

What does Australian-grown coffee taste like, and how does it compare? Research describes its unique 'terroir'

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Australians love their coffee, and many can barely live without it. [According to Statista](#), we consumed an average of about 2kg of coffee

per person in 2022. Yet [it's estimated](#) less than 1% of this coffee is grown in Australia.

Our new research, [published in the *Journal of Sensory Studies*](#), introduces a world-first coffee character wheel which can be used to describe the unique "terroir" of Australian coffee.

We pored over published literature, online materials and coffee sensory panels to collate a list of 679 unique sensory terms describing coffee's acidity, mouthfeel and aftertaste. We then narrowed this down to 95 terms, which were arranged onto our wheel.

We hope our research will help Australian growers become more competitive in the wider coffee market, and establish a brand identity beyond "Grown in Australia".

A history of growing coffee

Many people don't think of Australia as a coffee-growing country—probably because coffee cultivation is typically associated with tropical high-altitude areas.

But that doesn't mean we can't produce a good cup of coffee here. In fact, coffee has been successfully grown on Australia's east coast for [more than 100 years](#). Today, there are about 50 growers scattered throughout the coast's tropical and subtropical areas.

During the course of our research, coffee farmers told us Australia's cool temperature, high rainfall and zero-frost microclimates are perfect for producing high-quality Arabica coffee.

At the same time, coffee is an expensive crop to produce because of high labor and land costs. As such, Australian-grown coffee remains the

secret of a small number of speciality coffee drinkers.

But our research has found there is potential for it to meet national demand.

Working with producers

Southern Cross University's Northern Rivers campus borders the Byron Bay hinterland in New South Wales, a major coffee-producing area in Australia. For decades, our university's researchers have worked with local coffee farmers to improve production and quality.

Our team recently received funding from AgriFutures Australia, as part of its [AgriFutures Emerging Industries Program](#), to find the unique "terroir" of Australian-grown coffee.

Terroir, a word often associated with wine, can be thought of as the "taste of place" of a product being consumed. Although a product's terroir is specific to a location, the exact definition can vary for different crops.

Looking at the literature on coffee, we found the definition of coffee terroir would need to be clarified. We [compared it](#) to the well-defined wine terroir, and found post-harvest processing should also be included, as it is specific to the location.

Finding the terroir of Aussie coffee

The quality of coffee is often assessed and scored following industry-standard guidelines.

Australian-grown coffees have [very high scores](#) similar to, or above,

other international coffees such as those from Brazil, Columbia or Ethiopia.

However, these scores can't differentiate between terroirs—so we assessed and differentiated between the terroirs of 100 Australian-grown single-origin coffee samples and 50 international ones.

The samples were anonymized and given to 138 panelists who provided thousands of descriptions. For aroma and flavor, we standardized the descriptions to the well-known [coffee taster's flavor wheel](#).

We then isolated descriptions related to acidity, mouthfeel and aftertaste, which we were able to summarize using our [coffee character wheel](#).

What does our coffee taste like?

Our results found Australian-grown coffee is sweeter, nuttier and fruitier in flavor than others. This pleasant terroir is probably due to the cooler temperatures and longer ripening periods in our coffee-producing areas.

It also has a low-medium intensity in acidity, smooth textural mouthfeel, and a medium-long aftertaste.

In addition, we observed slight differences between the terroirs of coffee from Australia's two primary growing regions. The tropical north had a more nutty and roasted flavor profile, while the subtropical presented a sweeter and fruitier profile.

Waiting to be discovered

In [collaboration with](#) World Coffee Research, we've conducted trials to

find new high-quality coffee varieties that can be grown in Australia. These will help reduce the cost of production and provide [more resilience against climate change](#).

Locally produced coffee also has a lower carbon footprint and transport time compared with imported [coffee](#). This means a fresher, cleaner and greener product. And as Australia is [free of coffee pests](#) and diseases, most of it is grown without the use of pesticides.

For now, Australian-origin coffee remains a niche product waiting to be discovered—but it might just end up in your morning cup yet.

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