

# Moondarra Blueberries lead the way in sustainable packaging

Sophie O'Neil

Moondarra Blueberries have taken out the ***National 2021 Eat Easy Award*** in the Grown category for their outstanding tasting fruit and ground breaking, environmentally friendly packaging.

As organic growers for over 30 years, packing blueberries into petroleum based plastic punnets never sat comfortably with Mal Deveson, his son Joel, daughter Kate and son-in-law Rob. The Gippsland farmers had been hunting for sustainable alternatives to single use plastic polyethylene terephthalate (PET) punnets but struggled to find a solution despite increasing demand from their wholesale and retail customers.

In their quest, the Moondarra team discovered many packaging companies talked the talk, but when they delved into the details, they were less convinced with the offerings. They learnt that packaging marketed as “environmentally friendly” and “compostable” was often required to be recycled or composted to the European Standard EU13432 or Australian Standard AS4736, which meant it actually could only be industrially composted, and such industrial systems are not widely available in Australia as yet.

“Dad believed we needed to find a home compostable packaging solution, not some half-baked idea,” explains Kate Prezioso. “We didn’t want to green wash our customers with promises of ethical packaging, which didn’t actually fully deliver.”

Fortunately, in 2019 Mal and Kate attended an expo, where they viewed a demonstration of the heat-sealing process by Proseal Australia, which led to an introduction to an award winning New Zealand based company who are considered pioneers of sustainable packaging solutions. Punchbowl Packaging’s then

Innovation Lead, Tunde Lovestyan, understood exactly what the Devesons required and together they successfully developed a fully home compostable packaging solution for their organic 125g fresh punnet.

Moondarra’s new punnets are made from bagasse, the waste generated from sugarcane plants after sugar has been extracted, and wheat straw. When combined it provides a strong environmentally friendly fibre. Punnets are enclosed with a heat-sealed cellulose film produced from sustainably sourced eucalyptus fibre plantations and converted in Australia to a biodegradable film. Bio-polymer used in the film is derived from natural resources such as sugarcane, cassava and corn from non-GMO crops.

Moondarra have also implemented an in-house printing process to add a barcode and information panel directly to the base of each fibre punnet before they are graded and weighed. The ink used is non-toxic and compostable. This step reduces the need to apply a label to the base which affects the compostability and reduces the use of non-renewable resources.

Importantly, Moondarra’s packaging can decompose under specific composting conditions back into water, carbon dioxide and biomass within 26 weeks at ambient temperature (20 - 30°C) and is non-toxic to the environment. It meets the Home Compostable Australian Standard AS 5810-2010, verified by the Australasian Bioplastics Association.

When introducing their new packaging, the Moondarra team were worried customers would reject the new packaging as they were accustomed to turning punnets over to inspect the bottom for berry quality before purchasing, however after two harvest seasons, concerns about a non-transparent base have been unfounded. Some doubt was cast over the fact that once the punnets are opened they cannot be sealed again, but according to Kate customers say after opening punnets, fruit is either eaten straight away or transferred into their own reusable plastic containers.

“Shelf-life tests in our new fibre and film punnets have shown brilliant results with some varieties stored for eight weeks still eating well. The packaging is also tamper-proof and has proved extremely robust which complies with our quality control standards post farm,” says Kate.

Currently the cost of the new packaging is estimated at an additional 50 cents per punnet over the old PET version, however Moondarra’s wholesale customers have taken on the price increase as they believe the sustainable packaging significantly helps market the fruit, and customers are willing to pay extra for this. Broader industry adoption of this style of packaging would, of course, bring costs down.



**Before the change to sustainable packaging, our annual plastic use within a single harvest season was close to 2,000 kilograms. Given Moondarra Blueberries accounts for only about 0.1% of Australia’s annual blueberry production, that’s an alarming figure, explains Mal.**

**Without a doubt, our home compostable packaging has strengthened our brand because shoppers are looking for products that align with their personal values, especially given the world’s climate crisis. Our recent success in the 2021 Eat Easy Award confirms to us we are absolutely on the right path, and we urge the rest of the industry to join us.**



**Punnets are robust enough to be packed into double layer 12 punnet trays.** Photo credit: Moondarra Berries.



**Punnet film breaking down in compost system.** Photo credit: Moondarra Berries.



**Punnet fibre base and film breaking down in compost system.** Photo credit: Moondarra Berries.



**Punnets being capped on the Proseal Australia GTR heat seal machine – semi-automatic with rotary table. Capable of capping 45 punnets per minute.** Photo credit: Moondarra Berries.