



# Sector survey indicator results: Comparing management systems within horticultural sector

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**Lincoln  
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*Te Whare Wānaka o Aoraki*





# Survey objectives

- To assess how farmers responded to a number of important issues emerging from our research to date.
- Survey designed to compare management systems
  - Conventional (CV)
  - Modified conventional (MCV)
  - Organic (Org)
- And sectors
  - sheep/beef
  - horticulture
  - dairy



# Topics of interest

- Indicators (financial, production, environmental and social).
- Approach to management.
- Connections between practices and social and environmental wellbeing.
- Community participation.
- Bird diversity and management.
- Trees and shrubs.



# Response rate

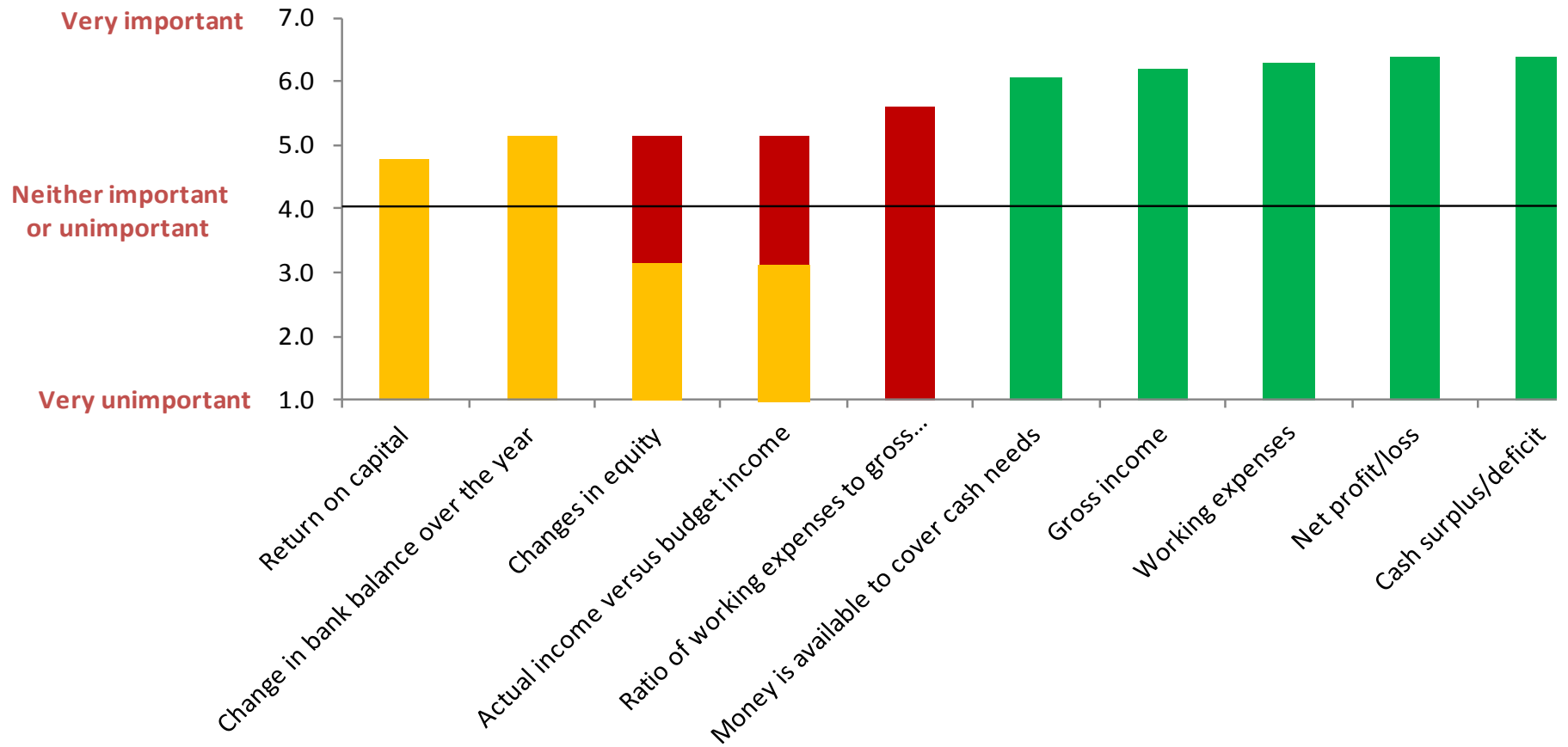
- Average response rate was 22 per cent.



## Horticultural sector: financial indicators

- Important to all: cash surplus/deficit, net profit/loss, money available to cover cash needs, gross income.
- More important to MCV than Organic: working expenses.

# KF financial indicators

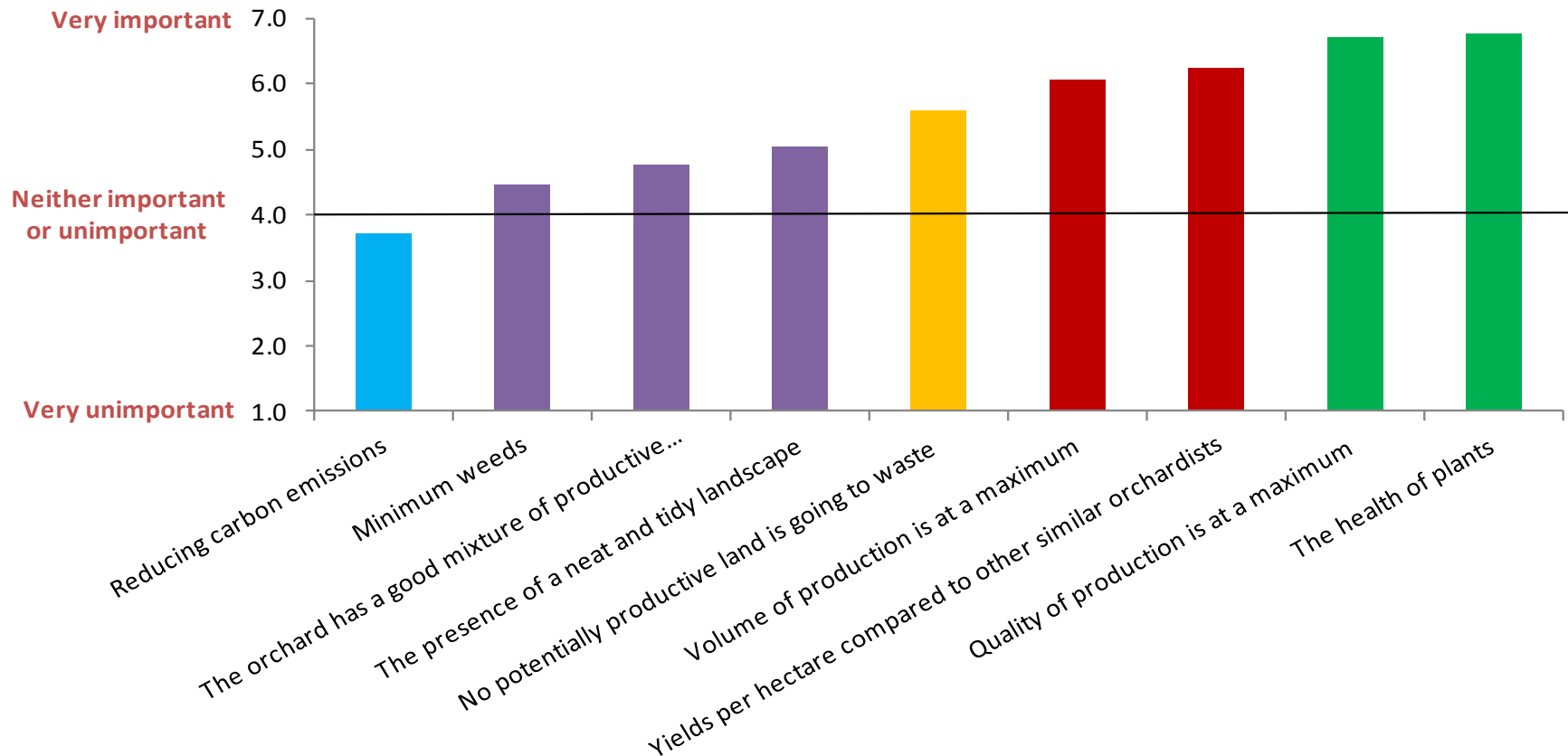




# Horticultural sector: production indicators

- Important to all: yields/ha., volume of production.
- Very important to all: quality.
- More important to Conventional than Organic: neat & tidy landscape, minimum weeds.
- More important to MCV than Organic: health of plants in productive performance, no productive land going to waste.
- Less important to MCV than Organic : reducing C emissions.
- More important to conventional than MCV: mixture of productive uses.

# KF production indicators

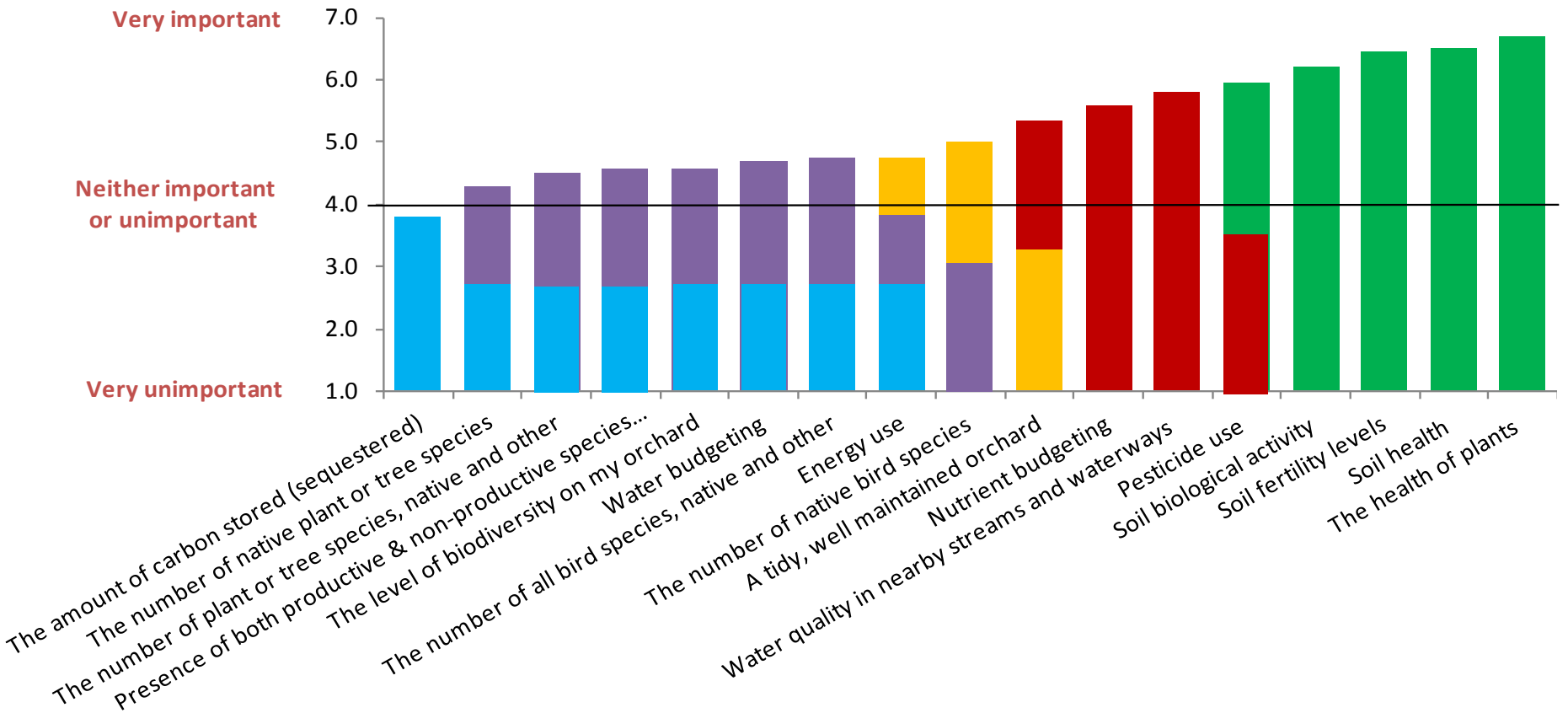




# Horticulture sector: environmental indicators

- Very important to all: soil fertility, water quality.
- Important to all: water and nutrient budgeting, energy use.
- More important to Organic farmers:
  - Soil biological activity
  - Soil health
  - Biodiversity, presence of prod. and non-prod. species, number of bird species-native or other, number of plant and tree species, native or other.
- Less important to Organic farmers:
  - Pesticide use, tidy well-maintained orchard.

# KF environmental indicators

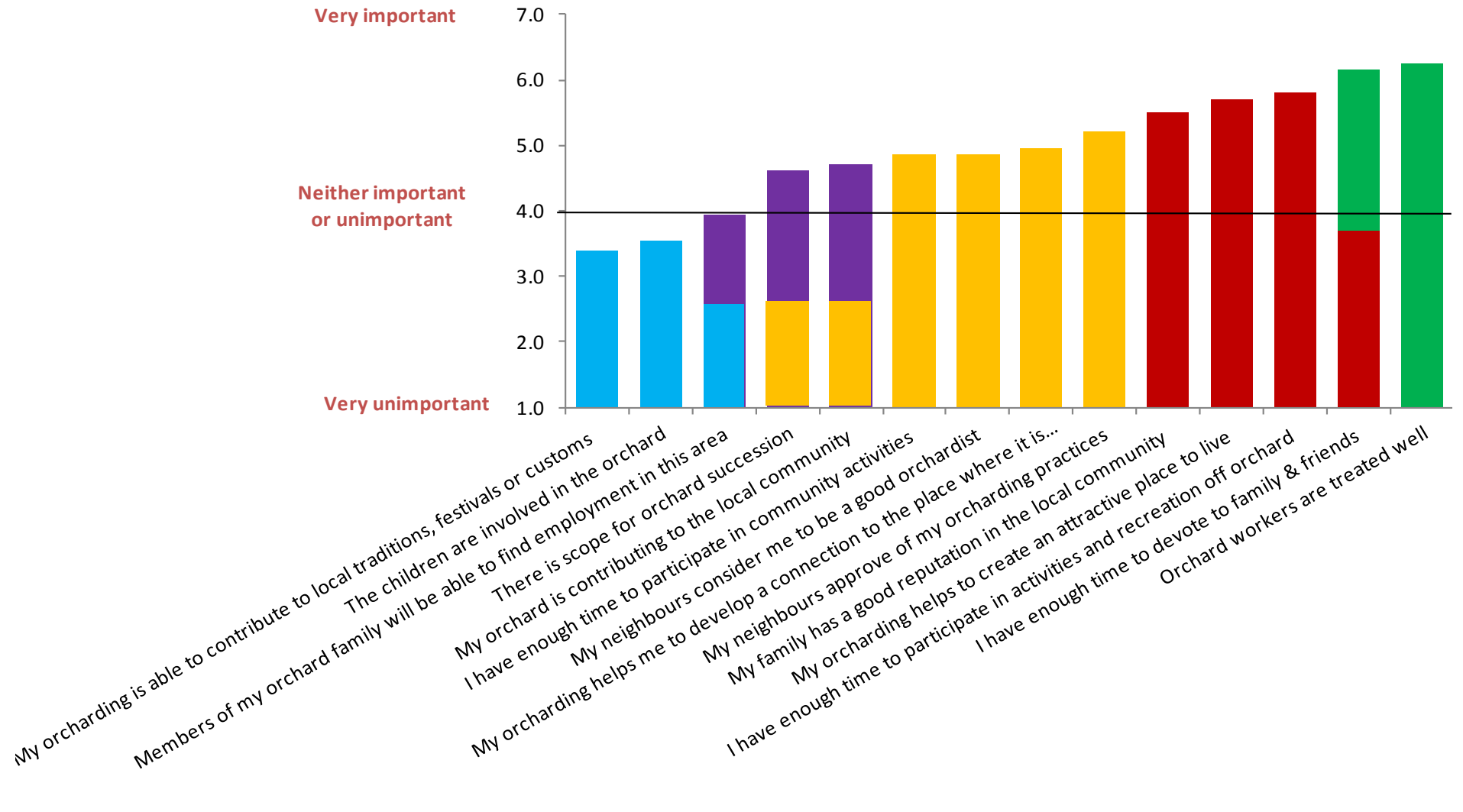




# Horticultural sector: social indicators

- Important to all that neighbours considered them to be a good orchardist.
- Conventional orchardists rated highest the importance of ‘my neighbours approve of my orcharding practices’.
- MCV orchardists rated lowest the importance of creating an attractive place to live (on the orchard).
- Conventional orchardists rated the importance of their family’s reputation more highly than Organic orchardists.

# KF social indicators

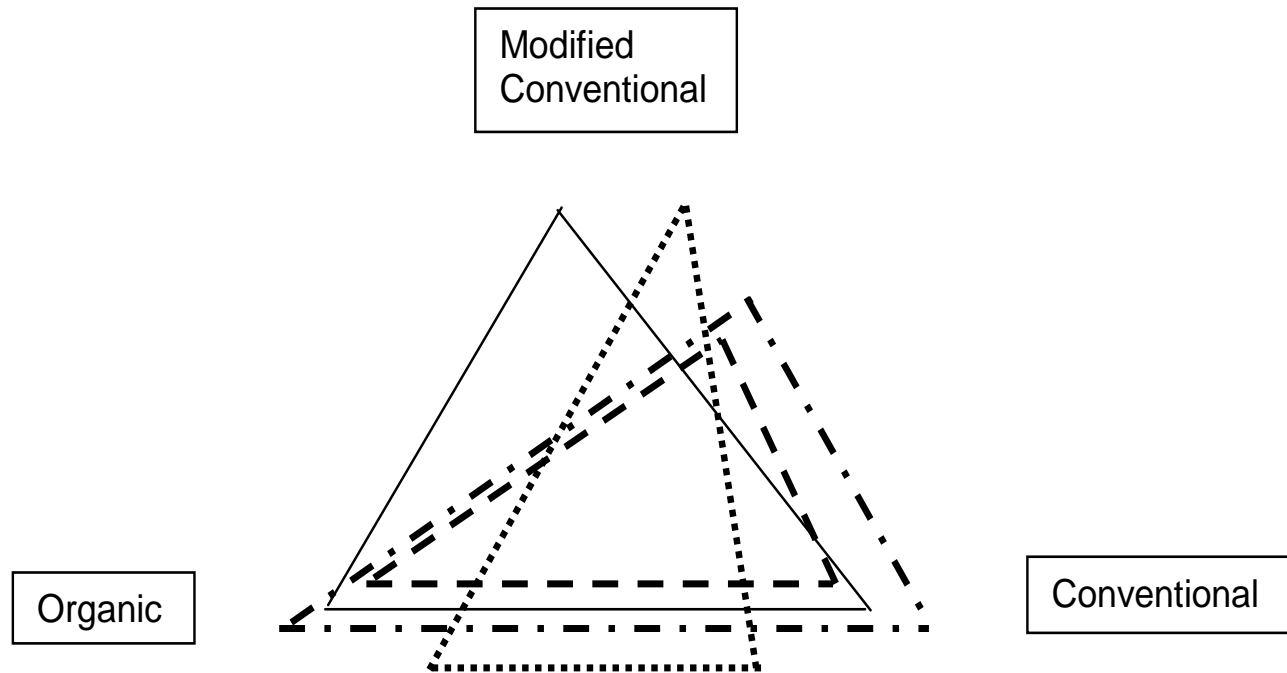




## KF: Differences between management systems

- Very few differences
  - Green cf. Green Organic orchardists placed more importance on having a tidy orchard (5.8 vs 4.2)
  - Gold orchardists neutral on birds and biodiversity (~4). Green/Green Organic saw these as more important (> 5.0)

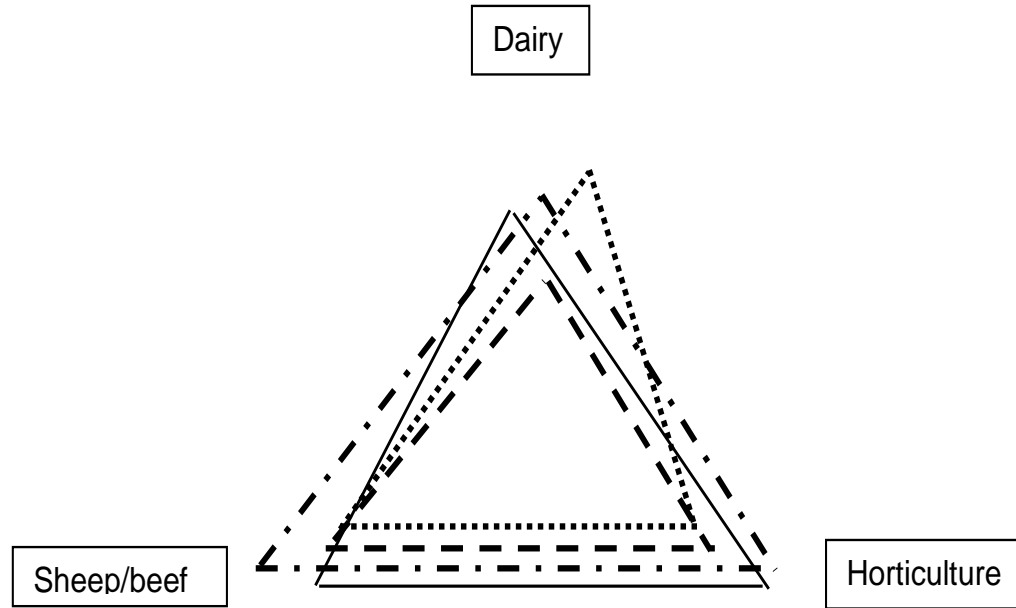
# Meta-analysis of indicators by management system (across all sectors)



Key:

- Financial indicators (11 variables) .....  
Production indicators (9 variables) - - - - -  
Environmental indicators (17 variables) - . - . - . -  
Social indicators (14 variables) \_\_\_\_\_

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