

# Student teachers, ICT and cyber ethics across four European countries





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## Background

- Wide use of ICT within school and outside of school
- Consumption/entertainment vs. productive
  use
- Increased need for ethical and safe use
- Understanding of privacy rights and copyright issues



# The Professional Digital Competence (PDC) framework in teacher education

- Generic digital competence
- Subject specific digital competence
- Profession related digital competence



### **Cyber ethics - part of PDC**



https://www.udir.no/globalassets/filer/in-english/pfdk\_framework\_en\_low2.pdf



## Methods and empirical data

- 1494 first year student teachers in Ireland, Norway and Spain (Malta)
- Pilot survey on Professional digital competence and cyber ethics
- Autumn 2017



## To aspects of cyber ethics

Perceived competence

I know how to use

- Practice
  - When I search for information on the internet for study purposes...

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#### I know how to:

- apply copyright rules
- protect my privacy online
- apply privacy rules
- detect cyber bullying and online harassment
- deal with cyber bullying and online harassment
- evaluate the credibility of digital information

#### When I search for information on the internet for study purposes...:

- I cite the source in order to ensure that the original source is accredited
- I check the source behind the information
- I am concerned about the reliability of the information
- I check that content is not sponsored
- I use social media as sources for information

Strongly disagree / disagree / agree / strongly agree



## Findings

- Confirmatory factor analysis of the cyber ethics framework in all the participating universities (separately) is supported
- Cyber ethics as a phenomena can be identified in all the teacher education programmes





## Findings cont.

- Comparing means (spss) and comparing cyber ethic latent models (mplus) indicate similarities between the two Norwegian universities
  - Data from the two Norwegian universities are merged
- Comparing means (spss) indicate differences between
  - University of Malta and the other universities



## Findings cont.

- Comparing means (spss) and comparing cyber ethic latent models (mplus) indicate differences between
  - University of Valencia and the Norwegian universities
  - University of Valencia and the University of Limerick
  - University of Limerick and the Norwegian universities



## Implications of findings

- There are challenges regarding cultural differences with regards to:
  - access to ICT
  - use of ICT
  - curriculum
- Cultural comparison is challenging because of
  - different understanding of the items
  - different understanding of response options



### Limitations and future research

- The need to organize independent backtranslation
- The challenge to create a one-size fits all model
- Next step to conduct in-depth interviews with the student teachers from all the participating universities





## References

- Eurydice (2011). *Key Data on Learning and Innovation through ICT at School in Europe.* Brussels: EACEA.
- Gudmundsdottir, G.B. and Hatlevik, O.E. (2018). Newly qualified teachers' professional digital competence: implications for teacher education. *European journal of teacher education* 41(2), 214-231.
- Prestridge, S., and J. Tondeur. 2015. Exploring Elements That Support Teachers Engagement in Online Professional Development. *Education Sciences* 5 (3): 199–219.
- Pusey, P., and Sadera, W. A. (2011). Cyberethics, Cybersafety, and Cybersecurity. *Journal of Digital Learning in Teacher Education*, 28(2), 82-85. doi:10.1080/21532974.2011.10784684
- The Norwegian Directorate for education and training. Professional digital competence framework for teachers. Accessed August27th 2018 from <u>https://www.udir.no/globalassets/filer/in-english/pfdk\_framework\_en\_low2.pdf</u>

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