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ALCOA AUSTRALIA ROLLED PRODUCTS PTY LIMITED

SUBMISSION IN RESPONSE TO BEVERAGE CONTAINER & DEPOSIT SCHEME BILL 2009

A.B.N. 50069 853 229

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Executive Summary

Alcoa ARP believes that all used beverage containers should be recycled and that the recycling loop must be economically sustainable for all stakeholders in the closed loop system.

Alcoa ARP supports a beverage container recovery system that engages all stakeholders in the recycling loop and drives towards an outcome of zero used beverage containers going to land fill.

Aluminium cans and aluminium bottles are unique beverage containers, as they are endlessly recyclable and due to the inherent value of Aluminium, have the highest level of recycling rate of any type of beverage container regardless of the recovery scheme in place.

Alcoa ARP believes the challenge for government, industry and consumers is to not only determine the best system for eliminating landfill, but to find a solution to the next step in the recycling process, and that is to take the reclaimed used beverage containers and convert them back into a usable product.

To this end Aluminium provides a sustainable solution which is not currently available for glass or PET beverage containers and Alcoa ARP has the potential to be able to complete this loop in Australia provided the supply chain is optimised and non-value added activities eliminated.

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Introduction

Alcoa Australia Rolled Products Pty Limited (Alcoa ARP) is pleased to provide this submission to the senate committee on the proposed Beverage Container and Deposit Scheme Bill 2009.

Alcoa ARP is part of the Alcoa family in Australia, and undertakes the processes of aluminium recycling and rolling. Alcoa ARP is the largest recycler of Aluminium in Australia and recycles over 70,000t/year, with the final rolled product being used to produce over 95% of all Aluminium cans made in Australia. Alcoa ARP has been recycling Aluminium in Australia for 45 years and has capital equipment in operation in Australia that has a replacement value of over $500m.

Recycled aluminium contributes 55% of the CO2-e saving of the entire Australian recycling stream. Alcoa ARP is committed to improving energy efficiency within its two operations and is actively pursuing opportunities to reduce energy and water use, greenhouse emissions and waste to landfill.

Alcoa ARP believes that there are several possible solutions to increasing recycling rates for used beverage containers and the government must engage all key stakeholders to ensure that the final system selected supports both the environmental and economic sustainability of closed loop recycling in Australia.

If the Australian Government determines that the best solution for reclamation of used beverage containers is Container Deposit Legislation, then Alcoa ARP believes that CDL must;

1. Support the development of infrastructure that will ensure used beverage containers are collected and sorted as cost effectively as possible.

2. Provide the necessary frame work that ensures the recycling of aluminium cans remains viable in Australia and that all non-value added activities are eliminated from the supply chain.

3. Ensures that extra costs are not burdened on business.

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About Alcoa

Alcoa ARP is part of Alcoa's Global Rolled Products group and operates Australia's largest aluminium recycling facility at Yennora, in Western Sydney, New South Wales, and aluminium flat rolled products facilities at Point Henry near Geelong in Victoria.

Alcoa ARP has been operating in Australia since 1965, and today produces around 150,000 tonnes of rolled aluminium each year for aluminium food and beverage cans and bottle screw caps. Around 60 per cent of Alcoa ARP's rolled aluminium is exported, mainly to the growing Asian markets.

The recycling facility at Yennora is the largest of its kind in Australia and recycles around 70,000 tonnes of scrap aluminium a year, including over 750 million cans. Aluminium is 100 per cent recyclable, and the recycling process uses only 5 per cent of the energy needed to make new metal from scratch, providing significant greenhouse benefits and diverting waste from landfill.

Alcoa ARP employs approximately 570 people in Australia and contributes around $80 million in direct and indirect wages to the Western Sydney and Geelong regions.

Alcoa ARP is the largest recycler of aluminium in Australia with its remelting facility at Yennora in Western Sydney. Of the 88,000 tonnes of rolled aluminium produced (forecast 2008), 70,000 tonnes will be generated from recycled aluminium. Recycled aluminium constitutes approximately 80% of the total production at Yennora. Yennora's Alcoa ARP site has the potential to process 100% recycled aluminium.

Using recycled scrap at Alcoa ARP's rolling mills saves up to 95% of the energy required to produce metal from the beginning of the mining process. Based on 70,000 tonnes scrap consumption, the energy saving through Alcoa ARP's recycling in Australia equates to offsetting up to 1.8 million tonnes of carbon emissions each year depending on the source of electricity, bauxite and alumina.

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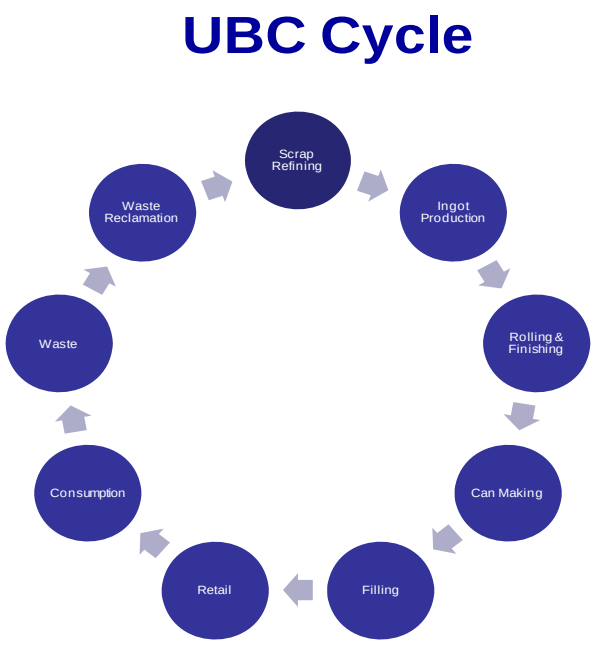
Background

Figure 1 is a schematic diagram of the recycle loop for Used Beverage Cans (UBC's).

It is estimated by the Packaging Stewardship Forum of the Australian Food and Grocery Council (1)) that 48,791 tonnes of aluminium cans are consumed in Australia each year with a recycling rate of 70%. Approximately 50% of the UBC's recycled are recycled in Australia with the balance being exported.

Figure 1



Scrap Melting Process

World best practice UBC recycling is capital intense with zero land fill waste.

With the appropriate incentives this best practice technology could be utilised in Australia with zero land fill which would keep all UBC recycling in Australia.

Under this scenario Australia could be in the unique position of having all aluminium cans made of approximately 80% recycled aluminium.

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Aluminium is the only beverage packaging material available to enable this level of closed loop recyclability.

Recycled aluminium constitutes greater than 30% of the total aluminium available worldwide. This figure is set to continue increasing. Between 1980 and 2006, recycled aluminium production increased by greater than 300% compared to a 200% increase in virgin aluminium. It is estimated that of the total 700 Million tonnes of aluminium produced in the world since commercial manufacture began in the 1880's, about 75% of the total is still in productive use today.

Table 1 shows the current recycling rates in Australia for beverage containers and shows that Aluminium cans make up approximately 40% of all beverage containers but only 3% of the total weight on containers that are not recycled.

Table 1

	Aluminium	Glass	PET	Total
Overall Beverage Container Recycling rate Australian Beverage Packaging Consumption, Recovery and Recycling Quatification Report, Hyder Consulting, Sept 2008	70%	46%	46%	47%
Total Consumption (t) Australian Beverage Packaging Consumption, Recovery and Recycling Quatification Report, Hyder Consulting, Sept 2008	48,791	785,867	88,137	922,795
Estimated average unit mass (Grams)	15	300	40	
Total Units produced	3,252,733,333	2,619,556,667	2,203,425,000	8,075,715,000
% Of Total Containers consumed	40.3%	32.4%	27.3%	
Beverage Containers not recycled (t)	14,637	424,368	47,594	486,599
% Beverage Containers not recycled (by weight)	3.0%	87.2%	9.8%	

Source (1): Australian Beverage Packaging Consumption Recovery and Recycling Report , Hydra Consulting September 2008 & estimates based on can weights and volumes from various sources.

Aluminium cans made from a high percentage of recycled aluminium have a lower carbon footprint than other drink container packaging. This is due to a number of factors including the percentage of recycled content in a can and the higher proportion of recycling post use compared to other beverage containers.

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Alcoa's position

- A beverage container recovery scheme has the potential to increase the volume of cans available to Alcoa for the manufacture of new flat rolled sheet for production of new aluminium can bodies that would be made from 100% recycled aluminium. The opportunity exists to for our Yennora site to make all of its production from 100% recycled aluminium and this would mean recycling an additional 25,000 tonnes of scrap aluminium including UBCs saving 600,000 tonnes of CO2, 6 Million litres of water, and 15,000 tonnes of land fill per annum.

- Increasing the recycling rate of UBC's in Australia from the current level of 71% to 90% would generate an addition 10,000 tonnes of UBC's for processing. If these additional tonnes plus the UBC's currently exported (approx 15,000 tonnes) were processed in Australia, then the increased value to the Australian economy would be approximately $60m/yr.

- An improved beverage container recovery system has the potential to improve the quality of scrap available for recycling, allowing scrap to be returned that has less contaminant such as plastics, which have an adverse environmental impact when melted. Under the current CDL system in South Australia, Alcoa receives high quality UBC's for recycling. This is compared to UBC's collected both by scrap merchants and through kerbside, both of which have a higher potential to be contaminated with plastics and other packaging waste. Therefore for Alcoa's recycling process a CDL would provide a higher quality scrap.

- An improved beverage container recovery system would benefit Alcoa if it provided a secure supply of UBC's and all non-value added steps were removed from the supply chain. Under the current CDL system in South Australia, Alcoa has to bid for cans in a monthly tender process which does not provide a consistent supply at known price points. Alcoa ARP is the major recycler in the Aluminium recycling loop in Australia, and if we are to increase our rate of recycling, we must be able to obtain a consistent flow of quality aluminium scrap, including UBC's, at a price that ensures that we can achieve a sustainable return on our investment.

- Can recycling benefits the environment and the economy, due to the fact that they are more efficient to collect and recycle, as Aluminium cans are 'one piece' and don't include a top. This reduces overall litter and its recycling carries an overall higher recycle value than other beverage packaging containers.

- Finally a beverage container recovery programme has the potential to increase the rate of aluminium recycling in Australia, thereby reducing the overall atmospheric greenhouse emissions. Aluminium has an indefinite life, and does not lose its quality during the recycling process. The

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lifecycle of an aluminium product is not the traditional "cradle to grave" sequence, but rather a renewable "cradle to cradle" process[1].

Conclusion

Alcoa ARP has been an integral part of the Aluminium recycling industry in Australia for over 45 years and currently operates assets with a replacement value of over $500m.

Alcoa ARP is a critical link in the recycling loop and is committed to increasing the amount of Aluminium recycled in Australia. With the correct government policy and cooperation of all major stakeholders in the beverage can cycle, Australia has the opportunity to lead the world in developing a beverage container that has over 80% recycled content, and delivering a 'closed loop' system for cans.

The aluminium can is a package with endless recycling capability, and a dramatically positive impact on Australia's CO2-e emissions.

Alcoa ARP believes that a closed loop Aluminium recycling industry is environmentally and economically sustainable in Australia, if Government at all levels work closely with our industry to improve recycling rates, eliminate non-value added activities, and provide financial incentives for business to invest in world class recycling technology.

[1] http://www.world-aluminium.org/Sustainability/Recycling