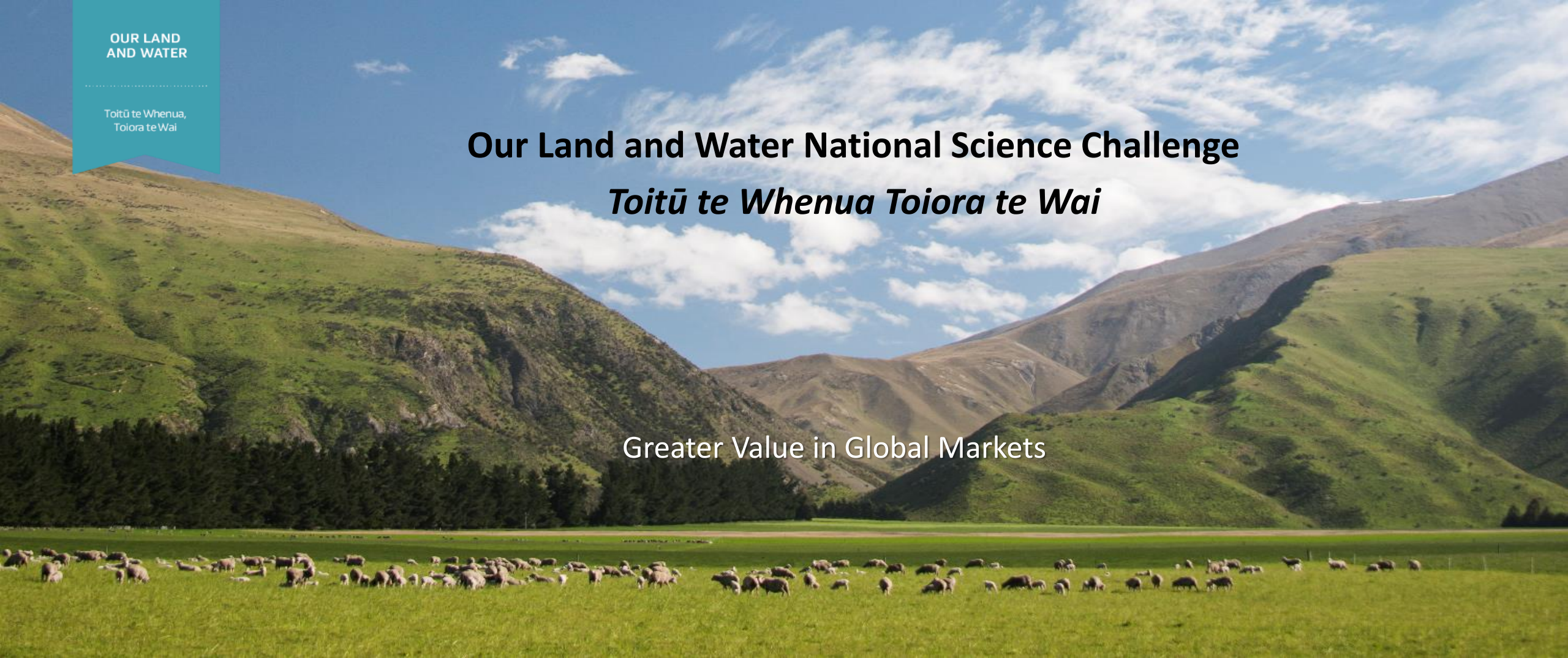


# Our Land and Water National Science Challenge

## *Toitū te Whenua Toiora te Wai*

Greater Value in Global Markets



## Greater Value in Global Markets - Current projects

- Integrating Value Chains
- Product eutrophication footprinting
- Credence attributes on farm
- Indicator Working Group
- Trust and Social License
- Matrix or Drivers project

## International and domestic drivers likely to impact on land use practice and/or change

<a href="#"><u>Agricultural and Trade Policy</u></a>	<a href="#"><u>Air Quality</u></a>	<a href="#"><u>Animal Health and Welfare</u></a>	<a href="#"><u>Authenticity and Traceability</u></a>
<a href="#"><u>Biodiversity</u></a>	<a href="#"><u>Biosecurity</u></a>	<a href="#"><u>Brand</u></a>	<a href="#"><u>Carbon Emissions Trading Schemes</u></a>
<a href="#"><u>Chemical Residues</u></a>	<a href="#"><u>Climate Change</u></a>	<a href="#"><u>Country-of-Origin</u></a>	<a href="#"><u>Cultural Values</u></a>
<a href="#"><u>Demographics</u></a>	<a href="#"><u>Digital Communication Systems</u></a>	<a href="#"><u>Environmental Condition</u></a>	<a href="#"><u>Extreme Weather Events</u></a>
<a href="#"><u>Family and Community</u></a>	<a href="#"><u>Food Safety</u></a>	<a href="#"><u>Functional Food</u></a>	<a href="#"><u>GHG Emissions</u></a>
<a href="#"><u>GM and Nanotechnology</u></a>	<a href="#"><u>Innovative Products</u></a>	<a href="#"><u>Local Food/Food Miles</u></a>	<a href="#"><u>Organic Production</u></a>
<a href="#"><u>Pasture-Based Production</u></a>	<a href="#"><u>Precision Agriculture</u></a>	<a href="#"><u>Product Quality</u></a>	<a href="#"><u>Religion</u></a>
<a href="#"><u>Social Responsibility and Fair Trade</u></a>	<a href="#"><u>Soil Quality</u></a>	<a href="#"><u>Sustainable Supply</u></a>	<a href="#"><u>Waste and Recycling</u></a>
	<a href="#"><u>Water Footprinting and Use</u></a>	<a href="#"><u>Water Quality</u></a>	

# Indicator Working Group

- They are acting as central source of indicator information
- They are in the middle of our TempAg workshops
- They held a TSARA policy-makers workshop.
- The 3rd report -- on the NZ Sustainability Dashboard is complete
- They are getting some traction with data.govt to hold some of the data for open use.

# Product Eutrophication Footprint (AgResearch)

Driver: EU Product Environmental Footprint (PEF) initiative, which may become a requirement for supply

Aim: Develop internationally-agreed Eutrophication indicator compliant which is NZ-relevant

Approach & Progress:

Case study: Taupo Beef supply-chain scenarios being tested versus EU beef

Meta-analysis suggests EU consumers willing to pay ~30% premium for beef with low env. impact (but highly variable)

Working with EU researchers in developing globally-relevant BUT site-specific freshwater eutrophication indicator

Sandra Payen is co-chairing the UNEP/SETAC Task Force on global Eutrophication and Acidification indicators

# Integrating Value Chains

## A) Consumer surveys

- Kiwifruit and yoghurt in China
- Beef and wine in California

B) Consumer related issues – including the use of new technologies for traceability, consumer information and authenticity.

C) Market Oriented Value chains that have potential to influence land use practice – looking at factors which facilitate and enable value to flow down the value chain to producers

# NZ Export Market Consumer Preference Surveys: Beef in California

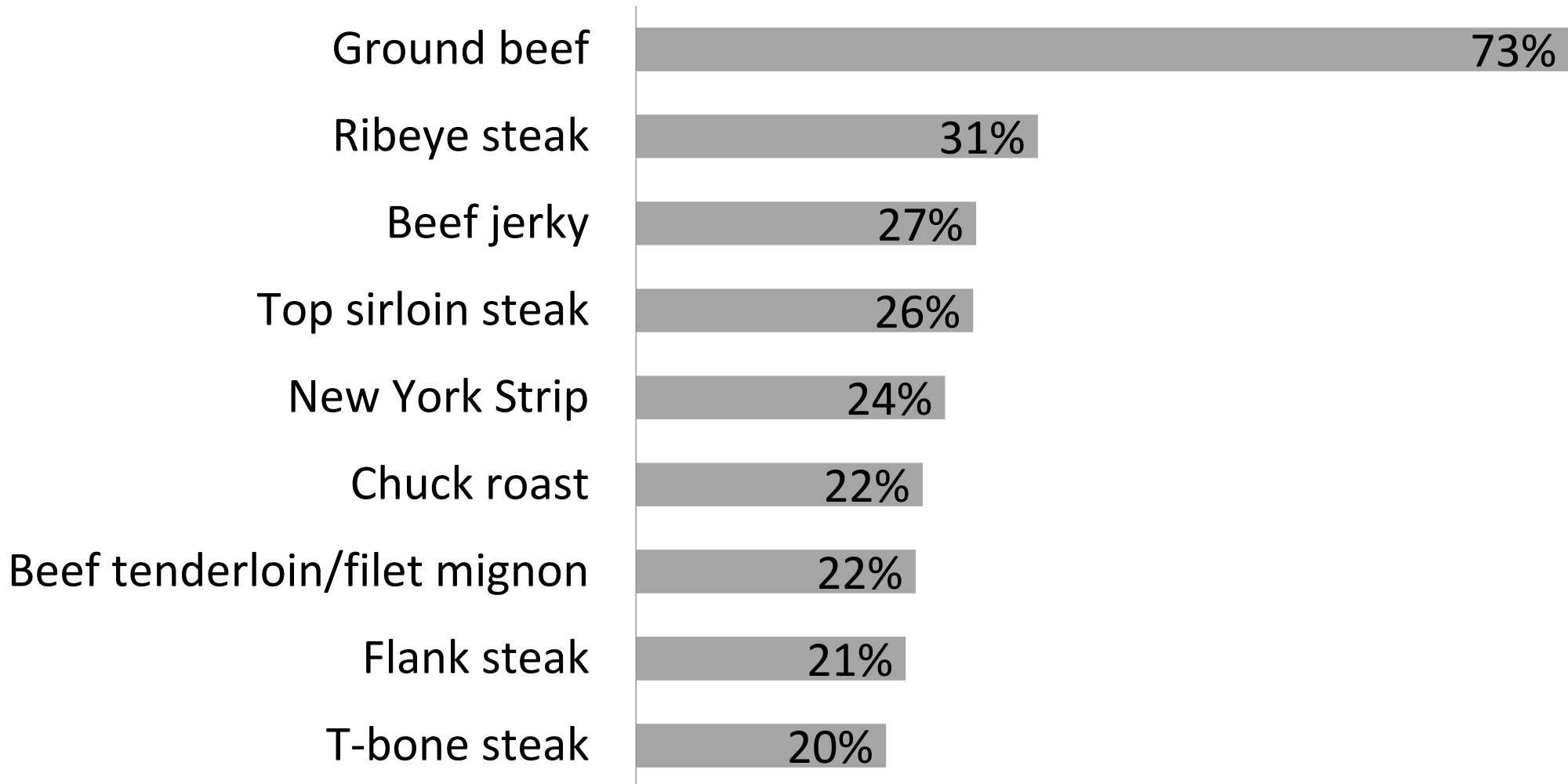
Peter Tait  
Caroline Saunders  
Paul Dalziel  
Paul Rutherford  
Tim Driver

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# What beef products have you purchased in the last month?



California: Beef

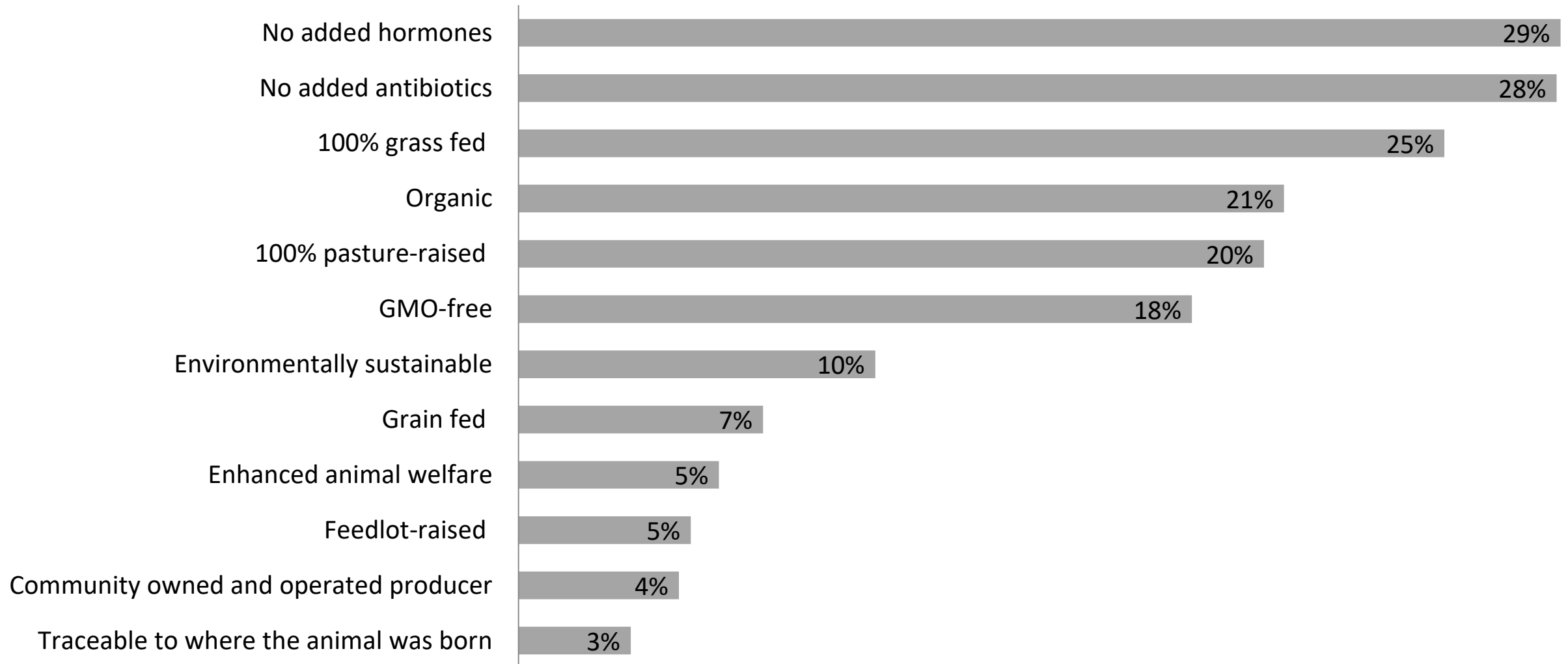
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# Do you usually purchase ground beef with any of these properties?



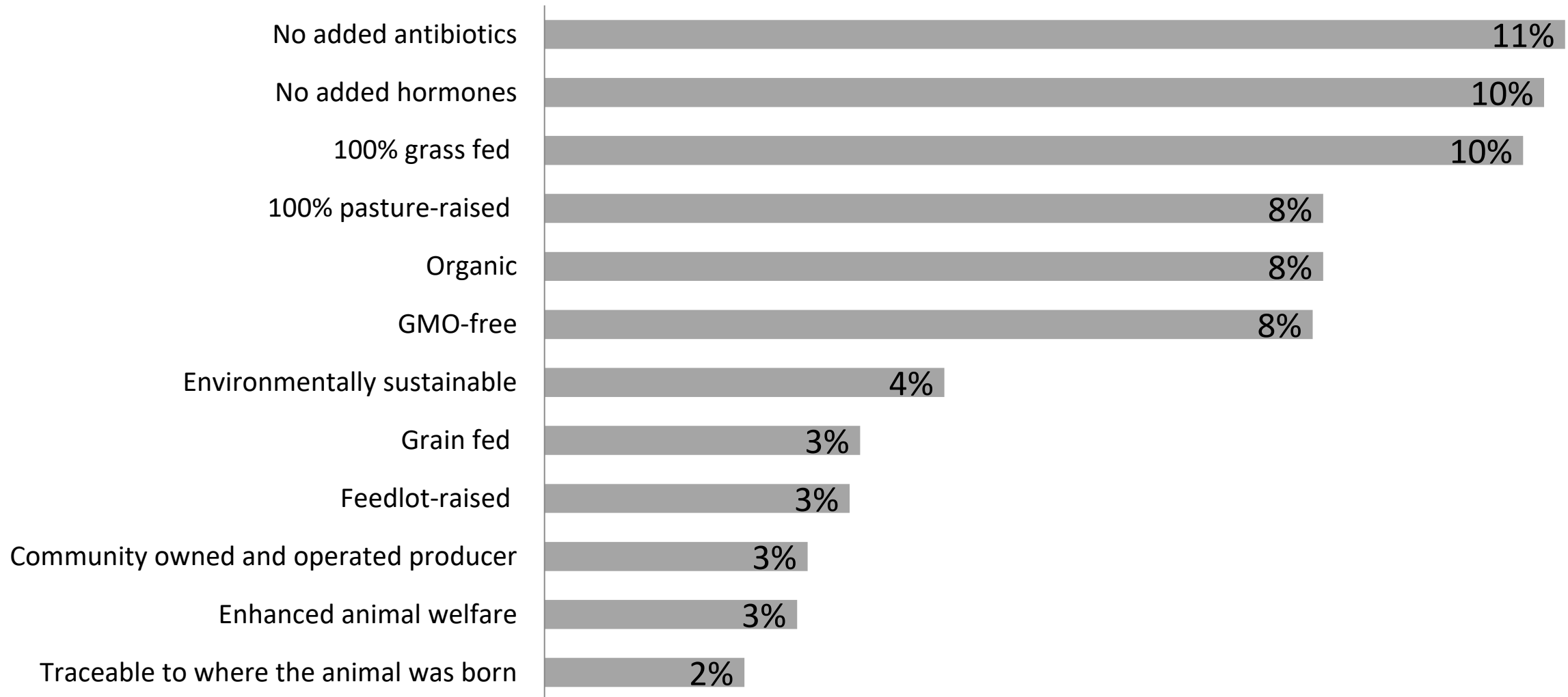
California: Beef

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# Do you usually purchase top sirloin steak with any of these properties?



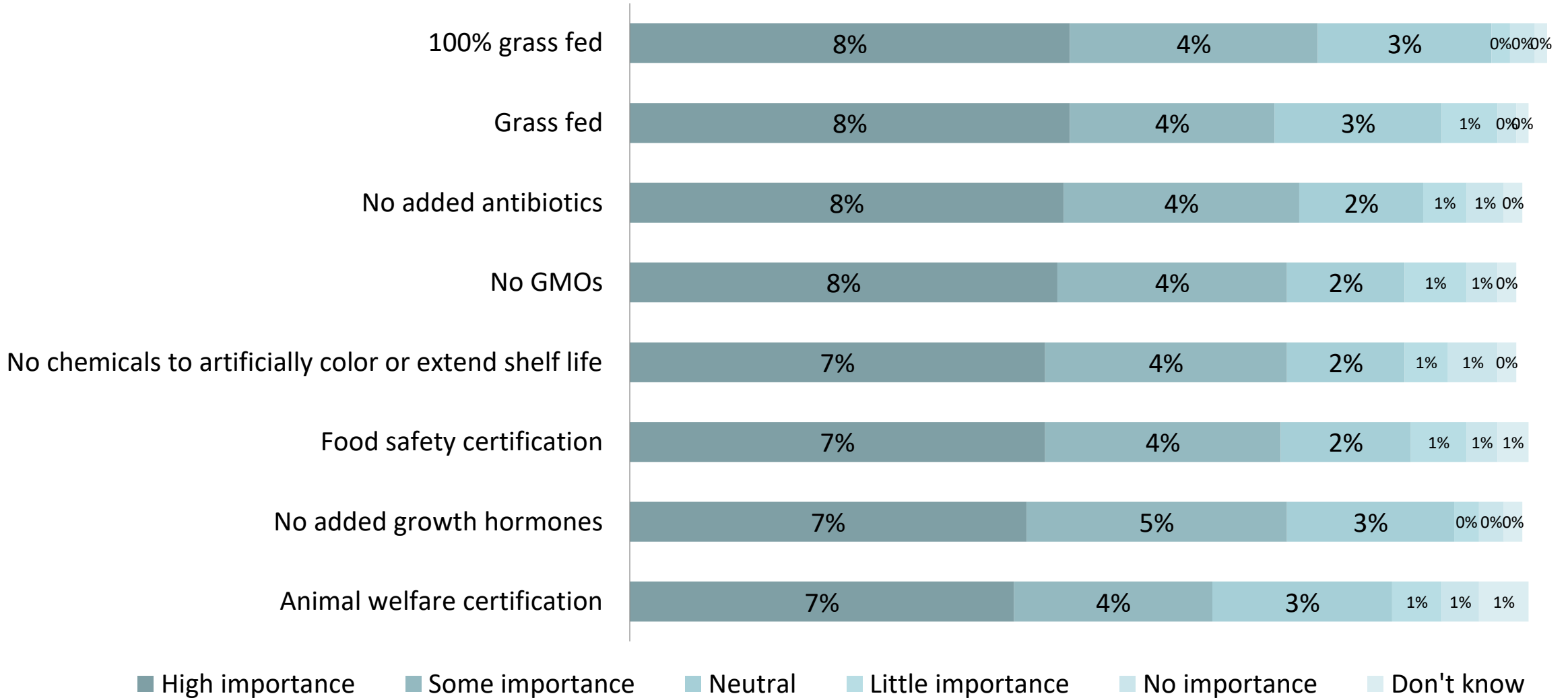
California: Beef

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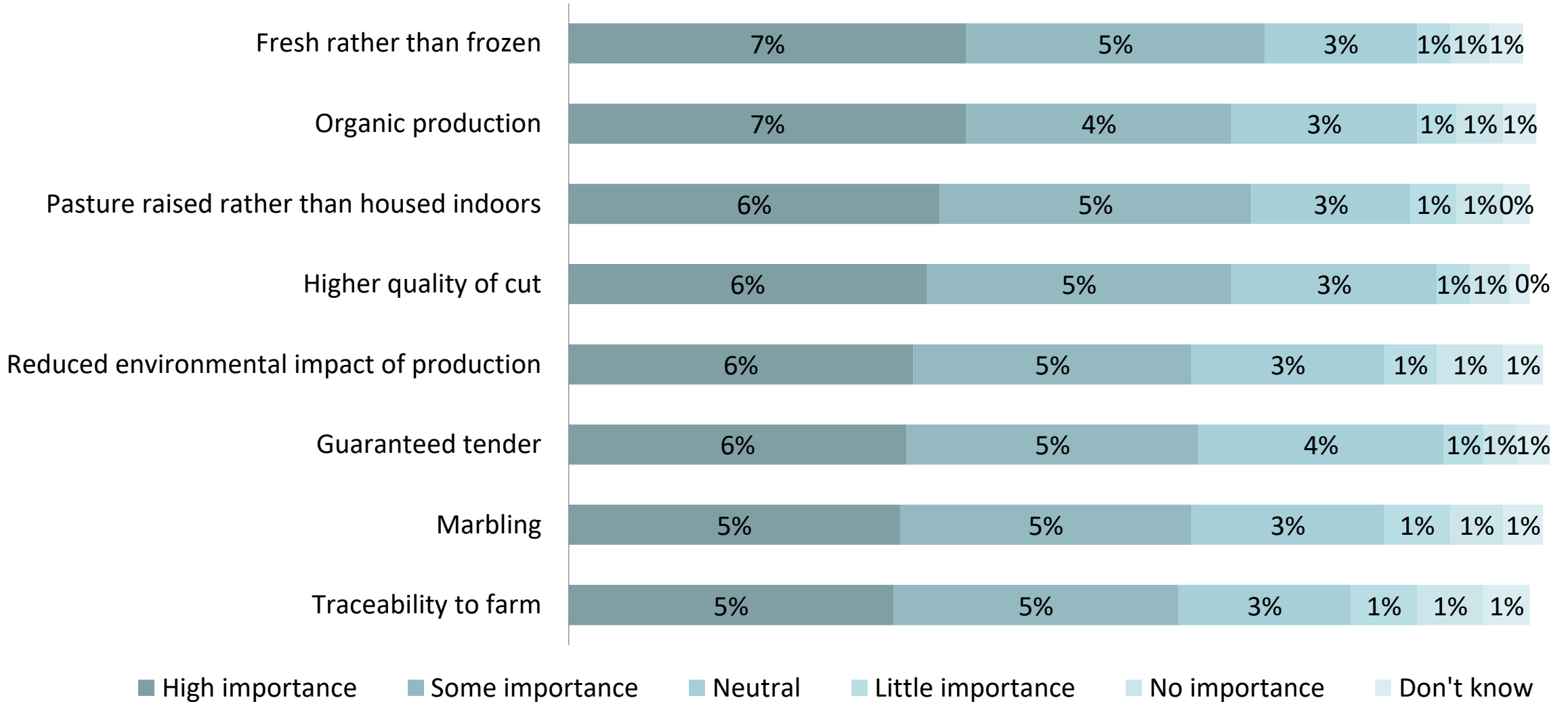
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# Why did you purchase New Zealand beef?



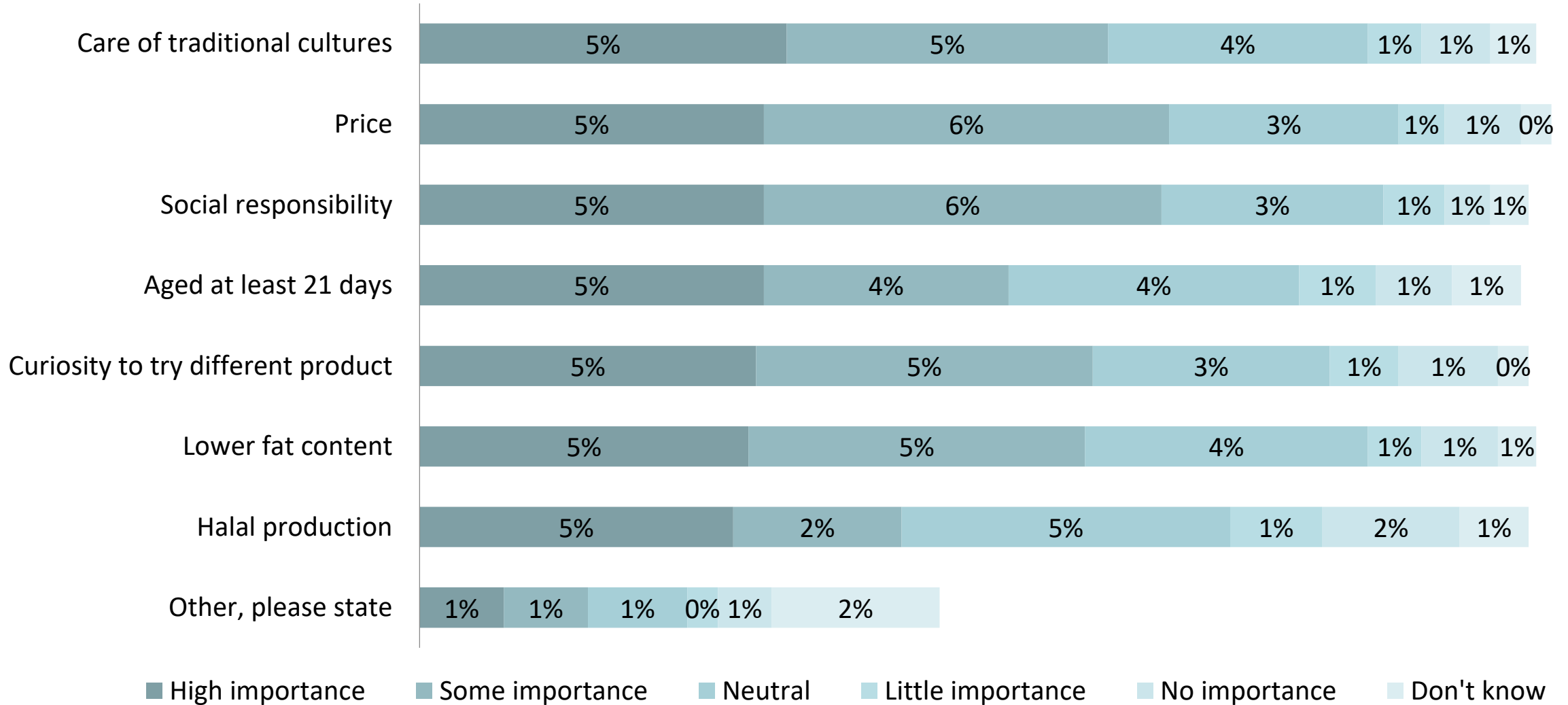
California: Beef

# Why did you purchase New Zealand beef?



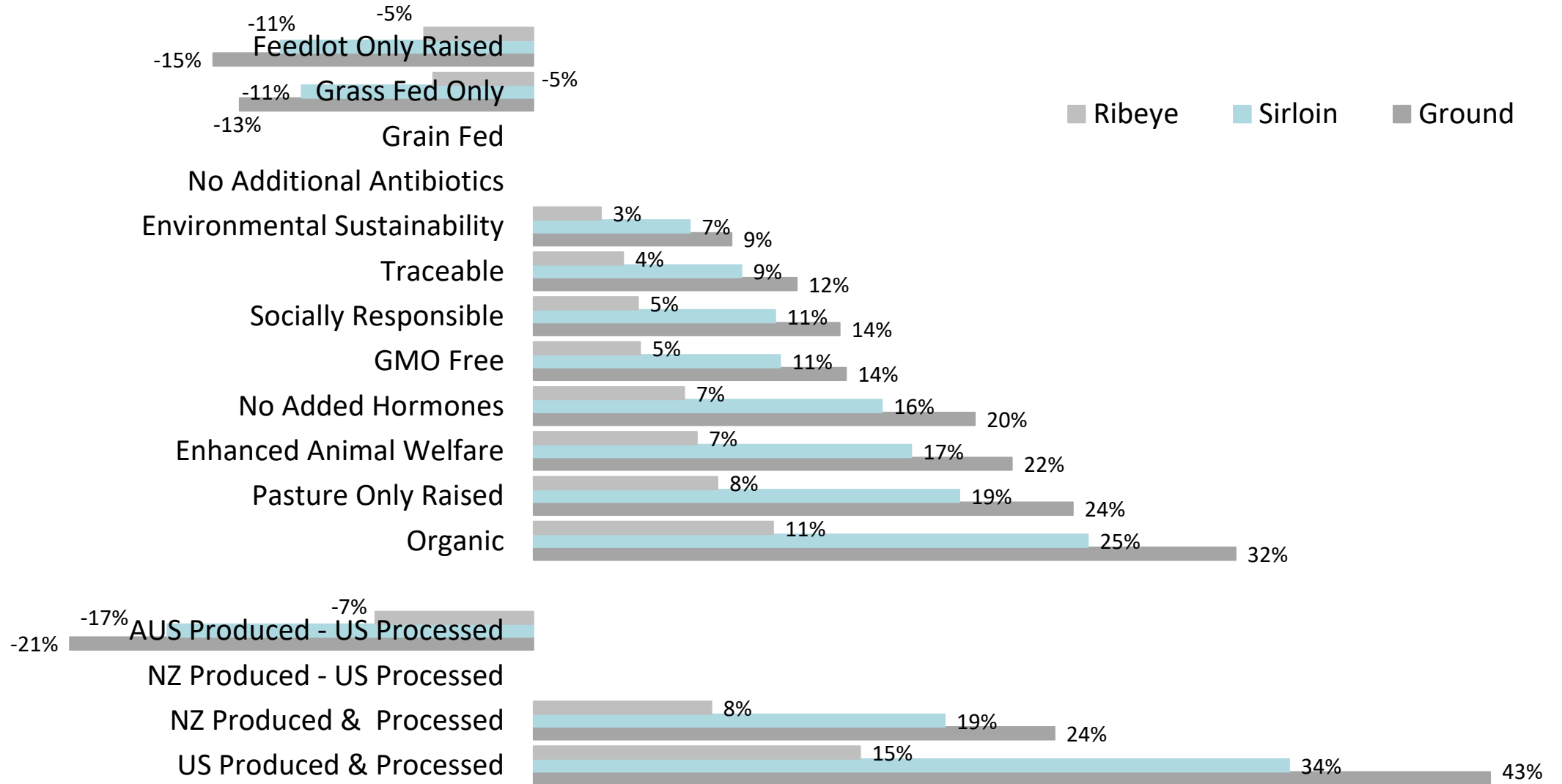
California: Beef

# Why did you purchase New Zealand beef?



California: Beef

# WTP as Percentage of Average Price



California: Beef

# NZ Export Market Consumer Preference Surveys: Kiwifruit in Shanghai

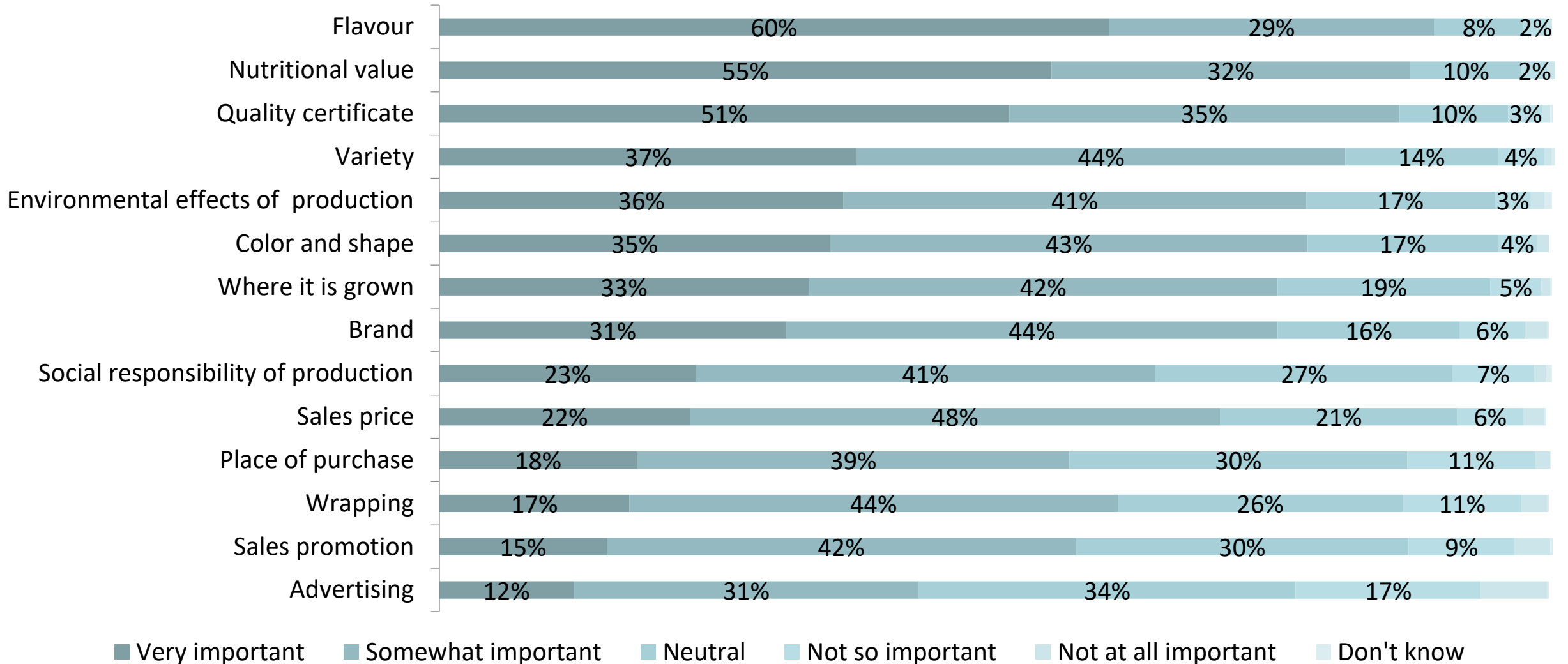
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Time Driver

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## When buying kiwifruit, how important to you are the following factors?



Shanghai: Kiwifruit

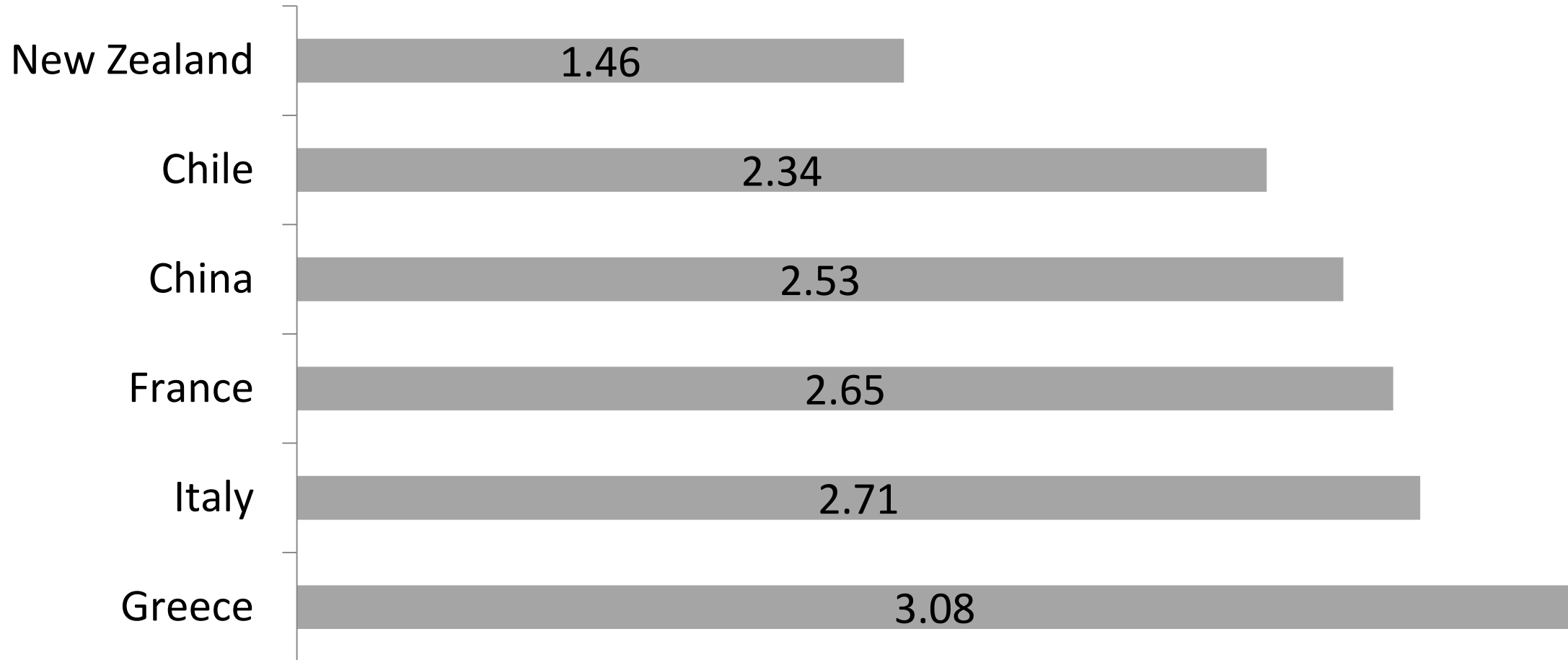
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# Which countries do you think produce the highest quality kiwifruit?



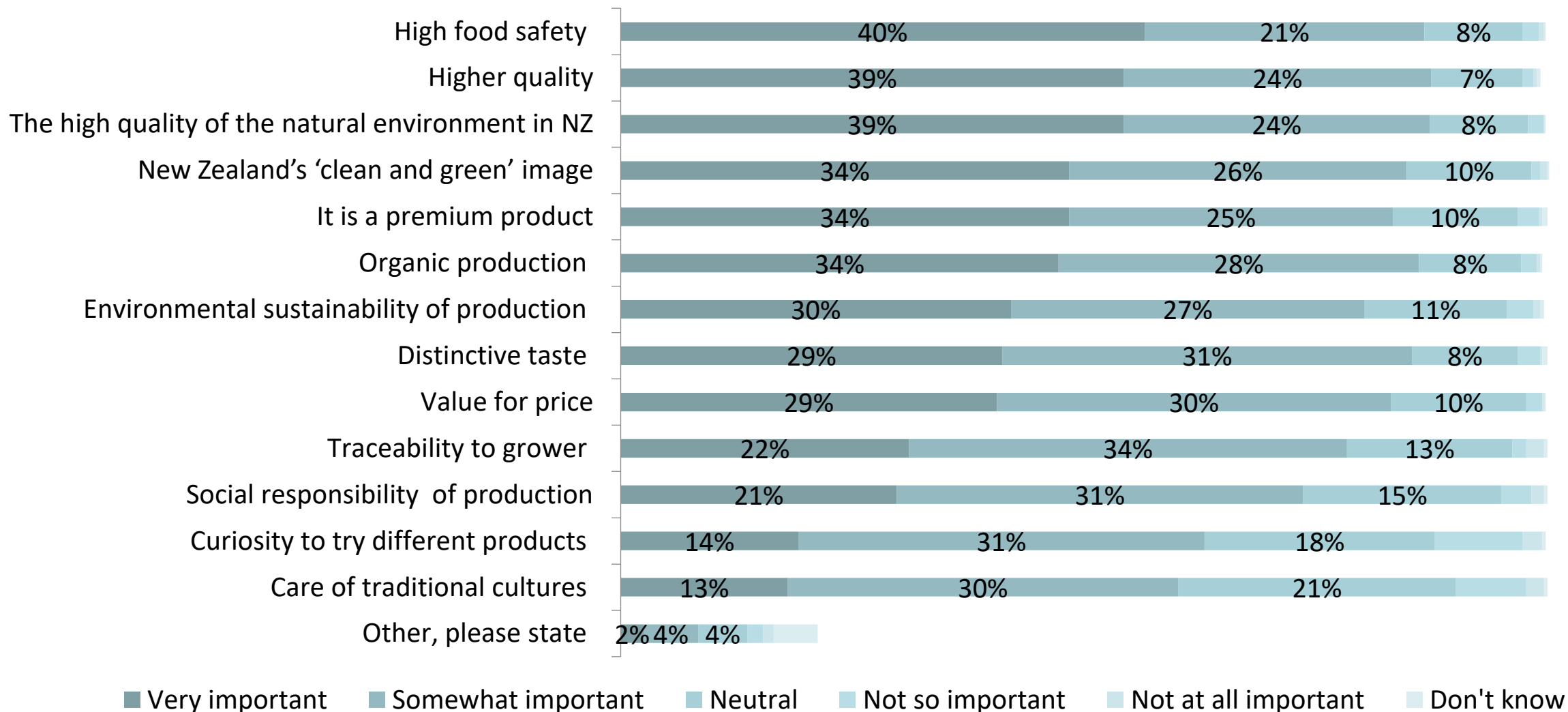
Shanghai: Kiwifruit

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## Why did you purchase New Zealand Kiwifruit?



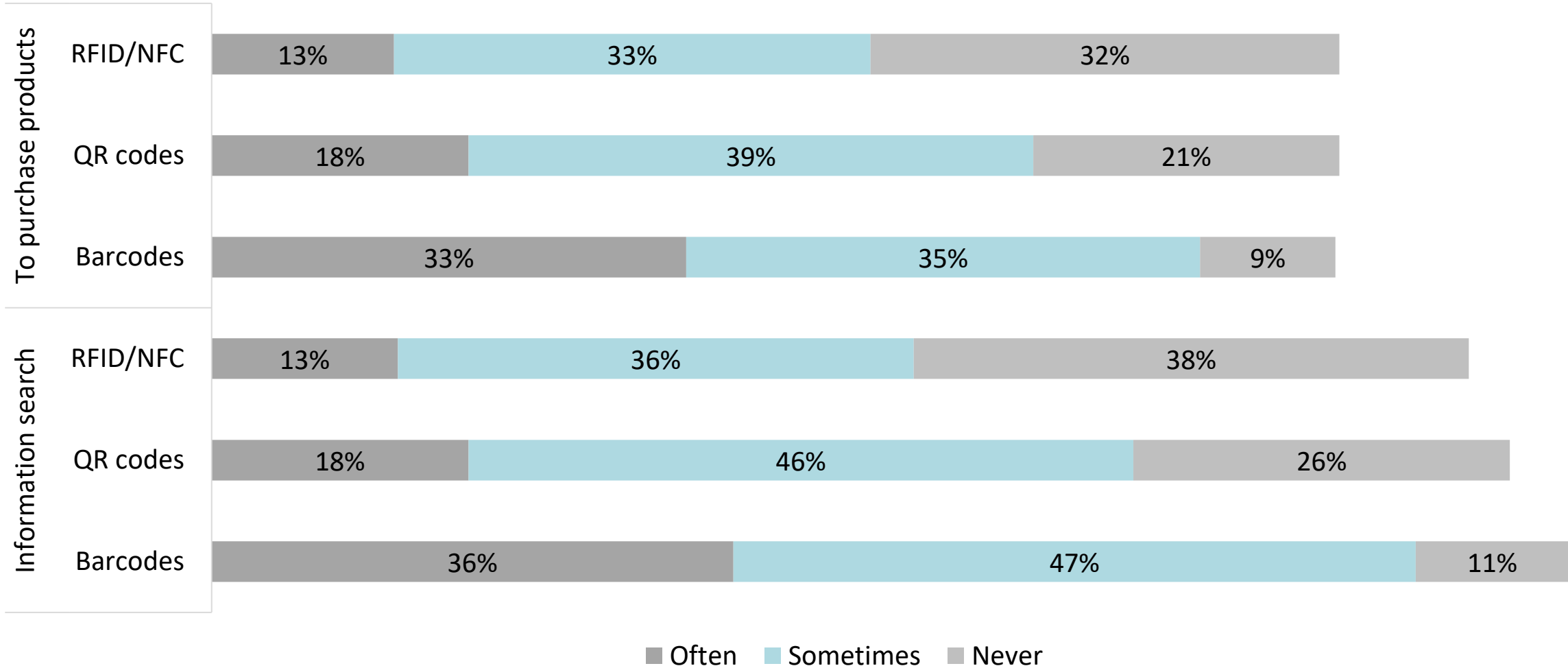
Shanghai: Kiwifruit

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## Have you ever used any of the following technologies in conjunction with your smartphone to search for kiwifruit product information or purchase kiwifruit products?



Shanghai: Kiwifruit

## Next steps

5 case studies to test success factors for market orientated value chains

- Ngāi Tahu Pounamu
- Taupo Beef
- Kōno wines
- NZ Mānuka honey
- Taste Zespri
  
- Competed over the next six months