



# Quality Assurance of the Re-coding to NACE Rev. 2.1, Combining Model and Manual Coding

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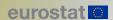
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# Outline

- Background
- Coding methods
- Quality assurance
- Discussion



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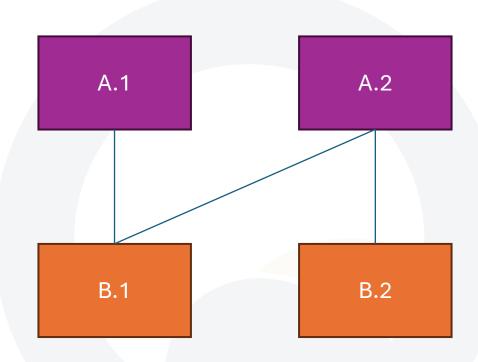


# Background

NACE is a European classification of economic activity for statistical purposes

Eurostat provides a mapping between NACE Rev. 2.0 and NACE Rev. 2.1

Re-coding is problematic for one-tomany cases i.e.,  $A.2 \Rightarrow (B.1, B.2)$ 









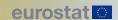
# Coding methods

Because of budget restrictions we suggest to use more automatic coding methods

#### Suggested methods:

- 1. Coding using a key
- 2. Large Language Models (LLM)
- 3. Imputation e.g. with ML
- 4. Manual coding







# **Quality Assurance Methods**

Main goal is to effectively allocate the resources

#### Measurement methods

- 1. Model inference
- 2. Design inference

#### Improvements

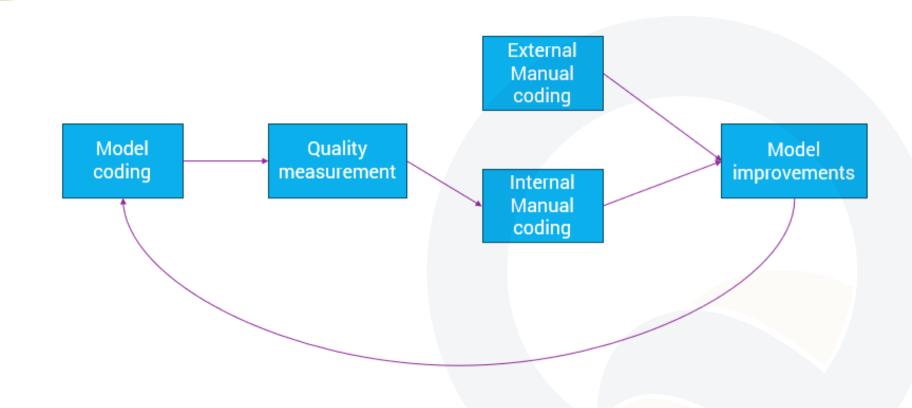
- 1. Manual coding supported by models
- 2. Re-use of manually coded data







## Quality assurance process

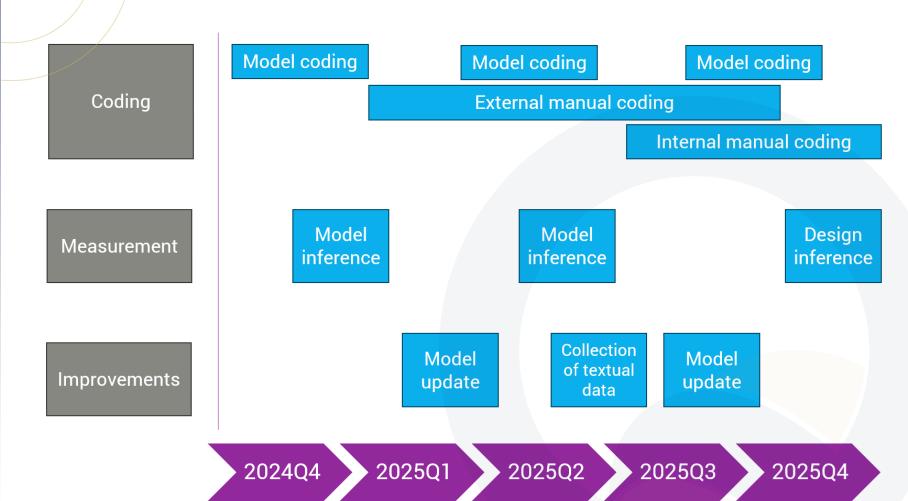


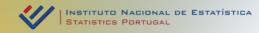


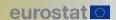
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### **Timeline**







### Discussion

- Risk of transferring cost
- Quality in the coding is dependent of quality in data, coding methods and priority system
- Relate the uncertainty from the re-coding to the total uncertainty



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