Devon Community Recycling & Community Composting Network News

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April 2009

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Spark social enterprise champions



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## Cloud cuckoo land

"People all over the world are starting to wake up!"

These words were ringing in my ears as I walked away from Roberto Perez's talk in Totnes about how Cuba had managed to feed it's entire population using mostly organic and permaculture methods. I had Steve Bell like visions in my head of people coming out of their zombie state and their eyes opening to the reality of a world where until very recently a £100 worth of capital could get you £8.000 worth of credit (I don't know maybe you still can?) where we need 3 planets each to keep up with our consumer lifestyles.

Cuba had to find out the hard way. When the Soviet Union



collapsed, virtually all imports, into Cuba ceased. Any ships landing in Cuba were barred from USA ports for 6 months (first offence and a year 2<sup>nd</sup> offence.) Cuba had the most industrialised agriculture in Central America based on the old plantation crops of tobacco, coffee and sugar – all good nourishing crops! The land which had been cleared of forest was first given to the rich elite and later mostly appropriated by the state. This land is now being massively reforested and much of it returned to grow food crops. All the previous cash

crops were heavily reliant on fuel, pesticides and chemical fertilisers – this was reduced at least tenfold virtually overnight.

Now Cuba had to come away from the cloud cuckoo land existence based on finite supplies of cheap oil and the chemical pesticides and fertilisers manufactured using oil. They entered a 'Special period' (we might call it a transition period) much like this country was faced when we went into World War 2. Food had to be carefully rationed and apportioned. Nutritionists worked out minimum daily requirements of food; every scrap of land was brought into cultivation. All this and much more happened in World War 2 here - the dig for victory campaign, the creative use of food, the utilisation of wild foods. Many of us have heard or experienced directly the stories of rationing during the war and try to imagine what it must have been like to have only 4oz of butter each a week 4ozs of bacon. ozs of cooked bacon or 3.5 ham, 12ozs of sugar

and 2 eggs. (I wonder what happened to the vegans?) Of course people started to grow their own food and collect from the natural environment.

In Cuba most people were living in an urban environment, in Havana today every spare scrap of land is a garden, roof tops, window boxes, demolition sites, everywhere there is food being grown and of course the transportation to the market is often measured in feet (well, metres I suppose)

Most people in Cuba were not at all used to growing food – they were basically plantation workers growing

all those cash crops. They had to change everything it is a learning experience which is still continuing and they are still faced with enormous challenges. They are still embargoed by the USA and that continues to make life extremely difficult for them as ideally they would trade in their 'bio-region' to exchange food that they cannot grow – potatoes, apples and other cooler climate crops. They have had to learn how to plough with

oxen once more as tractor fuel is not only expensive but the tractors have compacted the soils so badly that many of them have to be painstakingly reconstructed by careful use of composts and worm casts.

But this is more like the world will have to be – the real world, not squandering it's natural resources but using them carefully – not reliant on high tech fixes but using the technology where appropriate; a careful mixture of the old with the new. A photo voltaic system can power a radio, some lights maybe a small TV but not a plasma screen. Communities are more localised – Cuba now has 54 universities and the health system to rival anywhere in the world, without all the access to modern medicines – instead they grow their own medicinal plants and doctors have been trained by local healers.

Roberto said that the signs were promising – people all over the world are waking up and finding themselves in cloud cuckoo land and with the financial world being finally exposed for the house of cards that it is now is the time for us to start a compost heap, to pick up a hoe and start to cultivate some land; and this is the perfect time to start. I always think that September – October is the time to start you growing year. Get your garlic planted, plan for those broad beans to over winter, and look at sowing all kinds of oriental salad crops, autumn onions. Get you ground covered and growing for the winter and then the spring start will just be a natural continuation. Are we the ones in cloud cuckoo land? I don't think so!

Nicky Scott



# It's a Wrap

In Part Two – Junk Mail investigates the real cost of packaging and asks if the consumer is being ripped off?

#### "Refill packs can provide up to 67% cost saving for the consumer.... The average found was 26% across all categories"

(Source WRAP feasibility study on refill packaging)

## "Refills can reduce packaging by up to 75%"

Source LGA report on packaging.

Common perceptions are that packaging is just a few pence in the cost of an item and the market will ensure competition and efficiency but research indicates that massive cost savings could be delivered to consumers and huge reductions made in carbon emissions and environmental impacts if products were packaged differently. Add the costs and impacts of waste collection, recycling and disposal for single use packaging. Then factor in resource depletion and carbon emissions such as haulage, long supply chains and other hidden environmental costs from production to end and we have an idea of the true costs of packaging and how scandalously wasteful many current business practices really are.

So if refills are that much cheaper and resource efficient why are they not everywhere? Refill packs are more common in the US and Europe, but WRAP research found that they are not widely available in the UK, and that where they were, refill retail prices were either no cheaper or only marginally cheaper than primary pack prices. WRAP states "it may be that UK pricing is a deliberate business policy rather than a reflection of cost". If cost benefits are not reaching the consumer, why is this "deliberate business policy" not being robustly challenged?

Welcome to rip-off corporate Britain and timid Government. Who controls the food production and supply chain and who picks up the bill for waste? For example, more than £1 in every £8 spent in the UK is spent in Tesco alone. Producer responsibility is in its infancy, and LA's struggle with end-of-pipe waste chaos and many find themselves spending £m's on Energy from Waste incinerators as the only way they feel they can meet the Landfill Directive.

## So what kind of things can be packaged differently?

Almost everything. For instance, packaging jam in refill pouches rather than jars leads to a 44% cost saving and a huge reduction in packaging weight. Laundry, cleaning, hygiene products and instant coffee can be up to 50% cheaper using refills. New sofas, furniture and DIY products may soon be delivered in reusable 'pouch' packaging that in trials could be reused up to 18 times. The 'pouches' replace mountains of bubble wrap and cardboard. Packaging is also designed for each item to be shelf displayed for visual impact, but only one item

is needed for display and the rest could be in less packaging. Current packaging methods also combine different materials in multiple layers and different plastics bonded together, so re-designing packaging for easy recycling, reuse, resource efficiency, reduced emissions and zero waste needs much greater priority. Tetra paks are made from 7 different layers of material laminated together including paper, plastic and



aluminium, and have to be shipped to Scandinavia for recycling where only the paper fibre can be recovered. Better than landfilling them, but it doesn't seem to make carbon sense. Many juices, for instance, are 90% added water and made up from concentrates, so why truck the water around?

## Can refill pouches be easily recycled?

Yes, if they are designed to be recycled. Most refills are plastic which can be recycled – it's a matter of segregating the different polymer types for recycling and minimising contamination. However plastic is currently not widely collected for recycling, partly because collections are full of other heavy packaging materials! - targets are weight based so there is little incentive, and most plastic packaging is not designed for recycling. In principle, instead of rinsing out the jar, bottle or can, the refill pouch could be rinsed, or washed during reprocessing.

#### **Environmental impacts?**

However, increased plastic use brings other problems – contamination of the marine environment highlighted by Rebecca Hosking's film 'Message in the Waves', 8% of oil use goes on plastic, 60% of litter found on beaches is plastic, and flooding is often caused by plastic blocking drains.

Peak Oil – life after 'mass' plastic? Because of Peak Oil we must also be planning beyond the era of cheap plastic – and respect it more as a versatile, useful and resilient material for which we have no replacement. The global downturn may have reduced oil prices, it doesn't matter so much when the peak oil tipping point is, but it does matter that we are hopelessly unprepared for the downward curve and we don't know how steep that descent will be.



5 litre wine pack reduces packaging weight by 17 times

#### **Reuse and refill containers**

It's very rare to find places where you can refill your own container from dispensing points. Reuse deposit schemes are common in Germany but non-existent in the UK. Companies took the German Government to Court claiming that having to comply with reuse deposit schemes amounted to unfair competition, and many lobby to prevent deposit schemes being adopted elsewhere. Why? - because producers and retailers would have to take responsibility for their packaging and bear the cost of operating return schemes.

But if everyone had to do it there would be a level playing field.

#### Litter bugs

Bill Bryson, Chair of CPRE (Campaign for the Protection of Rural England who commissioned a report on litter) said introducing deposit schemes was a 'no brainer', and claimed that the government was "intent" on finding reasons not to introduce deposit schemes in the UK. Mr Bryson added: "The fact of the matter is that the recycling rate in this country, while much improved in recent years, still lags behind many of our European partners and, as we have already established, we are world leaders in litter."

#### Who pays?

LA's will pay an extra £360m over the next 2 years in increased landfill tax on household waste, the tax rises to £40 p/t in 2009 and £48 p/t in 2010. Much of that waste will be unnecessary packaging material. Costs of recycling have also increased with the downturn in market prices for materials. The Local Government Ascociation are calling on the Government to make retailers responsible for funding the collection of packaging for recycling so they have an incentive to produce less.

## What innovations are producers and retailers undertaking?

We're not talking about planned product obsolescence whereby products are deliberately made to have a short life. According to the 'Story of Stuff', 99% of what we buy ends up in the bin within 6 months of purchase. And for every bin of waste put out at the household level up to 70 bin-fulls of rubbish have been produced 'upstream' to make and supply the products that are in that household bin. Let's be positive. Recent R&D work undertaken by WRAP with producers has focussed on light-weighting which is making considerable savings. This includes up to 25% lighter weight glass and plastic bottles and tin cans. Smart 'breathable' plastics are being developed for items like lettuce which spoil guickly. And supermarkets are all declaring environmental targets like reducing emissions, reducing waste, cutting bag use and building more energy efficient stores in response to public pressure. All this must be positively welcomed. Consumer demands for more ethical and sustainable practices are moving things in the right direction.

#### So where are we now?

There are 25m tonnes of household waste arising in the UK every year, and only 10% of all waste

is household waste. Current landfill sites are estimated to be full in 4 years time. The scale of the problem is so massive radical action is required. The bulk of recycling and waste reduction must be with commercial waste - but is there enough incentive? The 2005 'Courtauld Commitment' is a voluntary agreement between retailers and suppliers to reduce packaging and food waste. There is currently zero packaging waste growth, but packaging recovery targets only apply to large business, so SME's are exempt.

Newly revised Packaging Recovery target rates for commercial waste for large businesses – SME's are exempt.

Packaging Type	Recycli 2008	ng Targ 2009	get % 2010
glass	78	80	81
Paper/card	67.5	68.5	69.5
Plastic	26	27	29
Wood	20.5	21	22
Aluminium	35	38	40
Steel	58.5	59	59.5
Overall recyling	55		
Overall recovery	/ 72	73	74

#### What about food waste?

These targets may look impressive, business waste is easy to cleanstream. However, why are there no targets for food waste when the Landfill Directive has been all about stopping bio-degradable waste going to landfill?! Landfilling food waste will produce methane which is 15 times more potent a greenhouse gas than



APPARENTLY THEY'VE GOT A GOOD PACKAGING RECOVERY RATE HERE...

CO2. If commercial food waste targets were included it would have accelerated the development of anaerobic digestion and invessel composting in the UK, making it far easier for LA's to divert household food waste from landfill – meaning less incineration and a huge reduction in fossil-fuel derived fertiliser use. MP Philip Dunne has blasted the Government for being " asleep at the wheel" over anaerobic digestion in not rolling out a proven technology for generating energy from food waste and producing a bio-fertiliser. Friends of the Farth have been among the critics of the packaging

targets. Targets are much higher in Europe. With aluminium, for example, 95% less energy is consumed recycling it than making virgin ally – and its very energy hungry to produce – so why just 35% when best pratice in Europe can do 90%? There must also be waste reduction and carbon targets for business alongside greater resource efficiency - it's overdue to have more joined up thinking and action beyond recycling.

#### Why has it taken so long to bring changes to the UK when better practices have been around for a long time elsewhere?

The answer must lie in a lack of producer responsibility and the failure of timid Government to provide sufficient legislative drivers and incentives for innovation and change. Short term thinking, the failure of the market to deliver sufficient cost savings, resource efficiency and environmental improvements, corporate business practices that rely on glossy packaging, aspirational lifestyle images, manipulated consumer acceptance, and a retail sector dominated by vested interests all contribute.

#### Waste growth?

Waste growth in Devon has stayed

around 1% per annum for the last few years. Waste arising in the UK is 572kg per head, compared to 522kg EU average, with Eastern Europe around 294kg per head. Devon's recycling rate has climbed to a respectable 53% for 07/08 compared to 34% nationally, and everyone concerned should be lauded for that achievement. But imagine if waste arisings could be reduced by 1% a year instead - and this article has shown some simple ways that could be done. With runaway carbon emissions, serious attention needs to be given to low carbon living. Waste arisings must be cut dramatically and very quickly if Government targets of 80% emission reductions by 2050 to tackle climate change are to be met. Prevent waste happening - to state the obvious what isn't there doesn't need recycling or disposal!

#### And finally for laughs?

Have you ever hurt yourself while wrestling with packaging you cannot open? Well you are not alone. Apparently 70,000 accidents are caused by packaging every year!

Sources: www.wrap.org.uk www.lga.gov.uk www.thestoryofstuff.com www.letsrecycle.com

**Richard Gomme** 

Food Waste if there is nothing for them to eat. But maybe just by writing this I could be putting and Carbon Footprinting OK I'm always going on about it – I admit it, but I can't tell you how many

times people tell me that you cannot compost food waste. Even after I explain, they still say things like 'yes but not cooked food surely?' Rats, flies, smells - these are all the things that spring to mind with most people and with acod

DEFRA expects the overall impact of the Waste Strategy for England to contribute a net reduction in greenhouse gas emissions of at least 9.3m tonnes of CO2 equivalent annually in 2020 compared to 2006 levels. The work WRAP will deliver in the next three years will contribute 54% of this objective by 2011. By 2011, WRAP's work will contribute 54% of DEFRA's CO2 reduction target for 2020.

reason. Of course anyone silly enough to waste food almost deserves to get rats, but actually rats just like compost

piles anyway – warm, cosy, easy to burrow into, ideal for cold winter's nights - even people off composting? hope not, generally rats are everywhere, as we know you are never far from a rat! One of the biggest reasons why rats are increasing in numbers is a) the fashion for decking (rat hotels!) and b) the increase in food waste. According to Waste and

Resource Action programme (WRAP) we throw away 6.7 million tonnes of food every year, around 20% of everything we put in our bins each week. Every tonne of food waste prevented has the potential to save 4.5 tonnes of CO2 equivalent. Furthermore around one third of this food waste is still within it's sell by date!

Of course there is always going to be some food waste, even potato peelings are food for rats, raw fruit veg on the heap is still food for fruit flies and all manner of creatures. Most composters have no problems with this material - incorporated into a heap with garden material it generally fine, sometimes a bit of a fruit fly explosion in the summer and in the depths of winter an occasional rat or mouse might nibble a few potato peelings. For most of us the normal flow of food waste can be dealt with by dogs, Bokashi (fermentation - just Google Bokashi or see my book 'Composting for all') or the Green Cone www.greencone. com. But for institutions like schools, prisons, National Trust properties, pubs

with big gardens, hotels etc they need a system which is robust and foolproof and can take the volumes generated. The trouble is that most solutions are seriously expensive. In-vessel composters start at around £8,000 and you have to have a shelter, electricity - often 3 phase and then there are the extras, macerators, de waterers and compost additives that the big companies want to sell you.

Richard Gomme and I have been trialling the Jora 270 for some years and many of these have gone into schools across Devon and beyond. However they are still for relatively small volume usage and really need the addition of my 'Scotty's Hot Box' to complete the composting process, besides which they are not terribly robust and I'm concerned they will not stand last very long with the kind of high usage many schools put them through. What is needed is a larger more robust composter which is a fraction of the cost of the smallest in vessel composters from Rocket or Big Hanna.

Richard Gedge (who has also designed wood chip boilers) has come up with a design with an engineer friend, called Dan hence the name 'Ridan' for the new composter, which fits the criteria and now retails for £1,610. The mark 2 is currently steaming away at Ilfracombe junior school and they are very happy with it. Mark 3 is now at Riverford Field Kitchen and at Okehampton Primary school. We are looking to trail some more Ridans in schools in Devon - to make sure that it will perform according to expectations. We can help towards funding these machines which we hope will be ideal for schools with 500 + pupils.

Food Waste and Carbon Footprinting

How do you calculate the environmental damage caused by food waste? We know how many carbon dioxide equivalents (greenhouse gases) are produced in the UK from Government figures, and experts in the UK and Europe suggest that almost 20% of the total comes from producing, transporting, preparing and storing food and drink.



Ridan composter

#### How do vou calculate?

We also know that when food is sent to landfill it produces more areenhouse gases as it breaks down. We can calculate how many carbon dioxide equivalents are linked to food, and if we assume that half of the food thrown away could have been eaten (and we think that most could have been) then this is equal to at least 15 million tones of carbon dioxide equivalents. We know how many cars there are on the road, and how many carbon dioxide equivalents the average car produces, and so we can work out that this 15 million tonnes is the same as that produced by 1 in 5 cars in the UK.

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## grassroots

## Spark Devon Winners Social Enterprise Champions!

Two Devon furniture and appliance reuse projects are among 15 national winners selected to be social enterprise champions working to tackle homelessness and will receive up to £100k in investment funding. ReFurnish Devon (formerly Devon Furniture Forum) and The Resettlement Agency Plymouth will do this by supplying low cost items to homeless people moving into accommodation, and by providing skills training, volunteer opportunities and work placements to disadvantaged people to help them into further employment.

The 'Spark' programme, whose backers include Big Issue Invest, Price Waterhouse Coopers, BT, and the Governments Homelessness Unit, is a pioneering development and investment programme of £1.6m that aims to inspire organisations to build social enterprises that will tackle some of the biggest social issues we face, including homelessness, long term unemployment, mental health challenges, alcohol/drug issues and exclusion, using sustainable business models. Having two Devon winners underlines the good practice and achievements of our reuse partnerships. Out of 139 applicants, 15 exciting social enterprises from across England were selected to show the innovative and entrepreneurial approach they are taking.

The recognition of Refurnish Devon and Resettlement Agency follows the success of Mid Devon Community Recycling (MDCR) being awarded the Social Enterprise Mark by Secretary of State Hilary Benn and being in the national Social Enterprise Ambassadors programme, and the visit of Minister Phil Hope to Proper Job and MDCR last year. For more details

www.sparkchallenge.org

# Bottle top recycling?

The Wildstore in south Devon are planning to start collecting plastic milk bottle tops for recycling into suitable products which will be made locally. They are looking for anyone who wants to start collecting tops or start a collection point to get in touch – no money can be paid to collectors but some money will be donated to charity. Louise hopes to build up a viable

collection round, starting from south Devon. Contact Louise by e-mail info@wildstore.co.uk

### Devon Climate Action Network

www.devonclimateactionnetwork.ning.com

This network was launched on the 7th March and already has over seventy members at the time of writing – please join up! If all the climate change and transition town groups join this network and of course individuals we have a much stronger combined voice and can do much more. Please visit the website for more information.

If you live on Dartmoor you please also join the Dartmoor Circle Ltd. These groups have already received some funding from Dartmoor National Park Sustainable Development Fund and have been working on a low carbon community plan for the moor as one of its first tasks.

For more information, please e-mail Jan Freeman at dcrn-ccn@hotmail com.

## Appliance Refurbishment in Plymouth

The Resettlement Agency have opened a dedicated appliance refurbishment workshop to repair washing machines, cookers and other items near their shops in Union St, Plymouth. Flat pack furniture is also assembled there giving greater choice to clients, skills training and volunteer opportunities. Surplus food from shops and supermarkets is redistributed to people in need. Appliances are collected from the Plymouth waste stream, but there is a shortage of 'raw' white goods in Devon - Resettlement have reported finding it hard to source all the white goods they need as the majority of appliances in retailer take-back schemes are being sent directly up country for processing. Under the WEEE Waste Electrical Directive retailers must provide takeback schemes for appliances, but there are no reuse targets. Reconditioned and guaranteed appliances can be bought by anyone from Resettlement.

Contact: 01752 217046

NOOR TREES Mid Devon Community Recycling

(MDCR), has pledged to donate money to a tree planting charity for every tonne they fail to recycle!

Ken Orchard, Chief Executive of Mid Devon Community Recycling said, "We've designed a unique method of sorting recyclable materials which ensures that we end up with a really high quality product. Despite the current recession we've had no difficulty selling materials and we're continuing our tradition of sending only tiny fractions to landfill".

MDCR is keen to contribute to carbon reduction and biodiversity, and has teamed up with Moor Trees, a Devon based woodland charity.

## DCRN & DCCN Conference 24<sup>th</sup> June 2009

#### Boniface Centre, Crediton, Devon

Unrivalled opportunity for networking with community activists, social enterprises and local projects, volunteers, Councillors and Recycling Officers from across Devon involved in composting, recycling, reuse, climate change local action, and transition towns.

- Explore key issues and challenges facing communities
- Plenty of time for discussion and debate
- Keynote speaker
- All welcome
- High quality lunch from organic local food sources

Bookings: please contact Jan Freeman by e-mail on: dcrn-ccn@hotmail.com £10 community sector, £20 LA, free bursary places available.

