Glenlivet Estate

Mountain Bike

Forest Hub

Economic Impact Assessment

November 2009 **FINAL**

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Mountain Bike

Forest Hub

Economic Impact Assessment

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Revision History			
Issue Number	Issue Date	Checked	Summary

Contents

Tables

Charts

Maps

1. Introduction

1.1 Background

The Glenlivet Estate, situated in the south of Moray, is part of the Cairngorms National Park and has been part of The Crown Estate since 1937. The Estate consists of 23,000 hectares of upland livestock farms, forest and moorland, and is home to a wide variety of flora and animal species.

There is a choice of mountain biking, walking and nature trails set out throughout the Glenlivet Estate, as tourism is a very important industry to the area. Work is taking place to enhance the current network to help make Glenlivet and Scotland a world leader in areas such as mountain biking.

The main aim of The Glenlivet Estate is to develop new uses for the land that complement the traditional and existing activities, with particular interest to enhancing agriculture, tourism, forestry and sport whilst maintaining and protecting the landscape for a wide variety of flora and wildlife species.

1.2 Current Aims and Purpose of Economic Impact Assessment

This document aims to examine the likely economic impact of The Glenlivet Estate developing a network of mountain bike routes and a Forest ‘Hub’ in the Glenlivet forests, and the wider contribution that could be made by the project in the area.

1.3 The Project

As indicated in 1.2 the aim is to develop a regional scale mountain bike centre in the Glenlivet forests capable of creating and sustaining jobs and bringing income to the area. The mountain bike trails are seen as a good opportunity to add significantly to the popularity of a rural area with declining rural industries and a declining population.

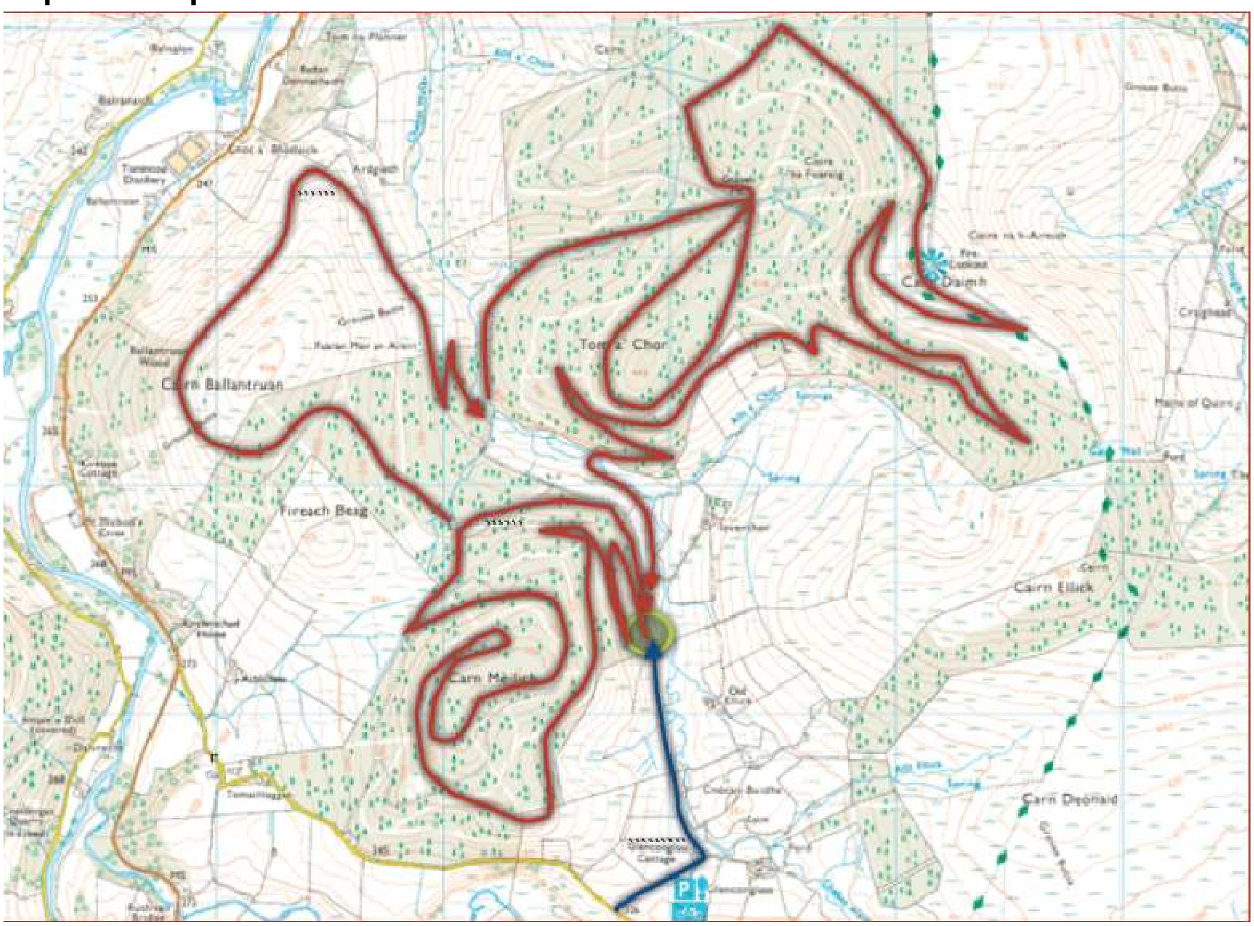
The project proposes to build a network of challenging off-road and downhill mountain bike trails which will then act as an economic driver for a forest ‘hub’ in the Glenlivet forest to take advantage of a growing popularity in mountain biking and attract a greater number of visitors to the area. The mountain bike trails will improve the current network of mountain bike, walking and nature trails in the forests and increase the amount of outdoor activities available to tourists.

In order to get to this stage a Feasibility Study was commissioned to examine the feasibility of developing a dedicated mountain bike centre and trails in Glenlivet. The Study concluded that:-

"The Glenlivet Estate as a location has the potential for the development of natural low impact, high quality mountain bike trails that would attract visitors and act as a driver for income to the local and regional economy"

What is proposed is the creation of three new trails and a mountain bike visitor centre or Forest Hub with a shop, cafe, toilets, and at a future date some basic bunkhouse/camping type of accommodation. The mountain bike trails will be single track, range between 8 and 21km and be of a high quality capable of attracting a wide spectrum of mountain bikers, from the less experienced to those with more skill, to the area.

Map 1.1: Proposed Mountain Bike Trails



The total cost estimate for the creation of the three trails is £717,000. This includes the cost of preparing the site for the Hub but not for the building which would be in the order of a further £80,000 plus internal equipping costs.

The Crown Estate will own the facilities and plans to rent out the space at the Hub to one or more operators. It has established some interest from third parties who could run the facilities.

The development of the Forest 'Hub' will take place concurrently with the mountain bike trails so that it is ready to open once the trails are in place. Much of the early work will involve levelling, car parking and landscaping the area to be suitable to build upon. There will also have to be improvements in the current vehicular access to the forest 'hub' location. The forest hub will include;

- Visitor Centre;
- Bunkhouse; and possible space for a caravan/camping site; (This is not budgeted for in the business plan, except for the optimistic scenario in 2014/15).
- Bike Hire / Repair, Bike Wash and Storage Facilities;
- Cafe / Shop;
- Showers, Changing and Toilet Facilities;
- Information Point; and
- Car Parking.

2. Baseline Position

2.1 Recent Trends in Population

The population in Moray has shown steady increase since 1961 with the population rising over 15% between 1961 and 2001. The greatest increase came in the 1970's when the population rose by nearly 8%. The majority of Moray's population lies in the five main towns of Elgin, Buckie, Forres, Keith and Lossiemouth. Moray covers an area of 2238 square kilmoeters thus the overall population density is relatively low at 39 persons per square kilometre compared with the Scottish average of 65.

Table 2.1: Moray Population 1961 - 2008

	1961	1971	1981	1991	2001	2008*
Population	75,286	75,659	81,525	83,616	86,940	87,770

Source: Census of Population 2001.

While Moray's population has continued to increase Glenlivet Ward has declined, dropping over 6% between 1991 and 2001. At the time of the 2001 census the population of The Glenlivet Ward was 2,949, these are no reliable estimates since the 2001 census figure, however it is expected that the current population level will be fairly close to the 2001 figure.

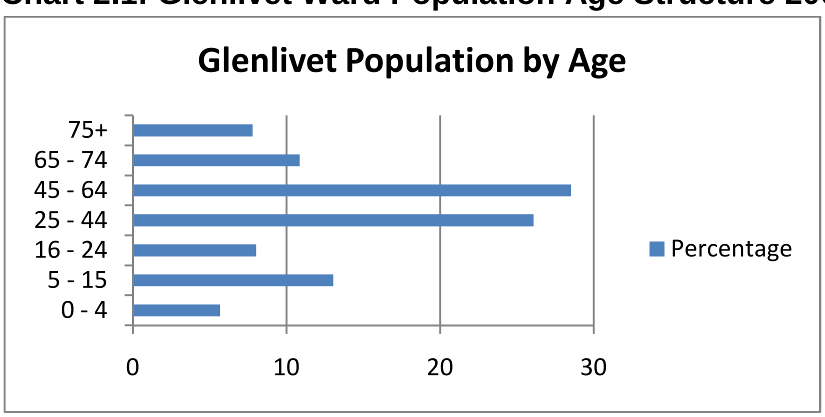
Table 2.2: Glenlivet Ward Population 1991 - 2001

	1991	2001
Population	3,151	2,949

Source : Census of Population 2001.

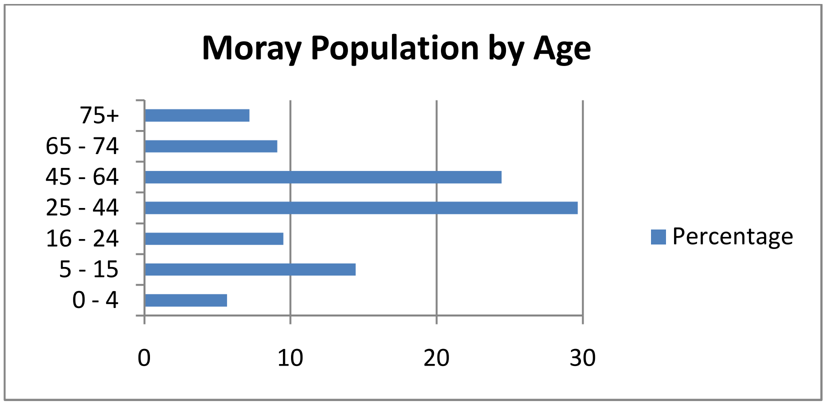
It should be noted that this data is for the Ward which extends to include Dufftown. The population level in the village of Tomintoul itself is estimated to be around 400.

Chart 2.1: Glenlivet Ward Population Age Structure 2001



Source: Census of Population 2001

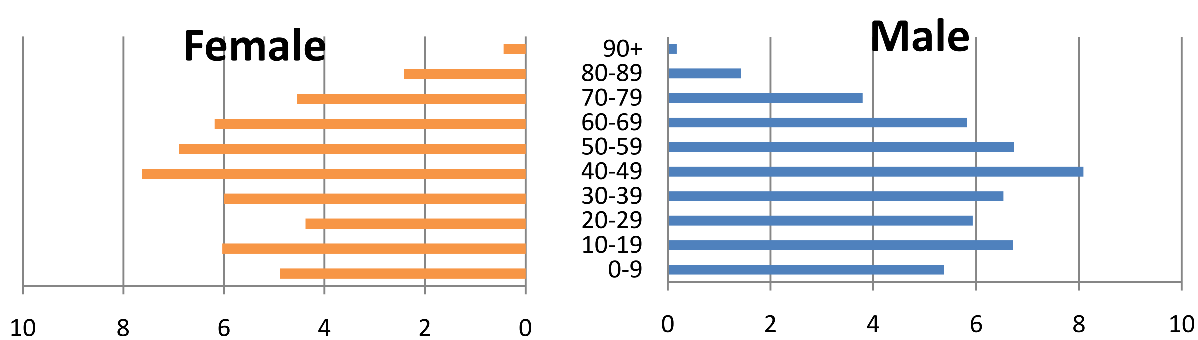
Chart 2.2: Moray Population Age Structure 2008



Source: 2001 Census of Population 2001

The Moray population age structure is similar to that for Glenlivet Ward (due to the larger age brackets in the middle). However the Moray population is younger with a larger quantity in the categories up to 25-44. The Glenlivet Ward population chart shows a larger quantity of people in the over 45 categories.

Chart 2.3: Moray Population Pyramid 2008



Source: 2001 Census of Population

The Moray population has a larger quantity of males than females under 50 and a larger number of females than males over 50. The most common age group in Moray is the 30-39 bracket with 16.08% of the population being of this age. This is followed by the 40-49 age group containing 13.89% of the population.

The total number of females is marginally greater than the total number of males, with 50.03% being female. The total number of people in Moray in 2001 was 86,940.

The working age population in Moray is estimated to be 53,200 or 60% of the total population. This is slightly lower than the national average. The percentages in Glenlivet are slightly smaller again.

Table 2.3: Working Age Population in Moray (2008) and Glenlivet (2001)

	Glenlivet	Glenlivet %	Moray Number	Moray (%)	Scotland (%)
All	1744	59.1	53200	60.6	62.6
Male	924	62.6	29300	65.9	66.9
Female	820	55.7	23900	55.1	58.7

Source: Nomis official labour market statistics and 2001 population census.

2.1.1 Projected Population

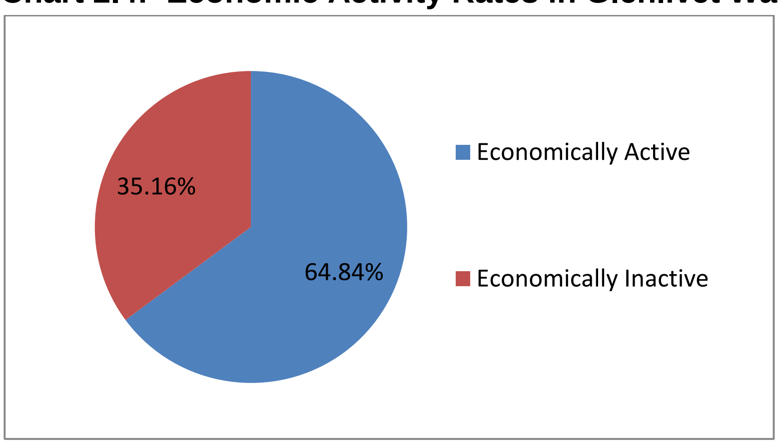
Given recent trends in the population of Glenlivet Ward and the known opportunities and potential for new economic development it is likely that the population will, at best, remain at a similar level, though it could continue to decline and is likely to continue aging.

2.2 Economic Activity

A good range of economic data is available at the level of Moray but it is much harder to get similar data for Glenlivet. This is unfortunate as Glenlivet is very different from the rest of Moray which tends to mask what is going on in Glenlivet. A useful part of the baseline is an analysis of activity rates in the population, the employment/industrial structure, unemployment, output/turnover, Gross Value Added, and occupation structure. The section that follows provides what information is available without undertaking extensive survey work.

Economic activity levels for Glenlivet Ward are shown in the following chart

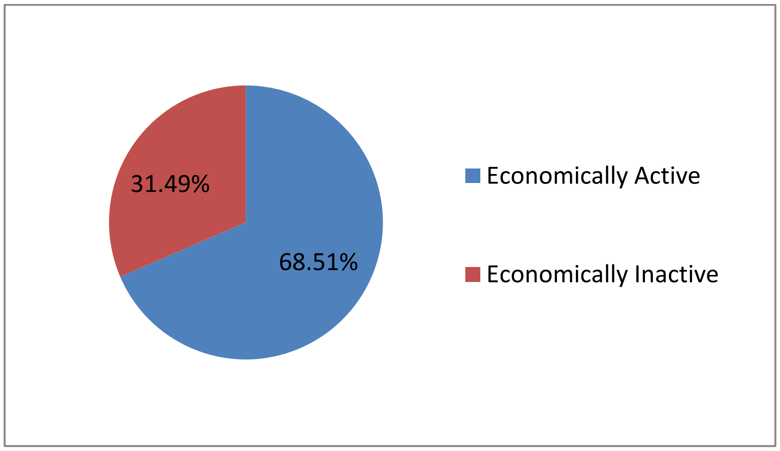
Chart 2.4: Economic Activity Rates in Glenlivet Ward (2001)



Source: Census of Population 2001 Sex and Age by Economic Activity

Economic activity levels for Moray in which Glenlivet is included are shown below.

Chart 2.5: Economic Activity Rates in Moray (2001)



Source: Census of Population 2001 Sex and Age by Economic Activity

The tables below detail some of the above results.

Table 2.4: Economic Activity in Glenlivet Ward and Moray 2001

Economically Active		
	Glenlivet	Moray
Employed FT	33.78%	41.63%
Employed PT	12.37%	13.32%
Self Employed	13.94%	8.09%
Unemployed	3.46%	3.52%
Full Time Students	1.29%	1.95%
Total	**64.84%**	**68.51%**
Economically Inactive		
Retired	19.10%	14.72%
Student	3.18%	2.94%
Looking after home / family	5.63%	6.17%
Disabled / Permanently sick	4.34%	4.57%
Other	2.91%	3.09%
Total	**35.16%**	**31.49%**

Source: Census of Population 2001 Sex and Age by Economic Activity

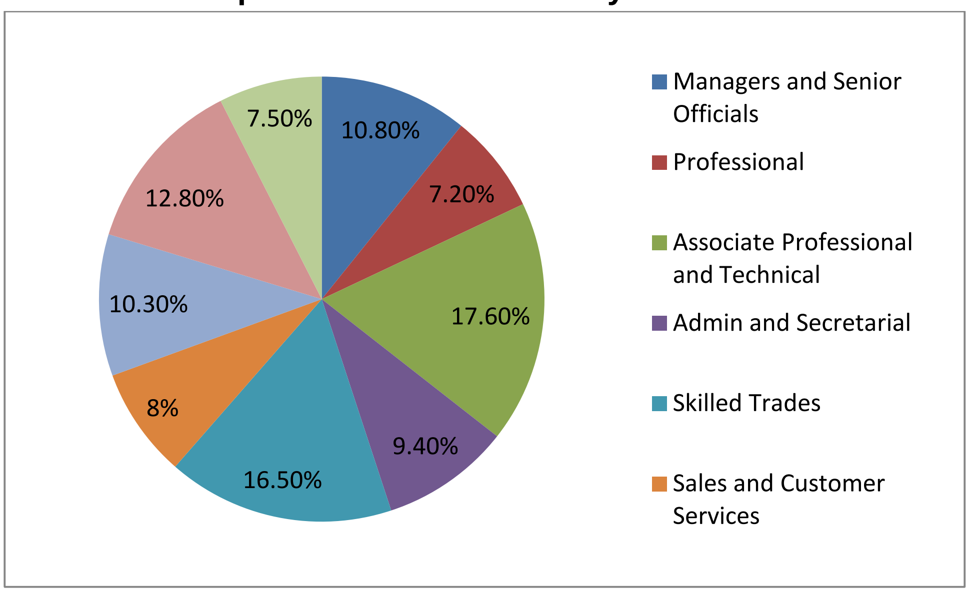
From the pie charts and tables above we see that Glenlivet Ward has a lower proportion of economically active people than Moray. Moray also has a higher proportion of full time and part time employees as well as a greater number of unemployed and full time students. The only economically active area where Glenlivet is greater than Moray is the proportion of self employed with 13.94% of Glenlivet being self employed compared with 8.09% in Moray. This is a reflection of the respective employment opportunities in Glenlivet as against the rest of Moray.

Of the economically inactive populations 54.32% of Glenlivet's is made up from retired people compared to 46.7% of Moray's. Glenlivet has a greater proportion of students than Moray, although Moray has a greater proportion of people looking after homes and families and a greater percentage of disabled.

2.2.1 Occupation Structure

The chart below shows the breakdown of employment by occupation in Moray in 2001.

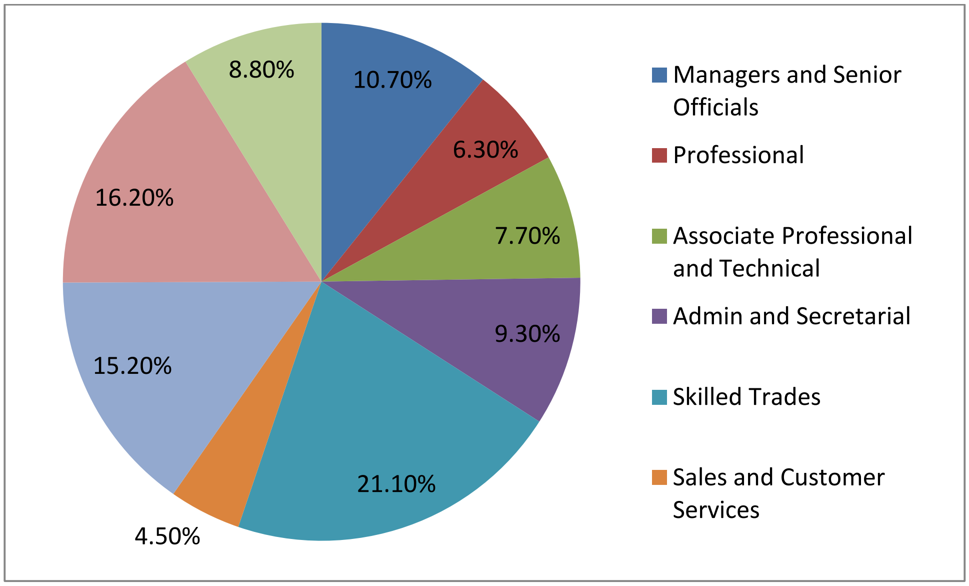
Chart 2.6: Occupation Structure in Moray 2001



Source: Census of Population 2001 Sex and Age by Economic Activity

The chart below illustrates the employment by occupation in Glenlivet Ward in 2001.

Chart 2.7: Occupation Structure in Glenlivet Ward 2001



Source: Census of Population 2001 Sex and Age by Economic Activity

2.2.2 Employment and Industrial Structure in Moray and Glenlivet Ward

Moray has a relatively diverse industrial base with the food and drink sector which includes over 50 distilleries and several nationally important producers, two major RAF bases, and tourism being particularly important. In addition, textiles, wood, paper and metal manufacture are also important.

The total number of employees in employment in 2007 was around 36,000 spread across the main sectors as follows:

Table 2.5: Employees in Jobs in Moray in 2007

Industry	Quantity	Percentage
Manufacturing	5200	14.5
Construction	2300	6.5
Services	25300	70.0
Tourism Related	3200	9.0
Total	36000	100

Source: Nomis Area Profile

This total excludes self employed, HM forces and those on government supported training schemes, as well as employees in the primary sector (agriculture, fisheries), forestry). The total employees is likely to be around 39,000 while self employed were a further 6000 (13%) to give a total of over 46,000 in employment.

The total number of residents in employment in Glenlivet Ward in 2001 was around 1200 with 23% being self employed (source: 2001 Census). The latter is very high when compared to Moray as a whole or to other areas due to the importance of forestry and agriculture where most people tend to be self employed; no breakdown by sector is available. The fact that the Glenlivet Ward data includes Dufftown means that even this data is not so relevant to the Glenlivet estate and Tomintoul area. Thus it has been necessary to undertake a limited survey to identify the businesses that currently exist in the Tomintoul area and the numbers employed to help provide a baseline and assess impacts. Data has been gathered from the rate register and local survey to generate the following results.

Table2.6: Businesses and Employment in Tomintoul Area 2009

Business Sector	**Industry**	**Employment**		
		FT	PT	FTE
Agriculture, Forestry, Estate and Game activities		57	15	64.5
Construction		3	4	5.0
Manufacturing including extraction		28	13	32.0
Services	Retail and Business Services	11	4	13.0
	Tourism	23	56	40.5
Public Services		6	15	13.0
Total		**125**	**106**	**168.0**

Sources: Glenlivet Estate, Agric Census, rate register, local survey

It is clear from this data that agriculture and services (both public and private) are the most important sources of employment in the area. Tourism stands out as the biggest employer though this is largely because of the high number of self catering establishments that provide mainly part time employment.

2.2.3 Unemployment

Unemployment levels and trends in Moray are strongly influenced by what is happening in the main towns and the MOD bases. The main figures are as follows:-

Table 2.7: Unemployment Rates in Moray 2004-2008

Moray	**2004**	**2005**	**2006**	**2007**	**2008**

Rate	3.8%	4.1%	4.1%	3.5%	3.8
Numbers	1600	1800	1800	1600	1800

Source: Annual Population Study

Table 2.8: Unemployment in Moray (2008)

	Moray Number	Moray (%)	Scotland (%)
All	1700	3.7	5.3
Male	1100	4.3	5.8
Female	Sample too small		4.8

Source : Nomis official labour market statistics

As can be seen from the two tables above the level of unemployment has overall remained relatively steady over recent years at around 1700.

Table 2.9: Unemployment in Glenlivet (2001)

	Glenlivet	Glenlivet (%)	Moray (%)
All	78	5.7	5.6
Male	49	6.3	5.8
Female	29	5.0	5.4

Source: Census of population (TableCAS028 – sex and age by economic activity

In Glenlivet the number of unemployed from the 2001 Census was 78. It is likely to have come down since then in line with overall trends though no precise figures are available.

2.2.4 Output and Gross Value Added (GVA)

Table 2.10: Turnover and GVA by Industry in Moray (2007)

			Basic Prices		**Per Employee**	
Industry	Area	Turnover (£m)	GVA (£m)	Total Output (£m)	GVA (£)	Labour Costs (£)
Manufacturing	Moray	724.7	400.4	738.2	76,807	24,322
	Scotland	38,885.9	13,486.0	37,302.8	61,252	28,866
Construction	Moray	310.2	113.1	312.0	53,035	28,419
	Scotland	15,547.3	6,372.5	15,654.4	50,061	26,598
Services	Moray	1,477.1	584.0	864.8	37,387	18,579
	Scotland	109,266.0	36,759.1	67,371.6	29,458	19,549
Tourism	Moray	94.4	46.0	86.4	15,271	7,986
	Scotland	13,294.2	4,051.0	12,351.8	19,405	10,712

Source: Scottish Executive, Annual Business Statistics 2007

Tourist Industry in Moray: Employment in tourism in Moray is estimated to be 3200 or 9% of the total. In 2004 Moray played host to around:

- 375,000 people using commercial accommodation, this generated around £66 million which is approximately £176 each.
- There were also 107,000 overnight visitors staying with friends and family and contributing £9.72m, averaging £88 per person.
- 258,000 day trippers amounting to £9.42m, which averages at £36.51.

From the total visitor days, visitors in commercial accommodation provided around 63%; visitors staying with friends and family 24%; and the remaining 13% being day trippers.

2.2.5 Incomes

Average incomes in Moray are below the Scottish average in all categories and reflects the range of employment opportunities in the area.

Table 2.11: Gross Weekly pay in Moray (2008)

	Moray (£)	**Scotland (£)**
All	374.8	440.2
Male	469.7	534.1
Female	302.7	354.3
Full Time	469.4	534.4
Part Time	170.0	184.0
Male Full Time	544.6	584.5
Male Part Time	*	170.3
Female Full Time	388.6	466.9
Female Part Time	183.8	187.8

Source: Annual Survey of Hours and Earnings, * - insufficient data for result

3. Strengths, Weaknesses, Opportunities and Threats (SWOT) Analysis and Key Issues

The key issues facing the Glenlivet area revolve around how to sustain and grow tourism numbers, employment and population. Mountain biking is one of the attractions which could help to increase the critical mass of facilities and tourism numbers in Glenlivet, and will add to the quality of the existing activities which attracts people to Glenlivet.

To attract a greater number of mountain bikers to the area Glenlivet needs to produce a high quality marketable system of mountain bike trails.

Glenlivet Area – A SWOT Analysis

Strengths
Unique, protected, natural environment
A diverse population of flora and fauna
Serene Qualities
Scenic landscape
Estate Infrastructure e.g. interpretive centre and extensive literature
Ranger Service

Weaknesses
A reliance on tourism
Transport links (in winter particularly) and remoteness
Lack of critical mass of attractions and activities to draw people to stay in the area
Limited range of accommodation (especially serviced accommodation and no camp/caravan site)

Opportunities
High quality mountain bike trails will improve biking visitor experience.
Population retention and economic growth
Provision of more indoors and out door facilities for visitors
Provision of a wider range of accommodation facilities
Development of heritage attractions

Threats
Competition for visitors from other areas
Other areas with mountain bike trails may draw away potential visitors
Poor weather in summer and too much snow in winter
Run down appearance of part of Tomintoul

4. Impact of 'Forest Hub' and Mountain Bike Trails

4.1 Background Context and Assumptions

4.1.1 Comparison with Laggan Wolftrax

The Laggan Wolftrax mountain bike trails are around 50 miles from the proposed site near Tomintoul. Both are situated around 25 miles from Aviemore and Laggan is situated near Laggan, a village with a population of around 200 people.

The Laggan Wolftrax trails have a number of similarities with the proposed trails in Glenlivet and are therefore a good example as a case study. For example the trails are situated in a relatively remote area of the Highlands and have a shop and cafe for mountain bikers. However there are also a number of relevant differences as well such as:-

- Glenlivet site is at the end of a single track road while Laggan is situated alongside a main road therefore more visible and accessible.
- Glenlivet site will have three long bike routes amounting to 39km in the green, blue, and red categories which have a broad appeal to the recreational cyclists while Laggan has 4 shorter routes amounting to 30km in green, blue, red and black plus a bike park facility that appeals to enthusiasts with high levels of skill.
- Glenlivet propose to provide a camp/caravan site which is not included at Laggan.
- Laggan provide pony trekking from the base camp as well as walking and recreational cycling forest track trails, while Glenlivet could have the latter two.

In its first year (2005) Laggan Wolftrax attracted 14,325 mountain bikers who used the trails a total of 42,974 times and in the second year (2006) visitor numbers were estimated at around 16,000, with 48.8% as day trippers and 51.2% therefore being overnight tourists.

The average spend for users of the trails per day in the Laggan area was as follows;

- £11.87 Day Visitors
- £25.58 Overnight Scots
- £29.94 Overnight Elsewhere UK
- £39.17 Overnight Overseas

The origins of the visitors are show in the table below.

Table4.1: Origin of Laggan Wolftrax Visitors

Origin	Day Visitors	Overnight
Laggan Area	3.6%	0%
Badenoch & Strathspey	5.6%	0%
Inverness and East Highlands	11.1%	0.4%
Elsewhere Highlands and Islands	4.4%	1%
Elsewhere Scotland	24%	31.7%
Elsewhere in UK	0%	16.7%
Overseas	0%	1.4%
Total	48.8%	51.2%

Source: Laggan Wolftrax Evaluation, Dec 2006

The average length of stay in the area is shown in the below table.

Table 4.2: Average Length of Stay of Laggan Wolftrax Visitors

	Scottish (days)	Non Scottish (days)
Laggan	0.9	0.8
Badenoch and Strathspey	1.5	1.3
Inverness and East Highlands	1.6	1.4
Highlands and Islands	1.9	2.1
Scotland	2.0	2.3

Source: Laggan Wolftrax Evaluation, Dec, 2006

4.1.2 Glenlivet – Possible Visitor Scenario

The data from Laggan can be used to help generate estimated income from the proposed mountain bike trails and Forest Hub in the Glenlivet Forest. However some adjustments are needed to take account of the slightly different facilities and thus markets. Glenlivet should have a wider appeal to recreational bikers that are projected to grow even more significantly than the specialist end of the market. As a result an estimate of around 16,000 visitors per annum to the Glenlivet Forest Hub is used for the most likely scenario in the Business Plan. After 2014 this total includes all users of cafe/shop, not all of whom will use the trails. A range is introduced for the pessimistic and optimistic scenarios of 13,500 and 18,500.

Using the breakdown from the Laggan Wolftrax and modifying it according to the slightly different markets at Glenlivet we would expect around 40% or 6400 of these visitors to be day trippers and around 9600 to remain in the area for more than 1 night. This compares with Laggan where it was estimated that 50% stayed overnight and 50% were day trippers. Using the percentages above the following table can be generated.

Table 4.3: Origins of Glenlivet Visitors

Origin	Day Visitors		Overnight	
	Percentage	Number	Percentage	Number
Tomintoul Area	2.9%	464	0%	0
Glenlivet and Moray	4.5%	720	0%	0
Inverness and East Highlands	9.0%	1440	0.5%	80
Elsewhere Highlands and Islands	3.6%	576	1.2%	192
Elsewhere Scotland	20%	3200	37.2%	5952
Elsewhere UK	0%	0	19.5%	3120
Overseas	0%	0	1.6%	256
Total	40%	6400	60%	9600

Table4.4: Average Lengths of Stay in Glenlivet due to Forest Hub

Origin	Day Visitors	Overnight	Total
Tomintoul Area	464	0	464
Glenlivet and Moray	720	0	720
Inverness and East Highlands	1440	80	1520
Elsewhere Highlands and Islands	576	192	768
Elsewhere Scotland	3200	5952	9152
Elsewhere in UK	0	3120	3120
Overseas	0	256	256
Total	6400	9600	16000

Table 4.5: Average Length of Stay of Visitors to Glenlivet Forest Hub

Origin	Scottish (days)	Non-Scottish (days)
Tomintoul Area	0.9	0.8
Glenlivet and Moray	1.5	1.3
Inverness and East Highlands	1.6	1.4
Highlands and Islands	1.9	2.1
Scotland	2.0	2.3

It should be stressed that this data is not based on a local survey but has been constructed using assumptions from other surveys, notably from the Laggan mountain bike facility.

4.2 Direct Impact

It is proposed to build the new trails in a way which enhances the current network of trails in Glenlivet. The mountain bike trails will not only improve the experience for visitors but also the local population with the addition of the Forest Hub being open all year round that will support two full time and two part time jobs and attract visitors all year round (3FTEs). It is likely to generate new turnover at the hub of around £150,000 per annum. There are also likely to be impacts from the construction phase of the project if local contractors are involved. If some workers come from outside the area then they will require accommodation and feeding.

If the construction is spread over three years then it is more likely to favour local labour. It is estimated that seven to eight could be involved in the trails work and two to three in the Hub. This would be the equivalent to 3 FTEs (10 workers over 3 years / 10, to give FTEs (1 person over 10 years = 1 FTE)).

The new mountain bike trails are aimed at family participation in particular. The mountain bike trails will add to the overall package of The Glenlivet Estate as a tourist destination boasting a wide variety of outdoor activities.

4.3 Indirect / Induced / Gross Impacts

The presence of a new facility will have beneficial spin offs for other local businesses and suppliers through purchases of goods and services for the facility both during the construction and operation phases.

In addition there is likely to be increased expenditure in the local area from the direct and indirect employment income. This is generally described as the induced effects.

These multiplier effects can be calculated either from an analysis locally of the expenditure or the application of multipliers derived from other studies of average effects and flows of money between sectors. Both approaches have been used in this study.

Table 4.6: Gross Impact of Forest Hub Method 1 on Glenlivet and Scotland

Direct		**Indirect / Induced**				**Gross**	
		Multiplier		Amount			
		Glenlivet	Scotland	Glenlivet	Scotland	Glenlivet	Scotland
Construction							
Employment	1.5 FTE	1.46	1.93	0.7 FTE	1.2 FTE	2.2 FTE	2.9 FTE
Turnover £	800,000	1.52	1.88	400,000	700,000	1.2m	1.5m

Income £	300,000	1.55	1.91	105,000	273,000	465,000	573,000
Operation							
Employment	3.0 FTE	1.18	1.20	0.5 FTE	0.6 FTE	3.5 FTE	3.6 FTE
Turnover £	150,000	1.48	1.53	72,000	79,000	222,000	229,500
Income £	50,000		1.31		15,500		65,500

Source: national multipliers from 2004 I/O tables, local multipliers calculated from Scottish multipliers adjusted using assumptions from other local area surveys

This method does provide a useful assessment of the impact of the project but does not always pick up all the affects from wider visitor spend beyond the project and it doesn't identify where the impacts are likely to be felt, thus the two further methods below are also considered.

Method 2 (Gross Expenditure): This method takes the gross expenditure of the project (capital and running costs) and allocates it to different geographic areas e.g. local (Moray), Highlands and Islands and Scotland to derive direct and indirect impacts and then applies a multiplier to each gross impact by locality. This approach involves working through the supply chain and identifying the source of goods and services and is more usually applied to major capital projects. In a project of this scale it is not considered to be justified or so necessary.

It is possible to take this methodology one step further and do a whole life model which calculates the expected income and expenditure over the lifetime of the asset. This is not attempted at this stage though it might be useful to consider as it would also show the potential income to The Crown Estate over the life of the project.

Method 3 (Visitor Spend)

This method was used in Laggan Wolftrax and takes evidence of visitor spend in the area and calculates the impact in terms of jobs and income in the local area.

The data derived from the Laggan Wolftrax study has been updated and used to calculate gross expenditure by expected visitor numbers to Glenlivet Forest Hub. The results are summarised in the table below.

Table 4.7: Direct Income in the Area from Visitors to the Forest Hub

(£)	**Tomintoul**	**Glenlivet and Moray**	**Inverness and East Highlands**	**Highlands and Islands**	**Scotland**
Day Visitors	85,464.00	85,464.00	85,464.00	85,464.00	85,464.00
Overnight Scots	161,200.00	268,666.74	286,577.86	340,311.20	358,222.32
Overnight	84,071.20	136,616.22	147,125.16	220,687.74	241,704.70

UK					
Overnight Overseas	9,024.77	14,665.25	15,793.34	23,690.01	25,946.21
Total	339,759.97	505,412.21	534,960.36	670,152.95	711,337.23

The direct expenditure (income) has been arrived at by taking the average daily spend of local day visitor and overnight visitors multiplied by the numbers and length of stay for overnight visitors. The spend has then been apportioned at different levels from Tomintoul to Scotland wide. Thus the total spend for visitors generates income to each area from £340,000 in Tomintoul to over £600,000 in the Highlands and Islands, and over £700,000 in Scotland.

If it is assumed there is no displacement and the multiplier derived for the Scottish Tourism Multiplier Study (STMS) are used, as per Laggan study, then the Gross effect could be.

Table 4.8: Gross Impact (No displacement)

	Tomintoul	Moray	Inv, E High	H&Is	Scotland
Direct Expenditure	£340,000	£505,000	£535,000	£670,000	£700,000
Multiplier	1.05	1.1	1.18	1.24	1.8
Gross Expenditure	£360,000	£555,500	£631,000	£830,000	£1,260,000

Again using the STMS with an allowance for inflation applied it is possible to calculate the likely number of jobs this additional income could sustain.

Table 4.9: Jobs Impact of Visitor Spend (No Displacement)

	Tomintoul	Scotland
Gross Expenditure / Income	£360,000	£700,000
Output / Employment Ratio	£40,900 from STMS + inflator to give £52.350	
FTE jobs	6.9	13.4

The results suggest that the project will from its own expenditure (£150,000) create over £200,000 of gross output and 3.5 gross FTEs in the Tomintoul area (table 4.6) while the wider effect of total visitor spend is likely to result in 6.9 FTEs supported from £360,000 of gross visitor spend (tables 4.8 and 4.9).

4.4 Displacement and Net Impact

It is necessary however to adjust the gross impact figure to take into account leakage, deadweight and any possible displacement that could be caused by the Glenlivet Forest Hub in order to arrive at net impacts. It is possible that the visitor expenditure at the new facility could reduce spend in the other facilities and other areas rather than representing 100% new expenditure to the area.

It is unlikely from experience elsewhere in Scotland and in the case of this project that it would happen without some pump priming. The total cost of creating the trails cannot be recouped directly from the usage of the trails; rather the income generated in the area goes to a range of businesses and individuals in the area. It is also clear from the financial projections produced that the Forest Hub could not generate enough income to fund the development. As a result there is no dead weight (i.e. part, or all of the project that could have proceeded without public support) and therefore in 100% additionality since it would not proceed without public support.

The other issue that has to be considered in order to arrive at net additional benefit for the project is whether there are any negative effects on other facilities from the presence of this new facility and shifting of expenditure from one area to another.

In the case of the Laggan facility the degree of displacement was based on a visitor's decision to visit the area and where they might be otherwise. 90% of the mountain bikers came from outside the Badenoch and Strathspey area and 93% of visitors would not be in the Laggan area if the trails did not exist. In this case there could have been some displacement in the order of 7% who had come to the area for other reasons. Thus it is clear that in the overwhelming majority of cases there is no displacement from other facilities in the area and that their spend is net additional to the area, and indeed will bring additional benefits to other facilities in the area.

A review of local businesses in the Tomintoul area would suggest that very little displacement, if any, is likely because:-

- Nearly all users of the Hub would not have come to the area without the facility therefore accommodation and catering businesses are likely to be better off even if there is a cafe and camp site at the Hub
- No local businesses are providing similar facilities currently e.g. bike shop (the nearest is in Aviemore), and there is no camp site in the area and the current hostel only has 20 bedspaces

At the other end of the spectrum i.e. at the Scottish level it is assumed that for visitors in Scotland then their decision to go to a specific facility in a specific location is likely to mean less expenditure elsewhere within Scotland, though even here, if the alternative was going out of Scotland then there would be no displacement within Scotland.

Table 4.10: Net Impacts of the Forest Hub

	Tomintoul	**Moray**	**Inverness, East Highlands**	**Highlands and Islands**	**Scotland**
Direct Expenditure	£340,000	£505,000	£535,000	£670,000	£700,000
Displacement %	6	24	34	40	93
Net Expenditure	£319,600	£383,800	£353,100	£402,000	£49,000
Multiplier	1.05	1.1	1.18	1.24	1.8
Gross Net Expenditure	**£335,580**	**£422,180**	**£416,658**	**£498,480**	**£88,200**
Output / Employment Ratio	£52,350	£52,350	£52,350	£52,350	£52,350
Gross Net FTE Jobs	**6.4**	**8.1**	**8.0**	**9.5**	**1.7**

Thus after taking possible displacement into account the net impact of the Forest Hub in gross terms is likely to be £336,000 and 6.4 FTE's in Tomintoul, and £500,000 and 9.5 FTEs in the Highlands and Islands.
If £150,000 and 3 FTEs are directly accounted for by the Hub then there will be net additional benefits within the local area of £186,000 per annum and 3.5FTEs.

This additional income is likely to benefit

- existing accommodation providers (particularly serviced accommodation and the hostel, the Laggan experience showed positive impacts),
- existing catering businesses on meals and snacks,
- existing retail outlets for gifts and supplies, and
- existing activity providers in the Tomintoul area such as pony trekking, canoeing, walking.

It could also encourage other new providers/businesses. For example at the moment there is limited serviced accommodation which is more likely to be in demand from visitors to the Hub. If bedspaces are not available in the area it would mean people having to look further afield for accommodation and the full benefits will not necessarily staying in the Tomintoul area. It is considered that there could be several new business opportunities arising out of the new visitors brought into the area as a result of the Forest Hub development.

5. Summary and Conclusions

The analysis of similar facilities in other locations has been helpful in establishing the likely impacts of the creation of the mountain bike Forest Hub in Glenlivet. Several methodologies have been considered for estimating the impacts locally and further afield and two main ones used. Account has also been taken of any possible displacement effects to arrive at a net additional impact position.

In summary the direct impacts locally from the construction activity is as follows using standard multipliers:-

Table 5.1: Construction Impact

construction	direct	gross
turnover	£800,000	£1.2m
employment	1.5 FTE	2.2 FTE

Regarding operational impacts the visitor spend methodology has been used as it better picks up the wider impacts from visitors to the Hub who are also using other facilities in the area and in particular staying in the area. Thus the wider impacts based on total visitor spend from 16,000 visitors (day trippers and those staying overnight) in the most likely scenario could be as below. This is based on an average spend per day tripper of £12 and overnight visitor of £30 from the Laggan survey in 2006. It is likely that these figures could be a little higher now but they have been left at this rate so are certainly conservative.

Table 5.2: Operation Impact for Most Likely Scenario

	Tomintoul/Glenlivet			**H&Is**
	total	Hub	other	
direct gross expenditure	£340,000	£150,000	£90,000	£670,000
displacement	6%			40%
net expenditure	£320,000	£150,000	£70,000	£400,000
multiplier	1.05			1.24
gross net expenditure	£336,000	£150,000	£186,000	£500,000
conversion to jobs	6.4FTE	3FTE	3.4FTE	9.5FTE

From these figures it is clear that the Hub is likely to bring additional benefits to the local area through attracting new additional visitors that would not otherwise have come or stayed overnight in the area. This is estimated to be greater than the direct effects of the Hub itself and will potentially benefit a wide range of businesses.