

# Swiss Agricultural Policy Forum 2024

## *Agricultural Policy 2030: How can simplification succeed?*

Insights into Agricultural Policy from New Zealand

**Oliver Hendrickson** *Counsellor (Agriculture)*

*New Zealand Mission to the European Union and NATO*

August 2024, Zollikofen

Ministry for Primary Industries  
Manatū Ahu Matua



# Presentation overview...

Agriculture in New Zealand

Removal of agricultural subsidies

NZ action on Climate Change

The NZ Emission Trading Scheme

Lessons learned to simplify policy and administrative burden on farmers.



Ministry for Primary Industries  
Manatū Ahu Matua



# *1980s – Economic subsidies ended*

Four decades ago, NZ initiated economic reforms and eliminated subsidies which opened our farmers' products to prices on the world market.

## Why?

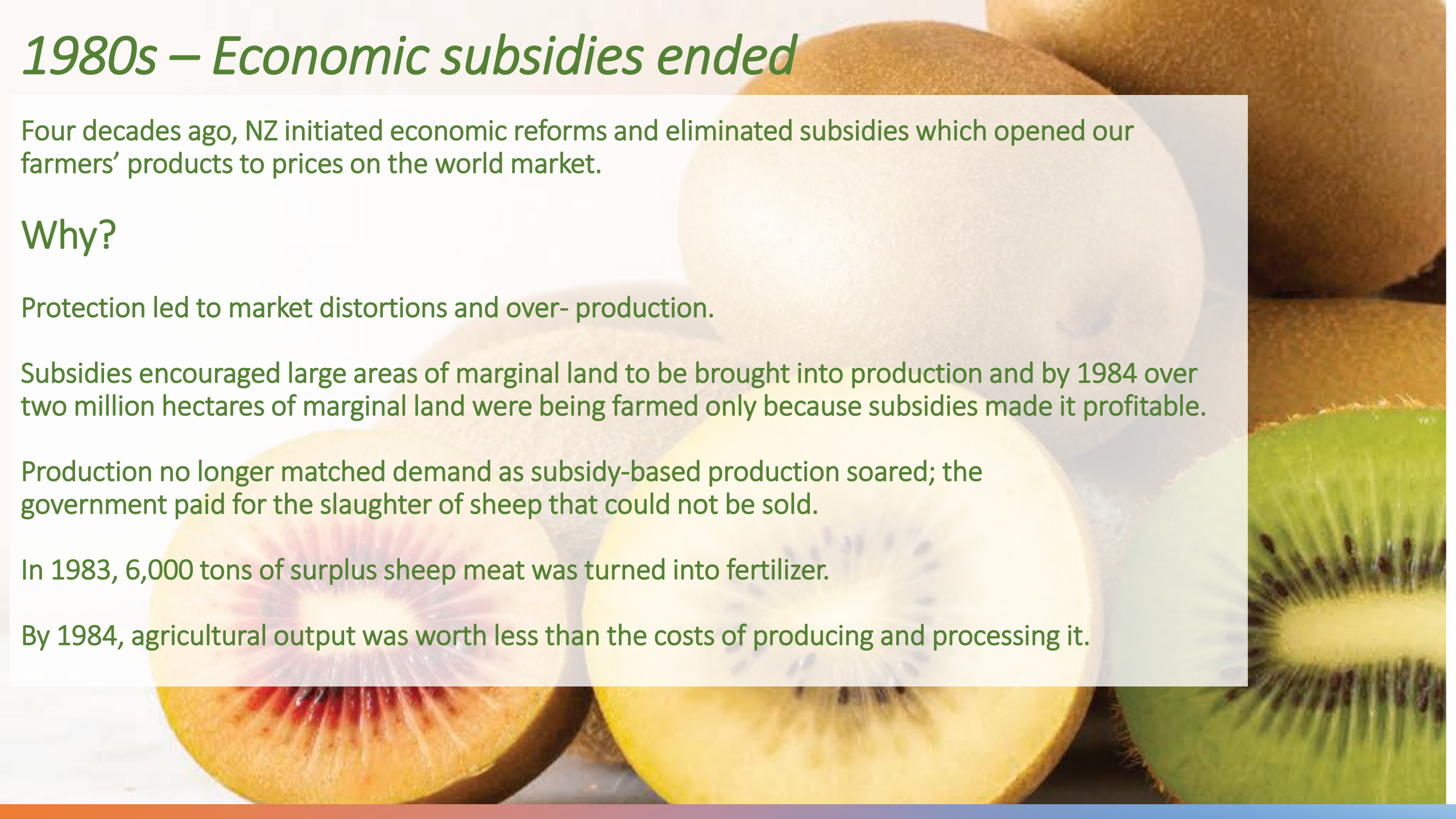
Protection led to market distortions and over- production.

Subsidies encouraged large areas of marginal land to be brought into production and by 1984 over two million hectares of marginal land were being farmed only because subsidies made it profitable.

Production no longer matched demand as subsidy-based production soared; the government paid for the slaughter of sheep that could not be sold.

In 1983, 6,000 tons of surplus sheep meat was turned into fertilizer.

By 1984, agricultural output was worth less than the costs of producing and processing it.



# *1980s – Economic subsidies ended*

Removal of all agricultural subsidies, including:

Price support for wool, beef, sheep meat and dairy products, income support, fertilizer, irrigation, transport and land development subsidies.

Tax concessions and free government services for farmers were also eliminated.



# *1980s – Economic subsidies ended*

## Results

Sheep numbers fell from 70 million in 1983 to 25 million today, while lamb meat product levels have largely remained the same.

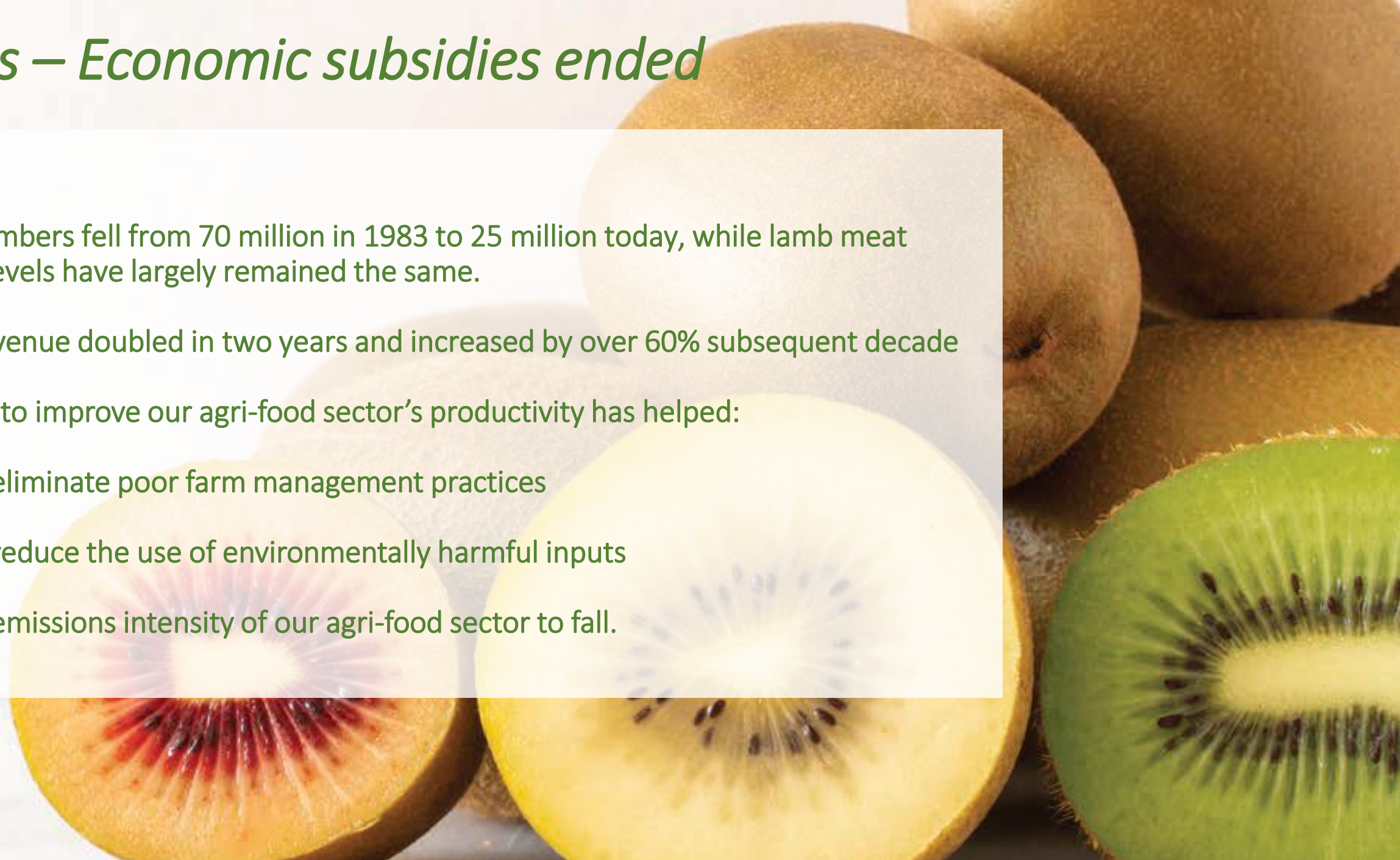
Export revenue doubled in two years and increased by over 60% subsequent decade

The need to improve our agri-food sector's productivity has helped:

- eliminate poor farm management practices

- reduce the use of environmentally harmful inputs

- emissions intensity of our agri-food sector to fall.



# Food and fibre sector in the New Zealand economy



**\$54.6 billion**  
in export revenue

Forecast, year to 30 June 2024.



**80.9%** of  
merchandise exports

The food and fibre sector accounted for 80.9 percent of New Zealand's merchandise exports in the year to 31 March 2024. Over the last 10 years, food and fibre exports have grown on average by 3.6 percent per year whereas other merchandise exports have grown by 1.6 percent.<sup>1</sup>



**12.8%** of  
employment

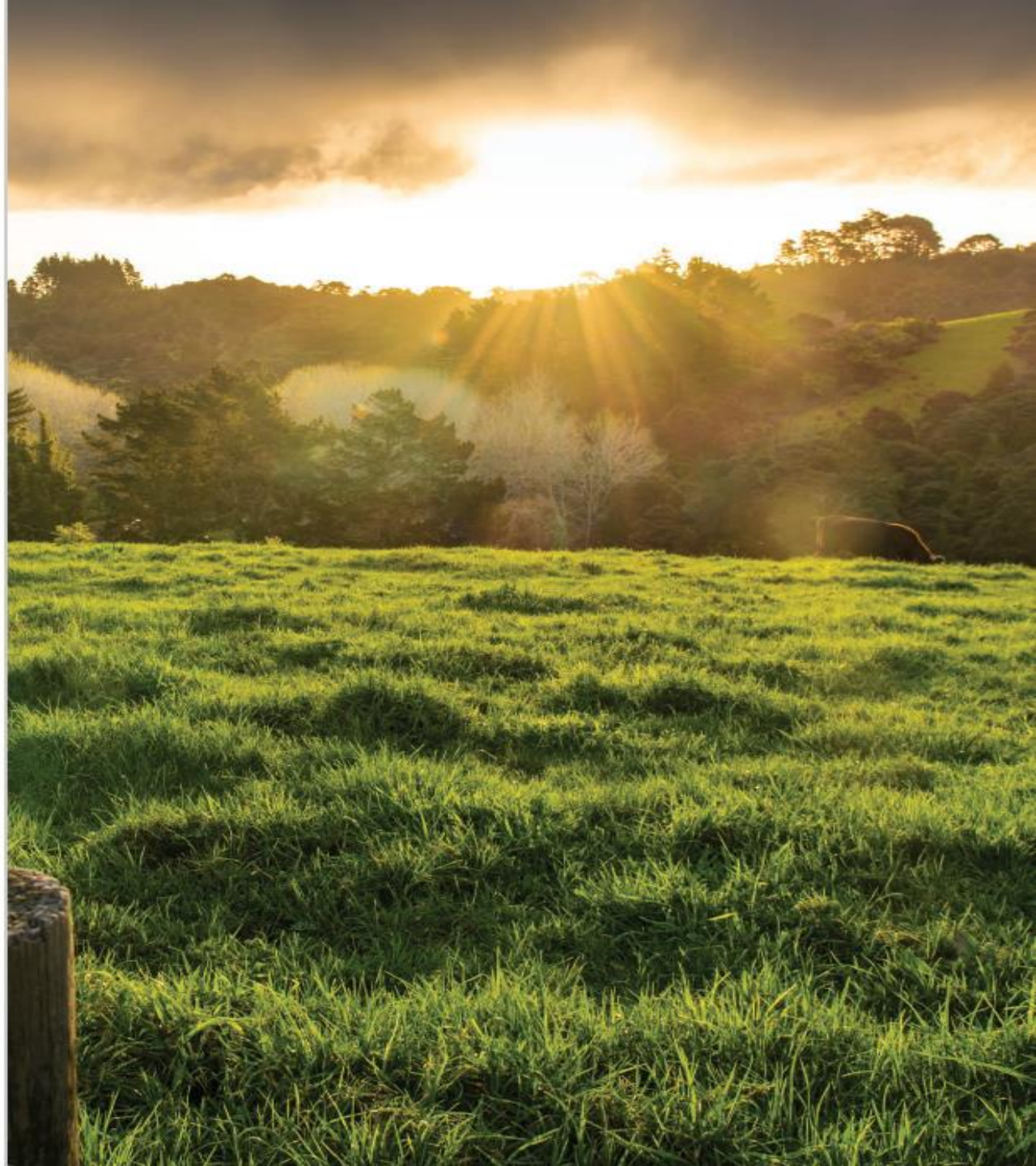
359,000 people were employed in New Zealand's food and fibre sector in the year to 31 March 2022,<sup>2</sup> representing 12.8 percent of the total workforce. Primary production employment is distributed across the country, but processing and commercialisation activities are concentrated in Auckland and other major population centres.



**10.5%** of GDP

The food and fibre sector accounted for 10.5 percent of New Zealand's GDP in the year to 31 March 2022. This figure presents only the direct contribution to GDP and includes both the production of primary products such as dairy cattle farming and the subsequent processing and commercialisation industries such as dairy product manufacturing.

<sup>1</sup> Compound annual growth rate  
<sup>2</sup> [www.workforcainsights.govt.nz](http://www.workforcainsights.govt.nz). Most recently available data. Note that a change of methodology means this figure is not comparable to figures reported in SDPI prior to December 2022.



# Top 10 export destinations

Year to 31 March 2024, NZ\$ million



Product	Export revenue (NZ\$ million)	% of total
Dairy	23,698	44%
Meat and wool	11,394	21%
Horticulture	6,673	12%
Forestry	5,876	11%
Seafood	2,163	4%
Arable	329	1%
Processed food and other products	3,446	6%
<b>Total</b>	<b>53,579</b>	<b>100%</b>

Totals may not add up due to rounding.  
Source: Stats NZ.

# Dairy export revenue 2020-28

(Year to 30 June, NZ\$ M)

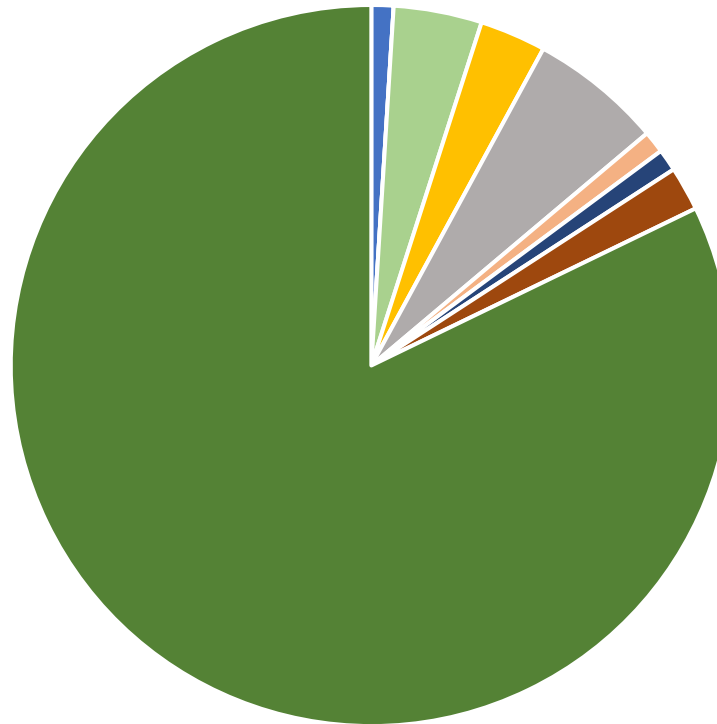
Product	Actual				Forecast				
	2020	2021	2022	2023	2024	2025	2026	2027	2028
Whole milk powder	7,555	7,542	8,304	8,274	7,990	8,850	9,340	10,110	11,010
Butter, anhydrous milk fat, and cream	3,360	2,667	3,519	4,589	4,570	4,900	5,090	5,320	5,540
Skim milk and butter milk powder	1,787	1,526	1,947	2,673	2,210	2,230	2,490	2,650	2,740
Casein and protein products	1,996	2,019	2,680	3,320	2,790	2,870	3,100	3,180	3,330
Cheese	2,072	2,065	2,199	3,039	2,760	2,910	3,050	3,160	3,310
Infant formula	1,842	1,588	1,435	1,915	1,690	1,770	1,810	1,930	2,030
Other dairy products*	1,491	1,648	1,914	2,198	2,150	2,220	2,240	2,300	2,410
<b>Total export revenue</b>	<b>20,102</b>	<b>19,055</b>	<b>21,998</b>	<b>26,008</b>	<b>24,160</b>	<b>25,750</b>	<b>27,110</b>	<b>28,640</b>	<b>30,360</b>
<b>Year-on-year % change</b>	<b>11%</b>	<b>-5%</b>	<b>15%</b>	<b>18%</b>	<b>-7%</b>	<b>7%</b>	<b>5%</b>	<b>6%</b>	<b>6%</b>





# Grass is the main feed source for NZ Dairy

Dairy diet composition - 2019

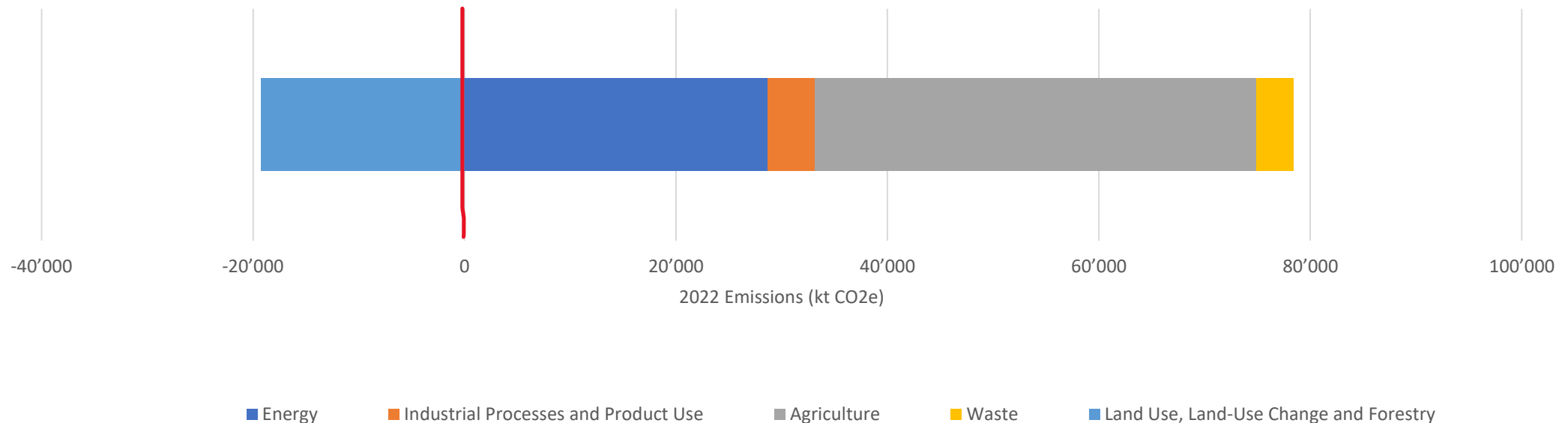


■ Kale ■ Maize grain ■ Maize silage ■ Fodder beat ■ Palm Kernel Expeller ■ Swedes ■ Turnips ■ Other supplements ■ Pasture



# Agriculture is 53% of New Zealand's gross emissions

- New Zealand is unique among OECD countries in the share of agricultural emissions.
- 87% of electricity generation in 2022 was renewable.
- Forestry offsets 21% of gross emissions



# New Zealand climate targets

- Nationally Determined Contribution under Paris Agreement is a 50% reduction in net emissions below 2005 gross levels by 2030.
- Domestically Climate Change Response Act is legislative framework.
- New Zealand has a 'split gas' target for domestic emissions, which considers biogenic methane separately from all other greenhouse gases, reflecting methane's unique impact.
- 10% reduction in biogenic methane from 2017 levels by 2030, 24-47% by 2050.



# Key agricultural actions:

- Accelerating development of mitigation tools and technologies
- Reviewing the methane science and targets
- Development of on-farm emissions measurement by 2025 and pricing
- Extension services

Committed to introducing pricing system for on-farm emissions by 2030...but it is critical that tools and technologies to reduce emissions come ahead of pricing.

84% of NZ farmers are calculating their on-farm GHG emissions



# New Zealand R&D on climate

## New Zealand Agricultural Greenhouse Gas Research Centre

- Set up in 2009, NZAGRC drives foundational and pre-commercialisation research to reduce agricultural GHG emissions.

## Centre for Climate Action on Agricultural Emissions

- Set up in 2022, the Centre adds resource to NZARGC and drove the establishment of AgriZeroNZ.

**AgriZeroNZ** a public-private joint venture to drive product development and commercialisation of emission reduction agri-tech.

- \$191m (\$29.2 committed, 10 investments, 77 on radar) (AGRIZERO.NZ)



The New Zealand Ministry for Primary Industries (MPI) is leading development of a new methodology for calculating on-farm emissions. It is intended that the different calculations tools adopt this method and for it to become the *de facto* standard for calculating emissions on farm in New Zealand.

Critical that there is **consistency** across the tools farmers use to calculate emissions.

**Transparency** is important – farmers with legal and other obligations (including contractual/commercial obligations) to reduce emissions have the right to know how they are being assessed.



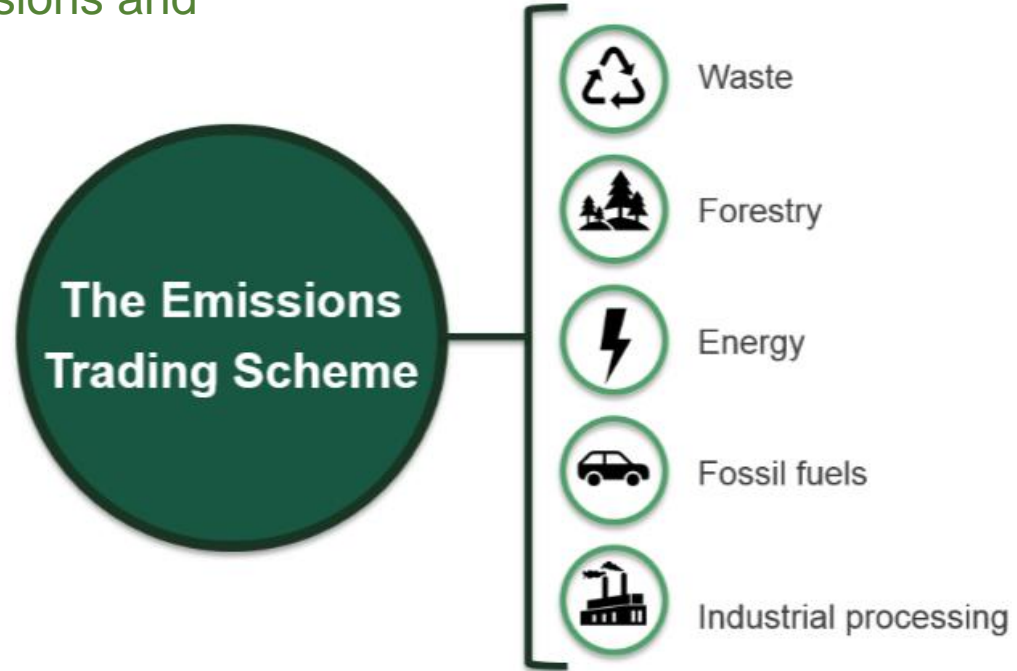
## Three criteria have guided the development of the methodology:

- **Effective** at recognising and incentivising the uptake of on-farm practices that result in emissions reductions.
- **Practical** by being easy for farmers to understand and provide input data, and easy to verify, and
- **Equitable** between different agriculture production systems i.e. dairy farms and sheep and beef farms and for Māori agri-business.



# What is the ETS?

- The ETS is NZ's primary tool to **reduce** net emissions and **meet** international climate change targets.
- All sectors are obliged to report emissions, while some are obliged to surrender units.
- The baseline date for forestry in the ETS is **1990**. This date was decided internationally through the Kyoto Protocol – everything **before** 1 January 1990 is considered baseline, and everything **after** is considered new emissions or new reductions.



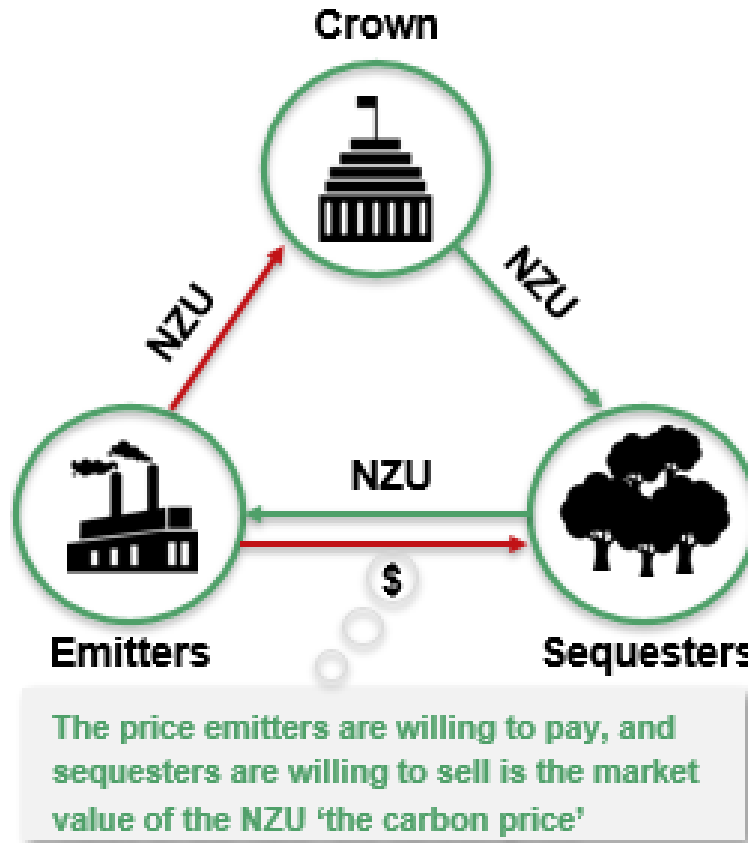
**Agricultural pricing system for on-farm emissions by 2030 but outside of the ETS**



# How the ETS works

**Sequesters (sellers)** store carbon and can **earn** NZUs from the government (e.g. forest owners). They can keep or sell on the market.

**Emitters (buyers)** have obligations to **surrender** NZUs to the government to cover their emissions.

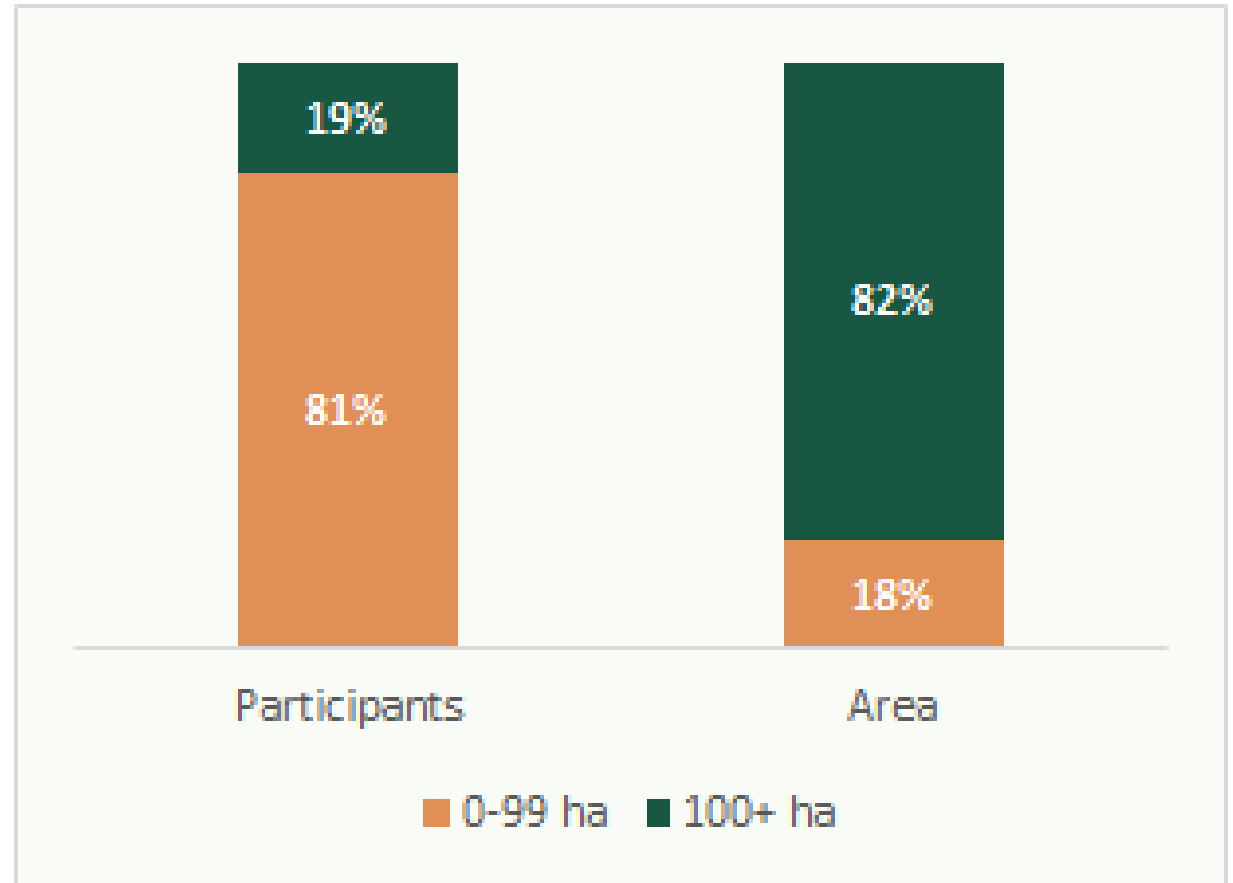


1 NZU = 1 tonne  
CO<sub>2</sub> equivalent

Current unit price is  
~\$51 per NZU

# Size and number of ETS participants in Forestry

- 81% of participants have less than 100 ha of forest in the ETS
- 19% of participants have 100 ha or more of forest land in the ETS – these larger participants have 82% of the total registered area



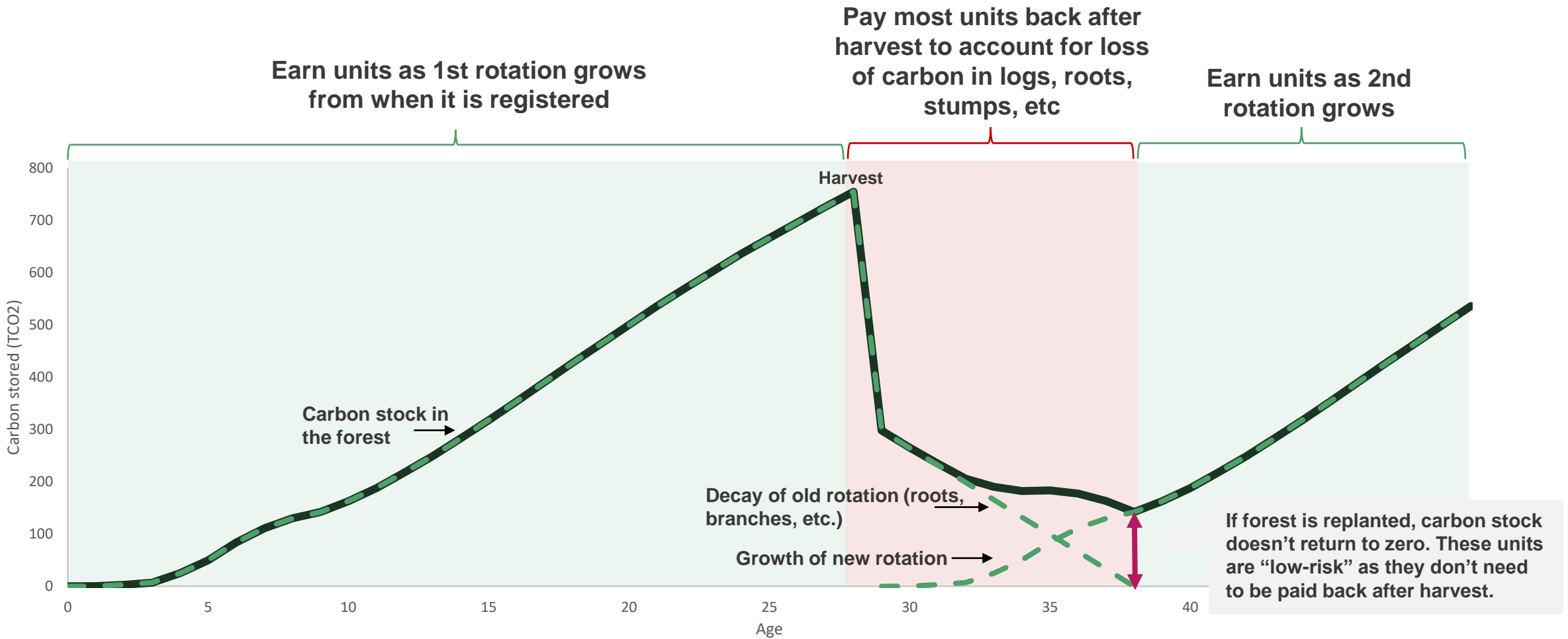
# Forestry ETS Transformation Programme

Following a 2015 review, the Climate Change Response Amendment Act 2020 made extensive changes to improve the effectiveness of the Forestry ETS.

## The changes aimed to:

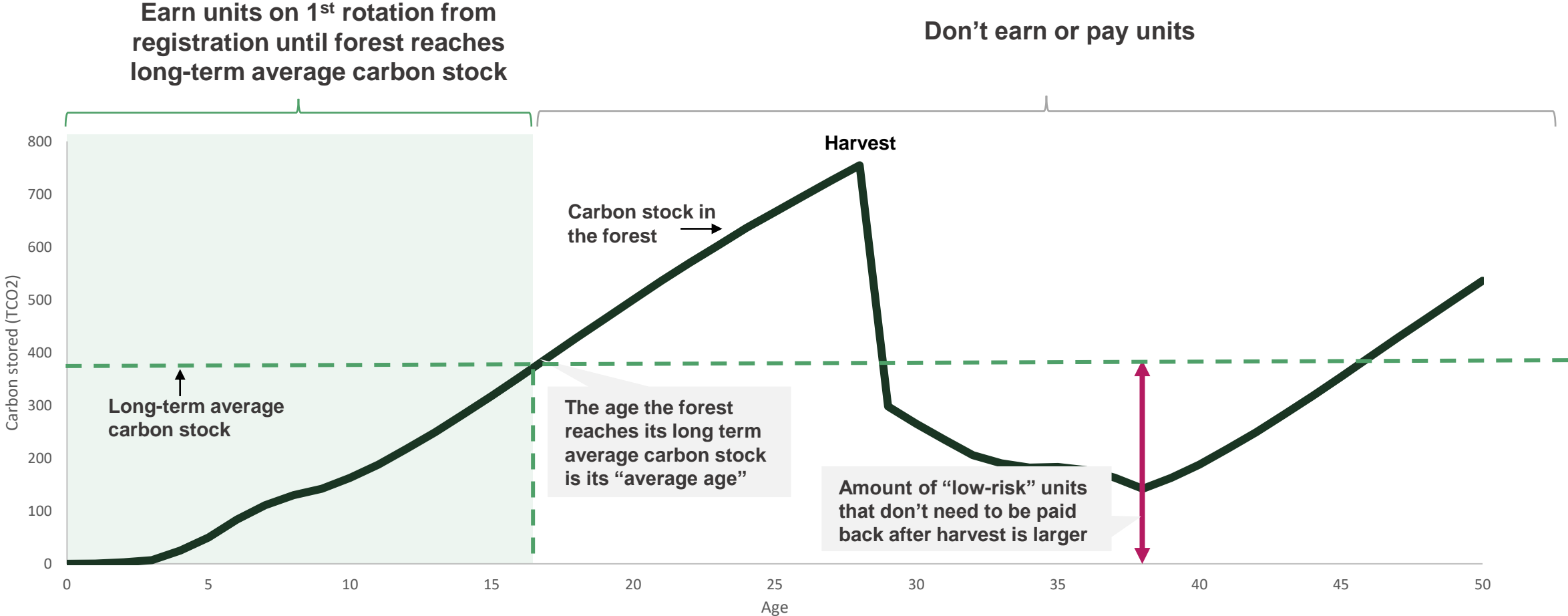
- Encourage afforestation
- Make it easier for people to earn carbon credits for planting forests
- Simplify participation in the ETS
- Enable people to use their land more flexibly

# How it started...stock change accounting (highly accurate, but difficult and high reporting burden)



# Recent reforms...new accounting rules from January 2023

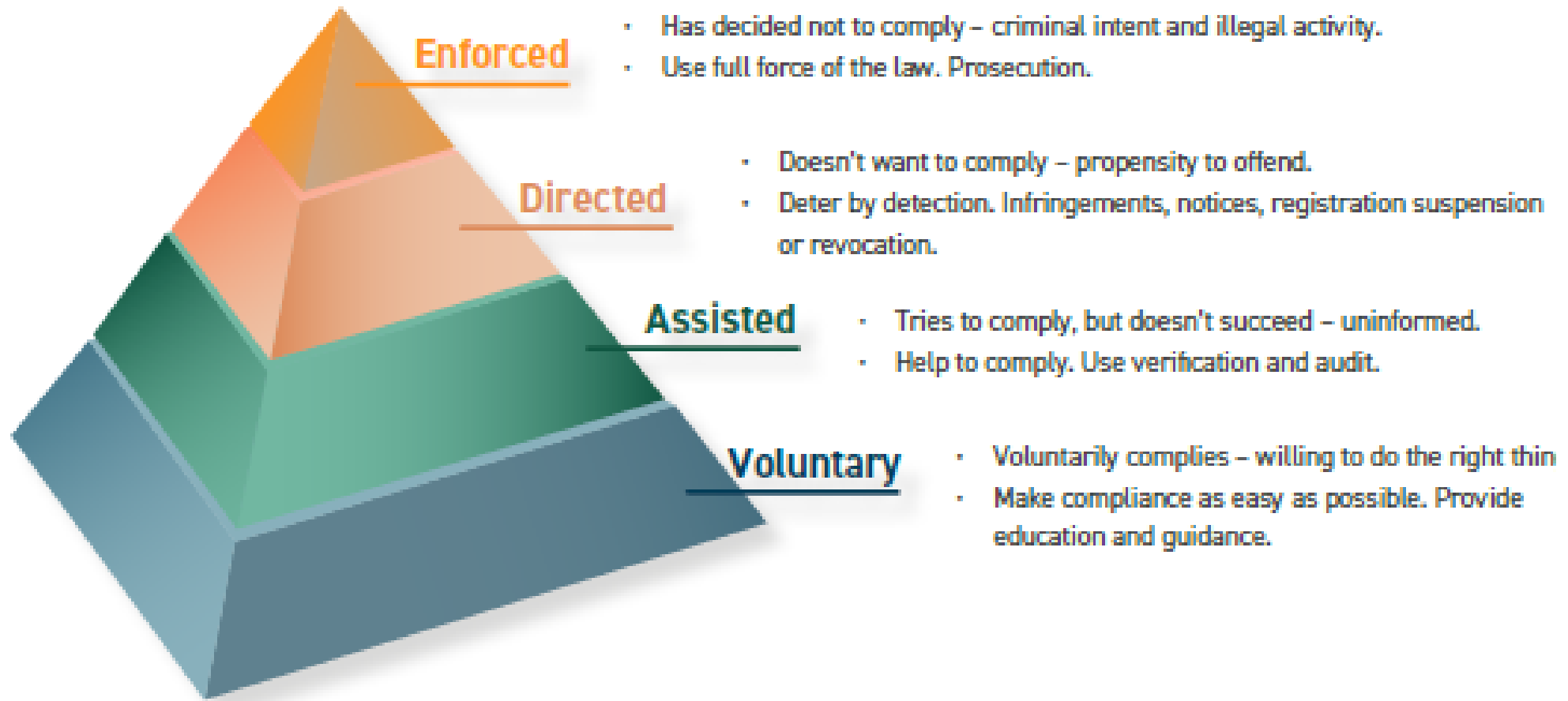
*International and domestic alignment to encourage greater forestry.  
Simpler accounting, better tools to support compliance*



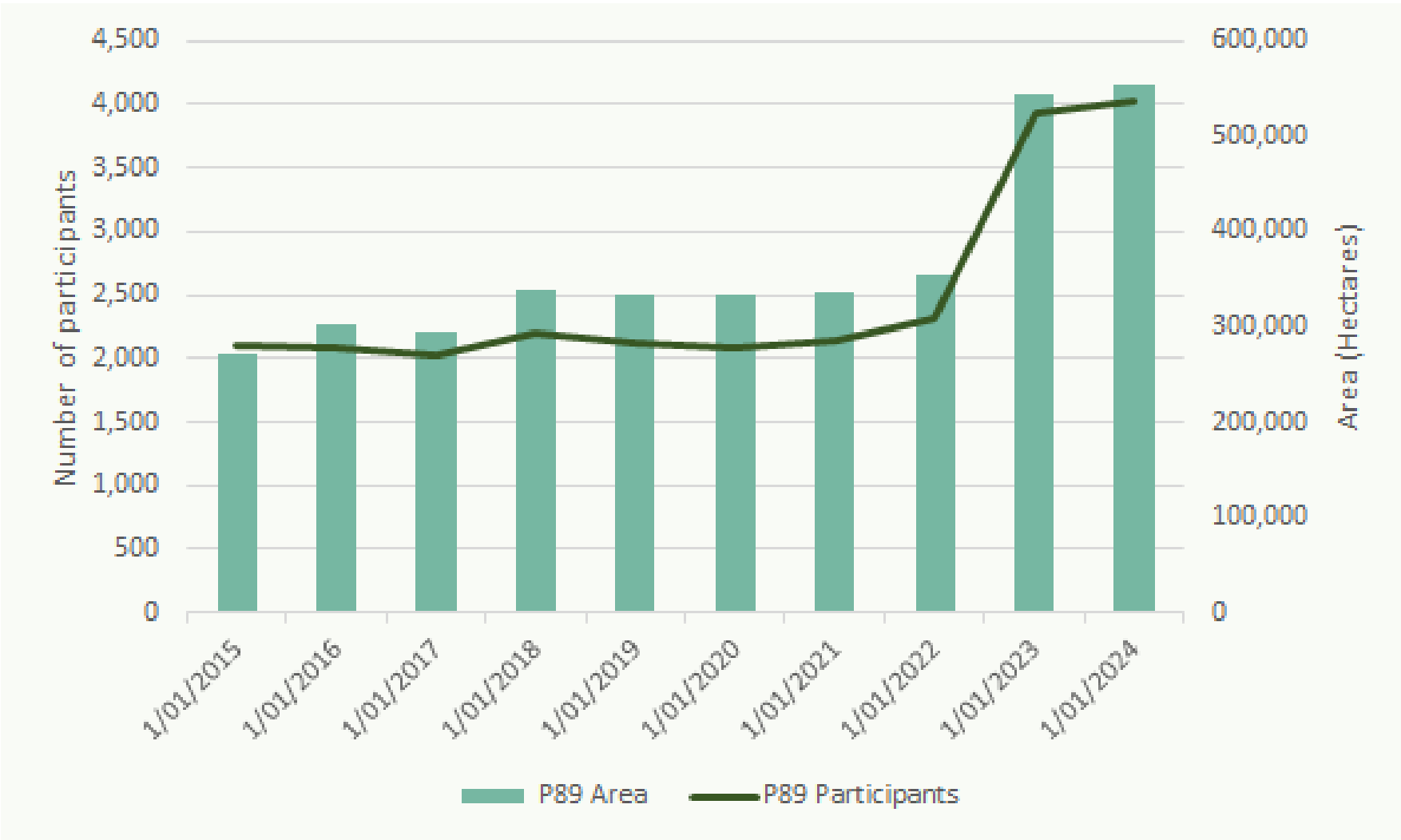
# New regulatory strategy

- **Consistent**...decisions are transparent and consistent
- **Proportionate**...we use our discretion proportionate to the risk
- **Engaged**...Emphasis on education, guidance and supportive tools.
- **Evidence driven**...monitor compliance and use business information to drive performance and achieve outcomes
- **Flexible**...future focused
- **Outcomes based**...performance metrics to measure the performance of the regulator in achieving outcomes

## VADE model showing scale of cases in comparison to severity of the intervention



# Increase in registered area and participants





## *Thoughts on policy design and implementation*



Be mindful of assumptions v. hard data, plus operational constraints.

Perfection is the enemy of the good.

Make compliance easy and focus your efforts on broad success.

Have champions.

Note the timing of the year and broader regulatory requirements.

Avoid subsidies that lock-in poor production and negative environmental impacts.

Apply 'polluter pays' so that production decisions take into account the true cost of resources.

# Thank you!

*Questions?*

[Agriculture | NZ Government \(mpi.govt.nz\)](http://mpi.govt.nz)

