

SUFISA case studies on aquaculture

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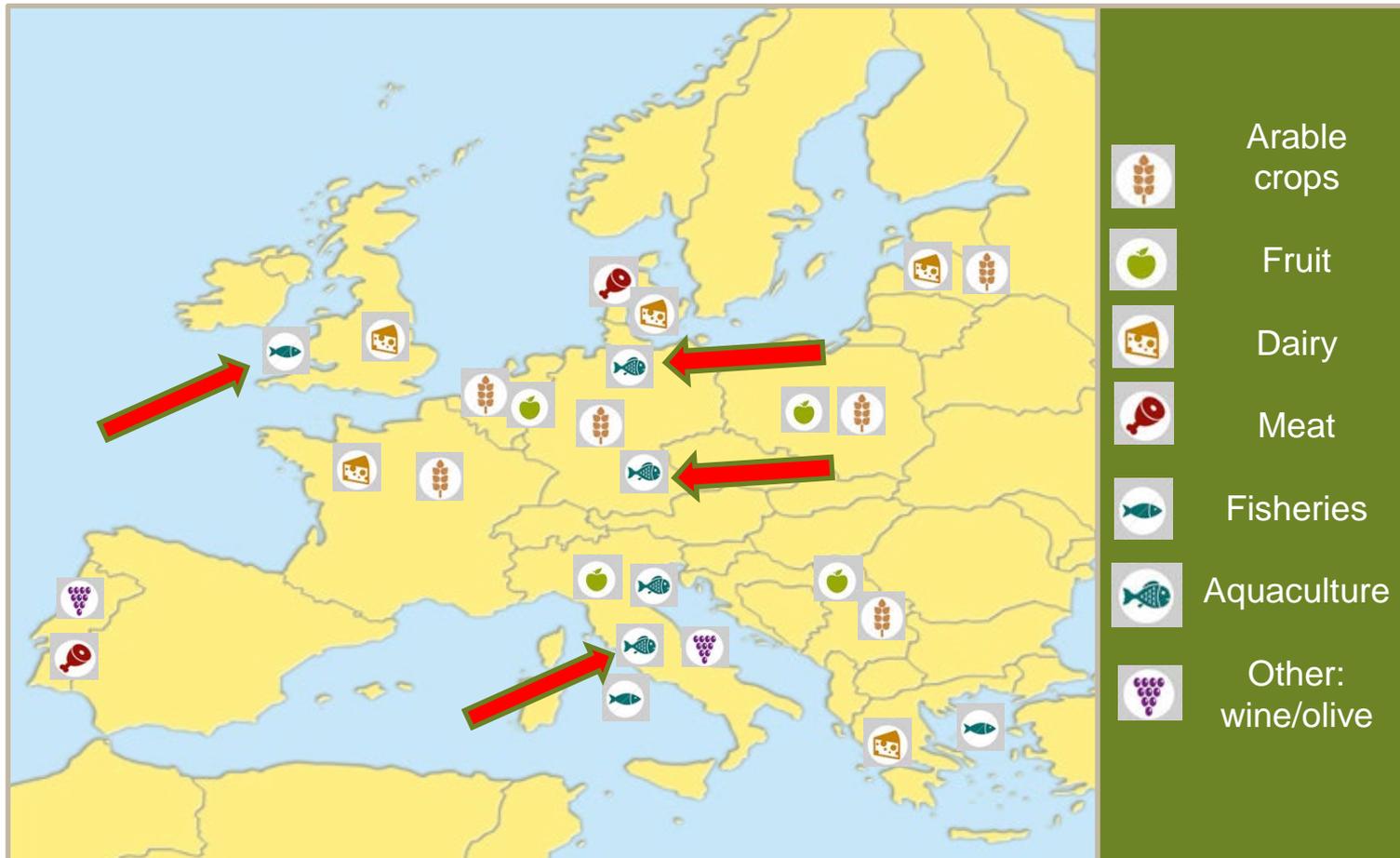
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Background

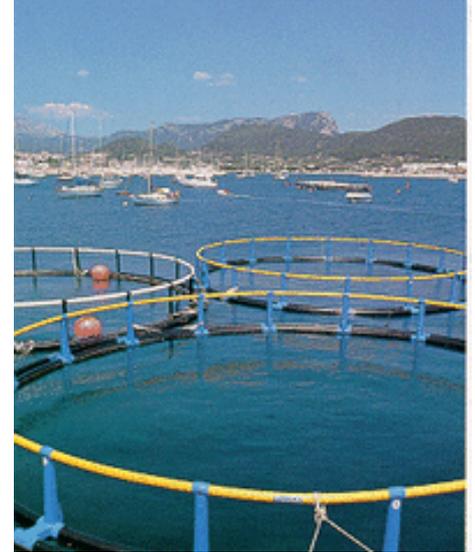
- The term aquaculture covers a variety of production systems:
 - Saline fish (seafood, algae) production – marine and onshore
 - Sweet water/inland fish production in natural ponds, artificial run-through ponds or in cold or warm water Recirculation Aquaculture Systems (RAS)
- Aquaculture is the global food industry's fastest growing sector.
- Approximately 90% of global aquaculture production is in Asia.
- There is a considerable scope to develop Europe's aquaculture.
- The European Commission and EU Member States aim to enhance aquaculture production throughout Europe.
- Aquaculture is likely to become increasingly important in light of global food security, the development of a more 'sustainable diet' and the achievement of the UN Sustainable Development Goals.

SUFISA aquaculture case studies



Key findings from Tuscany

- **Capital-intensive semi-industrial or industrial businesses**
- Supplying **supermarkets** and large wholesalers
- Strong **competition** from **low cost markets** (e.g. Greece)



Key findings (2)



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- Targeting **high quality standards** (high quality inputs and services for/in coordination with retailers)
- International standards (**ISO**), transnational **sustainability** certification (Friends of the Sea) or own **brands**
- Strong **vertical coordination (business to business)**
- **Administrative limitations** for expanding at sea



Major challenges

- **Renewal of marketing/coordination strategies vis-à-vis** international increasing low cost competition
- **Organic fish farming, now?** It was tested in Tuscany 10 years ago but the market did not respond.
- **Regional brand is not working well:** top down, ignoring value chain dynamics, less efficient than private labels.
- **Expanding ponds at sea?** Authorisations depend on state protection of natural sites; and uncertainty of local policies



Traditional carp farming – ponds in a row without flowing water



Own photo: Three ponds in the Aischgrund, Middle Franconia







Own photos: Mowing stripes in Natura 2000 area



Own photos: pond facilities

Keeping live carp after the harvest



Own photos: Tanks in the old times (Carp museum Neustadt) and today



**Karpfen Stammform/
Wildkarpfen**
Cyprinus carpio



Zucht-Karpfen als Spiegelkarpfen (Aischgründer)
Cyprinus carpio morpha noblis

Karpfenmuseum



Carp represents the regional identity of the Aisch valley



Own photos

Key findings - traditional carp farming in Frankonia

- Earthen carp ponds date back to the development of cloisters all over Europe, and represent high nature value ecosystems!
- In Frankonia, (agricultural) families farm their own carp ponds.
- Carp dishes are a local and seasonal speciality (Sept. - April)
- Farmers cooperate closely for water management in pond cooperatives.
- Some farmers cooperate with local gastronomy/regional tourism for fresh carp delivery. PGO: Aischgründer carp
- Many farmers sell fish to fish traders competing with Czech and Polish carp producers (low price sales).
- Regional and cultural identity: carp and pond landscape

Major challenges for carp farmers

- Predator birds cause the risk of significant losses (up to 60%)
- Low margins due to increasing costs and stagnating sales prices
- Natura-2000 payments are limited to a) the grassland/dykes around ponds, and b) small conservation areas.
No agri-environmental schemes for traditional carp farming, which farmers compared with traditional alpine dairy systems
- Younger generation will only take over engagement in the part-time business when carp farming is profitable.
- Values-based sales / marketing

Thank you!



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