to 2026

<table>
<thead>
<tr>
<th></th>
<th>Total Employees 2006</th>
<th>Employee Change 06 – 26</th>
<th>Employment Density m² per employee</th>
<th>Floorspace Change 06 -26 m²</th>
</tr>
</thead>
<tbody>
<tr>
<td>Office</td>
<td>48,890</td>
<td>14,886</td>
<td>18</td>
<td>267,949</td>
</tr>
<tr>
<td>Other Business Space</td>
<td>31,287</td>
<td>-4,057</td>
<td>32</td>
<td>-129,812</td>
</tr>
<tr>
<td>Warehouse</td>
<td>9,298</td>
<td>1,551</td>
<td>50</td>
<td>77,531</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>157,100</strong></td>
<td><strong>12,380</strong></td>
<td><strong>19</strong></td>
<td><strong>215,668</strong></td>
</tr>
</tbody>
</table>

Source: GVA Grimley/Cambridge Econometrics (2006). * = Figures may not total due to rounding

4.3 These changes are directly comparable with the SWRA RSS Employment Land Provision based on 2.8% Growth Scenario. When comparing these changes in floorspace requirements we note that while employment changes are similar there are marked differences between the need for additional industrial and warehouse floorspace. This is explained by the fact that the SWRA Report amalgamates Other Business Space and Warehousing and applies an average density of 35 m² per employee. In order to more accurately assess floorspace requirements we assume the standard ODPM

---

3 The floorspace changes from 2006 to 2026 do not total in some instances as the floorspace changes are rounded up or down each year between 2006 and 2026 resulting in small discrepancies within the figures but nothing that affects the model in a significant way

densities of 32 m² per Other Business Space employee and 50 m² per Warehousing employee to assess more precisely floorspace needs within the District which allows for more accurate planning in the future.

4.4 Of the three different floorspace use types office floorspace demand is projected to grow the most between 2006 and 2026. Demand for warehouse floorspace is projected to grow slightly and demand for other business space is projected to decline between 2006 and 2026. The decline in Other Business Space in particular is related to the general decline in traditional manufacturing throughout the UK and indeed most Western economies. This is replicated in South Gloucestershire and is a result of the projected decline in sectors such as Transport Equipment Metals & Engineering (see Table 2c).

4.5 So far future employment floorspace demand resulting from economic growth has been considered. As a next step the allowance for windfall losses is taken into account.

Allowance for Windfall Losses

4.6 The allowance for windfall losses takes into consideration the fact that for various reasons under specific circumstances some employment land might be used for other purposes (see paragraph 4.8). To estimate the windfall losses reference to historic losses has been made. According to the Annual Monitoring Reports (AMR) for South Gloucestershire, which are available from 2004/5 to 2007/8 the amount of employment land lost to non employment use is as follows:

Table 5 - Windfall losses in South Gloucestershire 2004 – 2008 Sq M

<table>
<thead>
<tr>
<th>Year</th>
<th>Office</th>
<th>Other Business Space</th>
<th>Warehouse</th>
</tr>
</thead>
<tbody>
<tr>
<td>2004/5</td>
<td>0</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>2005/6</td>
<td>1,398</td>
<td>1,876</td>
<td>0</td>
</tr>
<tr>
<td>2006/7</td>
<td>1,563</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>2007/8</td>
<td>483</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>Median Loss</td>
<td>941</td>
<td>1,720</td>
<td>0</td>
</tr>
<tr>
<td>Total Windfall Loss</td>
<td>18,810</td>
<td>34,390</td>
<td>0</td>
</tr>
</tbody>
</table>

Source: South Gloucestershire Annual Monitoring Reports* = Figures may not total due to rounding

4.7 In order to give a robust reflection of past losses we take the median of losses over the past four years. The median is used here so as to negate any major outlying number that would skew the overall figures. For example one large loss in a single year would make the average significantly higher than the median loss figure.
4.8 Taking the median loss of the past four years and multiplying this by 20 years (the planning period) an estimated 18,810 m$^2$ of Office employment land and 34,390 sq m$^2$ of Other Business Space land might be lost to other uses between 2006 and 2026.

**Allowance for Churn**

4.9 The allowance for churn (or frictional vacancy) takes into account that a certain amount of vacant floorspace is required for the commercial property market to work effectively. To estimate the churn demand we have taken the annual net take-up of employment floorspace as a guide.

4.10 Our analysis of data derived from the Council’s employment land monitoring systems suggests that the amount of commercial floorspace developed on previously developed land is as follows:

- 2004/5: 13,490 m$^2$
- 2005/6: 32,331 m$^2$
- 2006/7: 18,924 m$^2$
- 2007/8: 74,780 m$^2$

4.11 Please note that these figures may not correspond directly with those published in the Annual Monitoring Report’s because, in line with standard methodology we have removed outlying figures.

4.12 In our experience it takes around two years for a property to be redeveloped (see methodology, paragraph 3.13). Taking the median of developed floorspace on previously developed land of the past four years and multiplying it by two results in a demand for churn for employment floorspace of 51,255 m$^2$.

**Allowance for Economic Development Aspirations and Other Factors**

**Economic Development Aspirations**

4.13 In addition to employment projections based on forecasts it is important to consider the impact that economic aspirations will have on employment growth in South Gloucestershire throughout the planning period. Given the current economic climate we have assumed that annual GVA growth will be 2.8%, the current “low GVA growth” scenario from the Regional Spatial Strategy, and have calculated future employment land
requirements based on this assumption. To put these in context we have also considered two other scenarios:- high GVA growth and low GVA growth and provide alternative land requirements based on these assumptions. This allows for provision of a number of policy recommendations to be made based on potential future scenarios.

4.14 We therefore define two further scenarios for South Gloucestershire to consider: - an increase in GVA to 3.2% per annum based on the current “high GVA growth” scenario from the RSS provided by Cambridge Econometrics, and a reduction in GVA growth to 2.5% in line with the latest (Autumn 2008) forecasts for the West of England area provided by Experian Business Services. We use West of England forecasts as these are the latest forecasts as at 2008 and include the South Gloucestershire administrative area in order to make robust comparative assumptions.

**Scenario 1: High GVA Growth**

4.15 Our base case scenario prescribes 2.8% GVA growth each year between 2006 and 2026. In this scenario, an increase in the GVA figure to 3.2% per annum is applied and its effect on employment land increases is measured. These figures are taken from the Cambridge Econometrics “High Growth” scenario as used in the RSS.

**Scenario 2: Low GVA Growth**

4.16 In order to arrive at future employment projections which are more reflective of the current economic situation and assess their likely effect on South Gloucestershire we use the latest GVA figures for the West of England area which are available from Experian Business Services and are updated to Autumn 2008. This allows us to take account of the most recent changes in economic growth and we use these to project future GVA growth in South Gloucestershire. These reflect the current economic situation and indicate a smaller level of GVA growth compared to our “base case” scenario. These latest figures show that GVA growth in the West of England area will be 1.5% in 2008, GVA will decrease by 1% in 2009 with growth of 1.8% in 2010. Projecting this forward to 2026 results in an average annual GVA growth of 2.5% between 2006 and 2026.

4.17 We then use this figure of 2.5% annual GVA growth and apply it to the employment growth figures given in our “base case” scenario to calculate the requirements for employment land in a low growth scenario in South Gloucestershire.
Assessment of Changing Working Practices

4.18 The issue of changing work practices and their effect on the space needed per employee in the future is a much debated topic. The theory is that the increase in home working, hot-desking and cost pressures on employers to use space more cost effectively results in higher employee densities per sq m.

4.19 A recent study\(^5\) asserted that there was some evidence to support changing practices, with big employers such as BP and IBM requesting lower employment densities for their offices. However, a quantitative study of the South East concluded that employment densities were not changing overall in the region and did not make any strong conclusions on changing work practice.

4.20 While there is no quantifiable evidence to suggest that employment densities are changing, the view that they will alter in the future is supported by a recent report by the Chartered Management Institute\(^6\). They predict that the workplace will undergo significant change by 2018. They cite pressures to reduce carbon footprint and an ageing population which will require more time looking after elderly relatives as key reasons for this change. This will result in more work from home and possibly an alteration in the number of days that an individual works per week.

4.21 While there is a strong consensus that working practices will change, there is a lack of detailed quantitative studies to give an idea of what it will mean for employment density requirements in the future. Emerging policy, such as ongoing work on office densities by the British Council for Offices will inform future policy decision making and is something that South Gloucestershire should be aware of as more evidence emerges on this subject.

Summary of Needs

4.22 As described within Section 4 above we have based forecasts on Cambridge Econometrics data and this gives an indication of employment needs into the future. We have made allowances for expected windfall losses and for churn demand. We have included the 2006 VOA Stock figures to put the projected growth figures in context and to apportion the total churn figures to the different floorspace use types according to their current size as shown in Table 6. This represents our Base Case employment floorspace requirements and is the key figure to be taken forward in Stage 3.

\(^5\) Roger Tym & Partners, Ramidus Consulting & King Sturge (2006), The Use of Business Space in London
\(^6\) Chartered Management Institute (March 2008): Management Futures – The World in 2018
### Table 6 – 2.8 % ‘Base Case’ Employment Floorspace Requirements of South Gloucestershire 2006 -2026

<table>
<thead>
<tr>
<th>VOA Stock 2006</th>
<th>% of Total Stock</th>
<th>Floorspace Demand 2006 - 2026</th>
<th>Allowance for windfall losses</th>
<th>Allowance for Churn</th>
<th>Change in floorspace</th>
</tr>
</thead>
<tbody>
<tr>
<td>m²</td>
<td>%</td>
<td>m²</td>
<td>m²</td>
<td>m²</td>
<td>m²</td>
</tr>
<tr>
<td>Office</td>
<td>427,000</td>
<td>20.0%</td>
<td>267,949</td>
<td>18,810</td>
<td>10,349</td>
</tr>
<tr>
<td>Other Business Space</td>
<td>866,000</td>
<td>40.0%</td>
<td>77,531</td>
<td>20,699</td>
<td>-74,723</td>
</tr>
<tr>
<td>Warehouse</td>
<td>889,000</td>
<td>41.0%</td>
<td>-129,812</td>
<td>0</td>
<td>21,216</td>
</tr>
<tr>
<td>Total</td>
<td>2,182,000</td>
<td>100%</td>
<td>215,668</td>
<td>53,200</td>
<td>51,747</td>
</tr>
</tbody>
</table>

Source: GVA Grimley/Experian/VOA 2006

4.23 As is shown our base case indicates an approximate overall increase of employment land of around 14% from current VOA commercial stock figures in the District. However, it is the increase in office stock which is the greatest with a projected increase of 69% based on the current stock levels in the District. Other Business Space is projected to decrease by 9% compared to current stock levels and warehouse is projected to increase by 11% from current stock levels.

4.24 At this stage we translate the floorspace needs of South Gloucestershire into land requirements. To do this we combine Other Business Space and Warehousing requirements into a single category at this stage. This is because the locational needs of these uses are generally the same, as are the applicable plot ratios. We carry out this translation under the following plot ratio assumptions, which are generally regarded as standard in published employment land literature.

- Office: 0.8
- Industrial: 0.4

4.25 This results in the following additional land requirements in South Gloucestershire between 2006 and 2026 as shown in Table 7 below

### Table 7 Additional Employment Land Requirements in South Gloucestershire 2006 – 26 (Ha)

<table>
<thead>
<tr>
<th>Land Use Type</th>
<th>Change in Land Requirements (Ha)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Office</td>
<td>37</td>
</tr>
<tr>
<td>Industrial</td>
<td>6</td>
</tr>
<tr>
<td>Total</td>
<td>43</td>
</tr>
</tbody>
</table>

Source: Cambridge Econometrics / GVA Grimley
Scenarios for South Gloucestershire

4.26 The two scenarios relating to the possible employment growth are now considered in turn to assess the effect of these on employment demand levels within South Gloucestershire. This provides options within the final balance of supply and demand and allows for flexibility when planning future employment policies.

Scenario 1 – High Growth in South Gloucestershire

4.27 This scenario represents high growth in South Gloucestershire. As shown in Table 8 there is an increase in floorspace demand in South Gloucestershire by 58,461 m² under Scenario 1 throughout the planning period.

Table 8 – Scenario 1 ‘3.2%’ additional demand for employment floorspace in South Gloucestershire

<table>
<thead>
<tr>
<th>Additional Demand in South Gloucestershire</th>
<th>Employees</th>
<th>Floorspace (sq m)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Office</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>Other Business Space</td>
<td>1,313</td>
<td>42,016</td>
</tr>
<tr>
<td>Warehouse</td>
<td>299</td>
<td>16,445</td>
</tr>
<tr>
<td>Total</td>
<td>1,612</td>
<td>58,461</td>
</tr>
</tbody>
</table>

Source: GVA Grimley / Cambridge Econometrics

4.28 Table 8 shows that employees in offices are not forecast to increase under this Scenario because GVA growth in this instance is seen to give rise to higher productivity as opposed to an increase in jobs. This GVA Growth Scenario therefore results in the majority and nature of floor space demand being primarily for Other Business Space with to a lesser extent, Warehousing floorspace as a result of employment growth.

4.29 This additional floorspace requirement is now expressed as a land requirement in Table 9 below:
4.30 This scenario demonstrates the increase in land requirements are significant when GVA growth is set to be 3.2% as prescribed in the Cambridge Econometrics forecasts. This implies that should economic growth increase from the current base case scenario then a higher quantum of employment land would be required.

**Scenario 2 – Low Growth in South Gloucestershire**

4.31 This scenario represents low growth in South Gloucestershire. As shown in Table 10 there is a decrease in floorspace demand in South Gloucestershire by 2,798 m\(^2\) under Scenario 1 throughout the planning period.

**Table 10 - Scenario 2 demand change for employment floorspace in South Gloucestershire – Low Growth scenario 2.5% GVA**

<table>
<thead>
<tr>
<th>Additional Demand in South Gloucestershire</th>
<th>Employees</th>
<th>Floorspace (sq m)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Office</td>
<td>(-93)</td>
<td>(-1,666)</td>
</tr>
<tr>
<td>Other Business Space</td>
<td>(-19)</td>
<td>(-617)</td>
</tr>
<tr>
<td>Warehouse</td>
<td>(-9)</td>
<td>(-515)</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>(-483)</strong></td>
<td><strong>(-2,798)</strong></td>
</tr>
</tbody>
</table>

Source: GVA Grimley/Cambridge Econometrics

4.32 This is expressed as a land requirement in hectares in Table 11 below:
### Table 11 Scenario 2 Additional Land Requirements (Ha) in South Gloucestershire 2006 – 26

<table>
<thead>
<tr>
<th>Additional Demand in South Gloucestershire</th>
<th>Floorspace (sq m) m²</th>
<th>Land Ha</th>
</tr>
</thead>
<tbody>
<tr>
<td>Office</td>
<td>(-1,666)</td>
<td>-0.2</td>
</tr>
<tr>
<td>Industrial</td>
<td>(-1,132)</td>
<td>-0.3</td>
</tr>
<tr>
<td>Total</td>
<td>(-2,798)</td>
<td>-0.5</td>
</tr>
</tbody>
</table>

Source: GVA Grimley / Cambridge Econometrics

4.33 This demonstrates that an overall decrease in GVA of 0.3% does not have a significant overall impact in total requirements for employment land within South Gloucestershire. This means that, despite the current economic downturn, future planning policies should remain consistent with those applied to the “base case” scenario.

**Summary**

4.34 The findings for total employment land requirements for our base case and our two scenarios are shown in Figure 2 below. It shows the total employment land requirements:

**Figure 2 – Employment Land Demand within South Gloucestershire (Floorspace m²)**

Source: GVA Grimley / Cambridge Econometrics
4.35 The above findings will be considered alongside the conclusions of the Stage 1 Supply Side report to identify employment land shortfalls / over provision within Stage 3 of this Employment Land Study which will then seek to develop a portfolio of new sites.
5. DEMAND IMPLICATIONS & ANALYSIS OF BUSINESS SURVEY

5.1 The chapters above have provided an overview of the likely demand for employment land in terms of a forecasting model and property market information. Whilst we do not provide a detailed quantitative breakdown of demand by market sub area we provide an overview of the main growth sectors coupled with an overview of the main findings of the business survey. The business survey findings can then be used to validate the economic model and provide an overview of likely demand. Section 6 then provides an overview of the main demand implications for the District which can be taken forward into Stage 3 of the Employment Land Review.

Sectors

5.2 Further to the forecasting exercise detailed above, a more detailed analysis of the sector growth projected for South Gloucestershire shows that Finance and Other Business Services is set to grow at the greatest rate until 2026. Taking 2006 as a base year of 1 Finance and Other Business Services is forecast to grow to 1.5 (50%) by 2026. Other strong growth sectors are Hotels/Catering (forecast to grow to 1.27 or 27% by 2026), Distribution (forecast to grow to 1.23 or 23% by 2026), Construction (forecast to grow to 1.2 or 20% by 2026) and Public Services (forecast to grow to 1.19 or 19% by 2026). Manufacturing and Utilities / Agriculture are the two sectors forecast to decline in South Gloucestershire, both to 0.64 (-35%) by 2026. This is shown in Figure 3 below:
Figure 3 - Sector Growth in South Gloucestershire 2006 – 26

Source: GVA Grimley / Cambridge Econometrics

Business Survey

5.3 As part of building the evidence base for demand, a business survey was undertaken to identify the key issues for businesses in South Gloucestershire. In particular its aims were:

- Better understand the local labour market
- Understand trends and changes in the local economy
- Monitor employer’s experience of operating in South Gloucestershire
- Gain an understanding of local employer’s issues and needs
- Identify employment opportunities, skills gaps and training needs
- Inform planning and infrastructure requirements

The Survey

5.4 An initial mail out to 1,900 businesses was made in August 2008 in order to make potential respondents aware that they may be requested to take part in this survey. These 1,900 businesses were then approached via telephone, of which 310 took part which is a response rate of around 16%, which is generally considered to be a statistically significant response rate (response rates of 15% and above are statistically significant.)
5.5 A phone survey rather than a postal survey was performed because it is deemed to be more cost effective. The list of 1900 potential interviewees was provided by South Gloucestershire Officers and comprises of firms recorded as being on employment land i.e. The survey does not include retailers unless the retailer is located on a business park or is a small company operating from home.

5.6 Readers should take care when considering percentage results from some of the sub groups within the main sample, as the base figures may sometimes be small. Due to rounding some graphs may not add up to 100%.

5.7 GVA is confident, on the basis of the sample, that the survey presents a good representation of current thinking by local companies. To some extent findings may be coloured by the ongoing financial crisis occurring at the time the survey was undertaken, but respondents were asked to take a longer term view of their activities and needs.

5.8 The survey method allows for analysis and output by type of company / organisation and geographic area. The key findings of the results of the survey are set out below, a full breakdown of the results is provided in a stand alone document.

Organisational demographic and classification

5.9 The largest numbers of responses were received from organisations classified within the groups “Financial & Business Services”, “Distribution” and “Manufacturing.” The response was significantly reflective of the actual labour market in South Gloucestershire and of “B Class” businesses.

5.10 The greatest number of responses came from organisations located in the Kingswood and rural districts in South Gloucestershire. The geographical stratification of the Survey was largely indicative of the actual business / organisation geography of South Gloucestershire.

5.11 Around 37% of participants had been in South Gloucestershire for between one and five years. A further 21% had been present for between six and ten years. Only 1% of respondents indicated they were present for less than 1 year.

Business Demographics and Business Satisfaction

5.12 Sixty four percent stated that they were solely located in South Gloucestershire and did not operate anywhere outside of the District. 26% stated that they were national based,
while 10% were global, 6% had offices elsewhere in the South West, 6% in the wider Bristol area and 6% elsewhere in South Gloucestershire.

5.13 Of the respondents to the survey, 65% stated that they were a single site business (solely located in South Gloucestershire). 23% stated that they were a UK or international branch or subsidiary and 10% were a headquarters.

5.14 Fifty one percent of business respondents stated that good security features were very important to doing business in South Gloucestershire. Cheap rents were also considered to be very important by around 43% of respondents, as was on site parking for 42% of businesses surveyed.

Market Growth Expectations

5.15 Business respondents were asked whether they anticipated their market to grow or contract during the next 5 years. Over 54% of respondents expected the market to grow, while around 36% expected the market to stay about the same. The remaining 10% believed that their principal market would contract.

Future Plans of South Gloucestershire organisations

5.16 The majority of businesses (68%) had no plans to move operations away from South Gloucestershire. 5% of businesses already had plans to move away from South Gloucestershire, with a further 11% viewing a move as very likely.

5.17 The greatest reason that businesses gave for moving away from current premises was to move to a bigger site (56% of the cases). This was followed by a need to move to more suitable premises (13%).

5.18 The majority of those respondents that were considering relocation planned to do so within South Gloucestershire (55%). A further 32% also planned to stay within the wider Bristol area with 8% planning to move away from Bristol area.

5.19 Around 43% of respondents that were considering moving wanted premises of 460 square metres or less. Meanwhile, around 10% of those considering moving required premises of over 1800 square metres.

5.20 Further analysis of the above findings is provided within the attached stand alone document.
6. SUMMARY & RECOMMENDATIONS

6.1 The following chapter provides an overview of the key demand implications arising from the economic modelling, property market review and business survey explained above. Our aim here is to combine our review of the forecast changes by sector in Table 2c and assess where this is most likely to occur.

North Fringe

6.2 The North Fringe is South Gloucestershire’s established employment area and on the basis of our property market analysis will continue to be so in the future. It includes a number of the main out of town office parks within the Bristol area with major occupiers including AXA Insurance, Orange, Atkins and the MoD.

6.3 The area accounts for over 50% (an estimated 75,000) of the jobs in South Gloucestershire. With locations such as Bristol Business Park, Aztec West, Vantage Office Park and major occupier sites at Filton make this the most economically vibrant market area in the authority area.

6.4 On the basis of this we expect the majority of Banking & Insurance and Other Business Services sector growth to take place in the North Fringe.

6.5 Additionally, the purchase of the Rolls Royce East Works site by Distribution developer Prologis in the area demonstrates its potential as a strong distribution location in the future, therefore a proportion of the distribution sectors growth will also occur within the North Fringe. (We do note however that as of 20th April 2009 Prologis have formally walked away from the site citing the international investment situation for the decision, we understand that the site will be cleared and re-marketed in the future by Rolls Royce. Despite this decision by Pro-logis we still feel that their initial purchase decision does demonstrate an expected demand for B8 uses in this area).

6.6 The University of West England’s decision to purchase a large parcel of land formerly owned by HP also indicates the potential for future growth in the “Education and Health” sector in the North Fringe.

6.7 Finally, the presence of the Aerospace cluster around Filton Airfield suggests that employment and demand for land will remain steady or increase.
Severnside

6.8 The availability of land around Severnside and the continuing demand for distribution in this area suggests it will take a large proportion of the projected 33% growth in the distribution sector in South Gloucestershire. It’s strong links to the Port and to the Motorway network which links Severnside to the South West and to Wales ensures that it will remain a strong distribution location in the future. Major occupiers include Dixons, Warburtons, Constellation Europe, Next and Royal Mail.

6.9 The area is not seen as an office location so the likelihood of growth of Banking & Insurance and Other Business Services is not strong. Severnside is still experiencing demand for manufacturing uses which potentially has impacts on traditional manufacturing areas such as Filton. Nevertheless it is likely that, although manufacturing is forecast to stay relatively steady until 2026 in South Gloucestershire, losses in places such as Filton may mean an increase in manufacturing employment in Severnside. The manufacturing sector includes activities such as recycling and renewable energy activities, which are growing in Severnside indicating the further likelihood of an increase in the manufacturing sector in this area.

Emersons Green

6.10 Emersons Green complements the North Fringe and has a similar sector representation. It includes the science park designation east of the A4174 and west of the M4, based on existing and extended employment allocations and an emerging Harlequin Office Park (formerly Viceroy Gate). The Distribution Centre for Sainsbury’s is also a major development within this area.

6.11 On the basis of its similarities to the North Fringe we assess that Emersons Green will account for a significant proportion of growth in the office based sectors such as Banking & Insurance and Other Business Services. Also, the development of the science park within Emersons Green will give rise to a proportion of the increase in the Other Business Services sectors in South Gloucestershire.

6.12 The presence of the Sainsbury’s Distribution Centre suggests that Emersons Green will also experience a proportion of the Distribution sectors growth up until 2026.
Kingswood

6.13 Kingswood is a predominantly residential area with a comparatively small commercial presence. There is however significant pressure for the change of use of many of the older employment sites particularly in the Kingswood urban area. The commercial stock is focussed towards small indigenous businesses. On the basis of our assessment it is likely that this will continue throughout the planning period. There is a strong presence of the manufacturing sector in Kingswood and it is likely that this will remain steady in Kingswood in the future.

6.14 There is also a variety of small office uses which indicates a proportion of Banking & Insurance sector growth and the Other Business Services sector growth will occur in Kingswood.

Yate

6.15 Yate is a comparatively large employment area primarily consisting of manufacturing and distribution focussed industrial estates. However, the distribution units are increasingly falling short of modern requirements being offered elsewhere. This suggests that it’s position as a location for distribution may not sustain through the planning period with the presence of Severnside and to a lesser extent Emersons Green.

6.16 There has, however, been an increase in demand for office uses within this area given its location near to Bristol. We therefore view that a modest proportion of the increase in office based sectors such as Other Business Services and Banking & Insurance will occur in Yate.

Rural

6.17 The rural parts of South Gloucestershire, by their very nature, are dispersed and therefore demonstrate different characteristics in each areas. The rural areas are characterised by some major employers which have grown over many years into established businesses such as The Alderly Group HQ at Arnolds Field Estate at Wickwar and the Heritage Wine Company at The Old Brewery.

6.18 With the presence of office uses in Thornbury and smaller industrial uses in other parts of the rural area we view that a small proportion of Other Business Services sector growth and Banking & Insurance sector growth will occur in the Rural areas.
Conclusion

6.19 In terms of the business survey results, the key findings indicate a requirement for cheap rents and good security, particularly within the Emmerston and Severnside areas. On-site parking is also a key consideration for businesses, and is particularly important within the North Fringe and Emmerston. One further key finding was the business profile of the respondents suggesting a low average length of presence for occupiers, however there was a general picture that relocation was not a likely future option and if it was it would be within the District or at least the wider Bristol area.

6.20 The forecasting exercise has indicated an employment growth total of 19% between 2006 – 2026 (using standard 2.8% base case growth) within South Gloucestershire. This equates to an additional land requirement of 43 hectares. The major growth sectors are expected to be Other Business Services (62% growth), Distribution (33%) and Education and Health (29%). These rates are above the South West average forecast and will therefore create specific property demand requirements within South Gloucestershire. The largest declines are expected in Transport Equipment (-60%), Agriculture (-43%) and Food, Textiles and Wood (-35%). However, given the subsequent severity of the downturn in financial services since August 2008 we also advise that South Gloucestershire Council continue to keep this matter under review through the Council’s Economic Development function.

6.21 Given that the manufacture of aircraft sector is a major employer within the District our forecast reduction reflects the broader UK trends of a decline in traditional manufacturing. The retention of this sector would clearly make a large difference in land requirements in the District throughout the planning period. This is something that should be considered in any future employment land strategies or business retention strategies for the area.

6.22 The study has also made allowances for expected windfall losses and for churn demand and also considered a high growth and a low growth scenario. Once windfall and churn are taken into account, we project that over the period 2006-2026 there will be an additional total requirement of between 317,817 sq m and 379,076 sq m of employment floorspace for B-class uses in South Gloucestershire, which equates to between 42.5ha and 57.6ha of land. The requirement for office space is projected to increase significantly. We predict that between 295,442 sq m and 297,108 sq m of additional office floor space will be required. Translated into land requirements we project that approximately 37ha of land will be required for office use. In terms of warehousing, we project that between 98,232 sq m and 115,192 sq m of floorspace will be required, whilst the requirement for ‘Other Business space’ (B1c & B2) is expected to decline from between 32,707 sq m and
75,340 sq m from 2006 levels. When translated into land demand, between 5.7ha and 20.6ha of land are likely to be required for industrial uses in the period to 2026. The underlined figures indicate are based on the 3.2% GVA growth scenario – which are consistent with the ‘high growth’ projections outlined in the emerging South West Regional Spatial Strategy. We suggest that the Council’s future employment land policies should remain consistent with this scenario.

6.23 Therefore in summary, by applying the model findings to use type the results show that the highest number of employees are currently, and will continue to be, in the Non-B use class sectors. Employment in offices is significantly below the numbers employed in Non-B Class sectors but is projected to increase in the years to 2026. The number of employees in other business space is set to decline slightly until 2026 and warehousing is set to remain steady.

6.24 In terms of catering for this growth, Stage 3 of this report will need to consider carefully the pitfalls of over reliance on a single location to cater for a specific land use. For example the huge projected increased demand for office floorspace is likely to be targeted at existing office locations in the North Fringe and Emersons Green, however new locations such as Yate may need to be explored, particularly in light of available land and to serve the expected growth of the settlement. In taking the analysis forward the Council should also have regard to changing national and regional policy and sub-regional projections.

6.25 The above findings will be considered alongside the conclusions of the Stage 1 Supply Side report to identify employment land shortfalls / over provision within Stage 3 of this Employment Land Study which will then seek to develop a portfolio of new sites.