

UNIVERSITÄT
DUISBURG
ESSEN

Open-Minded

Implementing Adaptive Mentoring for Novice Teachers at Disadvantaged Schools in Seven Education Systems

First results from the project “Novice Educator Support and Training” (NEST)

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Co-funded by
the European Union

The NEST project

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- **Idea: Teachers at disadvantaged schools face common challenges and need specific competences**

Context: the NEST project

- Co-funded by the EU as an Erasmus+ *Key Action 3 Policy Experimentation*
- Common Challenge: High attrition rates of novice teachers at schools in disadvantaged areas.
- Idea: Teachers at disadvantaged schools face common challenges and need specific competences
- **Solution: developing a scalable adaptive mentor training that can be used to reduce attrition rates at disadvantaged schools across Europe**

Indicators used for disadvantaged schools in international research

- Input criteria
 - SES of students (Pàmies Rovira et al., 2016)
 - Type of area (rural vs. urban) (McCoy et al., 2014)
 - Employment rates (Hall et al., 2020)
 - Educational level of parents (Kyriakides et al., 2019)
- Output criteria
 - Low educational achievement (Martínez, 2014)
 - Proportion of students qualifying for entering high school (Hall et al. 2020)

5 Dimensions used to define disadvantaged schools

- Economical situation
- Migration and language
- Family educational and professional background
- School characteristics
- Individual student characteristics

Dimensions used to establish disadvantaged schools

- Economical situation

Economical indicator	Education systems	Total
Family/household income	Austria, Bulgaria, Madrid, Wallonia	4
Employment status	Bulgaria, Wallonia	2
Receiving social assistance/benefits	Wallonia	1
School allowance	Flanders	1
Socio-economic level	Madrid	1

Dimensions used to establish disadvantaged schools

- Migration and language

Migration/language indicator	Education systems	Total
Language spoken at home/language proficiency	Austria, Catalonia, Flanders	3
Migration background	Austria, Catalonia,	2

- Family educational and professional background

Educational/professional indicator	Education systems	Total
Level of education (parents or mother)	Austria, Bulgaria, Catalonia, Flanders, Wallonia	5
Type of employment	Catalonia, Madrid, Wallonia	3

Dimensions used to establish disadvantaged schools

- School characteristics

School indicator	Education systems	Total
Average mark of students in national assessment (output indicator)	Austria, Bulgaria, Romania	3
Untrained teachers within school district	Romania	1
Percentage of students who drop out of school (output indicator)	Romania	1
Size and remoteness of the school	Bulgaria	1

- Individual student characteristics

Individual student indicator	Education systems	Total
Students with special educational needs (SEN)	Catalonia	1
Students who have been in prison	Madrid	1
Educational delay in neighbourhood of the individual student	Flanders	1

Reacting to the situation of novice teachers at disadvantaged schools with mentoring

Novice teachers face common challenges

→ Teacher needs

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→ to the specific needs of the novice teachers.

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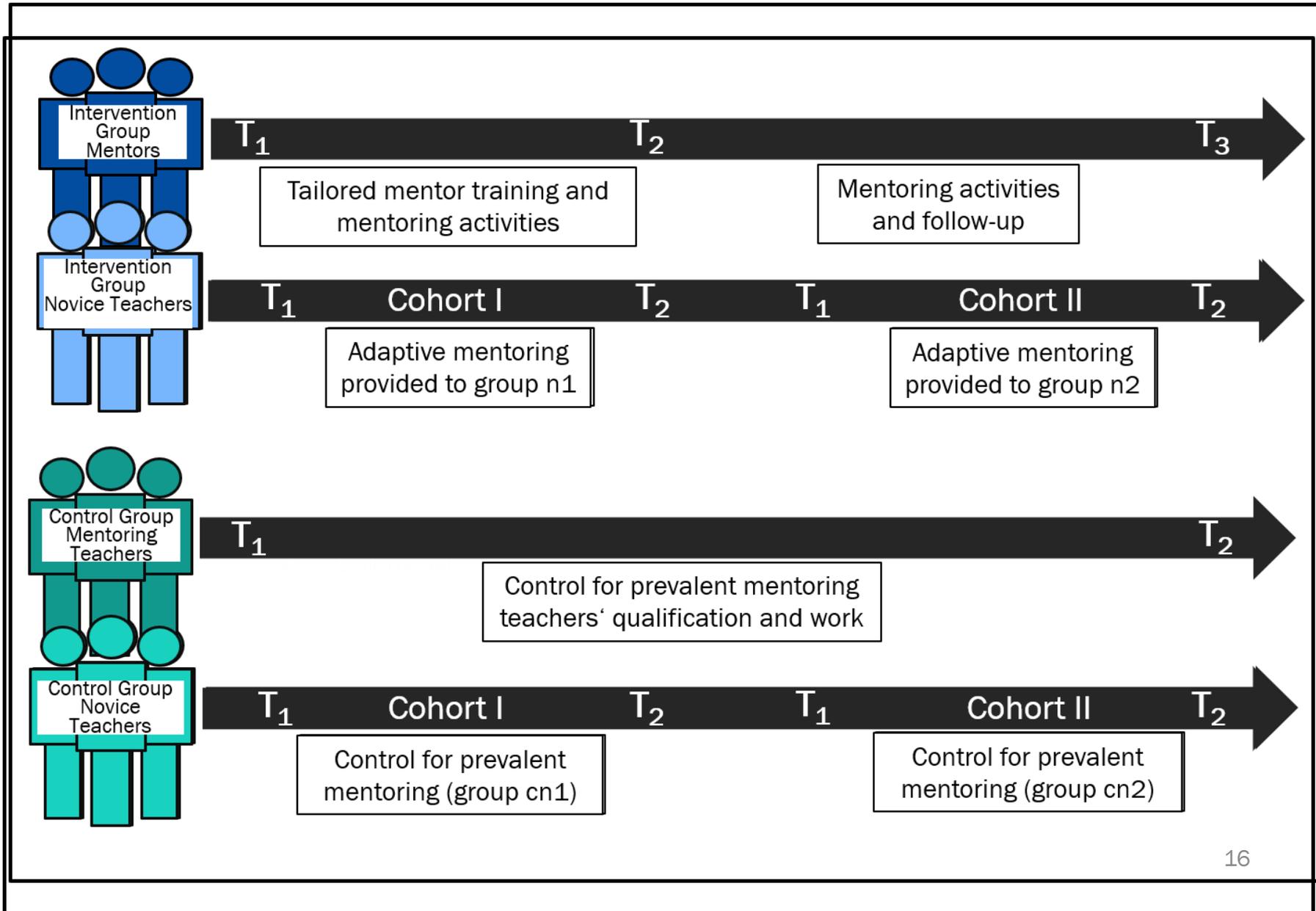
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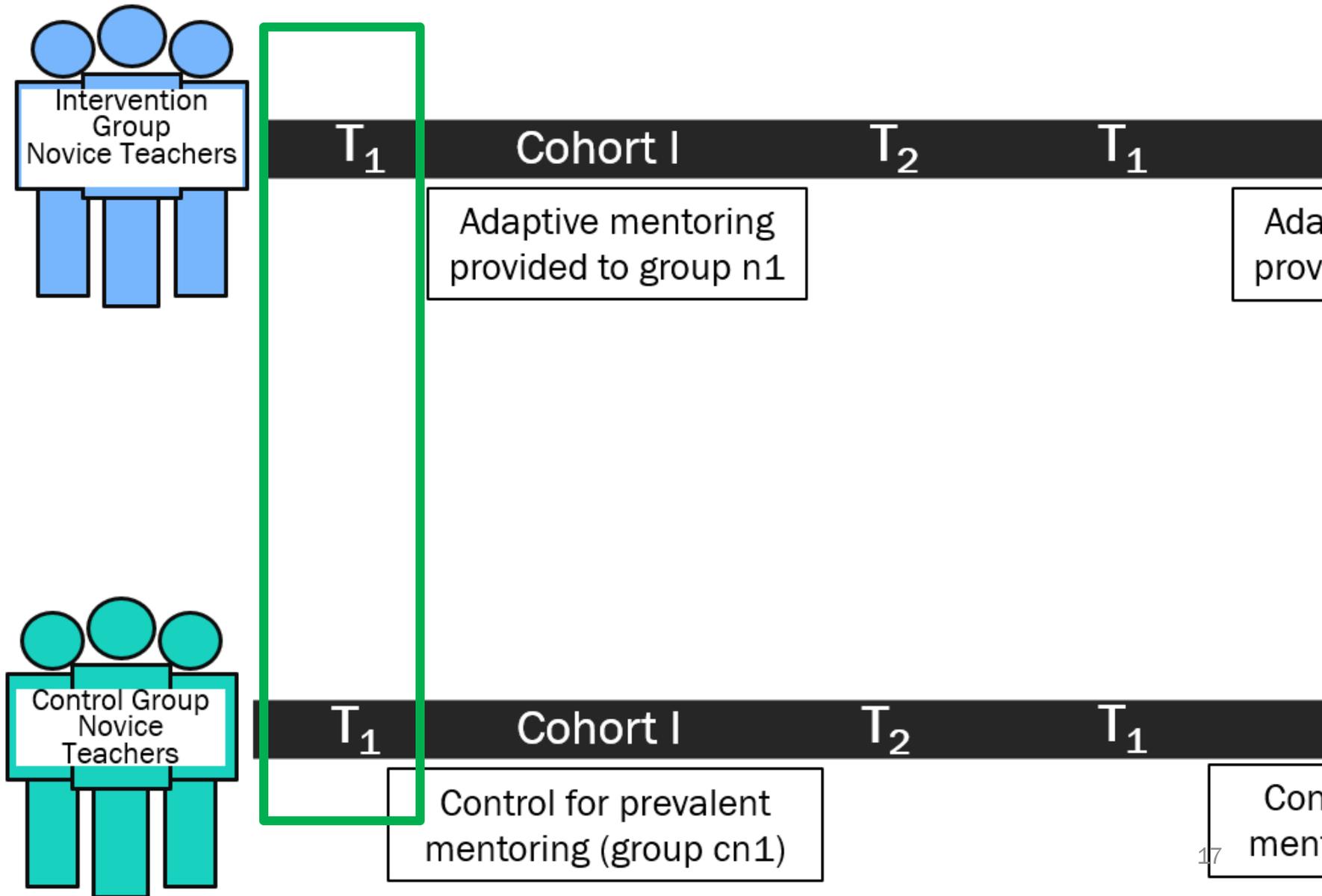
→ to the specific challenges of the disadvantaged school

→ in the context of their education system

Design of the NEST project



Design of the NEST project



NEST sample of novice teachers

Education System	N	
	Intervention Group	Control Group
Austria	13	13
Bulgaria	171	243
Catalonia	97	109
Flanders	50	29
Madrid	102	129
Romania	89	83
Wallonia	66	138

High teacher needs in all education systems

- 16 items on teacher needs(self-developed)
- 4-point scale (strongly disagree - strongly agree)

Education System	Range of Means	
	Intervention Group	Control Group
Austria	2.50-3.33	2.31-3.15
Bulgaria	2.56-3.27	2.58-3.20
Catalonia	2.82-3.36	2.96-3.39
Madrid	2.96-3.28	2.98-3.56
Romania	2.86-3.50	2.90-3.38
Flanders	2.46-3.08	2.41-3.24
Wallonia	2.14-3.09	2.20-3.14

Highest ranked teacher needs across education systems

Teacher Need	Education System
I would like more support on how to motivate my students.	All education systems
I would like more strategies on how to raise self-confidence and ambitions in students.	Bulgaria, Flanders, Wallonia, Madrid, Romania, Austria
I would like more information on how I can introduce learning strategies in the classroom.	Flanders, Wallonia, Catalonia, Madrid, Romania, Austria
I would like more opportunities to share best practice with other teachers.	All education systems
I would like more opportunities to share experiences about situations of conflict with others.	Bulgaria, Flanders, Wallonia, Catalonia, Madrid, Austria

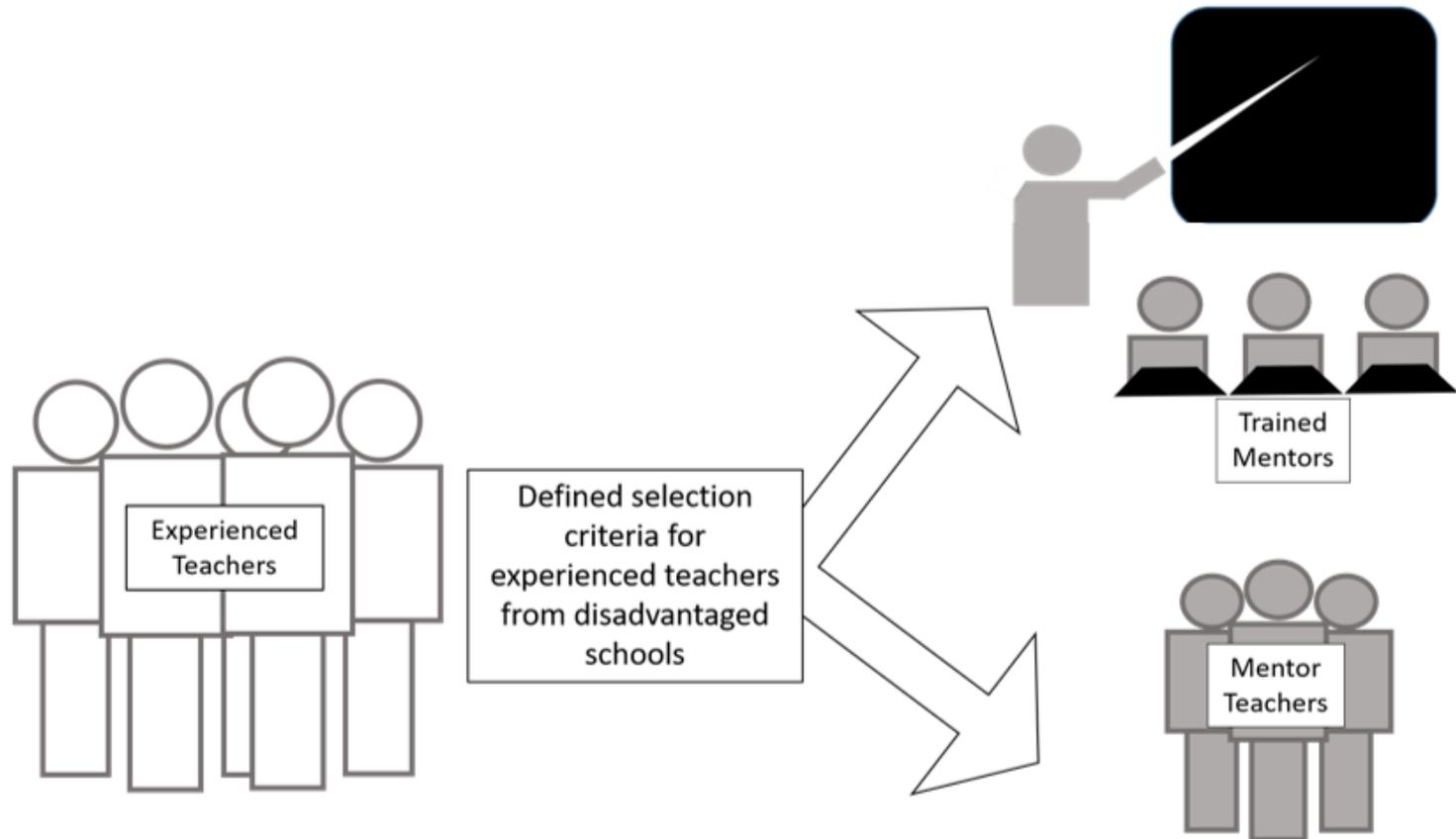
The NEST adaptive mentor training

Three types of adaptivity:

1. Mentor selection
2. Adaptive mentoring approach
3. Adapting to different challenges of disadvantaged schools

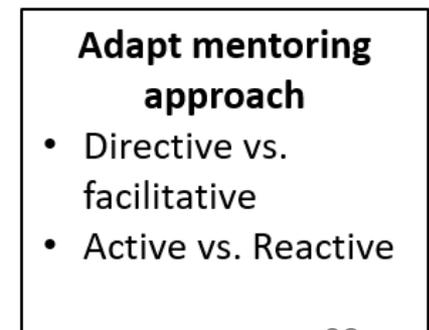
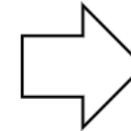
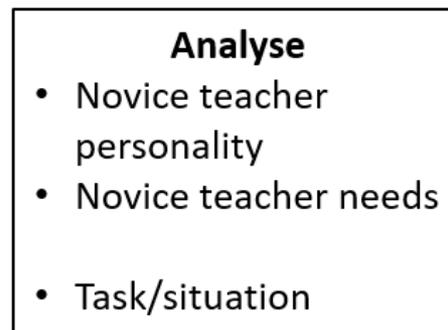
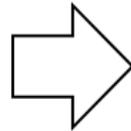
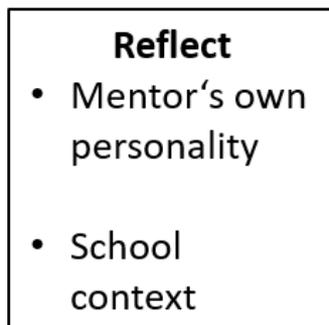
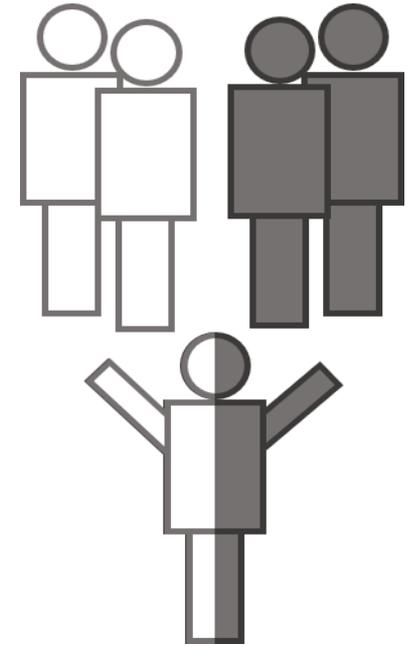
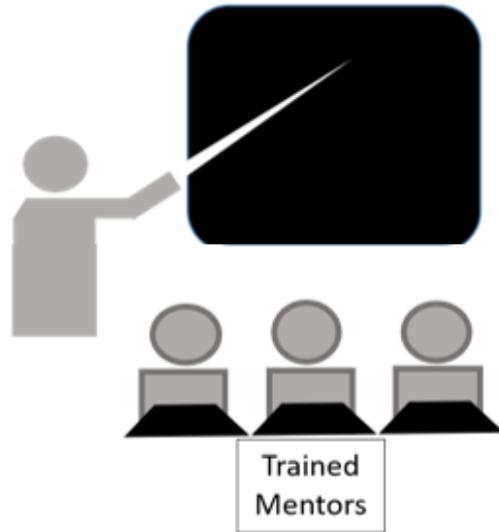
Type 1: Adaptive Mentors

Selection of mentors, who are adaptive within the context of disadvantaged schools



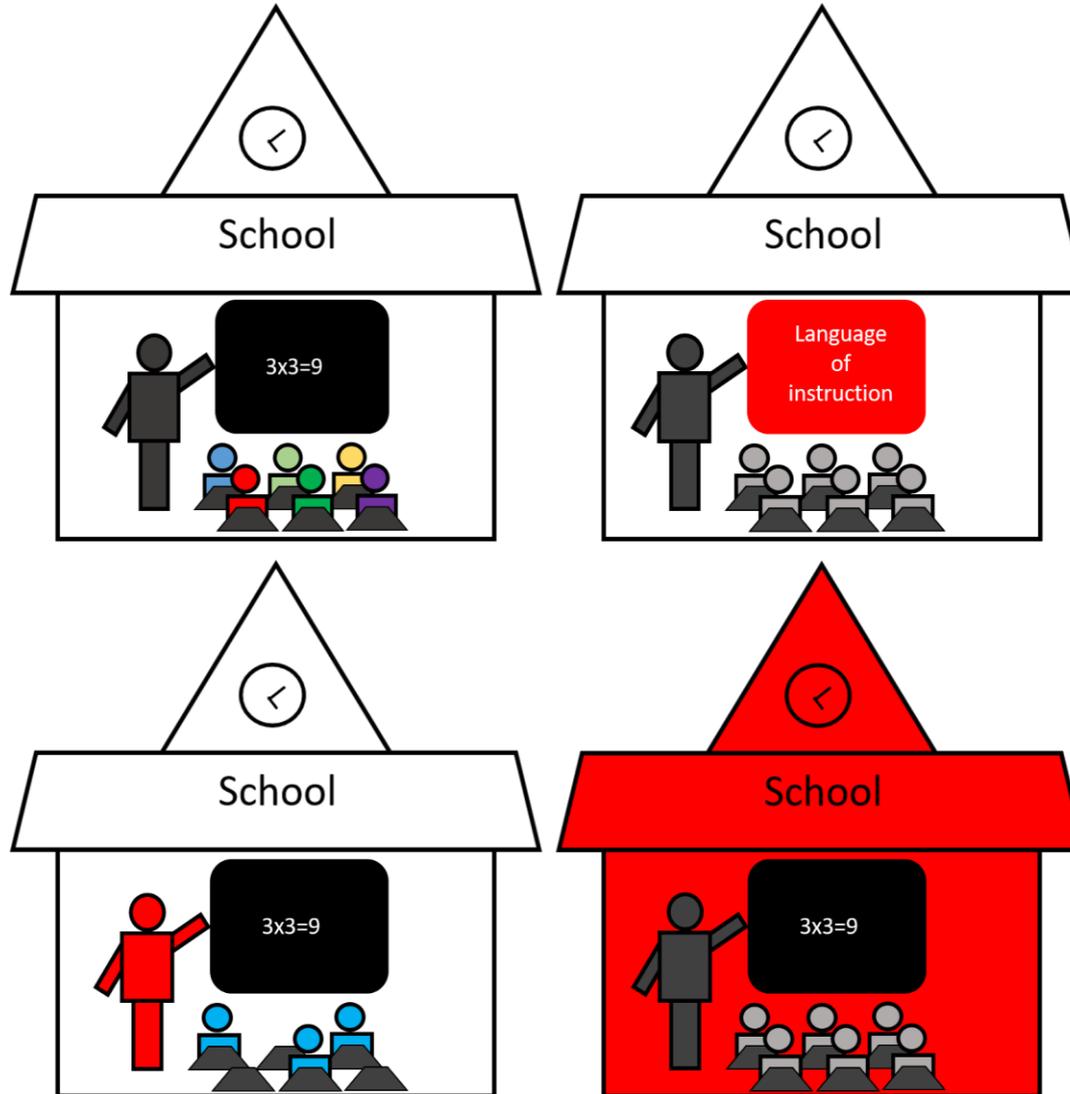
Type 2: Adaptive mentoring approach

Mentoring approach adapts to specific teacher needs and personalities



Type 3: Adaptive to challenges

Adaptation to different challenges within disadvantaged schools



Conclusion

- Education systems use a broad variety of indicators to select disadvantaged schools

Conclusion

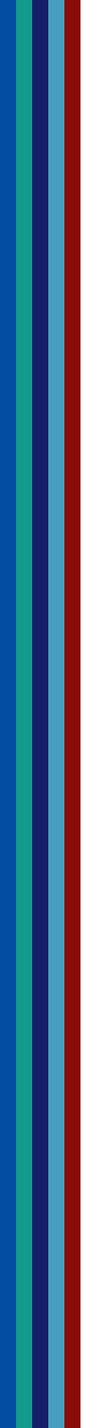
- Education systems use a broad variety of indicators to select disadvantaged schools
- **Novice teachers at disadvantaged schools are in need of additional support**
 - some of those novice teachers needs are quite similar across the different education system, yet there are also some differences.

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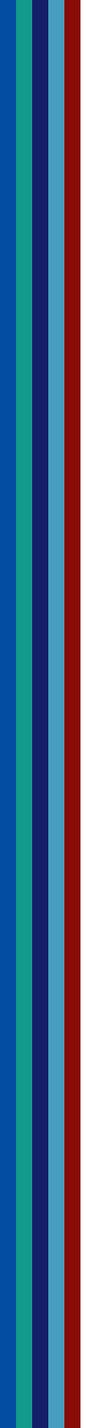
- Education systems use a broad variety of indicators to select disadvantaged schools
- Novice teachers at disadvantaged schools are in need of additional support
 - some of those novice teachers needs are quite similar across the different education system, yet there are also some differences.
- **Adaptive NEST mentor training is a good solution**
 - **As mentors are trained to adapt their mentoring to the specific needs of mentees working at disadvantaged schools**
 - **As it promises to be a scalable solution for different European countries.**

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Annex



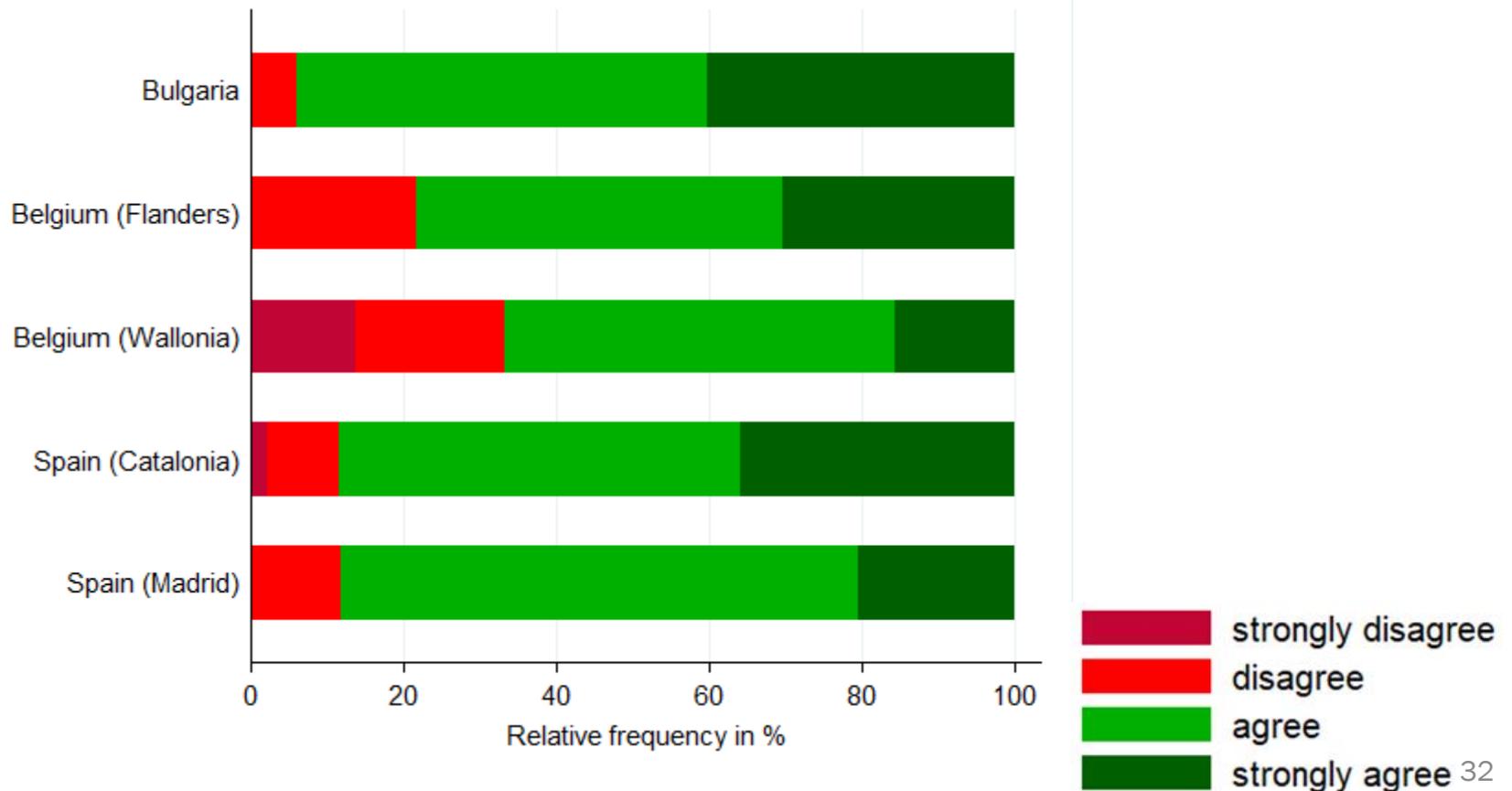
Adaptable Adaptability instead of adaptive

Structure of NEST adaptive mentor training

First trimester	Module 1	What is mentoring and why do we mentor I?
	Module 2	Why we mentor II and tools
Second trimester	Module 3	Coaching questions I
	Module 4	Coaching questions and techniques II
Third trimester	Module 5	Coaching questions and techniques III

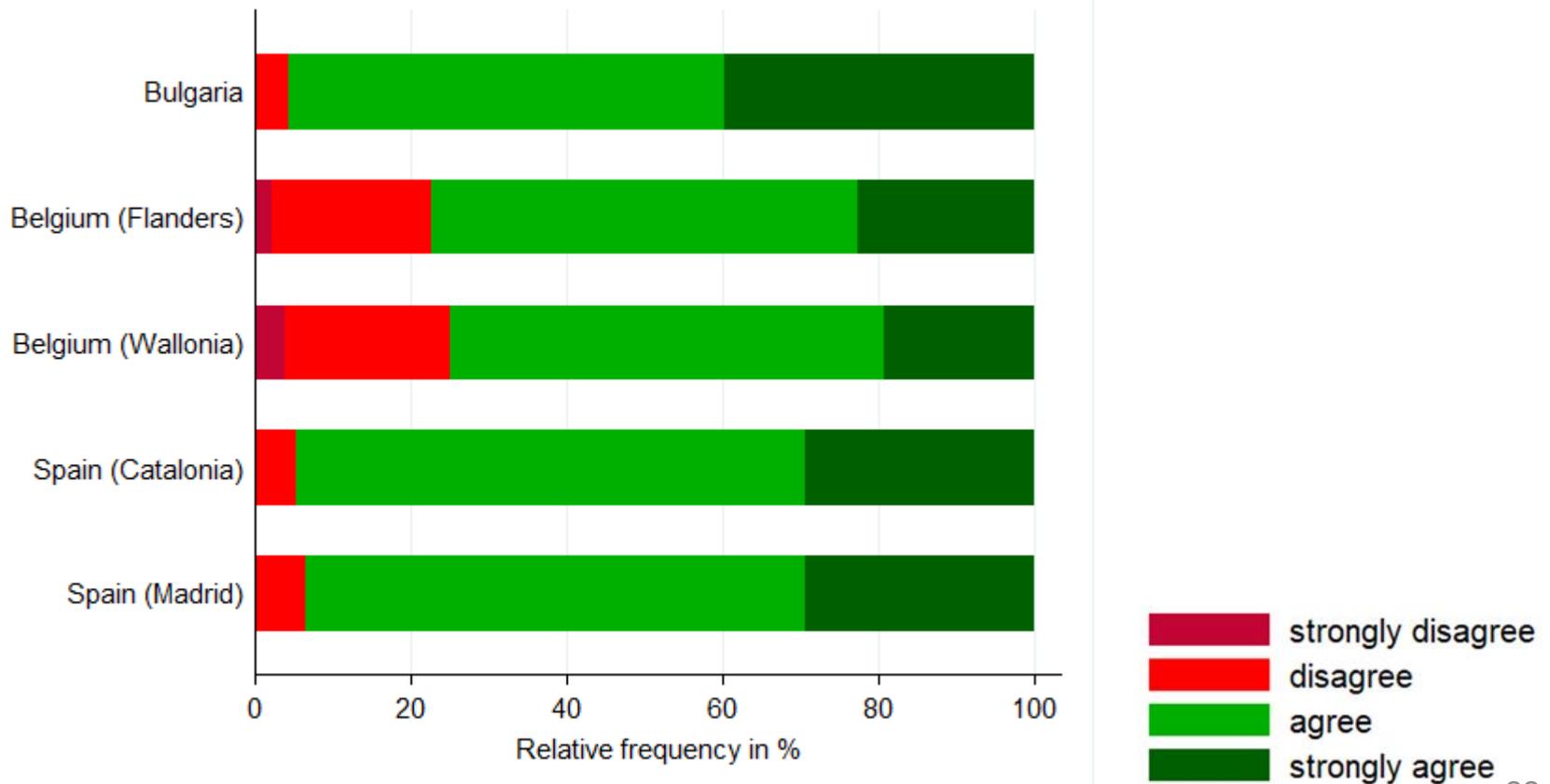
Need for teaching support

I would like more examples on how to improve students' language competences



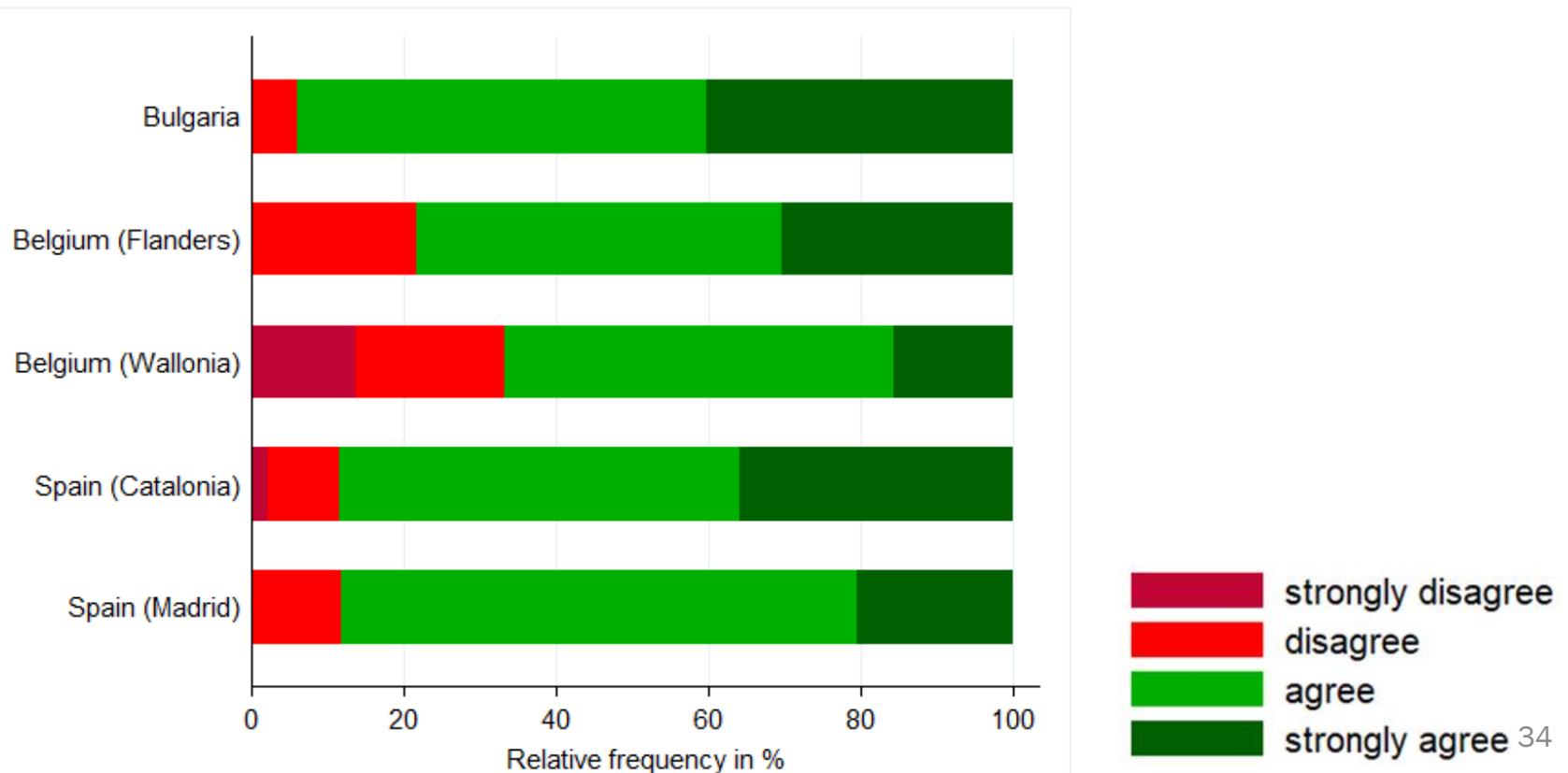
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I would like more information on how I can introduce learning strategies in the classroom.



Need for teaching support

I would like more support on how to motivate my students.



How to Select Participants for Control and Intervention groups?

Common/shared selection criteria for experienced teachers

1. Currently working as mentors
2. Working at disadvantaged schools
3. Same ISCED level
4. Teaching experience



Trained
Mentors

Distinct selection
criteria for intervention
group

Positive personality
traits (openness,
self-reflectiveness,
etc.)

Distinct selection
criteria for control
group

Working at
different school
than
intervention
group mentors



Mentoring
Teachers