Round Table 2
Rabbit housing - new farming systems with the regulations and social demand?
Chairman: L. Maertens (Belgium)

France: situation, methods, research, prospects
Fortun-Lamothe L.
French rabbit sector

- **An active interprofession**
- **800 Professionals**
- **42% are women**
- **90% members of a producer group**
- **78% of production in the West of France**
- **1/3 of farms are specialized**
- **95% of rabbits produced in France are consumed in France**
- **Slaughter 90% of production**
- **< 20 000 t eq. cc**
Regulations and social demand?

- Regulation and social demands concerning **animal welfare**

  "End the Cage Age"
  European Citizens’ Initiative

- Others subject no considered here
  - Antibiotic use
  - Price and quality: **loi EGALIM in France**
    50% of sustainable products, in particular with a sign of origin and quality (SIQO), in meals served in public restaurants* from 1 January 2022
  - Alternative systems

Citizens want the animals have an access to the outdoor
Situation in France concerning housing systems

Currently:
- \( \approx 95\% \) of rabbits housed in cages (50% are polyvalent for “duo management”)
- \( \approx 4\% \) of rabbits housed in pens, floor pens or elevated cages (platform)
- <1\% organic production (mobile cages fixed pen on grassland)

- The sector had set itself an ambitious objective: to reach 25\% of the production from alternative systems by 2022

The objective will not be met but the situation is changing significantly
Private solutions currently available: for fatteners only!

Indoor system with large ground pens

Hybrid housing combinating indoor elevated pen + winter garden

Lapin et bien
(≈ 15 farms)

Cuniloft
(<5 farms)

Wellap
(1 farm)
No private known solution for females!

For females there is several questions:
- Possibility of « duo management » ?
- Large and enriched housing for jumping, standing up, gnawing....
- Grouping for social interactions

Within the Living Lab Project, NGO people said that “the grouping of rabbit does” not enter in the "end the cage age" area

The first step is therefore to offer a more spacious and enriched living environment for the females at an acceptable economic cost
Prospects in the French rabbit sector

EVALAP Project = state-funded recovery plan

Development and deployment of an interprofessional charter of good practices in rabbit farming

welfare + hygiene (⇒VHD)
Research projects at INRAE on welfare subject

- Explore a gradient of system
  - Indoor → outdoor
  - Specialized livestock systems = farms for meat production only
  - Agroecological systems: integrated crop-livestock integration for additional services to meat production

- Implements various research approaches
  - Disciplinar research projects
  - Pluridisciplinar research projects
  - Open innovation = with non academic partners
Research projects at INRAE: indoor ground pen (under consideration)

For genetic studies

For fatteners

Photo L. Maertens
Research projects at INRAE: indoor large partitioned pens

Four individual housings connected via hatches

For fatteners and reproductive females
Research projects at INRAE: indoor large partitioned pens

Communication between units

- Stand up
- Gnawing
- Jumping
- Hiding
- Comfort (floor)
- Compatible with « duo management »
- Easy transformation from individual to group housing

Currently tested in commercial farms with « duo management » in the Living Lab Lapin project

Is it a cage or not??

“End the Cage Age” European Citizens’ Initiative
Research projects at INRAE: with outdoor access

Currently for fatteners only

Fetiveau et al., 2021. Effect of access to outdoor grazing and stocking density on space and pasture use, behaviour, reactivity, and growth traits of weaned rabbits. Animal, 15: 100334

See poster tomorrow

Improved natural behaviours

✓ Grazing
✓ Stand up
✓ Jumping
✓ Running...

✗ Climatic comfort
✗ Parasitism ??? (weak effect for the moment)

See poster tomorrow: Fetiveau et al.
Research projects at INRAE: with outdoor access

Four experimental groups:
- Group size (50 vs 25)
- Access to outdoor: Yes or no

- **Mortality** ($P<0.1$)
  - Ext25
  - Ext50
  - Int25
  - Int50

- **Behavior**
  - % active rabbits
  - $P < 0.05$

- **Growth**
  - Effect Density ($P<0.05$)
  - Effet Outdoor Acces ($P<0.05$)

Photo: M. Fetiveau (inrae)
Research projects at INRAE: studies on organic production

Studies on farms or experimental unit by T. Gidenne et al. concerned feeding, health and performance (smartphone application developed) but not animal welfare
Research projects at INRAE: integration tree-livestock apple tree-rabbit

Project in progress by Savietto et al.

Two housings testes

Services evaluated: meat production, Weed control, soil fertility, animal welfare, etc.
Possible dis-services: rabbit damage on apple trees, attraction of predators, disease for rabbits (copper poisoning)
Thank you for your attention