

Feeding self-sufficiency levels in dairy cow and goat farms in Western France

Current situation and ways of improvement

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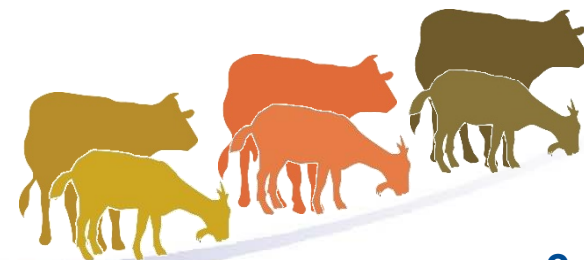
Definitions and methodology

- ▶ Feeding self-sufficiency → a major goal for dairy farming
 - ▶ To deal with the ups and downs of input costs & climatic hazards
 - ▶ To improve the traceability of feed
 - ▶ To reduce the dependence of imported proteins
- ▶ Feeding self-sufficiency = balance between the herd requirements and the resources that can be grown on farm.
- ▶ 3 indicators: mass, energy and protein self-sufficiencies



- ▶ 120 dairy farms followed by advisors in Western France in 2011 (75 dairy cow farms) & in 2013 (45 goat farms)

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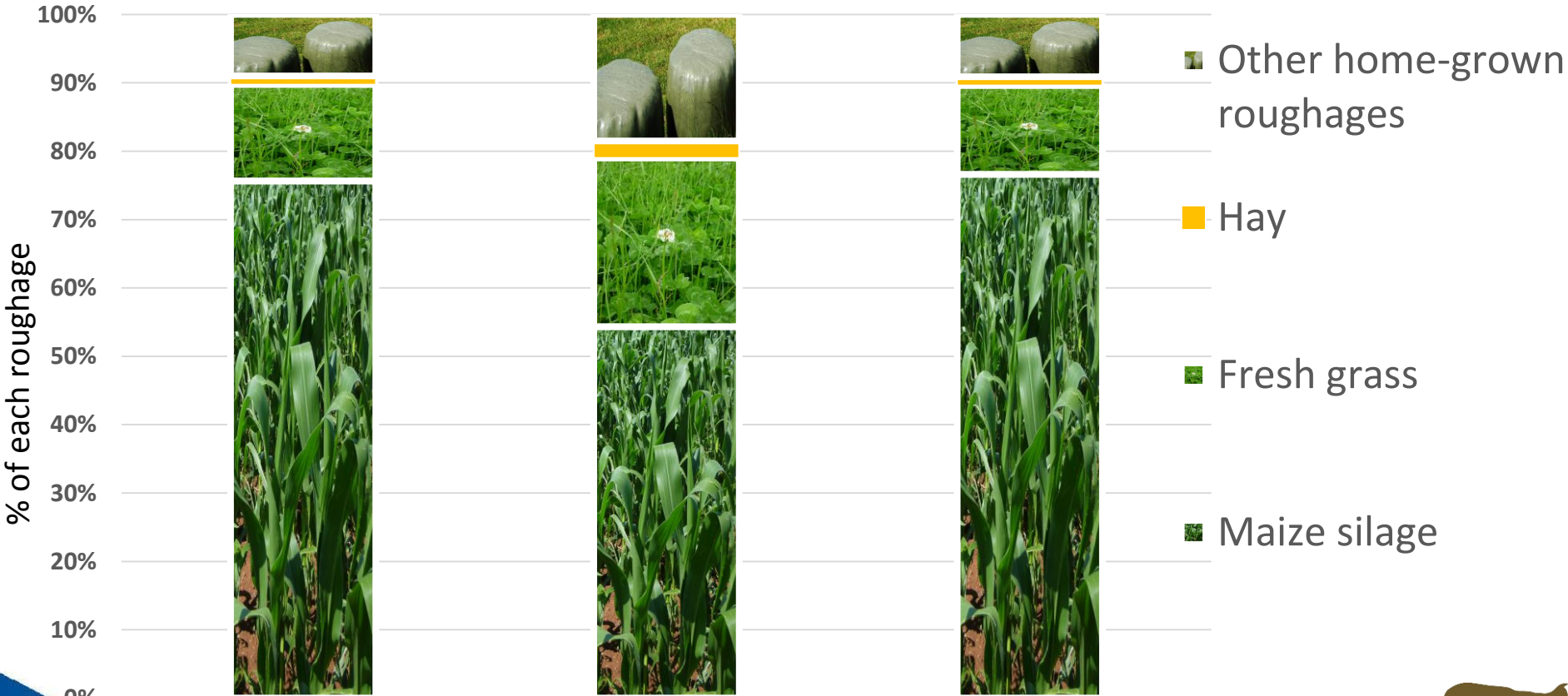
Feeding systems in cows farms

% of farms in the system

51 %

35 %

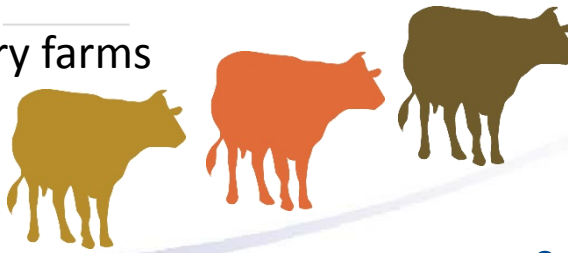
14 %



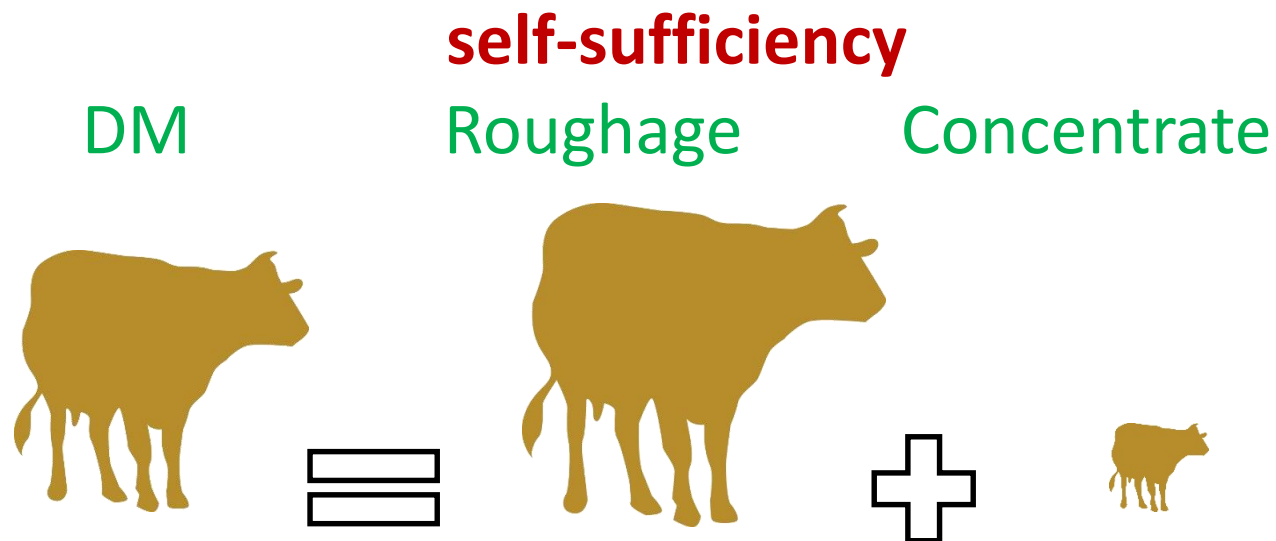
Specialized dairy farms

Mixed crop-dairy farms

Concentrates represent 19-23 % of the cow diet !



Feeding self-sufficiency levels in dairy cows farms: current situation



Specialized dairy farms

	DM	Roughage	Concentrate
- Maize area > 30 % Forage Area	83%	98 %	14 %
- 10 < maize area <30 % Forage Area	85%	96 %	24 %
Mixed crop-dairy farms	78%	95 %	6 %

Feeding self-sufficiency levels in dairy cows farms: current situation



Specialized dairy farms

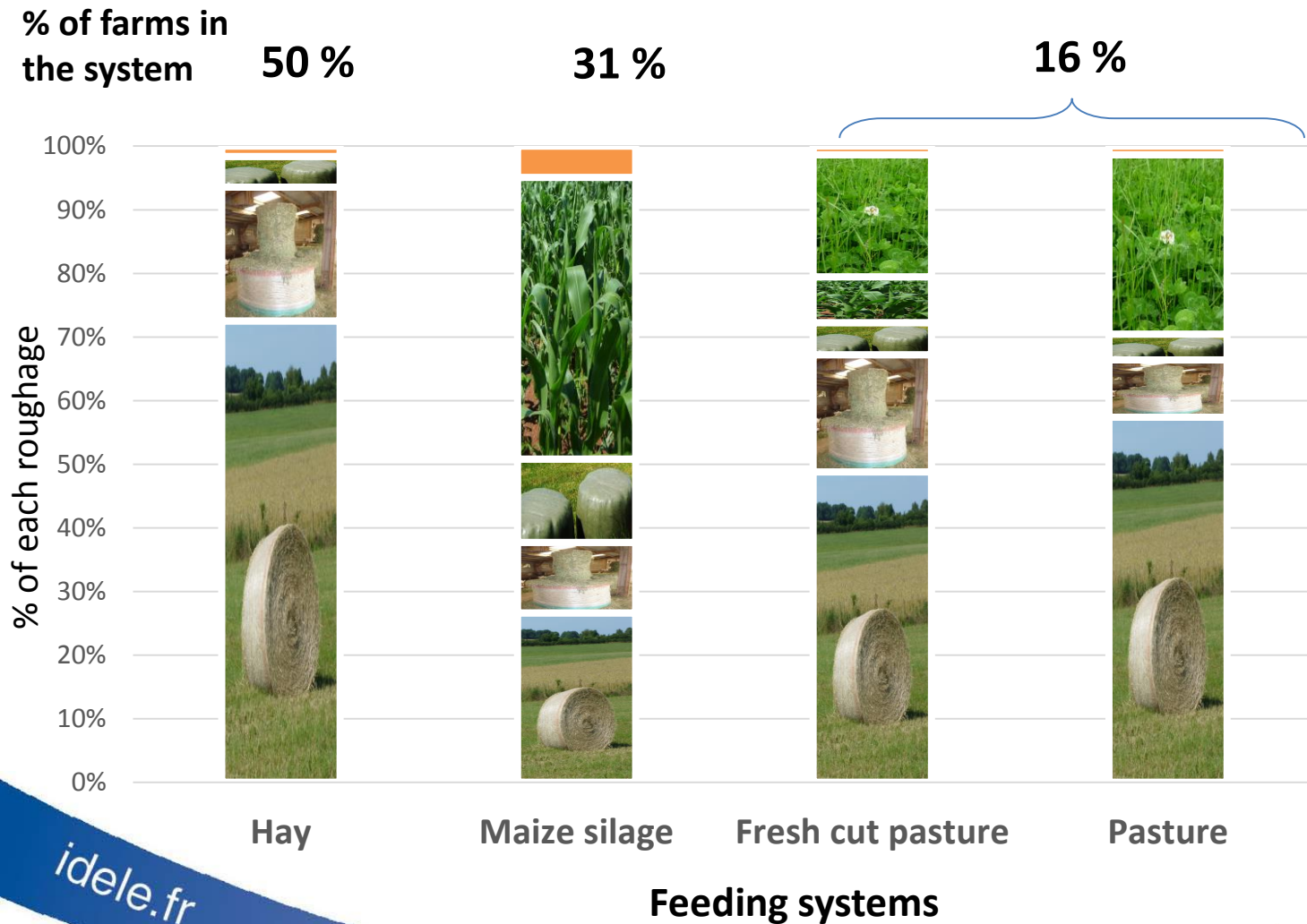
- Maize area > 30 % Forage Area **83%** **81 %** **59 %**

- 10 < maize area <30 % Forage Area **85%** **84 %** **68 %**

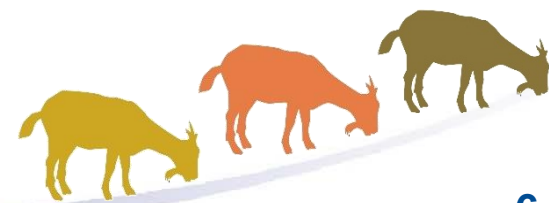
Mixed crop-dairy farms **78%** **76 %** **54 %**

Feeding systems in goat farms

Concentrates represent 46 % of goat diet !



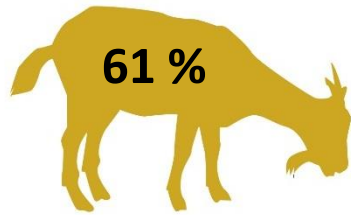
- Other roughage
- Fresh grass
- Maize silage
- Grass silage
- Bought hay
- Home-grown hay



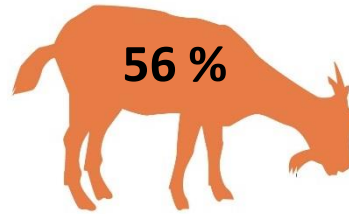
Feeding self-sufficiency levels in dairy goats farms: current situation

self-sufficiency

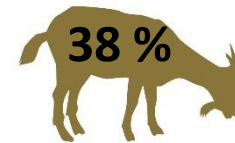
DM



Energy



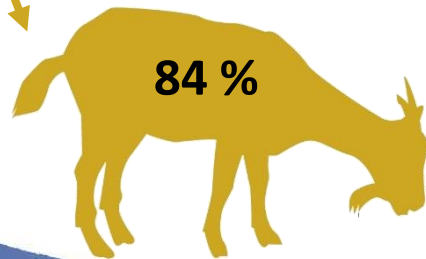
Protein



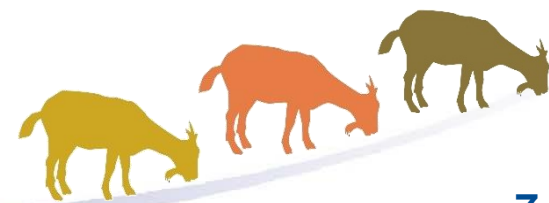
Concentrate



Roughage

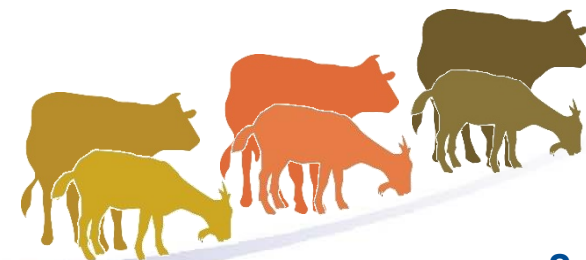


Self-sufficiency indicators
LOWER than cow's ones



Technical ways of improvement

- ▶ Better consistency between areas and herd size
- ▶ Herd management
 - ▶ larger use of grass in the diet
 - ▶ feed efficiency
 - ▶ nature of feed (protein crops, rapeseed meal, by-products)
- ▶ Crop management
 - ▶ grassland yields and quality of forages (more legumes, multisward)
 - ▶ new cultivated feed
 - ▶ well monitored crop-rotation.



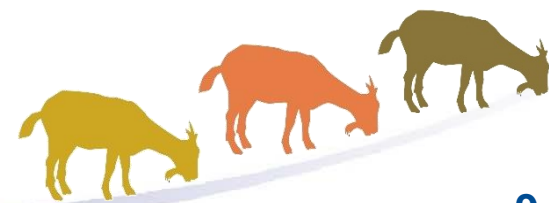
The experiment goat network REDCap:

a network of goat breeders, engineers, teachers and researchers to develop self-sufficiency

- ▶ This organization gives a wide place to:
 - ▶ experiment in experimental unit (Inra – Patuchev) and in farms
 - ▶ exchange to support the emergence of innovative research issues
 - ▶ spread of new knowledge on the topics of self-sufficiency and grass use.



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Financial supports:





Thank you !

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Financial supports:

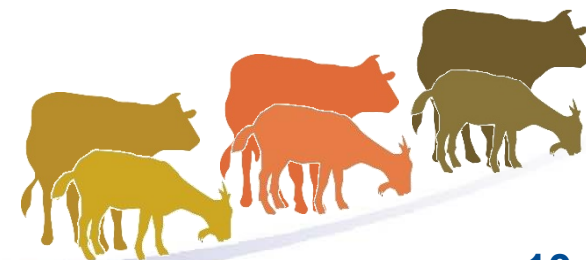
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