

# ***Agronomic perspectives of plant proteins in Europe***

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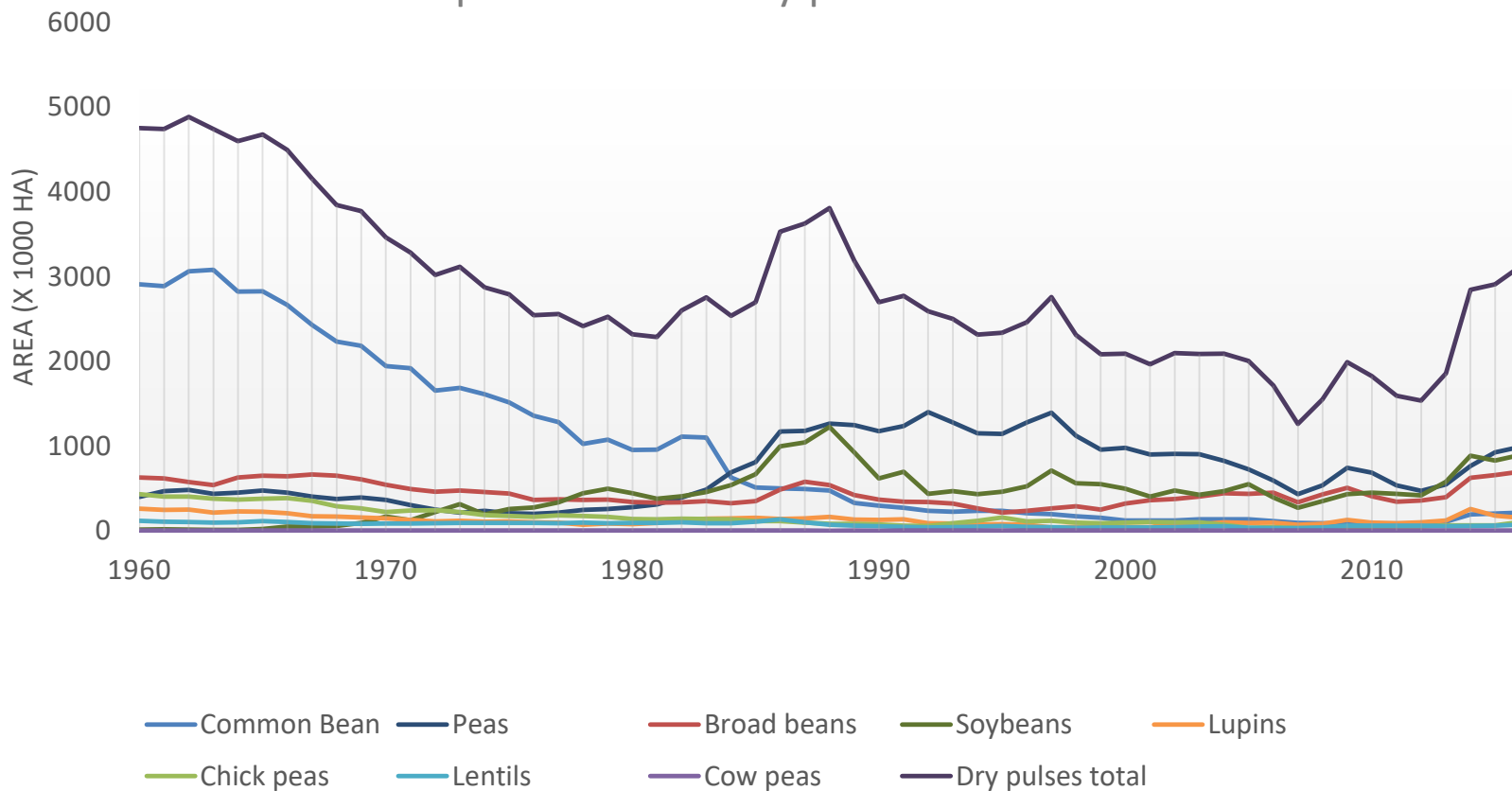
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CROPS  
FOR FUTURE  
GENERATIONS**



This project has received funding from the European Union's Horizon 2020 research and innovation programme under grant agreement No 635727.

# Plant proteins in EU

Area of production of dry pulses in EU



(FAOSTAT, 2020)



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# “New” protein crops



Faba Bean



Lupin



Lentil



Chickpea



Pea



Soy



Quinoa



Amaranth



Buckwheat



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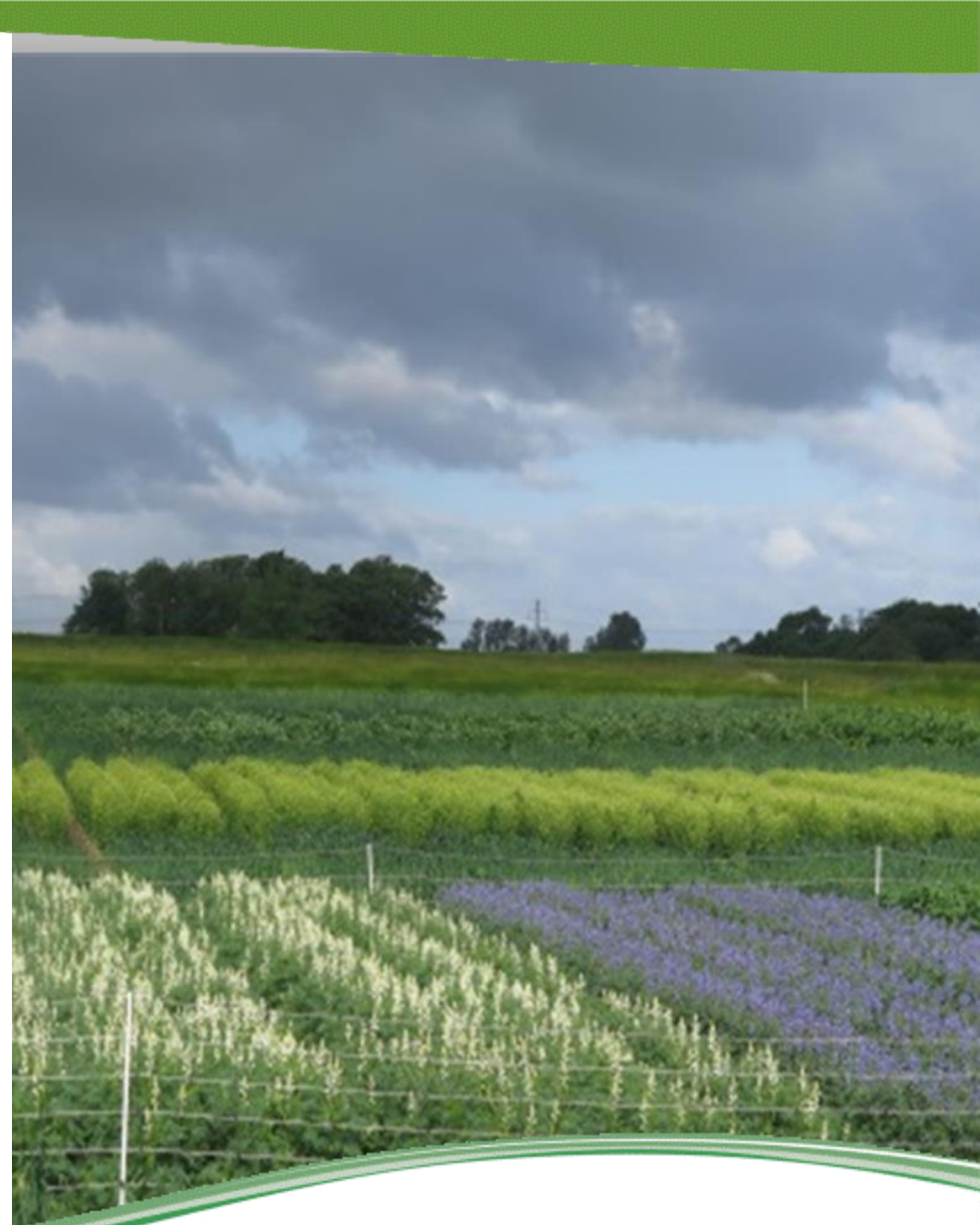
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# Trials testing

- **Varieties**
- **Agronomic practices**
- **Effect soil quality and agrobiodiversity**
  
- Breeding tools
- Commercial quinoa production in Romania



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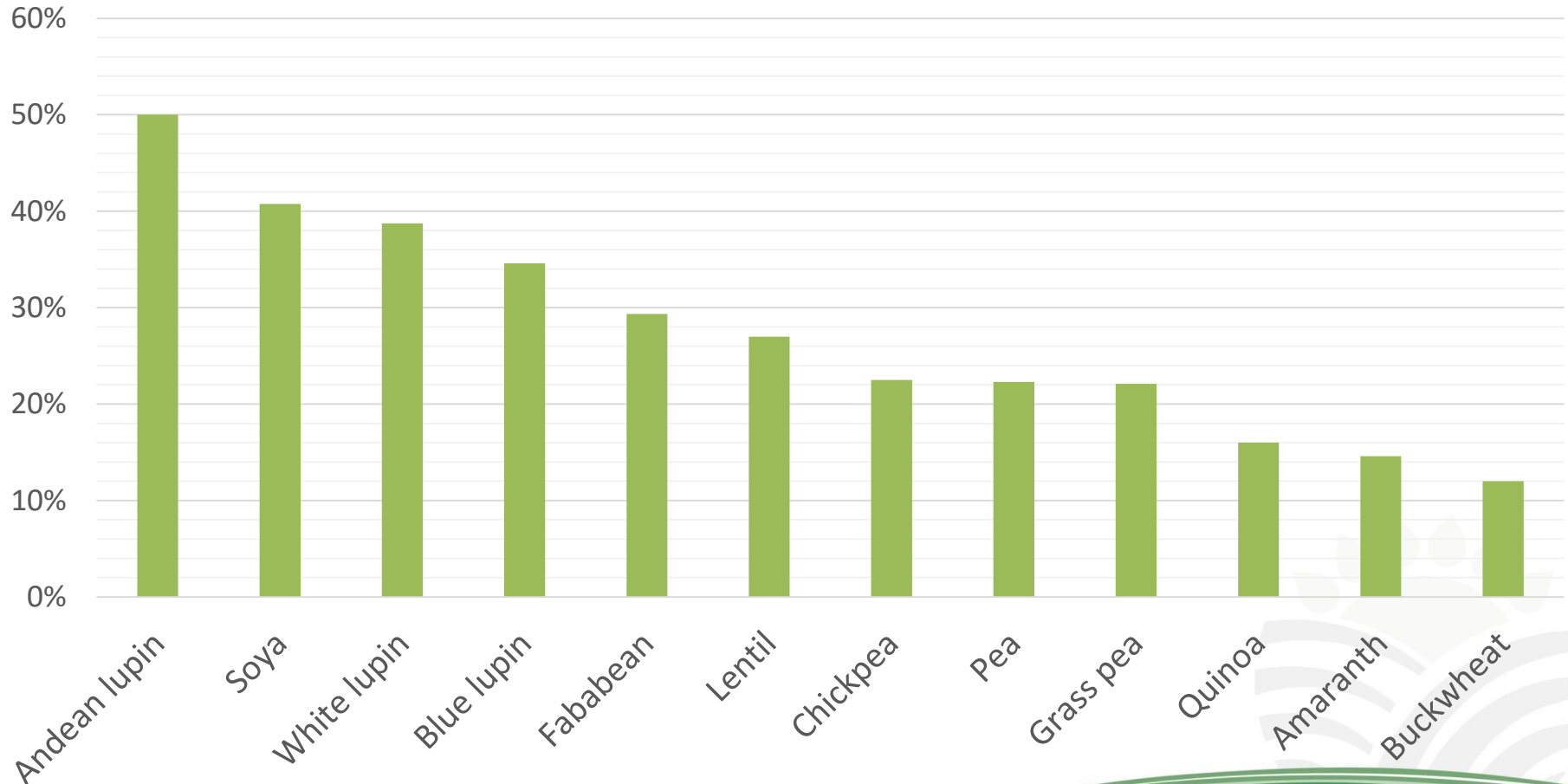
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# Protein Content

% in dry matter



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# Agronomic Performance

CROP	YIELD (t/ha)	STRENGTH	WEAKNESS
Faba Bean	2,8 - 6,7	Highest protein production	Drought sensitive and susceptibility to diseases
Lupin	1,9 - 3,5	Drought-tolerant, high protein levels and production	Susceptibility to some diseases
Chickpea	3 - 7,5	High total yields	Low protein yield and only in southern Europe
Lentil	1,2 - 1,9	Drought tolerant	Low (protein) yields
Quinoa	2,1 - 2,2	Salt tolerance	Difficult to establish
Amaranth	1,6	Robust to pests and drought	Low yields
Buckwheat	1,3 - 2,4	Marginal growing conditions	Low yields



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# From field to food

## PROTEIN2FOOD

Agronomic guidelines for high-value protein crops for a diversified production

## INDUSTRY

Boom in meat-replacers leads to shortage in traditional plant protein

## SOCIETY

New income opportunities for farmers and improved agro-biodiversity



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