

**PRIN: RESEARCH PROJECTS OF RELEVANT NATIONAL INTEREST – Call 2020**  
**Prot. 20205L79R8**

# **“Towards a holistic approach to Sustainable Risk management in agriculture” Sus-Risk**



**Policy Brief: factors affecting risk management choices**

**Deliverable D3.5**

Document Title	Policy Brief	Author	
Document type	Deliverable D3.5	Due date	1/6/2024
First issue		Ref.	
Dissemination level	Internal	Revised	

PROJECT	Towards a holistic approach to sustainable risk management in agriculture	Prot.	.....
Call identifier	PRIN: RESEARCH PROJECTS OF RELEVANT NATIONAL INTEREST – 2020 Call for proposals Prot. 20205L79R8		
Work Package			
WP n°		Lead beneficiary:	
Coordinator			
Project Manager	...		
Project Start date	...		
Project Duration	36 month		

### ***ABSTRACT FOR POLICY BRIEF***

**Authors:** Elisa Giampietri, Alice Stiletto, Samuele Trestini

#### **D3.5 Factors affecting risk management choices**

**Background.** Farmers make decisions in a context of uncertainty, depending on many factors such as extreme weather and climate events, diseases and pests, policy and market changes (Iyer et al., 2020). Uncertainty and risk constrain the rationality of their decisions.

**Topic.** The literature highlights the importance of several factors in influencing farmers' risk management (RM) decisions, such as behavioural factors (e.g. attitudes towards risk and uncertainty, time preferences, loss aversion), risk perceptions, personality traits (e.g. self-efficacy, locus of control), subjective probabilities, trust, etc (Giampietri et al., 2020; Wuepper et al., 2023).

**Objectives.** This policy brief aims to investigate the determinants of farmers' choices about adopting available or innovative RM tools at the farm level such as index-based insurance instruments and mutual funds.

**Main findings.** In order to provide a comprehensive analysis of the impact of the relevant determinants, the analysis focuses on the simultaneous effect of relevant factors using a framework that is rarely employed in this line of research, namely the Unified Theory of Acceptance and Use of Technology (UTAUT) proposed by Venkatesh et al. (2003). Another noteworthy innovation is the combination of primary data collected on large samples with secondary data from the FADN and ISTAT.

**Policy implications.** The results provide important contributions to the advancement of risk management research. Moreover, they can assist insurance companies and other risk management

stakeholders and policy makers in the development of more tailored RM tools that align with the needs of farmers and provide them with key insights on how to encourage farmers to use RM tools.

## References

- Giampietri, E., Yu, X., & Trestini, S. (2020). The role of trust and perceived barriers on farmer's intention to adopt risk management tools. *Bio-Based and Applied Economics Journal*, 9(1), 1-24.
- Iyer, P., Bozzola, M., Hirsch, S., Meraner, M., & Finger, R. (2020). Measuring farmer risk preferences in Europe: a systematic review. *Journal of Agricultural Economics*, 71(1), 3-26.
- Venkatesh, V., Morris, M. G., Davis, G. B., & Davis, F. D. (2003). User acceptance of information technology: Toward a unified view. *MIS quarterly*, 425-478.
- Wuepper, D., Bukchin-Peles, S., Just, D., & Zilberman, D. (2023). Behavioral agricultural economics. *Applied Economic Perspectives and Policy*, 45(4), 2094-2105.