

INDUSTRY DRIVE TO INCREASE EPS RECYCLING

The BPF's EPS Packaging Group is actively seeking new sources of used EPS packaging to increase supplies of the material to the UK's EPS recyclers.

"Today we have several recyclers of EPS looking for new sources of used packaging to recycle and we want to help them by alerting business consumers of EPS packaging to the situation," says Andrew Barnetson, Environmental Affairs Manager of the EPS Packaging Group.



Replacement wood samples made from recycled EPS packaging.

The EPS packaging industry, which already boasts one of the highest rates for plastics recycling in the UK, wants to encourage more holders of used EPS to send their waste material to be recycled rather than into landfill. There are two types of arrangement that can be made with recyclers.

- 1 If you have an IT refit, and EPS packaging has been used to protect your high value equipment in transit, you can arrange a one-off collection to have it picked up and recycled.
- 2 If you regularly have electrical components or fresh fish delivered in EPS packaging and have large amounts of material, you can set up a contract with a recycler to take your used EPS packaging. You may be provided with a machine to compact the material, which makes it more convenient to store until collection, and makes the transporting of it economically and environmentally viable.

"The demand for EPS packaging material for recycling is good news for

the environment," comments Andrew Barnetson. "It gives businesses an economic incentive to put the effort into setting up a recycling scheme.

"Instead of paying for material to go into landfill, it can be collected at no cost and I'd like to remind manufacturers with large amounts of compacted material; they may be able to sell their compacted waste to a recycler. The combination of saving landfill costs and payment for material can make good economic sense."



Andrew Barnetson

If you would like to discuss the best way to recycle your used EPS packaging please contact Andrew Barnetson on 020 7457 5014 or email info@eps.co.uk.

EPS Horse

A horse sculpted out of EPS was the star of the May Day Carnival in Midhurst, West Sussex on 6 May 2002.

Marion Tupper and Sarah Cooper who work at Rother House, a residential home for the elderly, in Midhurst, made the horse. The artistic pair spent hours chipping away at the huge EPS block that

was donated by LINPAC Moulded Foams in Chichester, to create the horse for their float. They even sponge-painted it, so it would look like a dapple grey.

Sadly someone left the stable door open and the horse was never seen again. But Marion and Sarah are already hard at work on another horse for their float at the Selsey Carnival later on in the summer.



A Racing Adventure with EPS

B&W Loudspeakers made its first foray into the revived sport of Gravity Racing last year; a hastily prepared entry won a surprise second place at Goodwood Festival of Speed Soapbox Challenge. This year, the pressure was on to go one better.

The Soapbox Challenge, now in its third year, has become one of the most popular events of July's Festival. Strict rules govern maximum weight, length and width, together with a stipulated minimum eye level. There is also a £1000 limit on the cost of materials and the requirement for rudimentary brakes (although no-one intends to use them!). The cars race in pairs down the twisty hill climb circuit using the force of gravity alone.

Stuart Nevill from the engineering team at B&W Loudspeakers told EPS NEWS, what a key role EPS played in the making of the B&W entry and how it fared at this year's Goodwood Festival of Speed.

"The B&W team – which comprised of Graham Paine and Pete Brook, from the B&W drawing office, Steve Marks from the model shop and Tom O'Brien and myself, Stuart Nevill, (also the driver) – designed and constructed a lightweight steel spaceframe chassis. The work was carried out during lunch hours and evenings over the course of a few months.

"Initial trials of the naked chassis at the first official test day confirmed the new design to be inherently fast and totally stable, if a little loose at the rear end.

"We opted to go for a composite bodywork. B&W's model shop has produced composite moulds for loudspeakers in the past but nothing on a 'vehicular' scale. We elected to go for a technique using stacked 2-D shapes of some workable material to create a full size mould plug.

"Our friends at Linpac Moulded Foams very kindly cut us appropriately sized sheets of expanded polystyrene (EPS) using printed outlines we supplied as templates to cut the EPS to the right size. The EPS was then stacked and bonded to give us a representation of our final shape.

"Using hot wires and sandpaper we carefully transformed the rough shape into a smoother and sleeker form, EPS greatly accelerated the otherwise painfully slow process because it is so easy to work and has a surprisingly smooth finish. Emulsion was painted over the top of the EPS form and any remaining roughness was filled with Plaster of Paris, followed with more sanding and more filling and so on until all the surfaces were smooth.

"With EPS, you have two easy options for removing the plug from the 'shell or

mould; either burn it out with acetone or rip it out with your hands, we chose the latter, any remnants were simply removed with a water jet.

"We (just) managed to get the vehicle finished in time for Friday's practice. The 'box, named "Loudspeedster" really looked like it could be a winner– the opposition certainly thought so too.

"Unfortunately, Friday was damp so our only chance to get a full speed test run was reduced to a slippery tip-toe down a greasy track. So, come Saturday and the first race day (Saturday and Sunday times were combined), we still had no indication of the 'box's speed...

"Which was, frankly too fast, the famous Moulecombe Corner was approached – even whilst handbraking – at 60mph and the result was, quite naturally, a great crowd-pleaser of a tail-sliding, two-wheeling, barrel-roll off the Earl of March's straw bales, embarrassed driver relatively unscathed, but race over.

"Rolls-Royce won, McLaren got the fastest time and we took an oddly twisted mess of many, many hours' work home with our unopened magnum of Veuves-Cliques but, as they say, "that's racing".

"There's always next year!"



EPS NEWS INTERVIEW

Gerry Dallimore, Managing Director of Green Waste Recycling talks to EPS News



Green Waste Recycling (GWR) is a newcomer on the recycling scene, but it has already made an impact. How quickly has the company grown?

We installed our first machines in November 2001 and we had three employees. In January 2002 we installed a second line of machinery and increased our employees to 18.

We have just installed a fourth line of machinery and now we employ 26 people. This new recycling line allows us to handle 100 per cent fish box material, on its own, for the first time.

This will give us access to a lot of 'contaminated' packaging material that has been used to package fresh fish. It could not be easily recycled before, because we had to mix the contaminated EPS packaging with clean used EPS packaging to get the required standard of the finished product.

Is it easy to source the waste EPS packaging?

No, it's a very competitive market out there.

We take a lot of used fish boxes from the Grimsby area. These used to be sent to landfill, so we are pleased that we can recycle them. With our new production line the whole process is really efficient, so we are planning to increase the amounts of fish boxes that we recycle.



We also recycle clean used EPS packaging, it is sourced from companies like Hoover, which has components delivered, packed in EPS.

We are always on the look out for new sources of both clean or contaminated EPS packaging as we have the capacity to increase our recycling rates.

Are you trying to identify and develop new waste streams to achieve your target amounts of EPS packaging?

Absolutely! We are talking to waste management companies to see if they do any separation of their waste, but it is a slow process to get effective new systems in place.



We are also in contact with distribution centres that repack goods to see if we can set up collection schemes from their warehouses.

Lastly, we are constantly on the look out for electronics companies and retailers that are just putting their waste EPS into landfill. The vast majority of our recycling

is EPS packaging so are always on the lookout for more of it.

What would you like to say to companies that landfill all their EPS packaging waste?

It is a shame that it is so easy for people to throw this material away and not think about the long-term effect of their action.



Used EPS is a valuable resource that can have an extremely useful second life.

What are your plans for the future?

We are an innovative company, constantly on the look out for new ways to recycle packaging waste. I work closely with our technical manager and we hope to continue developing new processes and new products that can be made from recycled packaging.

Another of our objectives is to open up satellite sites across the UK and Ireland to try and cut down the transportation of the material, which is wasteful, both economically and environmentally.

But top of the list over the next few years – we will be looking for more sources of waste expanded polystyrene packaging.

Contact Gerry Dallimore on
Tel no: 01685 359738

Wasps get a buzz out of EPS

EPS boxes are making snug, dry homes for a common wasp species, *Dolicovespula germanica*, as part of a research project at the Laboratory of Apiculture and Social Insects at the University of Sheffield.

EPS Packaging Group member, Styropack, donated 100 boxes to the laboratory after an urgent request for help.

"The EPS boxes have got our study off to a

flying start. They are ideal because they are good insulators and waterproof," says Dr Adam Hart.

"They enable us to capture established nests and put them inside the boxes. Then we insert windows allowing us to view inside the nests."

The scientists are looking at the interactions of social wasps and hope to extend the study to include the bumble bee.



The British Plastics Federation and eight other trade associations have welcomed the Government's Strategy for Manufacturing and together have made a robust response to it.

These are summaries of some of the points made in letters to Patricia Hewitt MP, the Secretary of State for Trade and Industry and to Martin O'Neill, Chairman of the Trade and Industry Select Committee:

- The Government has made a gloomy assessment of UK manufacturing and has played down the enormous effort made by our manufacturing industry to sharpen competitiveness.
- We agree that government resources should be given to best practice programmes, but emphasise that these must not be foisted upon sectors with little consultation.
- We agree that macroeconomic stability is essential for sustained growth; increased interest rates because of house price inflation would damage UK manufacturing at a very difficult time.
- We are surprised that the Strategy makes no mention of the serious impact on competitiveness made by the Climate Change Levy or the forthcoming increase in Employers NICs.

- We welcome government plans to identify the regulatory concerns of manufacturers and are keen to assist in this process.

- We would urge for more commitment to de-regulate as industry is currently hamstrung to an unacceptable level.

- We are disappointed that the Strategy does not analyse the 60 per cent of UK exports which is all manufacturing and look for areas of growth that could be supported by government.

- We suggest the government should analyse what manufacturing is moving overseas, to where and why? The Strategy should then make proposals to seek to prevent this.

- We welcome the proposal to appoint business people to DTI boards and we propose a DTI Manufacturing Board made up of CEO's from large and small manufacturing businesses, trade unions, HM Treasury and DEFRA.

- We strongly believe that government should make greater use of industry organisations such as ours, as advisory bodies and channels of support.

If you would like more information about this, contact Sarah Kelly, BPF, tel no 020 7457 5000 or email: skelly@bpf.co.uk

P.S.

EPS packaging applications were again honoured at the Institute of Packaging's Starpack 2002 Awards held at the Hilton Hotel, London on 24 June.

Silver was awarded to:

- **Imperial Towel Rails**
for a 'well-thought out solution for a multi-sized product range'
Mondi Packaging

Bronze was awarded to 3 packs:

- **Valor Heating Ltd**
Universal EPS Pack for five Valor Wall Mounted Gas Fires
SCA Tuscarora
- **Hornby Hobbies Ltd**
Family of four EPS Transit Trays for Scalextric Sets
SCA Tuscarora
- **KEP Audio (UK) Ltd**
Integrated Materials Pack for Reference Series 207 Speaker
SCA Tuscarora

Styropack Gives Young Designers a Head Start with their EPS Cycle Helmet

EPS Packaging Group member, Styropack, has given four primary school children from Aberdeen – who won a competition by designing a cycling helmet using EPS – the opportunity to see a prototype of their design built by professionals.



Expanded Polystyrene (EPS) is used for cycling helmets because of its outstanding protection properties, its strength and durability, and because it is so lightweight, it is comfortable to wear.

"The cycling helmet and its safety design features is a great achievement for such young children, comments Gavin Birnie, Sales and Marketing Director, Styropack. "We are delighted to be able to encourage this young talent."

As well as offering to build the prototype, Styropack organised a tour of its West Tullos manufacturing site, for the four winners and their classmates from year seven of Kirkhill Primary School.

"We showed the children the various manufacturing processes for polystyrene

and how their prototype will be made. Also we'll be able to give these young designers a head start with next year's competition," says Gavin Birnie.

"We have introduced them to computer design techniques and will give them opportunities to learn additional skills over the coming months. We're keen to help the children build on their existing knowledge and enthusiasm and give them expertise which will increase their career prospects."

The cycle helmet design by four children from Kirkhill Primary School won the regional heat of the Primary Enterprise Braveheart Challenge, organised by Careers Scotland and School Enterprise Scotland.