

A STUDY OF SUBSISTENCE FARMING IN EASTERN EUROPE

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What is subsistence farming?

There is **no consensus definition** of subsistence farming. This has two main causes:

- Subsistence can be viewed from two different points of view:
 - **Consumption** → Share of food consumption from own production
 - **Production** → Share of total production kept for own consumption
- The share of own consumption/production can **range from 0-100%**
→ Where put the threshold for subsistence?

The most common approach is to look at subsistence from the **production side** and apply a threshold of **50%**. This means that:

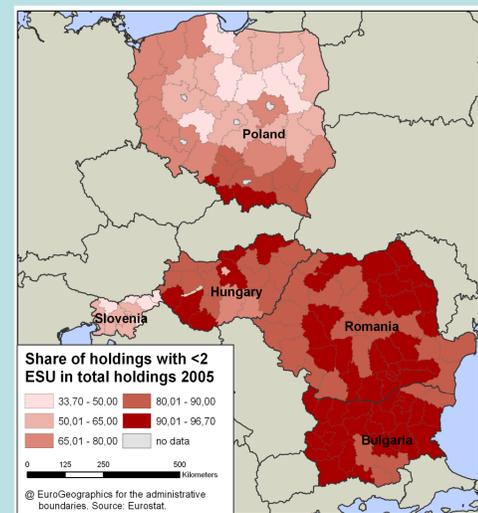
- Production *only* or *mainly* for own consumption = **Subsistence orientation**
- Production *mainly* or *only* for the market = **Commercial orientation**



Why is subsistence farming important in Europe?

Following the fall of the Iron Curtain, Central and Eastern European countries (CEE) entered the state of **transition**: *i.e.* the process of moving from a centrally planned economy to a free market. This process involved:

- **Land privatisation**
- **Migration** from urban to rural areas
- Creation of **small family farms**
- Farming as a **social buffer** during times of economic reforms and macro-economic instability
- Emergence of a **dual farm structure**, with small family farms and very large farms coexisting side by side.



1 ESU (European Size Unit) is a measure of the economic size of a farm business based on the gross margin imputed from standard coefficients for each commodity on the farm. 1 ESU roughly corresponds to either 1.3 hectares of cereals, 1 dairy cow or 25 ewes.



OBJECTIVES

- Understanding the **determining factors** for households:
 - Being **locked in** subsistence
 - Moving **out of subsistence** farming and **into commercial** agriculture
 - **Identify policy measures** to facilitate commercialisation of subsistence farmers



THEORETICAL FRAMEWORK

- **Utility maximising households**
- Subsistence households will **switch** to commercial orientation if $MU_c > MU_s$
where
 MU_c = marginal utility from commercial orientation
 MU_s = marginal utility from subsistence orientation



ASSUMPTIONS

- The **persistence of subsistence** farming is related to:
 - **Imperfect markets** for goods and factors, **remoteness** and **underdeveloped** market infrastructure ⇒ **High transactions costs** for market participation
 - **Risk** and **risk behaviour** are central for the decision of switching from subsistence to commercial orientation.



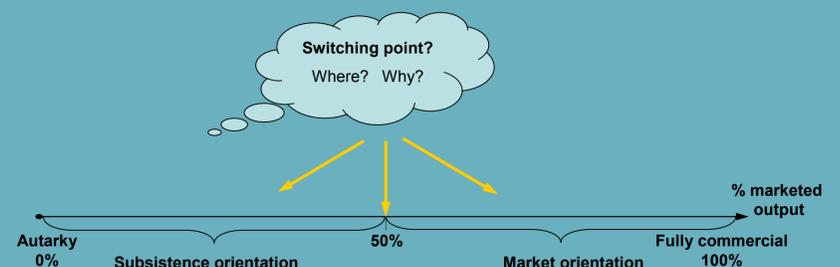
DATA

- Data collected within the framework of EU project **SCARLED** – Structural Change in Agriculture and Rural Livelihoods
- **Household survey** performed by local interviewers during winter 2007/2008
- 5 x 270 observations = **1350 observations** in total from **Bulgaria, Hungary, Poland, Romania** and **Slovenia**



HYPOTHESES & TESTING

- Under **perfect markets**, farm household **production** and **consumption decisions** are made **independently**
→ Production and consumption decisions can be modelled **separately**
- Under **market imperfections**, production decisions are influenced by household consumption characteristics
→ Production and consumption decisions are **nonseparable**
- **Commercial orientation** = **Separable** behaviour
- **Subsistence orientation** = **Nonseparable** behaviour



- ⇒ **Separability tests** will be applied to detect the presence of market failures and permit clustering of households according to their behaviour: **separable** or **nonseparable**
- ⇒ For **empirical analysis**, a model for household behaviour that accounts for **transactions costs** and/or **risk behaviour** will be applied
- ⇒ **Statistical** and **econometric testing** with cross-sectional data. Depending on the outcome of the data collection, possible testing with pooled cross-section and panel data.
- ⇒ Possible **case studies**