Environmental Report 2004

Best Foot Forward
bringing sustainability down to earth
Directors' statement

More than 200 years ago, US founding father Benjamin Franklin wrote that there were but three ways to acquire wealth, by war, by trade and by agriculture. Franklin showed a distinct preference for the latter which, he enthused, created new wealth “in a kind of continual miracle” - what we would now categorise as renewable resources. Best Foot Forward, like others in the service sector, relies on trade to realise wealth - in our case profiting from our environmental expertise and knowledge. But we also recognise, as this report illustrates, how our business is fundamentally tied to the natural world. Though our ecological footprint may be small (and demonstrably shrinking) we owe a duty to ourselves, and others, to take responsibility for conducting our business within the limits imposed by the regenerative capacity of our planet. We too rely on the ability of our air, sea and soil to renew itself and are taking steps to harmonise our business with these natural cycles of life. Franklin would, no doubt, have approved.

Reporting on our environmental performance is an integral part of our business. Since starting to monitor our performance in 1999 we have found that our consumption patterns vary dramatically from year to year depending on the nature of our business. We have found that constant review has brought to our attention issues that we may otherwise have missed. It has also directly affected our business strategy. In 2002 our major impact was from air travel associated with European work. We have addressed this by setting up a network of European partners who now deliver many of our services in their own countries. This year, while transport is still our major impact, materials and waste are significant, largely as a result of junk mail - the senders will be hearing from us!

Since our first report in 2002, we are delighted that resource efficiency and its economic implications have risen up the international policy agenda. In this report, for the first time, we have looked into linking environmental and economic performance indicators. We have included, alongside other normalised indicators, the resource productivity indicator of ecological footprint per unit of Gross Value Added. Our trend data indicates that it is possible to maintain and improve economic performance at the same time as reducing environmental impact. Next year we hope to be able to show further steps in the right direction.

Nicky Chambers & Craig Simmons
Executive summary

This report presents the ecological footprint of Best Foot Forward Ltd. Measuring the company’s environmental impact is an essential first step in managing our use of natural resources. This report goes further, highlighting trends, benchmarking performance against previous years, and most importantly, presenting actions for improvement.

Key findings

In 2003/4, Best Foot Forward:

- Consumed 11,970 kWh of energy (an increase of 46% on 2002).  
  - 63% was gas, and 37% renewable electricity.  

- Procured approximately 148 kg of products (a decrease of 62% on 2002).  
  - 58% was for administrative purposes, such as stationery; and 36% furniture.  

- Generated an estimated 171 kg of waste (an increase of almost 200% on 2002), of which:  
  - 74% was recycled.  
  - 72% was paper, of which the biggest hitter was junk mail and marketing brochures (53%).  

- Staff travelled 44,846 passenger-kms (a decrease of 20% on 2002), of which:  
  - 62% was travel at work and 38% commuting to work.  
  - 52% was by train and 19% by air.  

- Consumed approximately 14,900 litres of water (a decrease of 56% on 2002).  

- Occupied a physical land area of 66 square metres (no change on 2002).  

- Produced 7,727 kg CO₂ emissions (direct and embodied) associated with our activities (a decrease of 46% on 2002).  
  - 71% was associated with transport.  
  - 19% was associated with energy use.
**Ecological footprint analysis**

In 2003/4, the ecological footprint of Best Foot Forward was 3.20 gha or 0.53 gha per staff member (a decrease of 31% on 2002).

- Staff travel was 56% of the total ecological footprint (1.79 gha, a decrease of almost 40% on 2002).

- Products and waste were 29% of the total ecological footprint (0.94 gha, a decrease of 38% on 2002).

- Direct energy was 15% of the total ecological footprint (0.47 gha, of which 88% was gas, more than a 100% increase on 2002).

- Both built land and water were less than 1% of the total ecological footprint.

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**Normalised ecological footprints**

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<td>Ecological footprint per £1,000 Gross Value Added (GVA)</td>
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<td>😃</td>
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About this report

This 2004 report covers the period August 2003 to July 2004, and is Best Foot Forward’s second published environmental report (though the company has been monitoring its resource use since 1999). The main aims of the report are to demonstrate our ongoing commitment to environmental management, and to track our progress by benchmarking our activities on previous years. We hope that this report will be of interest to a broad audience and lead to a better understanding of the environmental issues associated with operating an Small Medium Enterprise (SME), such as Best Foot Forward.

Our approach is to measure our consumption of natural resources over time, using ecological footprint analysis. We recognise the value of the ecological footprint as a key sustainability indicator and hope that our report will illustrate this to others.

As this is an environmental report, we have avoided any reference to our corporate social responsibilities (CSR) and related activities. However, we have taken a broad view of our environmental responsibilities casting the net to include, for example, marketing and procurement.

Further information on Best Foot Forward, our products and services, and a copy of this report, are available on our website www.bestfootforward.com

September 2004
About us

Best Foot Forward Ltd, established in 1997, is a sustainability consultancy based in Oxford, England. It is a small organisation, based in a single office, which employs four full-time staff and two directors - skilled in the environmental sciences, statistical techniques and communications. Two co-directors, who also founded the business, manage the company. When required, individuals or organisations are contracted in for research purposes. This number varies on a year-on-year basis. In 2003, we introduced an Associate scheme, with partnerships formalised in the UK, France and Italy.

Best Foot Forward’s stakeholders include not only its clients, but also project partners and interested parties. These groups cover a broad spectrum of sectors and countries. Figures 1 and 2 illustrate the spectrum of our stakeholders.

Our mission statement

Our aim is to help regions, organisations and communities to reduce their ‘ecological footprint’ through the delivery of a wide range of analytical tools and consulting services.

Excepting our international ventures, no major changes have occurred in our size, management structure or facilities since 2002. However, the number of services we provide has increased. This has largely been due to diversification arising from changes in funding regimes, and as ecological footprinting becomes embedded as a standard indicator of sustainability, we undertake more smaller footprint and other related projects for a wide variety of clients.

Figure 1: A breakdown of Best Foot Forward’s stakeholders, by region

Figure 2: A breakdown of Best Foot Forward’s stakeholders, by sector
Products and services

Best Foot Forward is recognised as a world authority on ecological footprint analysis, having undertaken more than 80 studies for a wide range of clients, and across many different sectors. We have also developed a number of tools and educational activities, which are uniquely adapted for our clients’ needs. This year Best Foot Forward has been involved in establishing the Global Footprint Network and is a founding member.

The Stepwise™ and EcoIndex™ methodologies, based on ecological footprinting, are our main analytical techniques. These methodologies enable the calculation of a single aggregated indicator, which can represent the environmental impact of a product, service, organisation or region within a sustainability context. Our ecological footprinting methodologies are compatible with those adopted by the European Common Indicators Programme (ECIP) and with the Global Footprint Network’s National Footprint Accounts, which are summarised in WWF’s Living Planet Report.

What is an ecological footprint?

The ecological footprint is a sustainability indicator, which expresses the relationship between society’s consumption of natural resources and the natural environment. Using area equivalence, it aims to express how much of nature’s ‘interest’ we are currently appropriating. If more bioproductive land and sea is required than is available, then it is possible to assume that the rate of consumption is not sustainable. As the ecological footprint analysis uses a common currency (global hectare (gha)), a broad range of impacts can be aggregated to individuals, processes, organisations, regions and countries. It is a ‘snapshot’ measure and is based on a year-specific data set.

Global Steps

Global Steps is a card game that enables people to estimate their personal ecological footprint and explore their impact on the environment and barriers to change.

We have seen a large increase in the purchase of Global Steps over the past year, with most users requiring them for educational purposes in schools or businesses. Global Steps has also moved beyond the borders of the UK, with large orders coming in from the United States.

Personal Stepwise™

Personal Stepwise™ is a software programme to calculate personal ecological footprints and carbon dioxide emissions. It is suitable for a range of ages and lifestyles, and is designed to make people think about how individual actions can make a difference.

Students from tertiary institutions tend to be our main customers for this tool.

Volunteers have recently used Personal Stepwise to measure their own ecological footprints as part of a larger regional study in the South West of England. This study will be launched in 2005.

Corporate Stepwise™

Corporate Stepwise™ is a standardised way of accounting for an organisation’s use of energy and materials using ecological footprint analysis. The results can be used to: Identify environmental 'big hitters'; find the most cost-effective means of improving resource productivity; measure and monitor environmental sustainability; report environmental performance and identify opportunities for savings. Over the past
year, Best Foot Forward has put much focus into developing the Corporate Stepwise™ tool, and as a result the number of clients and project output has increased. The most notable projects completed using Corporate Stepwise™ to date include:

- Material Health: A mass balance and ecological footprint analysis of the NHS in England and Wales (download a copy of the report at www.materialhealth.com), and
- Best Foot Forward ACCA UK award winning Environmental Report 2001/02 (download a copy of the report at www.bestfootforward.com).

Regional Stepwise™

Best Foot Forward is perhaps best known for its regional analyses. Regional Stepwise™ uses a component-based footprinting approach to calculate the ecological footprint of a community or region. The same data is also used to derive carbon dioxide emissions for a range of policy-relevant activities (for example, transport and energy use).

Over the past year we have upgraded our Regional Stepwise™ tool and initiated a local authority marketing drive. In conjunction with this, and the launch of Scotland’s Footprint in February 2004, we increased the number of clients wanting this service.

Some Regional Stepwise™-based projects completed in 2003-2004:

- Scotland’s Footprint: A resource flow and ecological footprint analysis of Scotland (download a copy of the report at www.scotlands-footprint.com)
- An ecological footprint analysis of Angus - Scotland Supplement: Brechin & surrounds household footprint survey. This innovative public education programme, of which the ecological footprint project was a part, received a Green Apple Award in 2003.
- An ecological footprint analysis of Buckinghamshire - South East England.
- Sustainable States: How environmentally sustainable is Jersey?

Other projects

One-off, unique projects are also undertaken by Best Foot Forward. Some of the organisations we have worked with over the past year, include Bill Dunster Associates; Living Witness Project; Office of the Deputy Prime Minister (ODPM); Rhodes University (South Africa) and Stockholm Environment Institute (York University).

Awards and highlights

Best Foot Forward had a successful year in 2003, receiving two awards, which recognised our innovative use of ecological footprinting.

- ACCA UK Award for Sustainability Reporting 2002: Environmental Reporting Category: Best SME Reporter Best Foot Forward Ltd: Environmental Report 2001/02

In 2004, two landmark projects, managed and published by Best Foot Forward, were successfully launched. These were:

- Material Health: A mass balance and ecological footprint analysis of the NHS in England and Wales.
  Since its launch in April 2004, almost 300 copies of the report have been downloaded from the project’s web site www.materialhealth.com
- Scotland’s Footprint: A resource flow and ecological footprint analysis of Scotland. Since its launch in February 2004, over 250 copies of the report have been downloaded from the project’s website www.scotlands-footprint.com
- Scotland’s Footprint: A resource flow and ecological footprint analysis of Scotland.
  Also launched in 2004, was Northern Limits: Measuring Northern Ireland’s impact on the environment. Best Foot Forward were one of the lead partners in this project. Full report and project details are available at www.northern-limits.com
Environmental policy

Best Foot Forward is committed to reducing its impact on the environment. We take our responsibilities seriously and pursue a policy of environmental best practice with clear policy aims and objectives.

Policy aims
- To include environmental considerations in daily and project activities.
- To conduct an ongoing company resource flow analysis and ecological footprint.
- To implement an environmentally responsible purchasing policy.
- To reduce, recycle and reuse waste on the premises and at BFF events.
- To maximise energy efficiency and reduce greenhouse gas emissions.
- To minimise and control the use of water on the premises.

Objectives

Energy
BFF aims to maximise energy efficiency and reduce emissions by:
- minimising and monitoring its total energy consumption;
- purchasing, where possible, renewable energy.

Purchasing and supply
BFF aims to maximise the use of environmentally sound products and services, by:
- maintaining and increasing the use of local suppliers for products, such as stationery;
- using environmentally responsible and recognised printing companies for company publications.

Waste
BFF aims to maintain and improve its management of waste produced on the premises by:
- minimising (reducing and/or recycling), wherever possible, its solid and liquid waste streams;
- using recycled products wherever feasible;
- adopting a purchasing policy sensitive to environmental concerns;
- ensuring satisfactory disposal of waste that cannot be re-used or recycled.

Transport
BFF aims to maximise the use of efficient and environmentally sound transport options by:
- minimising the use of cars and aeroplanes for transport;
- maintaining and improving use of public transport for business activities;
- maximising the use of environmentally sound transport options for both project-related work and commuting.

Water
BFF aims to manage its water resources efficiently by:
- minimising and monitoring the total water consumption;
- ensuring that water systems on the premises are not wasteful.

Based on the findings of our environmental reports, Best Foot Forward sets targets and priorities for action for the following year.

Health and Safety

A health and safety policy has been drawn up for Best Foot Forward, to which the environmental policy is a complement. The office is designed to ensure a pleasant work environment in which staff can interact with one another, yet remain work-focused. Best Foot Forward also has a no-smoking policy.
Our environmental performance

This section of the report covers the components associated with our activities and environmental impacts. Each component is described in terms of current performance, the main issue affecting the component, an ecological footprint, trends and comment, achievements and actions to be taken to reduce a component’s ecological footprint.

The components covered are:
- Direct energy
- Products and waste
- Transport
- Water
- Land use
- Marketing, publications and procurement

Best Foot Forward has previously presented its ecological footprint for the years 1999/2000 and 2001/2002. These calculations have been used to identify trends over the years, and to assess any change.

Direct energy

This component includes energy used by Best Foot Forward for activities such as power, heating and lighting.

Current performance

In 2003/2004 Best Foot Forward consumed a total of 11,970 kWh of energy, of which 7,589 kWh (63%) was gas and 4,381 kWh (37%) renewable electricity.

Our electricity is provided by the UK renewable energy company Good Energy, which sources its energy from UK wind and small-hydro power.

Ecological footprint and CO₂ emissions

The direct energy ecological footprint for Best Foot Forward in 2003/2004, was 0.47 gha (Electricity, 0.06 gha and Gas, 0.41 gha).

Energy consumption for this period produced 1,463 kg of CO₂ emissions.

Trends and comment

In comparison with 2003/2004, Best Foot Forward consumed a total of 8,225 kWh of energy in 2001/2002. This is an increase of 46%.

Gas consumption has increased significantly - an increase of 152%. This can probably be attributed to a period during the winter months of 2001/2002 when Best Foot Forward was without a boiler and made do with some temporary electric heating and thicker clothing! A new boiler was installed with an additional radiator (by our landlord) in 2003. The figures further suggest that this new heating system uses considerably more energy than its predecessor. Figure 3 illustrates our consumption of energy bi-annually since 2000, by energy type.
Figure 3: Consumption of energy for 2000, 2002 and 2004, by energy type

The direct energy footprint for Best Foot Forward has increased by more than 100%, from 0.23 gha to 0.47 gha. This is due to the large increase in gas consumption.

Figure 4 illustrates our direct energy ecological footprint bi-annually since 2000, by energy type.

Achievements

- Continued use of renewable energy.

Actions

- To decrease gas consumption.
This component includes, where possible, all the products procured and waste generated by Best Foot Forward in 2003/2004. The ecological footprint distinguishes products going to waste from those being retained in stock. Analysing both the resources entering and leaving Best Foot Forward avoids double counting and gives a complete picture of the resources flowing through the company.

### What is stock?

Stock is the products retained in Best Foot Forward. This term describes products that were not discarded by Best Foot Forward during 2003/2004, an example being resources incorporated into durable products that remain in use beyond the timescale of this report. Stock is derived by subtracting waste from consumption.

### Current performance

#### Products

In 2003/2004 Best Foot Forward procured an estimated 148 kg of products. A list of products purchased, by category, and estimated weights are listed below:

- Hardware (computers etc): 10 kg
- Furniture: 53 kg
- Office/admin (stationery etc): 85 kg

Where feasible, we try to source environmentally sound products. Some of our main products and their environmental specifications are listed below:

1. In the past year we were able to source some office furniture second hand.
2. All our business paper is purchased from Evolve, which is made from 100% post consumer waste. For internal use we reuse wasted stock paper.
3. Ecover products are used for office cleaning. Ecover disclose all mineral and plant based ingredients, which are biodegradable. Containers are 100% recyclable.
4. Most beverages are either organic or support FairTrade, and in most instances are purchased wholesale through Infinity Foods, which trade in organic and natural foods.

#### Food consumed during work

Food waste, and therefore food consumed in the office, was accounted for in our previous environmental report. In this report we have tried to explore food consumption beyond this boundary, and include food eaten out of the office by Best Foot Forward staff on business and paid for by the company. It does not account for personal food consumed in the office, i.e. packed lunches made at home. Assessing food eaten out represents a boundary extension from our previous environmental report, and therefore this new data is assessed separately, as it cannot be compared to any previous analyses, and there is no benchmark.

This year we made a concerted effort to investigate procurement in more detail. This meant that in 2004 we were able to account for a greater portion of the impacts associated with our purchases. In the case of food, the increase in footprint and CO₂ were significant, so to retain compatibility with earlier years we have backcast this data for 2000 and 2002. We analysed our food consumption by not only using that captured in waste data, but also by analysing our accounts. By doing this we have created a complete picture of food eaten on the premises, because we can track food coming in and food going out (waste). This data has been aggregated into our products and waste findings.

In addition to this food stream, the accounts data also provided information on food eaten out on Best Foot Forward business, for example during our Christmas dinner. However, food...
Waste

In 2003/2004 Best Foot Forward generated an estimated 171 kg of waste, of which 72% was paper and 17% compostables. 74% of our waste was recycled, 15% composted and only 11% landfilled.

The majority (53%) of the paper waste was glossy paper, of which 57% were catalogues and junk mail, with 42% allocated to media etc requested by us. All of this paper waste was recycled. Compostable waste is sent to an allotment. Recycled materials are taken to a County Council waste recycling centre. Where possible, envelopes and scrap paper are reused internally.

Ecological footprint and CO₂ emissions

The products and waste ecological footprint for Best Foot Forward, for 2003/2004, was 0.94 gha, a decrease of 38% from 2001/2002.

Products consumed and waste generated in 2003/2004 produced 736 kg of embodied CO₂ emissions.

Trends and comment

In comparison to 2003/2004, Best Foot Forward generated a total of 59 kg of waste in 2001/2002. This is an increase of almost 200%, and is predominantly due to a large increase in junk mail and marketing catalogues. A significant proportion of this paper waste was recycled (89%). The amount of waste we landfilled in 2003/2004 (19 kg) has also increased. Figure 5 illustrates our quantities of waste generated and management trends since 2000.

It can be assumed that landfilled waste has increased from 3 kg to 19 kg due to paper (contaminated by food), and that recycling has grown, from 47 kg in 2002 to 152 kg in 2004, due to the following changes: Compost down (11.4 kg), steel up (1.1 kg), aluminium up (0.7 kg), plastic up (8.5 kg), glass up (0.7 kg) and paper up (108.9 kg, of which 65kg was glossy paper (junk mail)). Also, better data collection may have a role to play in this increase, as more waste was captured.

The products and waste ecological footprint has decreased from 1.53 gha in 2001/2002 to 0.94 gha in 2003/2004 (a decrease of 38%). The ecological footprint and CO₂ figures for 2002 are higher than adjacent years (see normalised indicators and benchmarking on page 20) due to the capital items (mainly computer equipment) purchased in that year. As is common in financial accounting, it is possible to amortise the environmental 'cost' of capital purchases over their expected lifetime.

Recycling

Is the process of collecting, sorting, cleansing, treating and reconstituting materials that would otherwise become waste, and returning them to the economic stream as raw materials for new, reused or reconstituted products.

Reuse

Is the recovery or reapplication of a product for uses similar or identical to its original application, without manufacturing or preparation processes that significantly alter the original product.

Food eaten out was not included in our products and waste findings, as it is new and would skew any comparisons with previous years. However, we will include it in our next report, as we now have a base from which to compare.

<table>
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<th>Embodied CO₂ (kg)</th>
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</table>

Food eaten out by Best Foot Forward staff did not include that paid for by our clients or other individuals, or food bought by staff members for personal consumption. An estimate of the quantities of food eaten out, and associated embodied CO₂ emissions and ecological footprint, are listed in the table below.
However, the current practice has been to account the total impact of capital items in the year of purchase. Figure 6 illustrates our products and waste ecological footprint trend since 2000, by management type.

**Achievements**

- An increase in the amount of waste sent for recycling.
- Continued and predominant usage of electronic mail as our main form of business communication.
- Project report launch innovatively designed to reduce paper usage.
- Better understanding of food consumption.

**Actions**

- To encourage waste minimisation, in order to decrease the total amount of waste generated.
- To decrease the amount of waste going to landfill.
- To decrease the quantity of glossy paper waste.
  1. Cancel paper-based catalogues if online versions are available.
  2. Stop junk mail and faxes.
- To have a year on year comparison of food eaten in and out by staff.
This component covers all modes of transport used by staff associated with Best Foot Forward activities (commuting to and from work, and during work). Freight transport was not included.

**Current performance**

A total distance of 44,846 passenger-kilometres (pass-km) was travelled by Best Foot Forward staff in 2003/2004. Of this:
- 62% was for work purposes, and 38% for commuting to and from work.
- 52% was by train, 19% by air, 10% by bus and 10% by car.

Travel during work is predominantly associated with project work. Most air travel was associated with trips to Scotland, for a project that is now complete.

**Ecological footprint and CO₂ emissions**

The transport ecological footprint for Best Foot Forward in 2003/2004 was 1.79 gha, of which, 88% was for travel during work. This was largely due to short-haul air travel to Scotland, which has a large environmental impact.

Travel associated with Best Foot Forward staff for 2003/2004 produced 5,515 kg of embodied CO₂ emissions.

**Trends and comment**

Best Foot Forward’s staff travel in 2003/2004 (44,846 pass-km) decreased by 10,935 pass-km from 2001/2002 (20%). This was predominantly due to a decrease in business-related long-haul flights. However, both car and train usage has increased - this was mainly due to many project-related activities taking place in areas that were not easily accessible by train, and an increased number of staff travelling for project-related purposes. Figure 7 illustrates how our transport use has changed over time.

**Figure 7: Distance travelled by staff for 2000, 2002 and 2004, by mode**
Due to a decrease in energy-intensive air travel since 2001/2002, Best Foot Forward’s transport ecological footprint also decreased - from 2.89 gha in 2001/2002 to 1.79 gha in 2003/2004 (a decrease of 38%). Since 2001/2002, travel associated with commuting to and from work has remained relatively constant. This is a result of little change in staff travel patterns. Figure 8 illustrates our transport ecological footprint trend since 1999/2000, by purpose.

Figure 8: Transport ecological footprints for 2000, 2002 and 2004, by purpose

Achievements

- A significant decrease in air travel for work.
- Continued use of cycles and walking for commuting to and from work.
- Continued encouragement for using non-car modes of transport for work.
- Continuation of membership with the Oxford Cycle Workshop (an organisation which operates locally, and is used for staff bicycle maintenance)
- Recruitment of locally based staff, who are encouraged to walk, cycle or use the bus, to commute to and from work.

Actions

- Where feasible, to decrease car travel for work-related trips.
- Where feasible, to decrease air travel for work-related trips.
- To decrease car use for commuting to and from work.
Current performance

In 2003/2004, Best Foot Forward consumed an estimated 14,900 litres of water, of which 88% was used for flushing toilets and 11% for drinking and washing.

Ecological footprint and CO₂ emissions

The water ecological footprint takes into account the energy required to collect, treat and supply water used by Best Foot Forward.

The water ecological footprint for Best Foot Forward, for 2003/2004, was 0.003 gha. Water usage by Best Foot Forward in 2003/2004 produced 12 kg of embodied CO₂ emissions.

Trends and comment

In this report we are able, for the first time, to compare water consumption with previous findings (water data was not collected for 1999/2000). Water consumption has decreased by 56% from 2001/2002. This is predominantly due to a decrease in water used for flushing toilets. Also, in 2004, a persistently dripping tap was fixed. Figure 9 illustrates our current water consumption for 2002 and 2004.

Figure 9: Water consumption for 2002 and 2004, by use

Achievements

- A significant decrease in overall water consumption.
- For the first time, we were able compare annual water consumption.

Actions

- Improve maintenance of leaking pipes or taps.
- Address water use by increasing water hippo capacity.
Land use

This component includes built and degraded land occupied by the building from which Best Foot Forward operates.

Current situation

The total land area covered by Best Foot Forward’s offices is 66 square metres.

Ecological footprint

The built land ecological footprint for Best Foot Forward in 2003/2004 was 0.0007 gha.

Trends and comment

Best Foot Forward’s land area has not changed since 2001/2002. However, our land area will increase in the next reporting year, as we have recently expanded, but as of yet, have not taken up occupancy of the newly acquired space.

Best Foot Forward has no on-site parking facilities, with guests being encouraged to arrive by taxi or bus.
Marketing

Best Foot Forward continues to predominantly use electronic forms of communication to market its services and products. For mass marketing of some of our services we contacted potential users via e-mail. This method was also used for informing large numbers of individuals about the launch of our project reports.

Due to an increased requests for Best Foot Forward to promote its activities at events, we produced durable marketing posters, which can be reused on an ongoing basis.

Best Foot Forward’s branded stationery (letterheads and business cards) is printed on recycled paper. Our letterheads are printed in-house, when required. This prevents a build up of outdated stock (which happened in the past, however this paper is now being reused for everyday in-house printing).

Publications

Most of our projects and clients require the presentation of findings in a report. Where feasible, we encourage these to be produced in electronic format. If hard copies are required, these are produced at a minimum. Hard copy reports are published by a local printer - SeaCourt Ltd, which is carbon neutral and ISO 14001 certified. Revive matt and gloss papers are used, which are chlorine-free and contains at least 75% post-consumer waste with a maximum of 25% mill broke.

If small print runs are required, for example Global Steps, we use Oxford Greenprint Ltd. (a small, locally based printing company that uses 100% recycled paper products, low-impact printer technologies and runs on 100% renewable energy).

Procurement

Whenever office supplies or furniture are purchased, consideration is given to procuring the most environmentally sustainable alternative. For example, due to the imminent expansion of our offices we have had to acquire additional furniture. We have managed to identify a source of second hand furniture, which has meant that we have prevented good quality furniture from being sent to landfill.
Our environmental impact

Best Foot Forward’s total ecological footprint for 2003/2004 was 3.20 gha (0.53 gha per staff member). Figure 10 shows the component breakdown of the footprint. The largest impact was transport (56% of the total footprint), with products and waste the second largest (29%).

Figure 10: Total ecological footprint for 2004, by component

Trends and comment

Best Foot Forward’s ecological footprint has decreased by 1.45 gha (31%) since 2001/2002 from 4.65 gha to 3.20 gha. The main reasons for this decrease were the purchase of capital items (mainly computer equipment) in 2002 and the decrease in air travel. Figure 11 illustrates how Best Foot Forward’s ecological footprint, and component breakdown, has changed over the years.
Normalised indicators and benchmarking

Ecological footprint results can be transformed into compelling management and benchmarking indicators by normalisation with other indicators. Some of our key indicators for 2003/2004 are as follows:

- Ecological footprint per staff member: 0.53 gha
- Ecological footprint per m² of office space: 0.05 gha
- Ecological footprint per project: 0.09 gha
- Ecological footprint per £1000 Gross Value Added (GVA): 0.03 gha

What is Gross Value Added?

Gross Value Added (GVA) measures the contribution to the economy of each individual producer, industry or sector in the United Kingdom. GVA is used in the estimation of Gross Domestic Product (GDP). GDP is a key indicator of the state of the whole economy.

\[
\text{GVA + taxes on products - subsidies on products} = \text{GDP}
\]
Trends and comment

We have recently focussed research efforts on making the link between economic and environmental efficiency, termed ‘resource productivity’ in the UK and EU policy. For example, the European Commission’s 6th Environmental Action Programme has addressed this issue by including a thematic strategy on the sustainable use of natural resources. The objective of this strategy is: “ensuring that the consumption of resources and their associated impacts do not exceed the carrying capacity of the environment and breaking the linkages between economic growth and resource use”.

Some key questions to address are:
- How many resources do we consume to keep our business economically viable?
- Can we maintain or improve our economic performance while using fewer resources?

Best Foot Forward’s trend data illustrates that this is possible (see Figure 12).

Obviously, different types of business have different resource intensities. Best Foot Forward, a small mostly consultancy business, demands 0.03 gha per £1000 of GVA. In time we hope to be able to benchmark our performance against other businesses providing similar services. Some initial comparisons are made using tonnes of CO₂ emitted per £1,000 GVA (see our CO₂ emissions below).

Figure 12: Normalised ecological footprints for 2000, 2002 and 2004
Our CO₂ emissions

Total CO₂ emissions (direct and embodied) associated with Best Foot Forward’s activities during 2003/2004 were 7,727kg. Transport activities produced the highest level of CO₂ emissions (71% of the total), with energy producing the second highest level, at 19%.

Trends and comment

Our CO₂ emissions have decreased by 46% between 2002 and 2004. This is due to a significant decrease in the embodied CO₂ emissions associated with products and waste (a 76% decrease, due mainly to the capital items (predominantly computer equipment) purchased in 2002, but not in 2004) and a 48% decrease in direct CO₂ emissions from transport. Our emissions are even less than those reported in 1999/2000 (7,906 kg). Figure 13 illustrates the total CO₂ emissions associated with Best Foot Forward’s activities since 2000, by component.

Figure 13: Total CO₂ emissions for 2000, 2002 and 2004, by component

By 2003/2004 Best Foot Forward’s carbon intensity had fallen to 0.06 tonnes of direct CO₂ per £1,000 GVA, a decrease of 51%. This reduction was largely due to internal consolidation and a highly efficient workforce.

What are direct and embodied CO₂ emissions?

Direct emissions are those that occur from direct use of a product or service, such as a car or a train. Embodied emissions are those that have occurred further up the supply chain of a particular product or service. For example, new furniture bought by Best Foot Forward will not create any direct emissions of CO₂, but the production of that furniture emitted CO₂ when the wood was planted, harvested, transported, converted to furniture and finally transported to Best Foot Forward.
Offsetting our carbon emissions

In order to compensate for our total CO$_2$ emissions, we are offsetting them with the ‘offset provider’, Climate Care. The carbon offset funds will go towards one of their renewable energy schemes, such as low energy lighting in South Africa; a biomass project in Scotland; biogas digesters for cow dung for cooking in India; and planting of coppice for wood burning in India.

<table>
<thead>
<tr>
<th>Economic sector</th>
<th>CO$_2$/£1,000 GVA</th>
<th>UK rank (of 74)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Real estate activities</td>
<td>0.01</td>
<td>1</td>
</tr>
<tr>
<td>Computer and related activities</td>
<td>0.05</td>
<td>5</td>
</tr>
<tr>
<td>Research and development</td>
<td>0.08</td>
<td>13</td>
</tr>
<tr>
<td>Education</td>
<td>0.10</td>
<td>16</td>
</tr>
<tr>
<td>Publishing and printing</td>
<td>0.11</td>
<td>20</td>
</tr>
<tr>
<td>Public administration and defence</td>
<td>0.24</td>
<td>35</td>
</tr>
<tr>
<td>Sewage and refuse services</td>
<td>0.31</td>
<td>38</td>
</tr>
<tr>
<td>Railways</td>
<td>0.58</td>
<td>47</td>
</tr>
<tr>
<td>Water supply</td>
<td>0.60</td>
<td>49</td>
</tr>
<tr>
<td>Pulp and paper</td>
<td>0.95</td>
<td>55</td>
</tr>
<tr>
<td>Electricity production and distribution</td>
<td>17.28</td>
<td>72</td>
</tr>
</tbody>
</table>

Best Foot Forward’s direct CO$_2$ tonnes per £1,000 GVA was 0.12 in 2001/2001. This equates to rank 24.
Degraded land - is a composite term; it has no single readily identifiable feature, but instead describes how one or more of the land resources (soil, water, vegetation, rocks, air, climate) has changed for the worse.

Direct energy - is energy consumed, as opposed to embodied or indirect energy.

Ecological footprint - the ecological footprint is a sustainability indicator, which expresses the relationship between humans and the natural environment. The ecological footprint accounts the use of natural resources. It is a 'snapshot' measure and typically refers to average annual consumption.

Embodied (incorporated) - when the mass of a material becomes incorporated with another material or materials during a manufacturing process and becomes a different material or product. Embodied energy in a commodity is the energy used (from all sources: Electricity, liquid and solid fuels to provide heat, light and/or power) during its entire life cycle for manufacturing, transporting, using and disposing.

Global hectares (gha) - one global hectare is equivalent to one hectare of biologically productive space with world average productivity. A hectare is roughly equivalent to 1.3 football pitches.

Normalisation unit - a figure or data that has been converted into something that can be compared for equivalence within a unique situation. For example, Best Foot Forward are interested in knowing the eco-efficiency associated with the delivery of their projects.

Other ecological footprint studies

Stepping Forward: A resource flow and ecological footprint analysis of the South West (due for release in 2005)
www.steppingforward.org.uk

Material Health: A mass balance and ecological footprint analysis of the NHS in England and Wales www.materialhealth.com

Scotland’s Footprint: A resource flow and ecological footprint analysis of Scotland www.scotlands-footprint.com

Northern Limits: A resource flow analysis and ecological footprint for Northern Ireland www.northern-limits.com

City Limits: A resource flow and ecological footprint analysis of Greater London www.citylimitslondon.com

Island State: An ecological footprint analysis of the Isle of Wight www.bestfootforward.com/island_form.htm

An ecological footprint analysis of Angus: Scotland & Brechin & surrounds household footprint survey www.angus.gov.uk/localagenda21

An ecological footprint of the UK: Providing a tool to measure the sustainability of local authorities www.york.ac.uk/inst/sei/odpm/tool.html

Sharing Nature’s Interest: Ecological footprints as an indicator of sustainability www.ecologicalfootprint.com
Further information

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For further information on Best Foot Forward’s products and services, visit our website
www.bestfootforward.com

To calculate the impact of your lifestyle visit our online calculator at
www.ecologicalfootprint.com

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