

## **Anexo D**

En este anexo encontrarán información sobre el reciclaje y de como la empresa es pionera en el reciclaje de la industria del empaque (Amcor, 2008)

### **Recycling**

Amcor was a pioneer in packaging recycling and to this day maintains a global commitment to packaging recycling.



Amcor was the first Australian company to recycle any commodity. It also became Australia's first kerbside recycler in the 1940s.

### **Recycling Fibre Packaging**

Fibre packaging refers to paper and cardboard used for cartons and corrugated packaging for products ranging from cosmetics to confectionery and tobacco. Over the past 120 years, Amcor in Australia has recycled more than 38 million tonnes of paper and cardboard.

Amcor currently collects over 800,000 tonnes of wastepaper annually, which in turn provides Amcor's fibre packaging, cartons and sacks operations with the majority of their raw material requirements.

Amcor fibre packaging is a leading recycler of waste paper from the Australian retail and commercial sector.

Amcor's boxes, made from recycled and other board, are used to package food and household items such as biscuits, breakfast cereals, frozen food, toothpaste, tissues, cosmetics, washing powder and pet food. Amcor's fibre packaging group spreads from Australia, New Zealand and Asia, to Europe and North America.

Amcor recycles waste paper and cardboard which, in turn, provides Amcor Australasia's Fibre Packaging, Cartons and Sacks operations with nearly all the raw materials required in the production of its extensive packaging range. Waste paper produced from Amcor's

recycling activities in Australia is also supplied to Amcor Asia and to Amcor Sunclipse in the USA for raw material use.

Amcor has also successfully developed a range of options to recycle waxed corrugated boxes which was previously not technically feasible. Recycling solutions include recycling into new cardboard, reuse as second hand boxes and remanufacture into new products such as combustible briquettes. All these initiatives have resulted in reduced volumes of waxed boxes going to landfill.

Amcor also facilitates collection of plastic, glass and metal in Australia. It works with supermarkets to recycle soft plastics, such as shopping bags, and directs collected glass to Amcor's glass plant in South Australia, which produces wine bottles.

All of Amcor's businesses recycle waste back into their operations wherever possible in order to reduce use of raw materials and at all times try to reduce overall resources and energy consumed during production processes.

### Recycling Flexible Packaging

Flexible packaging is used for a wide range of food applications including confectionery, coffee, fresh food and dairy, as well as medical applications. Amcor makes a range of flexible packaging products including printed and unprinted mono and multi-layer plastic films, laminations and converted products for consumer and industrial applications. Amcor's flexible packaging operations are located all over the world.

In many cases flexible packaging is in direct contact with the food it contains. This obviously results in food safety being a vital concern. Therefore, as well as flexible packaging plants focusing on waste and energy use reduction, hygiene and housekeeping standards are critical. Amcor is working with its customers to have its sites meet internationally accepted standards in these areas. These standards include the BRC/IOP Technical Standard and Protocol for Companies Manufacturing and Supplying Food Packaging Materials for Retailer Branded products in the UK, and annual ratings from the American Institute of Bakers.

One of the key features of flexible packaging is the fact that it weighs so little in comparison to the product that it contains. This has resulted in significant reduction in materials used, and thus resources utilised, to contain the same amount of product. There

are also continuous improvements in packaging materials and production methods that allow even lighter weight materials to be used. Although mixed flexible packaging waste is often not easily recycled, it does provide a valuable source of energy and many countries benefit from the calorific value of this packaging waste being used as fuel at energy plants.

Amcor's flexible packaging facilities concentrate heavily on reducing the weight of their products. They also focus on reducing their waste production and energy use per unit of product to become as efficient as possible. The European plants have been focused on these areas for many years with a number of the Nordic plants publicly reporting performance data to their local communities and regulators.

### Recycling PET Packaging

PET (Polyethylene terephthalate) is a strong, lightweight form of plastic. It is used to make containers for soft drinks, juices, alcoholic drinks, water, edible oils, household cleaners the strength of the material that makes PET such a successful product. For example, carbonated soft drinks can generate enormous pressure on a PET bottle, without making the bottle deform or explode.

Since its original development in 1941, PET producers have become increasingly concerned with environmental issues. This has resulted in a significant decrease in the quantity of raw material needed for bottle manufacture. Today, a 1.5 litre container is manufactured with just 35 grams of raw material. A striking feature of PET is its 100% recyclability. PET bottles are mostly recycled into fibres for textiles such as polar fleece, carpets and non-woven products, however the more recent 'bottle to bottle' recycling industry is growing rapidly. Amcor believes that as recycled PET production is expected to increase by 30% in the coming years, it is logical that recycled PET becomes part of the PET supply for beverage bottle production.

Amcor was the first company in the world to operate its own PET recycling facility. Globally, PET is now the most widely recycled plastic. Amcor's leading edge PET recycling facility in France has the capability to recycle nearly 100 million pounds of post consumer PET annually. That's nearly 1 billion PET containers each year which would otherwise go to landfill.

In many other countries, Amcor is working with its customers and regulators to identify opportunities for enhanced materials use and efficient recycling. Amcor is an active

member of industry associations including Petcore (PET Container Recycling Europe) and its American equivalent NAPCOR (National Association for PET Container Resources). Both these groups are committed to facilitating and encouraging recycling of PET products through community education, market research and awareness programs.

### Recycling Glass Packaging

Amcor's glass wine bottle plant in one of Australia's premium wine regions was built in 2002. The plant produces around 200 million premium wine bottles per year from melting sand, cullet (post consumer glass waste) and other minor ingredients. Cullet is supplied by Amcor's recycling operations in South Australia and the facility has been designed to incorporate 35-40% cullet, thus greatly reducing the energy needs of the site. In fact, Amcor Glass has secured the vast majority of South Australia's recycled glass.

When the plant was designed, specific attention was paid to environmental issues. The furnace technology used at the site incorporates recuperative technology which is very energy efficient and produces lower levels of nitrous oxide emissions. The process also uses low levels of water. All stormwater is collected and diverted to a lagoon where it either evaporates or seeps through the soil into the groundwater.

Extensive tree planting has also been undertaken at the site to minimise environmental impact, using locally collected native seeds.

### Recycling Metal Packaging

Amcor's major metal packaging businesses are located in the Australasian region. They produce aluminium aerosol and beverage cans, as well as steel aerosol and food cans.

Aerosol cans are supplied for the personal care and household product markets, (such as deodorants and insecticides). Beverage cans are produced in a multisize range of two-piece aluminium cans and ends for the beer, soft drink, ready –to-drink alcohol, wine and juice markets, while food cans are supplied as three-piece steel cans and ends to processors of food and dairy products.

The aluminium beverage can has undergone major innovations in the past thirty years. This includes the move to water based coatings and varnishes as well as significant reduction in the metal content in each can.

All manufacturing offcuts and spoilage in the Beverage Cans business are fully recycled. About 70% of used beverage cans are believed to be returned for recycling. Amcor's Metal Division is working closely with Amcor Recycling in developing a closed loop recycling system for used beverage containers.