Ewe Efficiency & Greenhouse Gases

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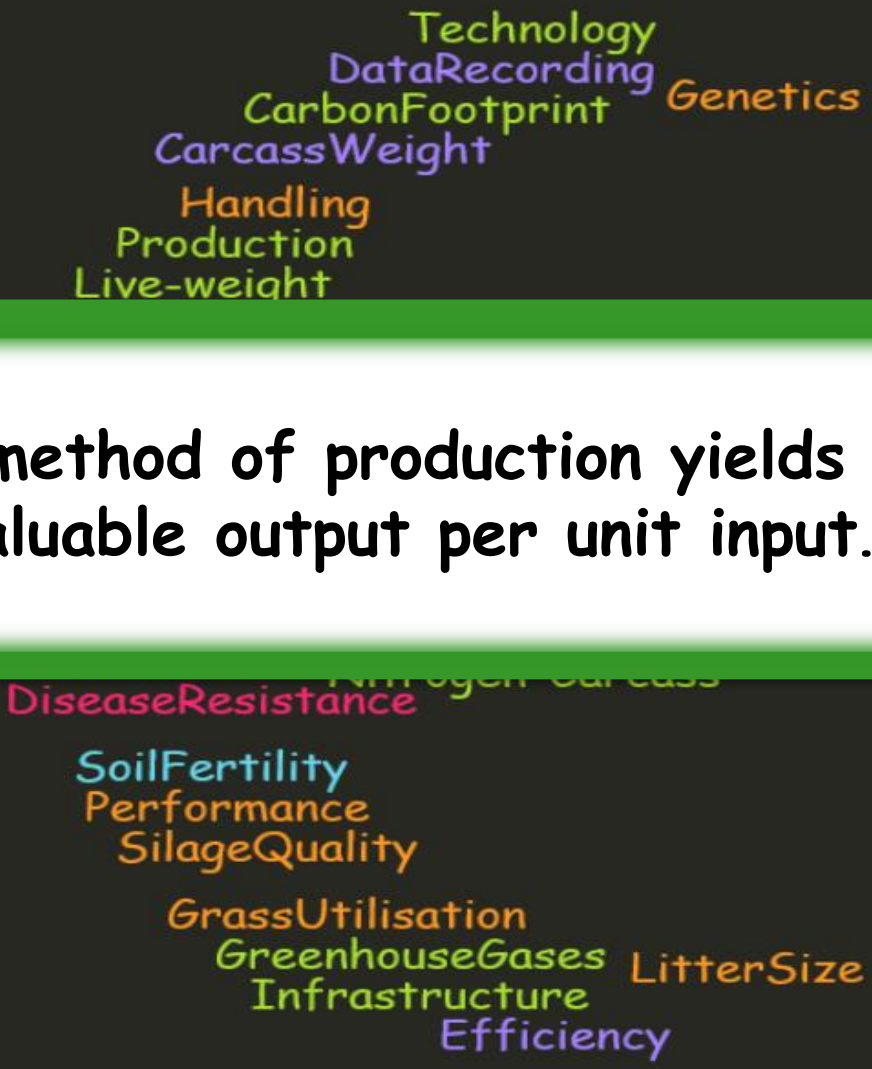
Teagasc
Agriculture and Food Development Authority

Sheep Ireland
www.sheep.ie

Overview

- **What is efficiency?**
- **Ewe Efficiency –**
  - *The replacement index*
- **Future research**

What is Efficiency?



Your method of production yields a more valuable output per unit input…..

What is important on your farm….

No. lambs/ewe

Can we use existing data as a proxy for efficiency?

Deviation in animal performance from a population…..

Carcass Output/ ha

Data

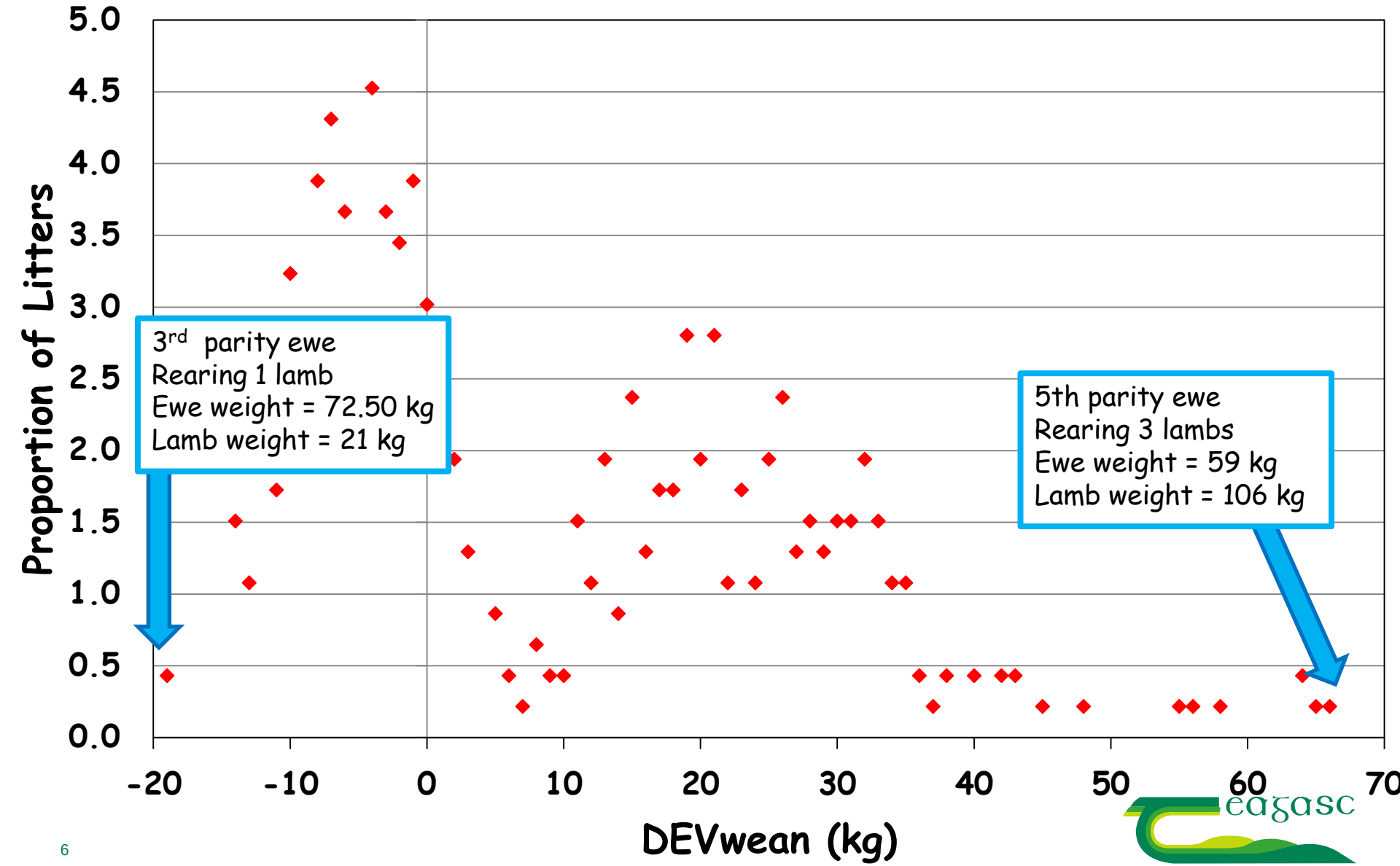
Live weight records

Ewe weights:

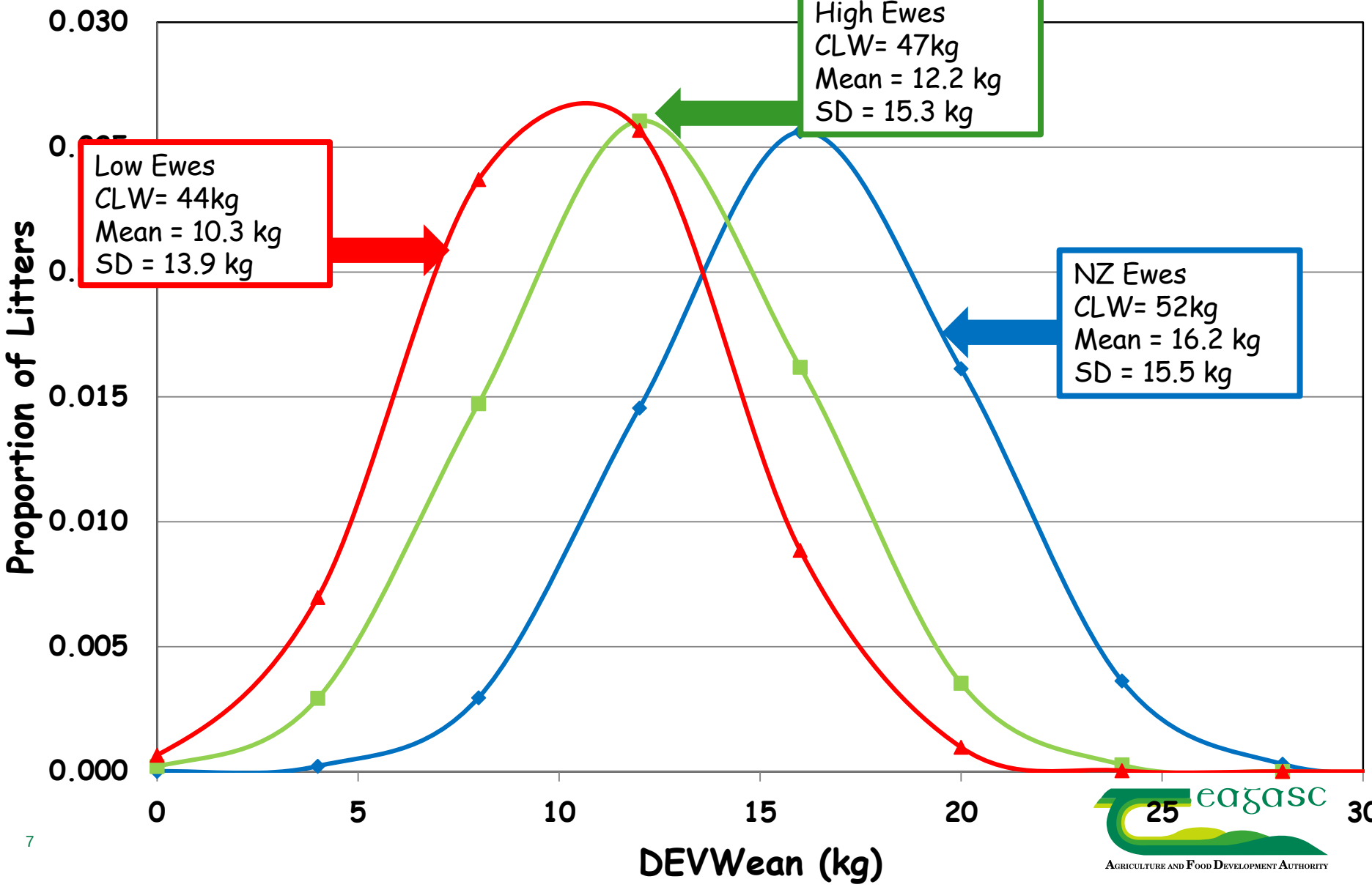
Lamb weights:

Investigate the variation - combined litter weight relative to ewe weight at same time

Benchmarking – Flock A



Benchmarking - INZAC



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New Sheep Research Greenhouse Gases

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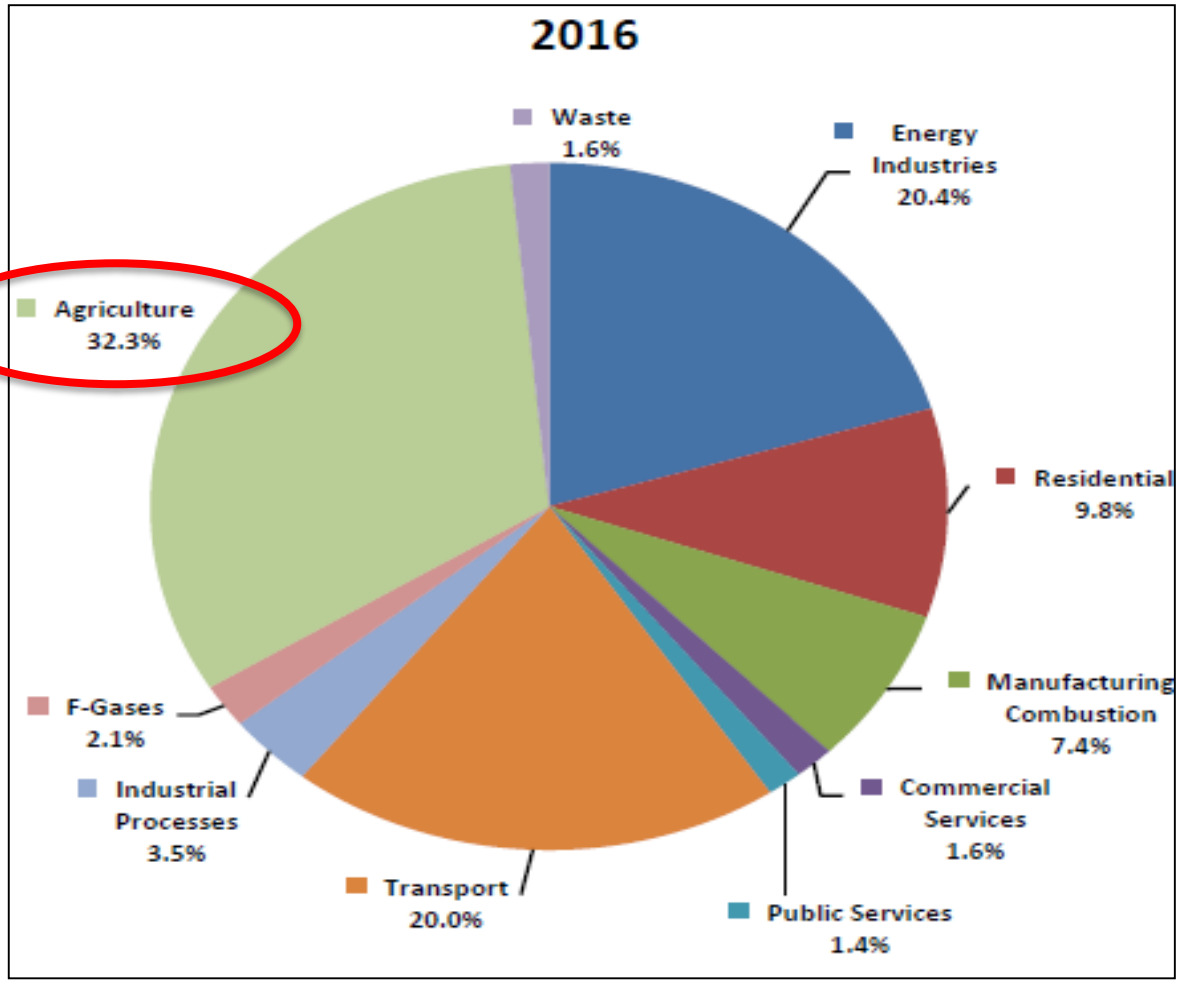
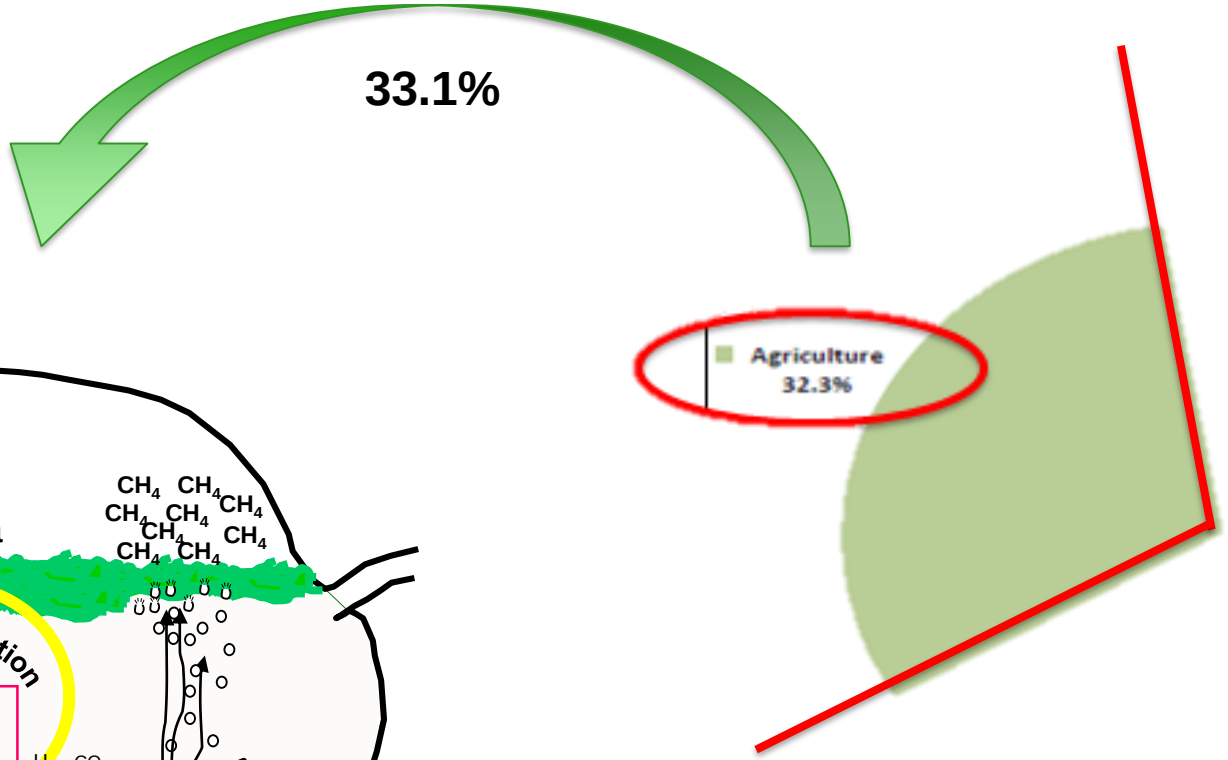
Ireland's GHG Emissions….



Ireland's Greenhouse Gas emissions by sector for 2016
(EPA, 2018)

Ireland's GHG Emissions….

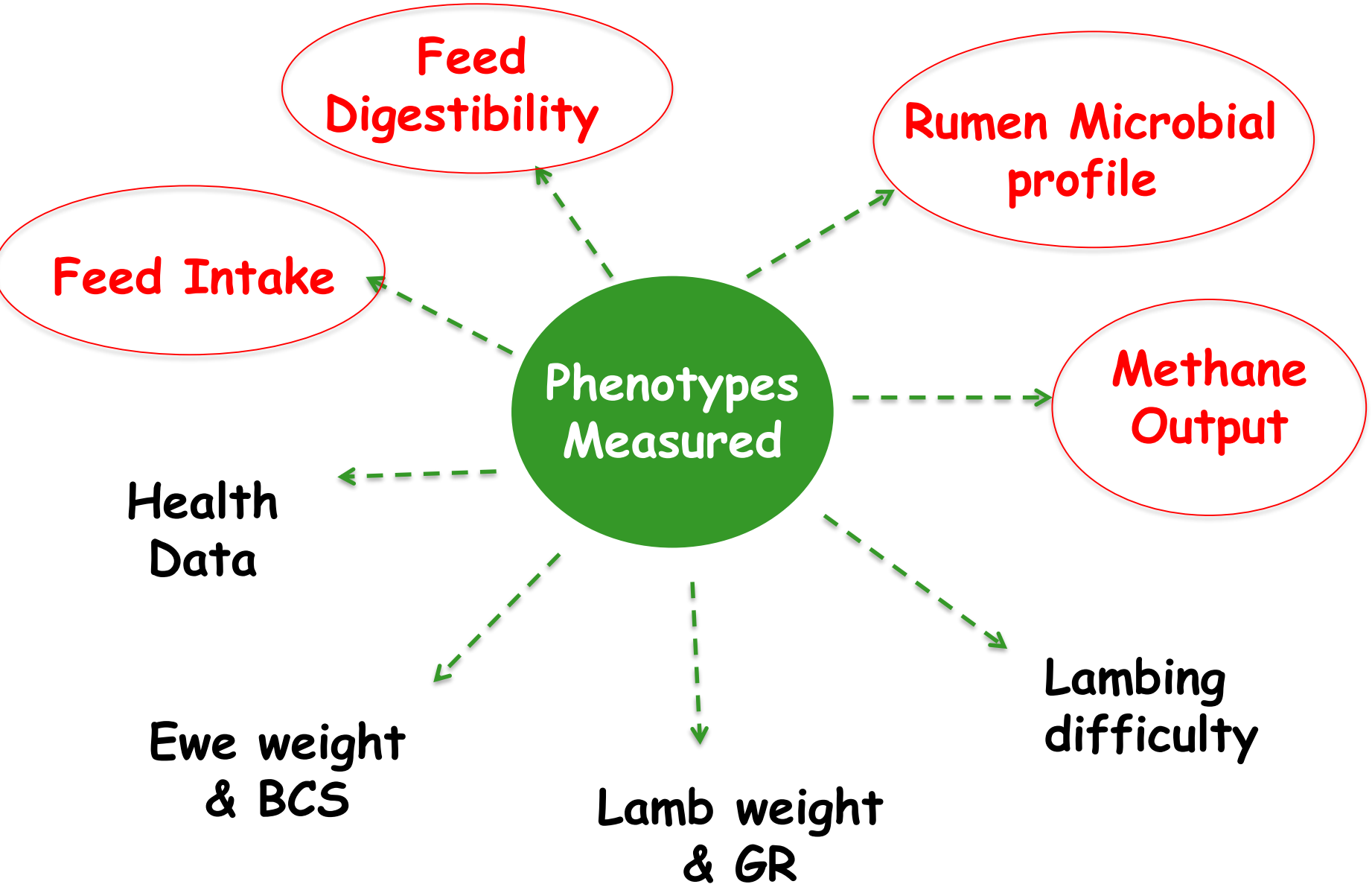
Methane & N_2O



GREENBREED

Objective

- To develop, validate and deploy the necessary tools and optimal strategies to achieve sustainable and quantifiable genetic gain through environmental and economic efficiency



Collaboration Research

- PAC Chambers

In Summary

- New ewe efficiency trait under development
  - Information required to derive this trait is routinely available
  - Useful Benchmarking report within and between flocks
- Research phase underway into new traits of importance

Genetic Index Traits

Is the trait important?

Is there data / can data be easily collected?

C ata

Calcul reliability

Cor -index

Make Selection Decisions

Acknowledgements:

- Dept. of Agriculture, Food and the marine
- Teagasc
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Thank you for your attention.

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