

## Consumer perceptions of plant-based products imitating milk and milk products

Surveys from around the world indicate that consumers are confused and misled by the labelling and marketing of plant-based products. It is important to show our policy makers that this too is an issue and Australians are equally confused.

This document details consumer insights from Australia, France, and the United States around their perceptions of plant-based products.

### In Australia and other countries:

- Consumer perceptions regarding plant-based beverages are confused, notably in terms of nutrition.
- Consumers believe that plant-based beverages are nutritionally equivalent and at times better than milk.

## Australia

### The Dairy Australia Trust Tracker:

Lewers Research has been conducting the Dairy Australia Trust Tracker since 2018 - a robust consumer study to monitor community sentiment including trust and perceptions of dairy foods and the industry, identify emerging food and general issues/concerns in the macro-environment and monitor the impact of marketing activities.

To ensure the representativeness and robustness of the insights we have ensured that the study has the following characteristics:

- Robust sample size of Australians aged 18+ with low margin of error at 95% confidence
- Quotas in place to capture a representative group of Australians during fieldwork
- Weighting of the data to correct for any deviations in the sample to ensure it is representative of the Australian population by age, gender, and location.
- Comprehensive and consistent online survey that has been designed to consider elements including ordering effects, priming and questions are asked of relevant groups to ensure consistent and comparable data wave on wave.

For the annual waves (including Wave 8 (Annual Wave) October 2020) we capture a robust sample of around **n=1,300 Australians aged 18+** via a 20-minute online survey. **At this sample size level, the margin of error is low at +/-3% at 95% confidence.**

For the alternative milks results specifically from Wave 8 October 2020 (Annual Wave), the survey had a sample of n=535 who buy alternative milks who provided the main reasons for buying alternative milks. At this sample size, the margin of error is +/- 4%. For the attitudes to alternative milks, this was asked of the total market, i.e. a sample size of n=1,293 which has a margin of error of +/- 3%. In both these cases, the margins of error are low and are below the widely accepted margins of error of +/-5% at 95% confidence of scientific studies.

**In summary, to confirm this data is based on a robust sample of Australians and is not anecdotal or based on small sample sizes with high margins of error.**

### Who are Lewers?

Lewers is an Australian owned, experienced, forward-thinking research company established 15 years ago and are dedicated to providing our clients with the insights they need to make the right decisions for their business.

**Table 1. Dairy Trust-tracker consumer survey commissioned by Dairy Australia<sup>1</sup> assessed perceptions of the nutritional value and benefits of plant-based foods**

	2020	2019
<b>Main reason for buying plant-based beverages*</b>	N= 535	N=466
Plant-based beverages are perceived to be healthier than milk	49%	45%
Plant-based beverages are better for the environment	30%	20%
<b>Attitudes to plant-based beverages<sup>+</sup></b>	N = 1293	N = 1326
Plant-based beverages are just as nutritious as milk	36%	33%
Plant-based beverages are as good for children as milk	33%	27%
Plant-based beverages contain cow's milk	19%	15%
Cows' milk is more natural than plant-based beverages	61%	61%

\*Among those who buy plant-based beverages. <sup>+</sup>Among total sample

- There is an increasing perception among plant-based purchasers that PBB are healthier despite insufficient evidence to conclude that plant-based beverages possess health benefits
- Many consumers do not believe that cows' milk is more natural than plant-based beverages. However, commercial plant-based beverages are formulated foods, with wide variance in fortified (added) nutrients. It is not equivalent to consuming naturally occurring nutrients and will have varying outcomes on nutrient quality and bioavailability<sup>2</sup>.
- There is an increasing perception that plant-based beverages are as good for children's health as cows' milk. Water and milk are the recommended beverages for children 12 months to 5 years of age. Generally, plant-based beverages are not recommended as milk equivalents for those aged 12-24 months due to nutrient inadequacies and only when medically needed for those aged 2 to 5 years.

See Appendix 1 for more results from 2019 and 2020 Trust Tracker results

## France

In France, the European Court ruled that purely plant-based products cannot be marketed with designations such as 'milk', 'cream', 'butter', 'cheese' or 'yoghurt', which EU law reserves for animal products.

A 2017 nationally representative survey of French adults (n= 5175), commissioned by CNIEL (The French Dairy Interbranch Organization) assessed consumer perceptions of plant-based products<sup>3</sup> and despite the regulations, consumers are confused about these products as detailed below:

### Confusion about the products

- One in three French adults believe milk is present in plant-based beverages.

### Confusion about nutritional content

- Six out of 10 believe that PBB can replace cow's milk in terms of nutrition
- Fifty-two percent agree that PBB provide the same nutrients as milk
- More than 70% agree that PBB naturally contain calcium
- This confusion could lead to risks for the consumer with one out of five French adults believing that PBB meet the nutritional needs of an infant.

<sup>1</sup> Dairy Australia Trust Tracker | Annual Wave Report | October 2019, N=1326, October 2020 N = 1293. National representative samples

<sup>2</sup> Zhang Y, Hughes J, Grafenauer S. Got Mylk? The Emerging Role of Australian Plant-Based Milk Alternatives as A Cow's Milk Substitute. *Nutrients* 2020, 12, 1254; doi:10.3390/nu12051254

<sup>3</sup> Audirep, Consumer Perceptions of plant products, Audirep enquiry of 5,175 people for Cniel, Oct 2017

## United States

A 2018 IPSOS (Global leader in market research company) population survey<sup>4</sup> (N= 2010) (gathered data from US Adults 18+).

- N= 914 exclusive dairy milk buyers (once a year or more often)
- N=789 dual buyers of dairy milk and plant-based beverages (once a year or more often)
- N=110 exclusive plant-based beverages buyers (once a year or more often)
- Respondents were asked about their perceptions of milk and plant-based beverages via both open-ended and closed-ended questions.

### IPSOS survey methodology

<https://www.ipsos.com/en-us/news-polls/americans-love-dairy-milk-for-its-taste-nutrition-and-affordability>

A sample of 2,010 adults age 18+ from the continental U.S., Alaska and Hawaii were interviewed online in English.

The sample for this study was randomly drawn from Ipsos's online panel, partner online panel sources, and "river" sampling and does not rely on a population frame in the traditional sense. Ipsos uses fixed sample targets, unique to each study, in drawing sample. After a sample has been obtained from the Ipsos panel, Ipsos calibrates respondent characteristics to be representative of the U.S. Population using standard procedures such as raking-ratio adjustments. The source of these population targets is U.S. Census 2016 American Community Survey data. The sample drawn for this study reflects fixed sample targets on demographics. Post-hoc weights were made to the population characteristics on gender, age, race/ethnicity, region, and education.

Statistical margins of error are not applicable to online nonprobability sampling polls. All sample surveys and polls may be subject to other sources of error, including, but not limited to coverage error and measurement error. Where figures do not sum to 100, this is due to the effects of rounding. The precision of Ipsos online polls is measured using a credibility interval. In this case, the poll has a credibility interval of plus or minus 2.5 percentage points for all respondents. Ipsos calculates a design effect (DEFF) for each study based on the variation of the weights, following the formula of Kish (1965). This study had a credibility interval adjusted for design effect of the following (n=2,010, DEFF=1.5, adjusted Confidence Interval=4.0).

### The United States IPSOS survey results showed:

- Sixty-two percent of exclusive PBB buyers, 51% of dual buyers and 35% of total respondent's thoughts PBB offered higher or equal protein quality to dairy.
- Seventy-three percent of consumers believe almond 'milk' had as much or more protein per serving than milk from cows.
- Sixty-eight percent strongly or somewhat agreed that PBB have the same nutrition as dairy milk.

Health is interconnected with nutrition in consumers' eyes. Both dairy milk and plant-based beverages are purchased with nutrition in mind, yet many consumers are not aware of nutritional distinctions between products. Open ended responses showed that:

- Consumers have an expectation that products labelled as "milk", whether they are dairy milk or a plant-based 'milk', are comparable on nutrition content.
- Almond beverage, soy beverage and coconut beverage are perceived as having the same or more vitamins, protein or other key nutrients as compared to milk.
- Most adults believe that dairy milk and plant-based beverages have the same nutritional content.

PBB were associated with dairy milk by some consumers.

- When milk is prominently labelled on the package (e.g., Bolthouse Farms Plant MILK Protein), the association is stronger than when "milk" does not appear on the package (e.g., Rice Dream Rice Beverage).

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<sup>4</sup> <https://www.ipsos.com/en-us/news-polls/americans-love-dairy-milk-for-its-taste-nutrition-and-affordability>