



FRUITCONSULT

"Pear Production-the Dutch way"

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The Netherlands

- www.fruitconsult.com -



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international consultancy
and research for apples
and pears



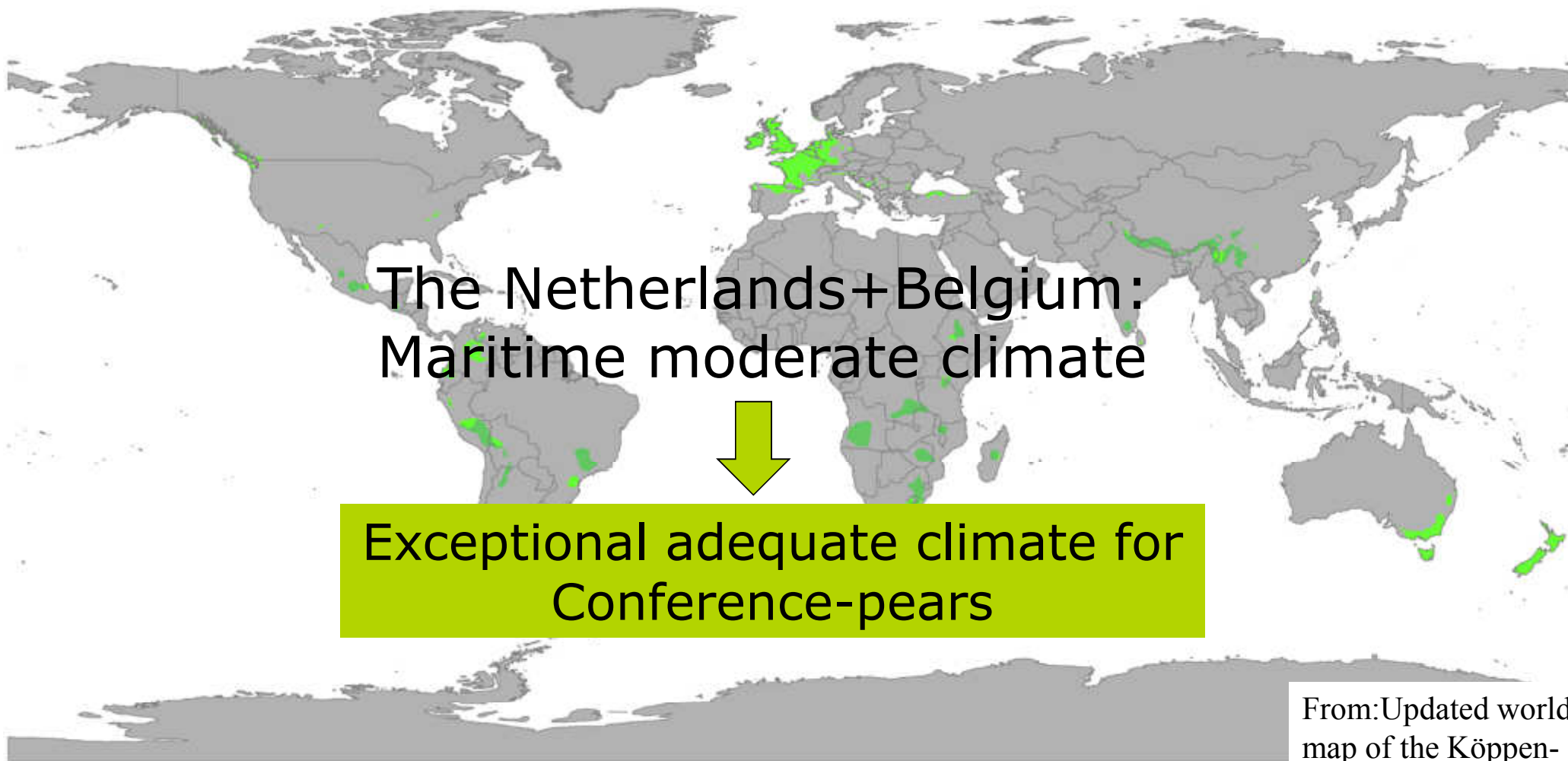


The Netherlands (NL)

The Netherlands

- Latitude: 51-53° (Minsk ...)
- Ferrara: 45°
- Maritime moderate climate
- Precipitation: 800 mm/year
- Soil: clay soil with $\text{pH} > 6.5$
- CEC between 150-250 mmol^+/kg





Af	BWh	Csa	Cwa	Cfa	Dsa	Dwa	Dfa	ET
Am	BWk	Csb	Cwb	Cfb	Dsb	Dwb	Dfb	EF
Aw	BSh		Cwc	Cfc	Dsc	Dwc	Dfc	
	BSk				Dsd	Dwd	Dfd	

From: Updated world map of the Köppen-Geiger climate classification. **Oceanic climates (Cfb, Cfc, Cwb, Cwc)**

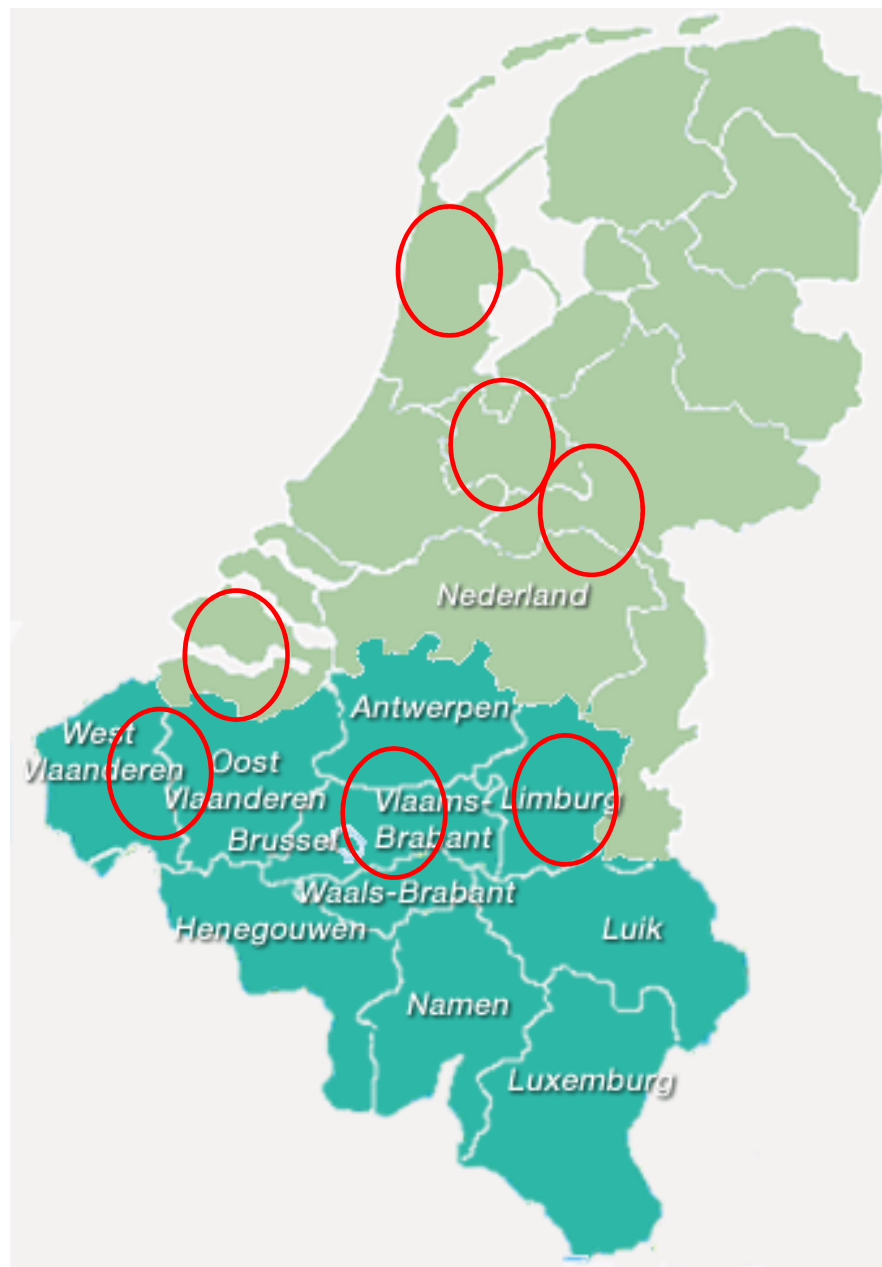


Netherlands+Belgium:

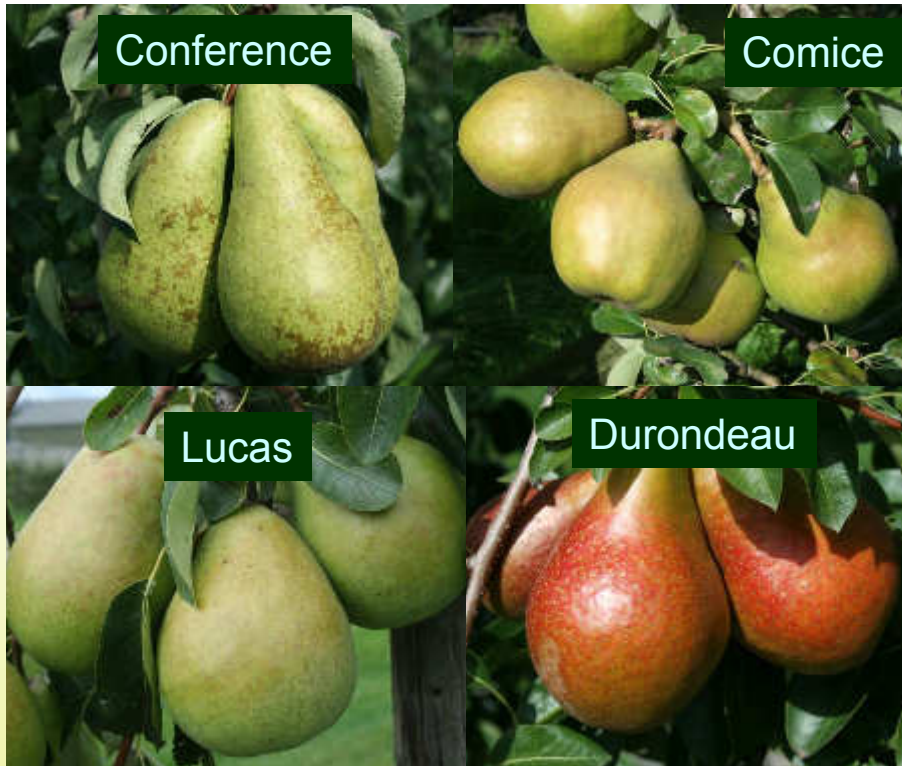
- 15 000 ha Pears
- Increasing area Conference

Production

- 500 000 – 600 000 ton
- Avg: 35-40 ton/ha



NL + B



Varieties:

- 80 % => Conference
- 5% Doyenne du Comice
- 5% Beurré Alexandre Lucas, Durondeu
- 10% clubvarieties
- No Abate Fétel



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Club varieties (500-1000 ha)



Sweet
Sensation



Xenia



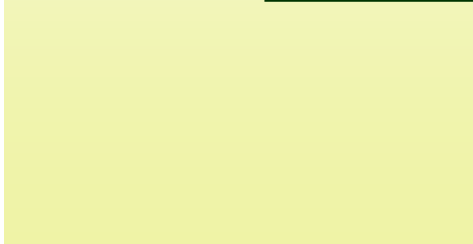
Migo



Qtee - Celina



Grafin Gepa
Early Desire





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PLANTING SYSTEMS AND ROOTSTOCKS



Quince C
60 % orchards



Quince
Adams
35% of
orchards



more frostresistant

Quince Eline
More and more
60% new orchards

Important for Conference –pear
-> Young branches (1-3 year) produce large
and long fruits





Older branches

**Conference:
Storage up to
11 months**



Young branches

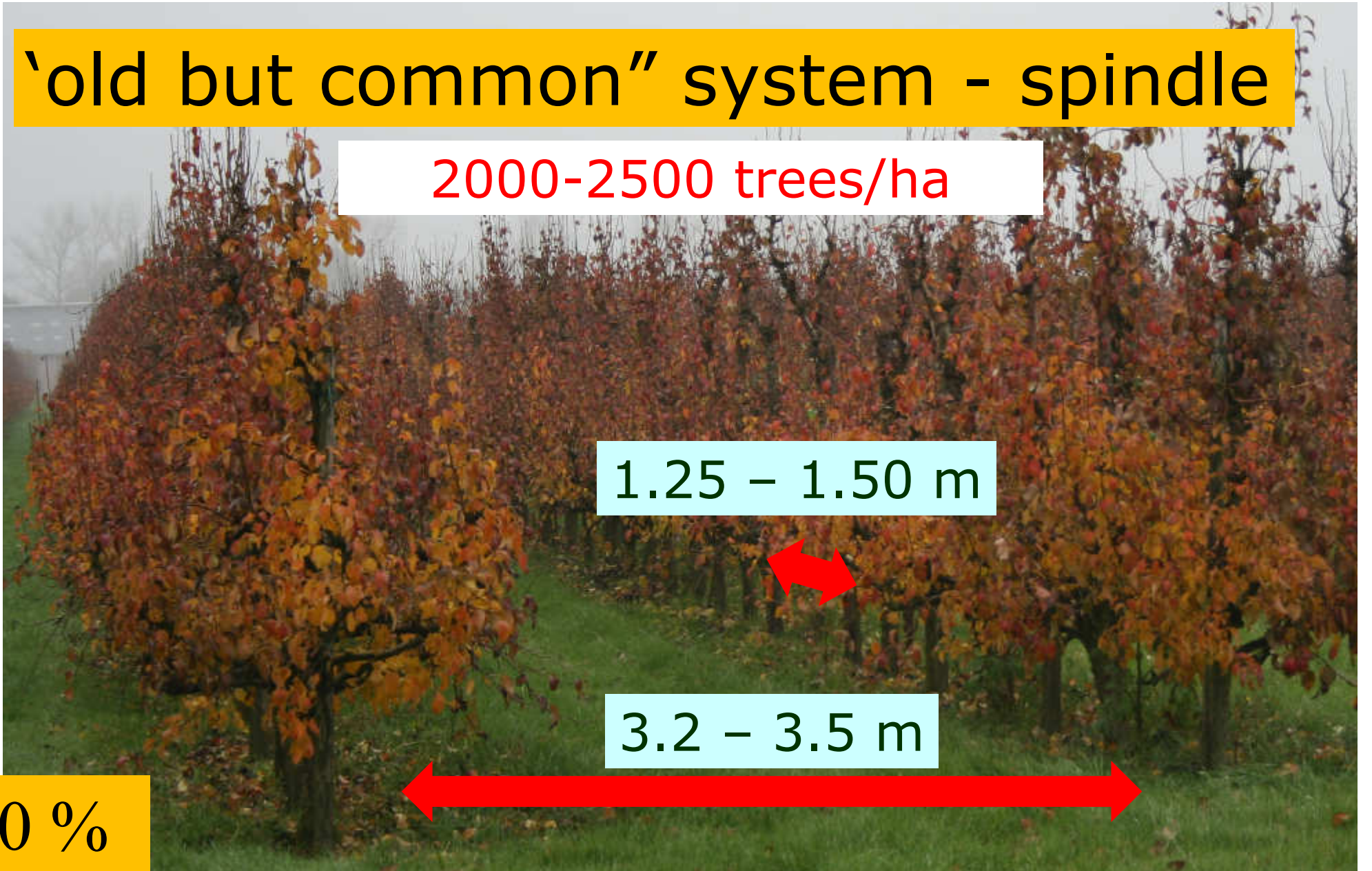
'old but common" system - spindle

2000-2500 trees/ha

1.25 - 1.50 m

3.2 - 3.5 m

10 %





Renewal of old systems by selecting only young branches and removal of old thick branches

10 %



'modern' – spindle 3,25 x 1,0 m

3125 trees/ha

2 wires to keep
branches up

young branches



25 %

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V-system

3125 trees/ha

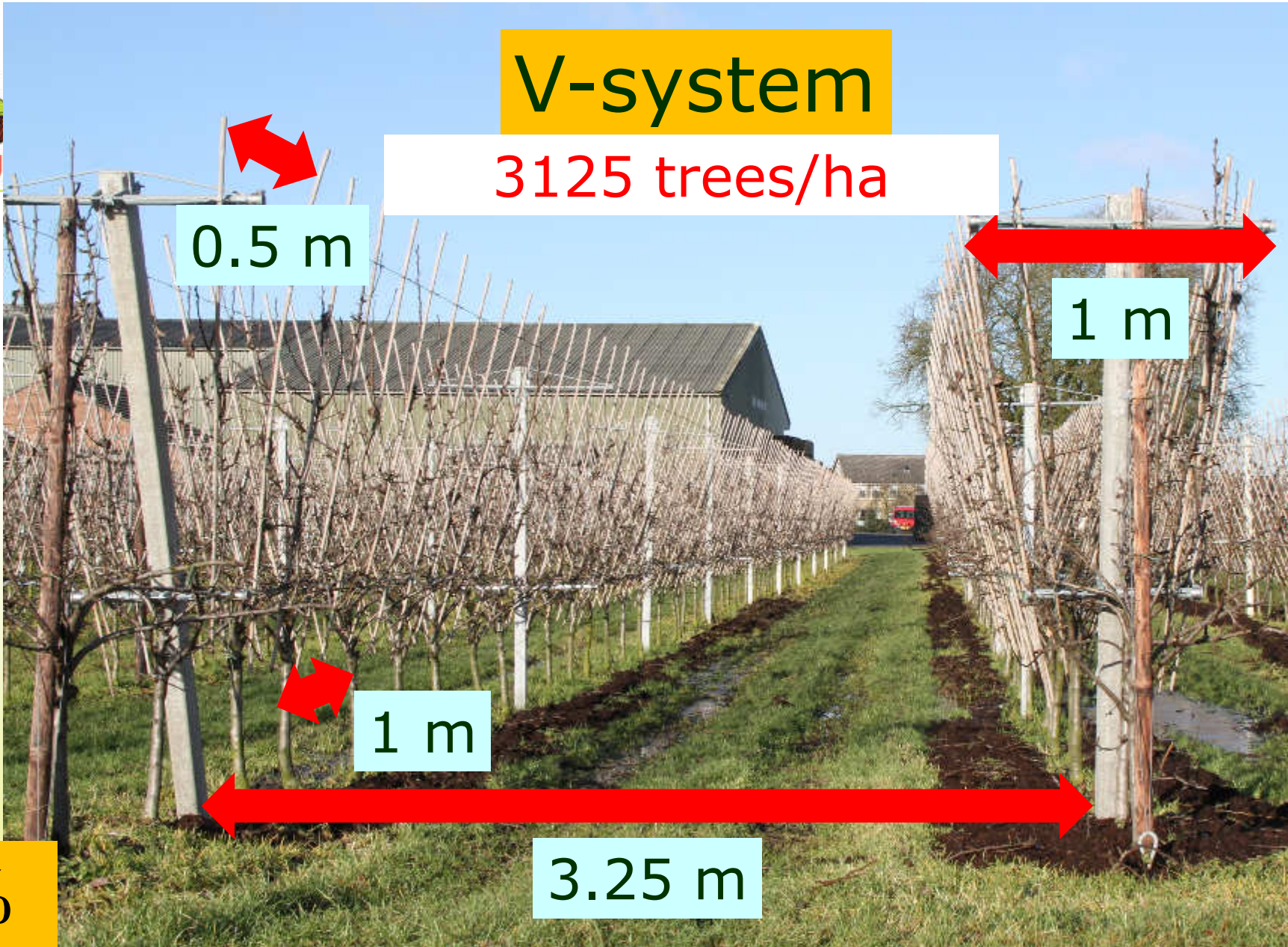
0.5 m

1 m

1 m

3.25 m

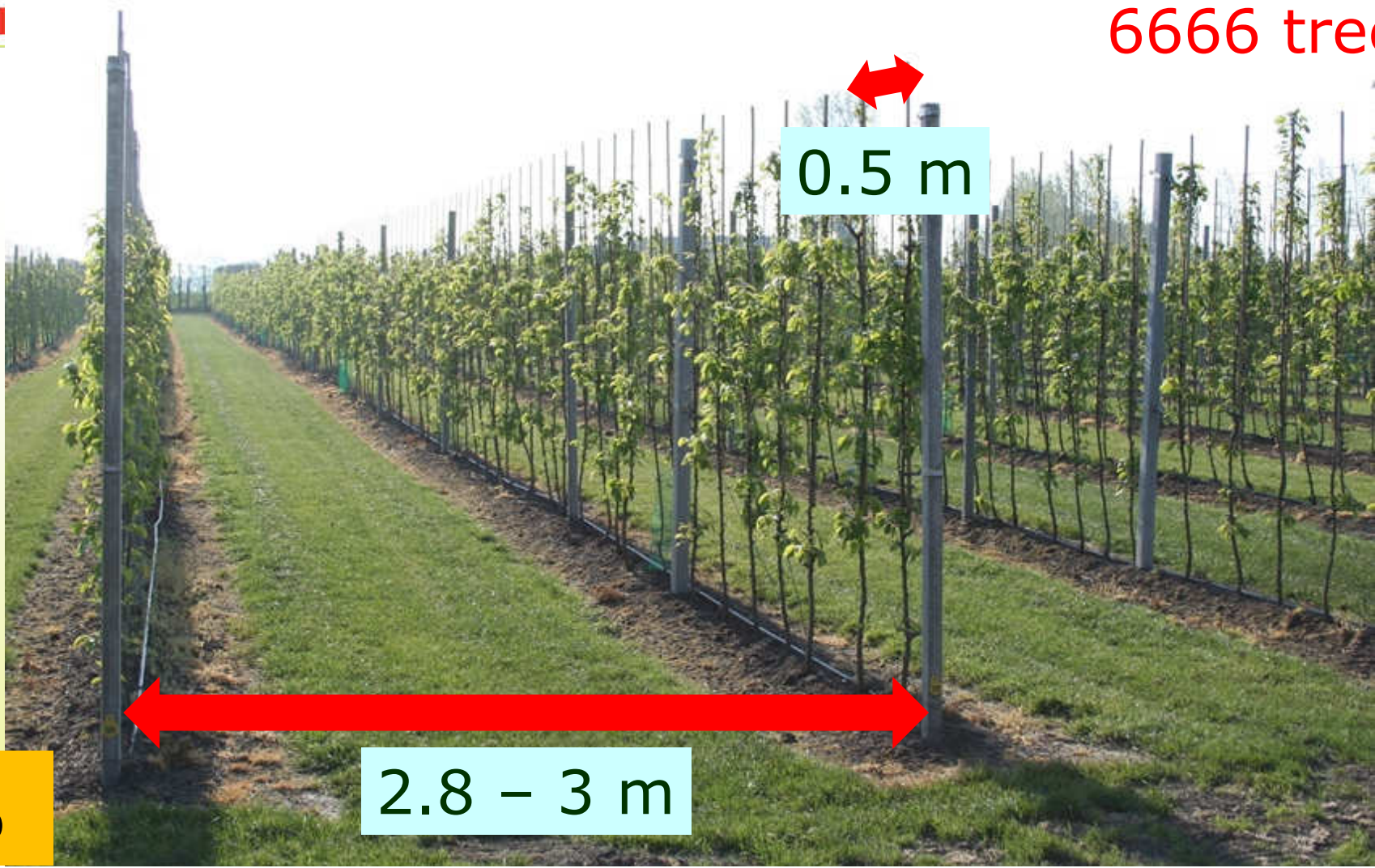
25 %





Super spindle

6666 trees/ha



0.5 m



2.8 - 3 m

10 %



2 leader system

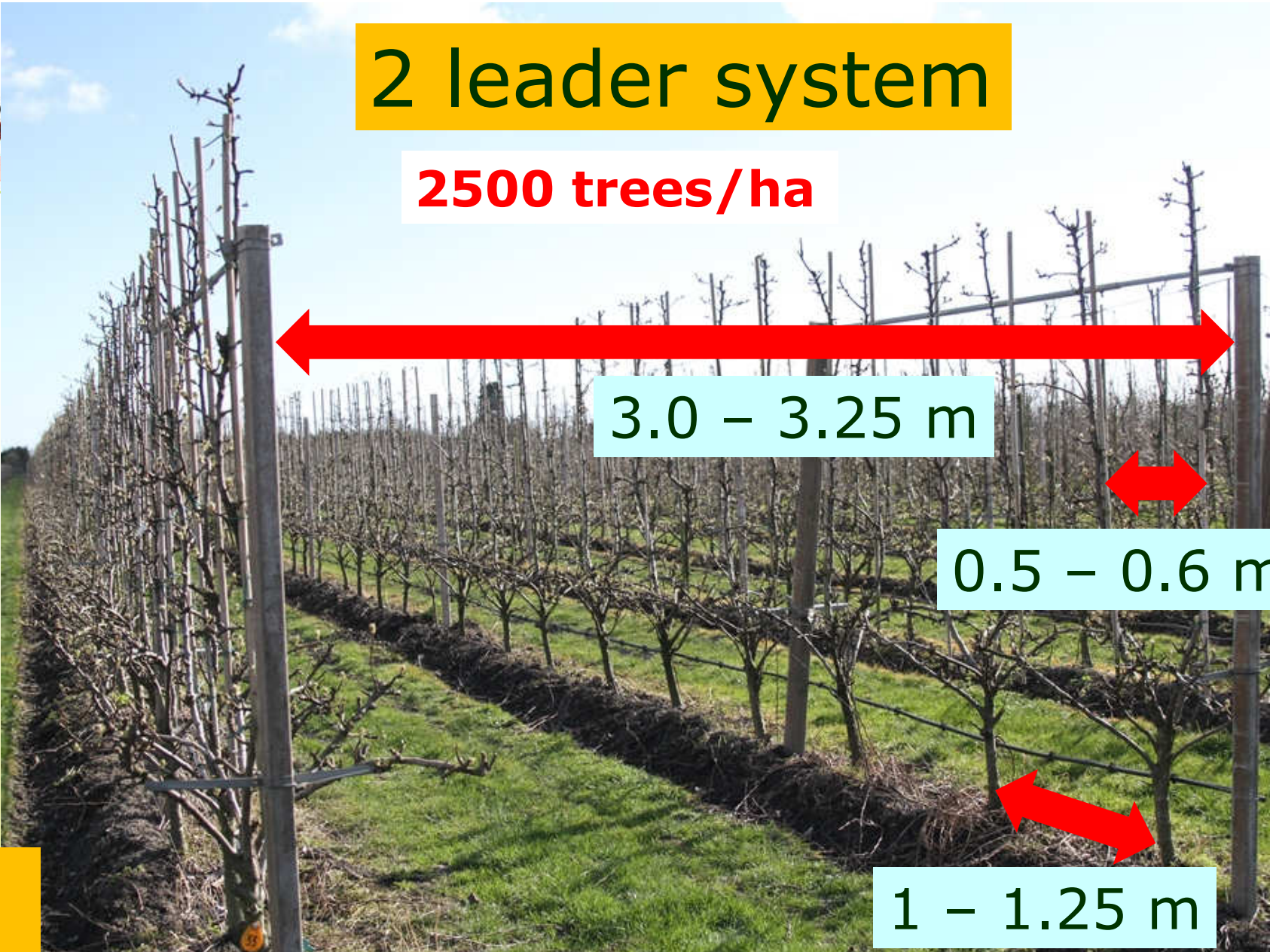
2500 trees/ha

3.0 – 3.25 m

0.5 – 0.6 m

1 – 1.25 m

10 %





REALISTIC PRODUCTIONS Conference

- Modern systems : 50-60 tons/ha
- V-systems : 70-80 tons/ha
- Avg NL : 40 tons/ha

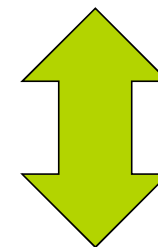
- Good modern system with good planting material can produce:
 - Planting year : 0
 - 2nd year : 25 tons / ha
 - 3rd year : 40 tons / ha
 - 4th year : 50 tons / ha
 -



Growth control is the key factor for stable and high productions



Regulex[®]
PLANT GROWTH REGULATOR



Brevis[®]
less is more...



SPRING FROST



QUALITY

LEAF-QUALITY



FERTIGATION





MAIN CHALLENGES - PEAR

- Pollination (Comice, Lucas, Migo) - > production ↓
- Russeting (frost, wind, sorting/packing, spraying programs)
- Limited Shelf life (Smartfresh)
- Crop protection major problems:
 - nr 1 : *Psylla Pyri*
 - Nr 2 : *Stemphylium vesicarium*

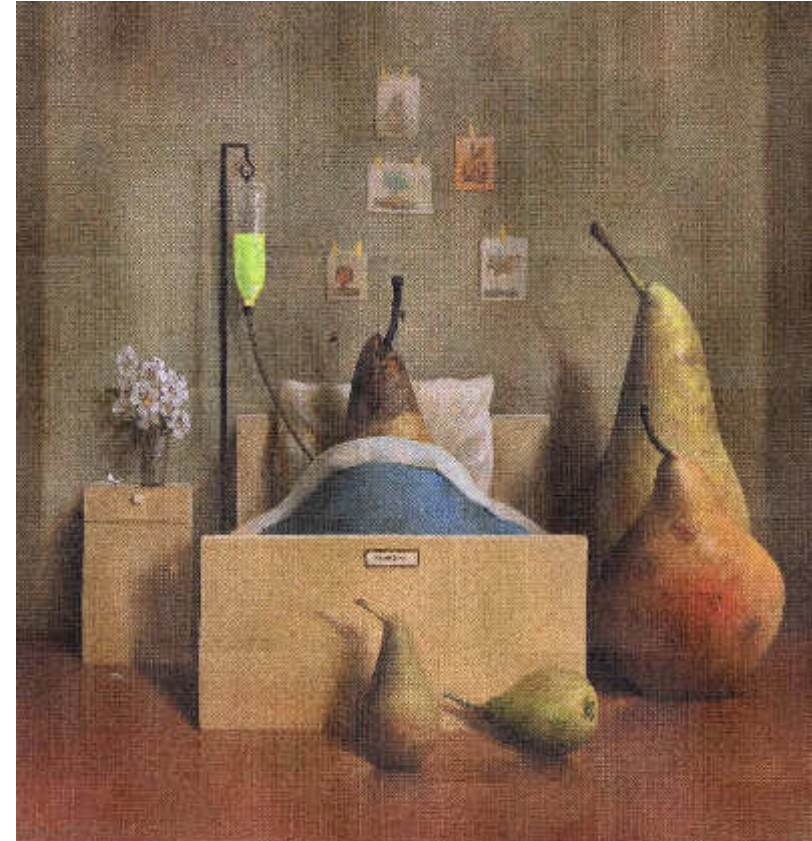




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MAIN CHALLENGES - PEAR

- Organic production: very hard because of production and scab
- Monoculture – Crop protection is weak point
- Despite our unique climate for growing very tasting and well-shaped Conference we are not able to use this unique sales power. The variety is free and growers stubborn. Price is under pressure.
- In 2013 50% of our production was sold to Russia





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DEVELOPMENTS

- Search for a bi color pear with a good taste (competition to Forelle)
- Better techniques for Smartfresh
- Artificial pollination on Comice, Migo
- Iron deficiency with HBED – chelates
- Year round delivey of Conference





THANK YOU FOR YOUR ATTENTION

More info ?

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