



Development of Local Soybean Production and Valorization for animal feeding in France

¹Quinsac Alain, ²Carré Patrick, ¹Dauguet Sylvie & ³Royer Eric

¹Terres Inovia, 11 rue Monge, 33600 Pessac, France

²ITERG, 11 rue Monge, 33610 Canéjan, France

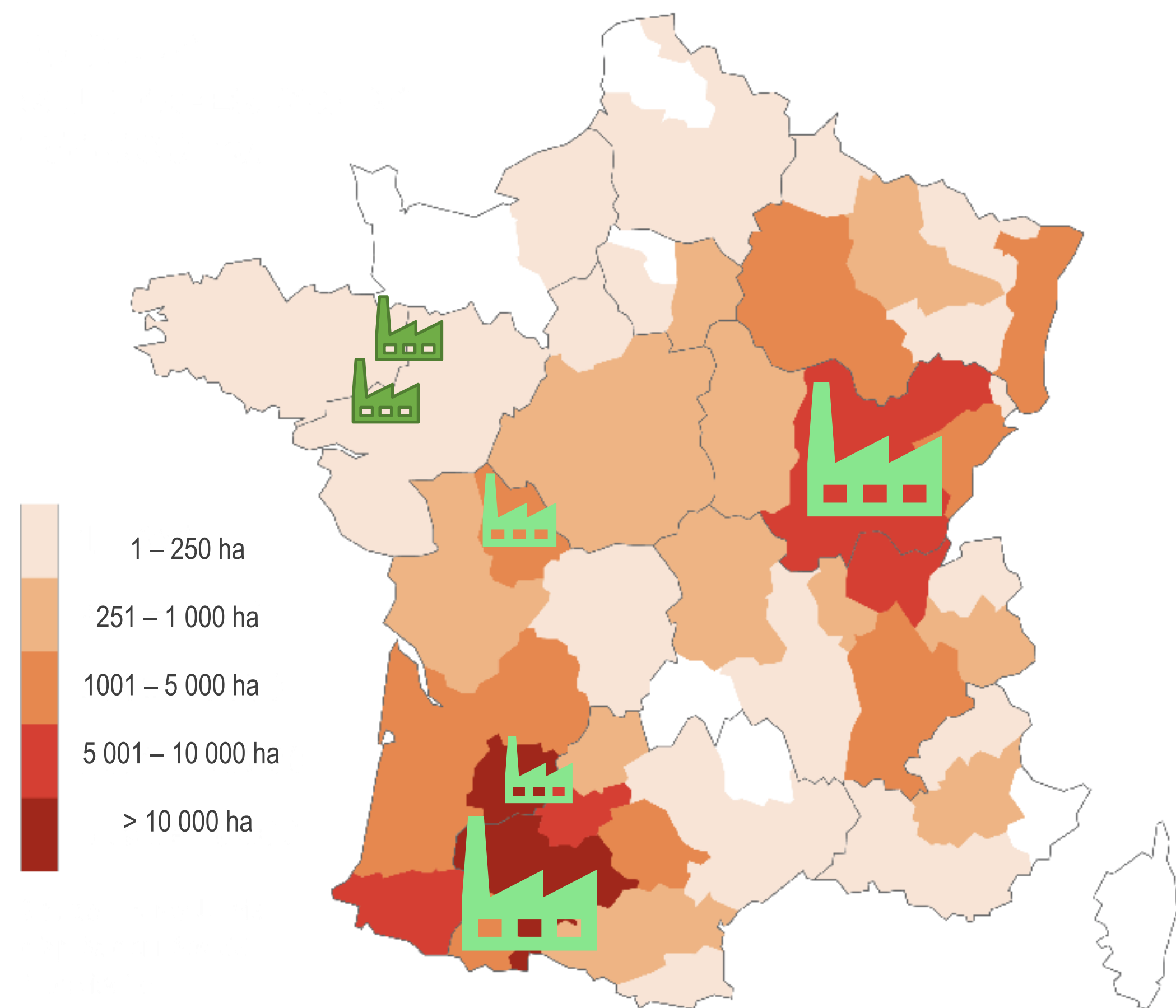
³Ifip-institut du porc, 31500 Toulouse, France.

#Current address, Institut de l'Élevage, 31321 Castanet-Tolosan, France

Soybean production in France

Mainly in South-west and Burgundy but development in other areas

2014 76 000 ha → 223 000 t
 2016 136 000 ha → 339 000 t
 2019 163 000 ha → 420 000 t



Enhancing the value chain

Contract with **Quality Chart** established with the French operators by Terres Univia



Four commitments

1 French Origin

- Non GMO
- Production, storage and 1st transformation on French territory

2 Sustainability

- No contact insecticide used during storage.
- Diffusion of technical knowledge towards farmers for soybean cultivation to improve economical, environmental and quality performances.
- Monitoring of fossil energy consumption, atmospheric emissions, wastes.
- Respect of international, European and national social rules and workers safety.

3 Identity preservation

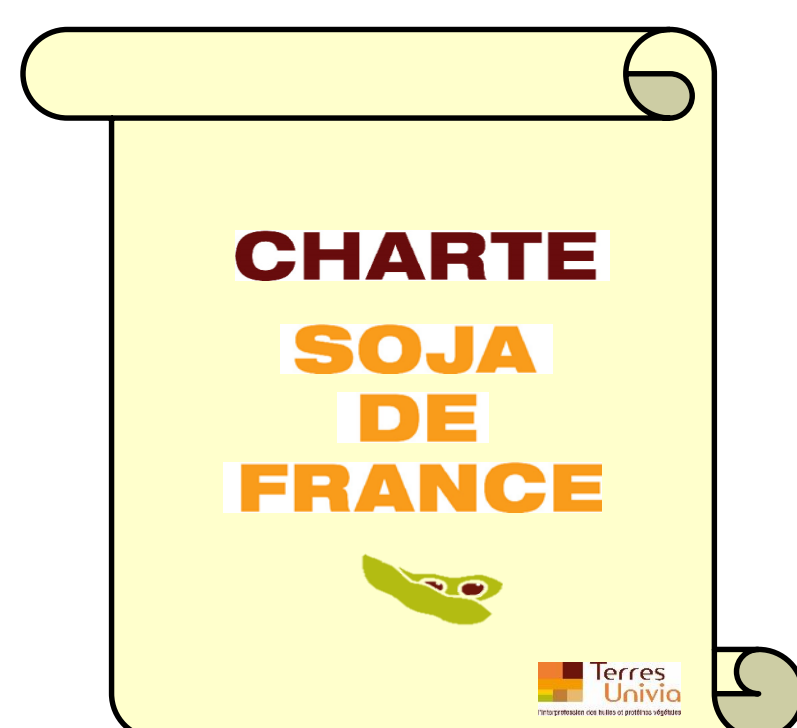
- Separate transportation from field to storage in dedicated and cleaned containers according to Qualimat standard.

4 Grain Quality :

- Control of seed quality according to contract criteria.

- Good practices for drying and storage.

Participation to the interprofessional survey plan on oilseed and pulses food safety and application of HACCP for contamination risk management.

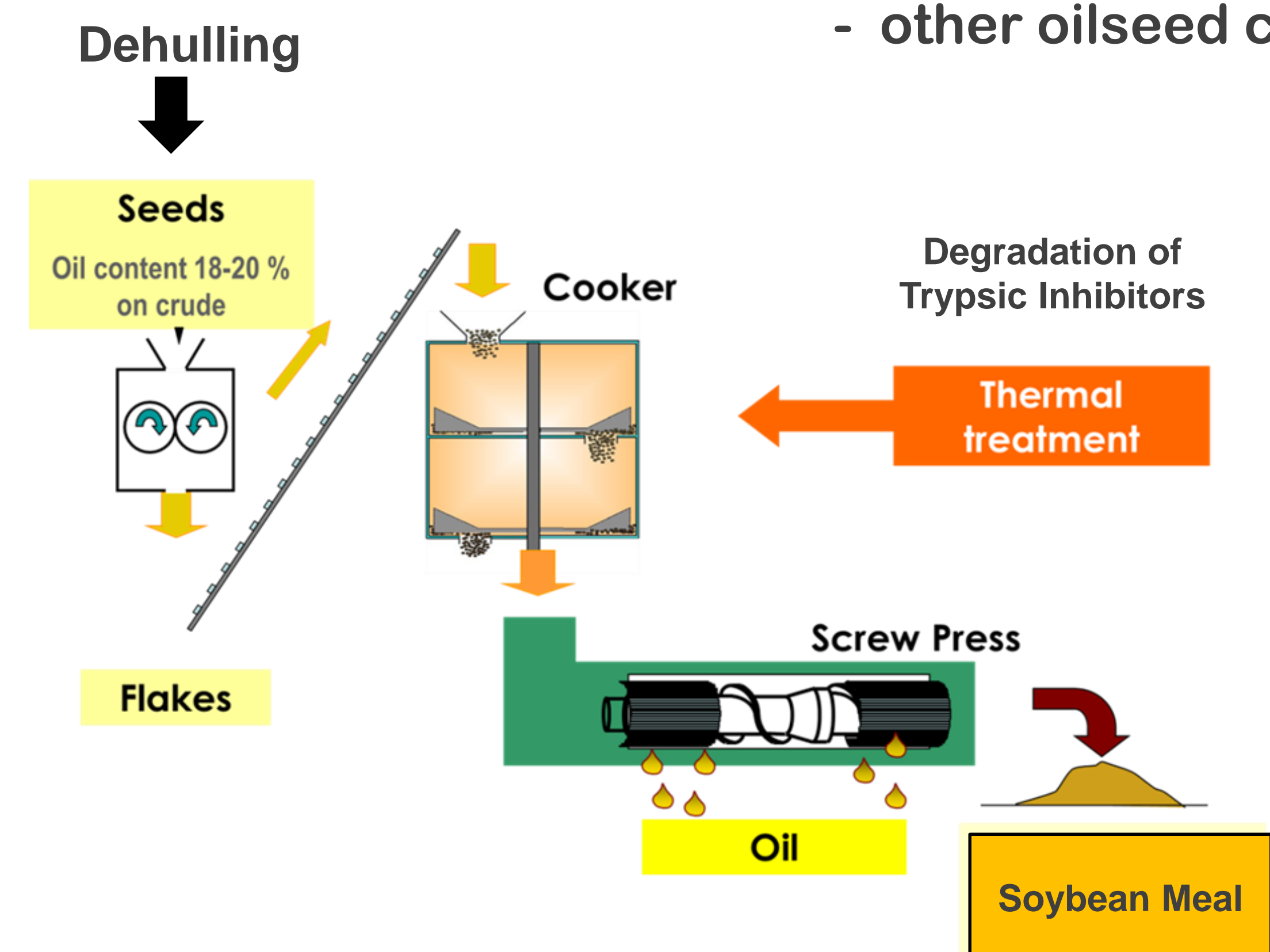


Soybean meal production for animal feeding :

- medium size plants: from 5 kt/y to 30 kt/y
- located in cultivation and livestock areas

Dehulling-Flaking-Cooking-Pressing Process

- allows
- identity preservation,
 - organic production,
 - other oilseed crushing



Typical composition of soybean meal

Protein	45 – 47 %
Oil	8 – 10 %
Moisture	5 – 7 %
Trypsin inhibitors	6 - 8 TIU/mg
Protein solubility in KOH	70 - 75%

Quality evaluation and monitoring of French production in 2020

Survey on soybean meal composition

- Oil, protein, moisture, Antitrypsin Factors, protein solubility
- Every month from each plant

Digestibility evaluation

- Soybean meal from different plants
- nutritional values for pigs and poultry

Demonstration tests in commercial swine farms

- Substitution effect of imported soybean by « soja de France »
- From post weaning to slaughtering
- Large number of animals

→ to promote the use of French Soybean meal



Feed-a-Gene is a European H2020 project involving 23 partners which aims to adapt feeds, animals and feeding techniques to improve the efficiency and sustainability of pig, poultry and rabbit production systems. It is coordinated by INRA (France), started in March 2015 and will last 5 years. The project aims to reduce the environmental impact of monogastric livestock production by improving and diversifying animal diets and feed technologies and by integrating new selection criteria for these animals. The Feed-a-gene project further aims to develop new management systems for precision feeding and precision farming and to evaluate the overall sustainability of the different management solutions proposed in the project.



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