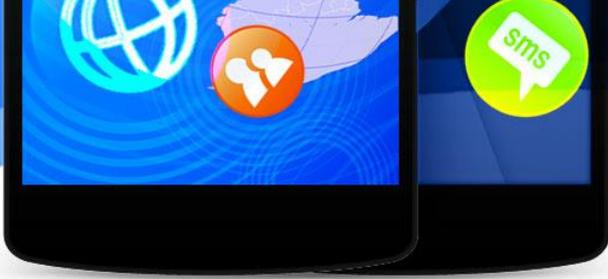


# Technology by Design

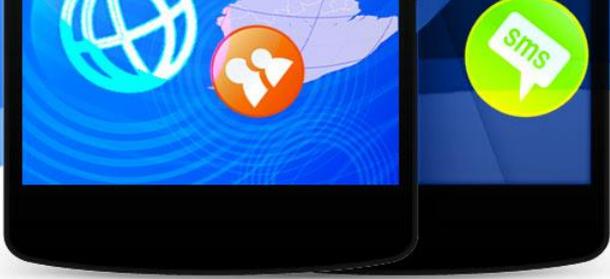
**June 1, 2022**



# Lorelie Bouchard

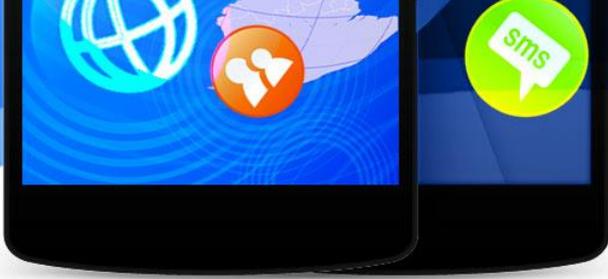
- Faculty, Champlain St. Lambert
  - Geography and Tourism
- *Chargée de cours*, UdeS
  - MTP Program





## Session Objectives

- Reflect on the choices we have made for pandemic teaching
- Look at frameworks to help us evaluate the use of technology
  - TPACK
  - SAMR
- Choose the right digital tools for our course's learning objectives in order to enhance student learning

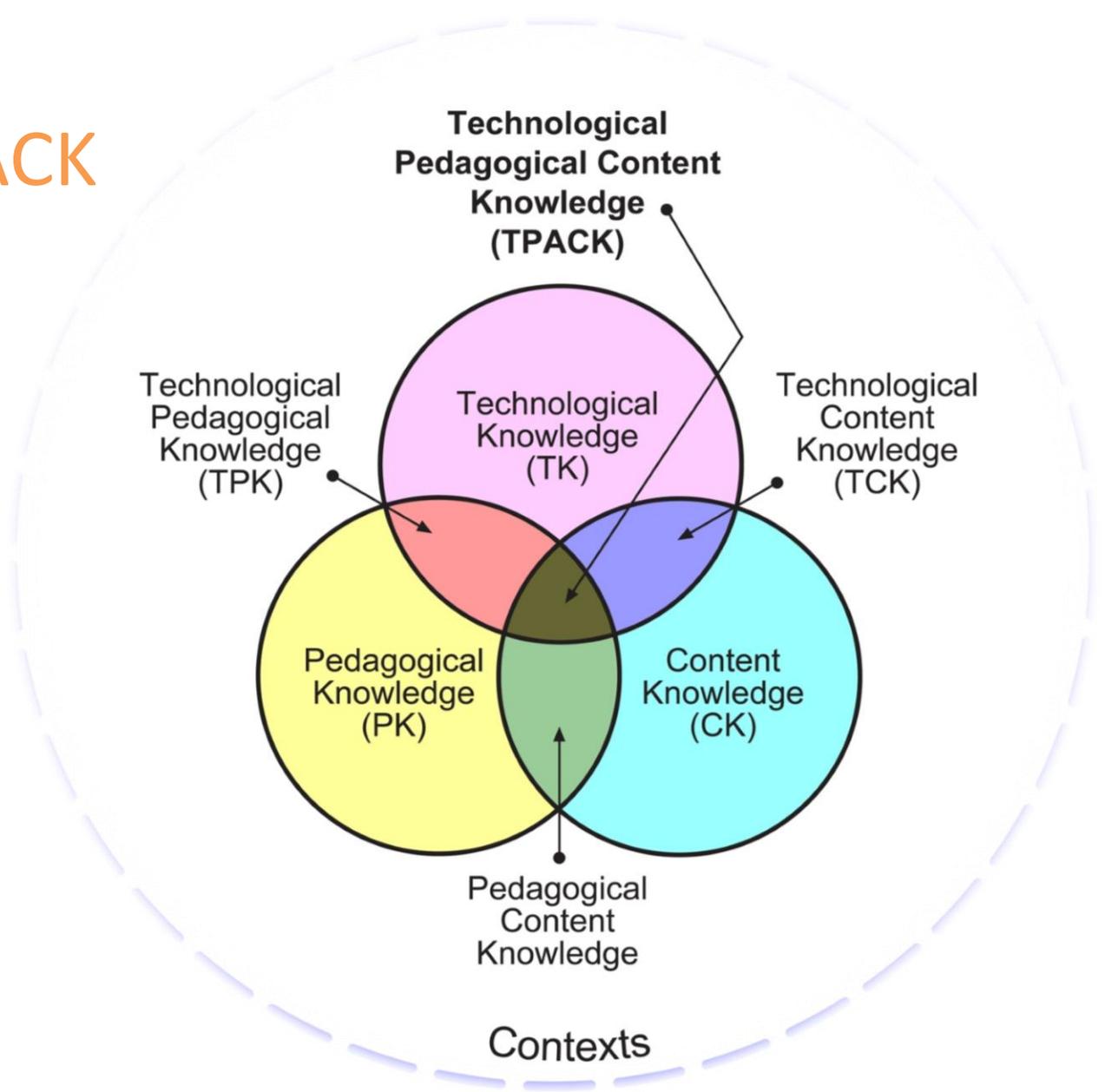


# Learning Technology by Design

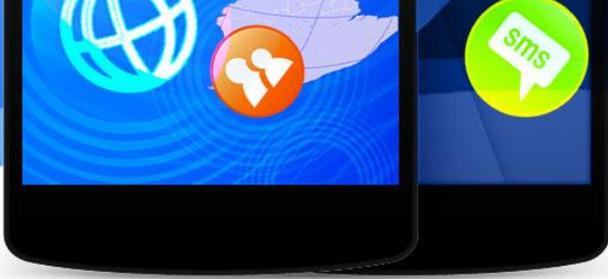
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**Code: 3006 1689**

# TPACK



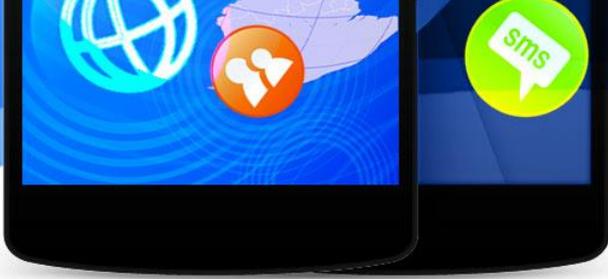
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## Evolution of a Cegep Teacher

- Newly hired

**Content  
Knowledge**

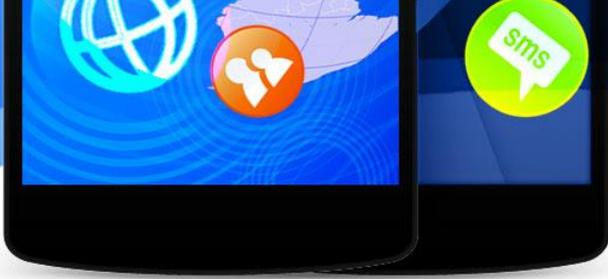


## Evolution of a Cegep Teacher

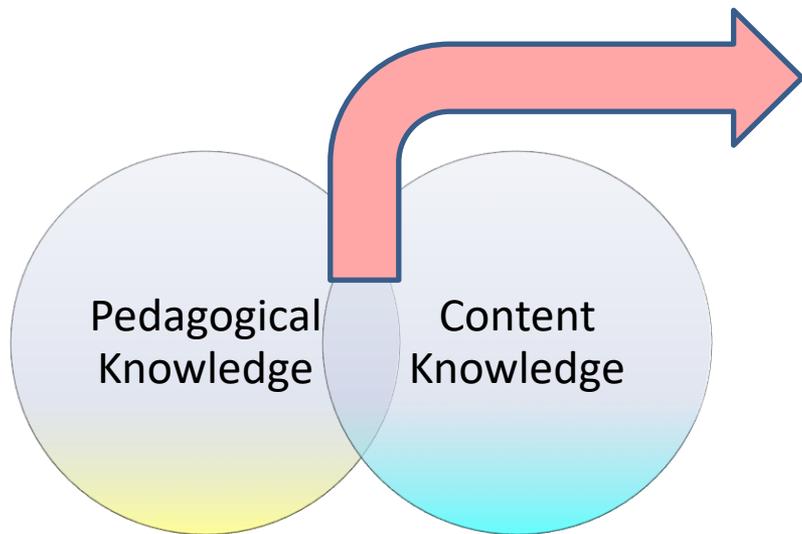
- Realization that there is something missing
- How can I do this more effectively?

**Pedagogical  
Knowledge**

**Content  
Knowledge**

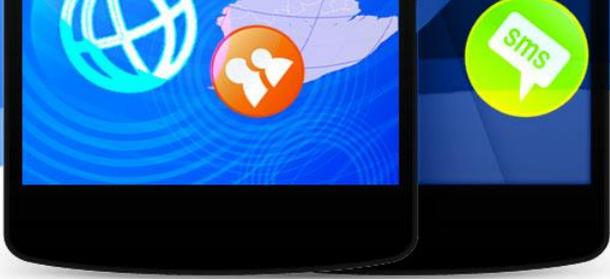


## Pedagogical Content Knowledge



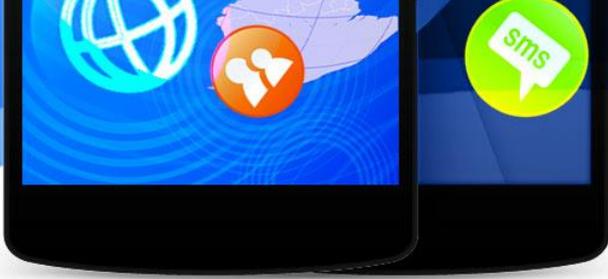
Start thinking in terms of

- What teaching approaches fit the content
- How to arrange content for better learning
- What makes concepts easy/difficult to learn
- What strategies can I use?

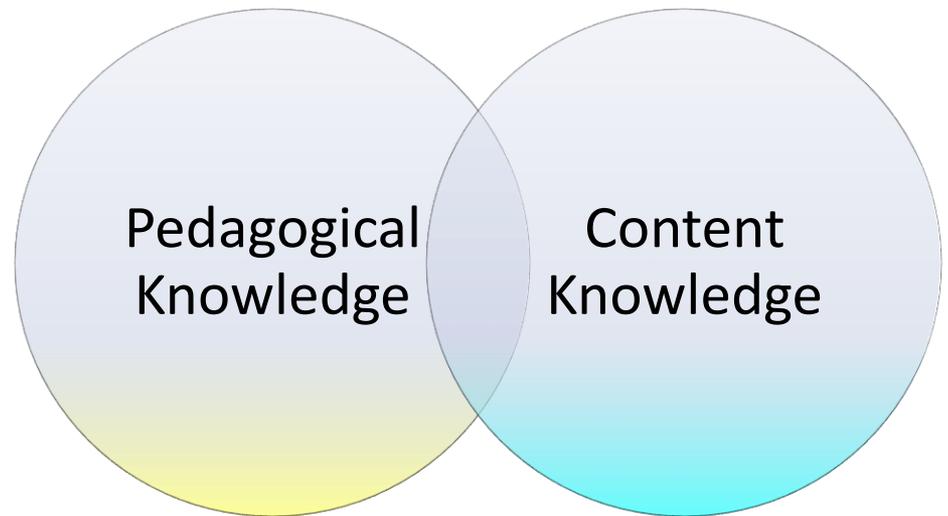
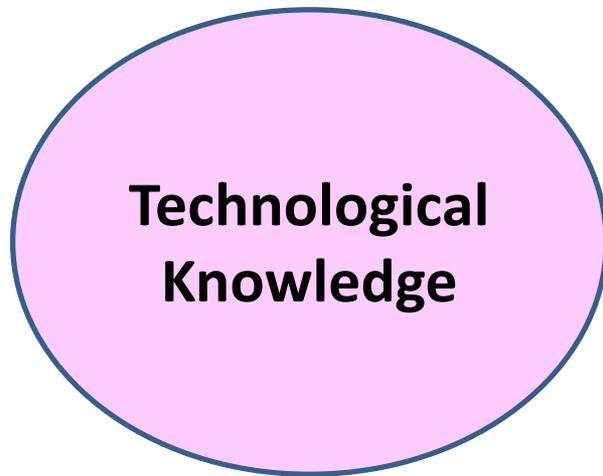


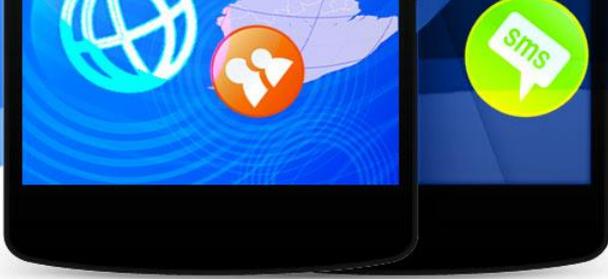
## Pedagogical Content Knowledge

- Subject matter is transformed for teaching and learning
- Most useful forms of representation of ideas
- Most powerful
  - Analogies
  - Illustrations
  - Examples
  - Explanations
  - Demonstrations

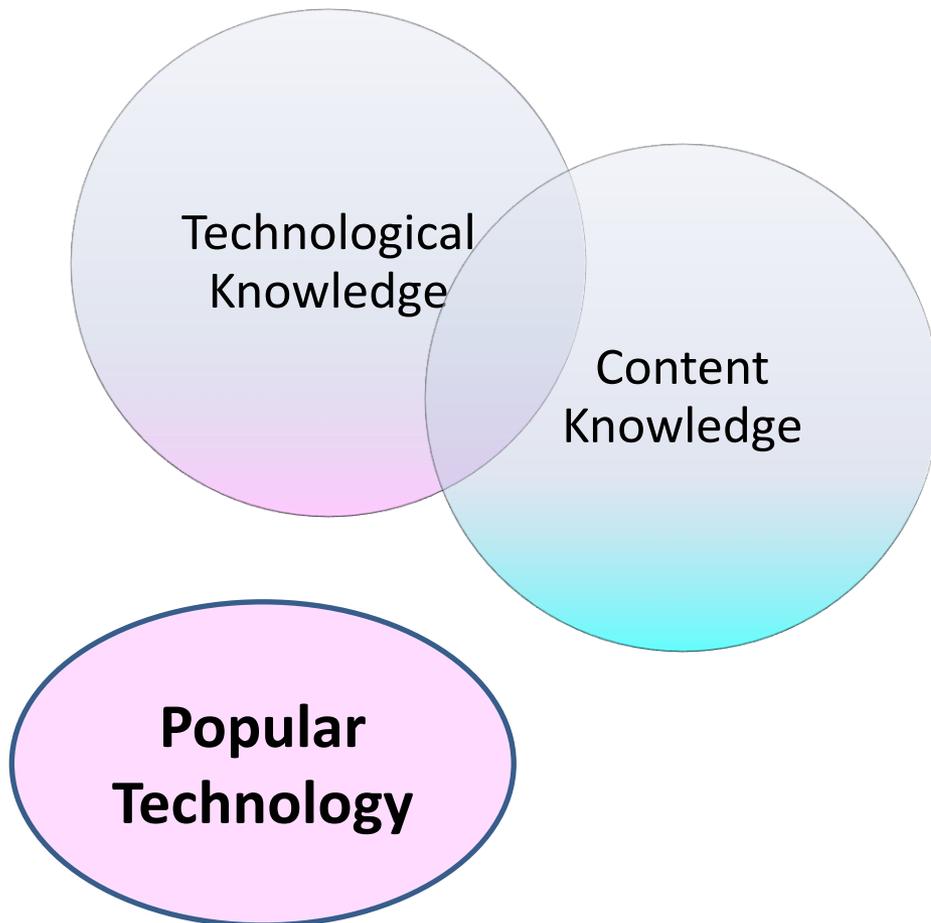


## Evolution of a Cegep Teacher

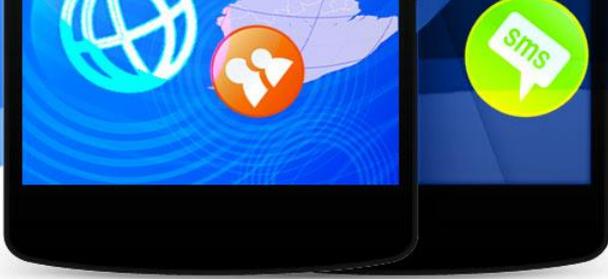




## Evolution of a Cegep Teacher

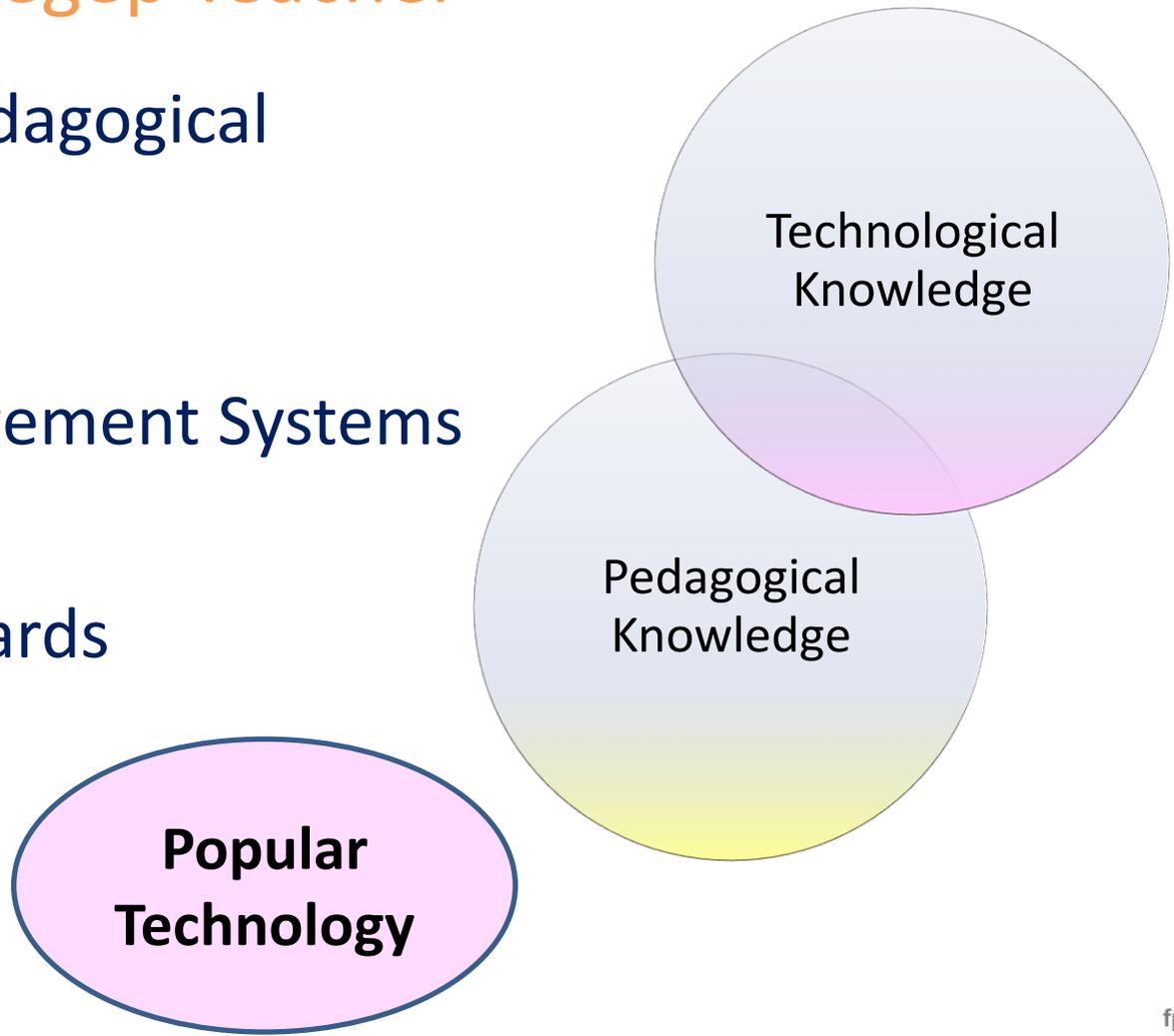


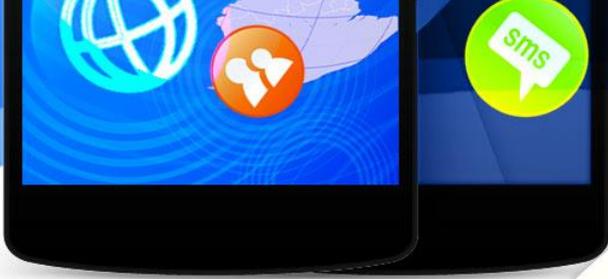
- Technological Content Knowledge
- Advances and changes in your field/discipline due to technology



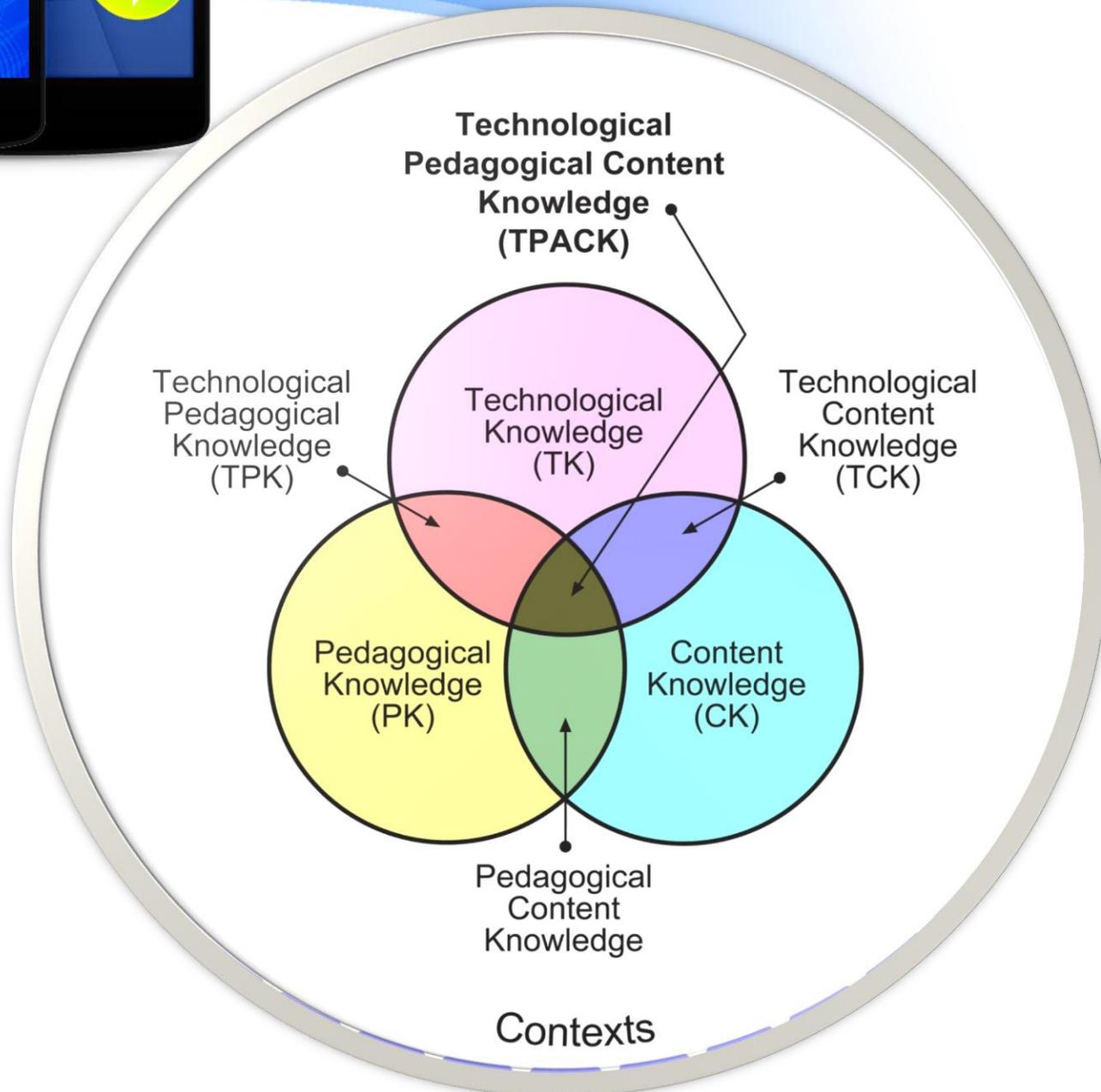
## Evolution of a Cegep Teacher

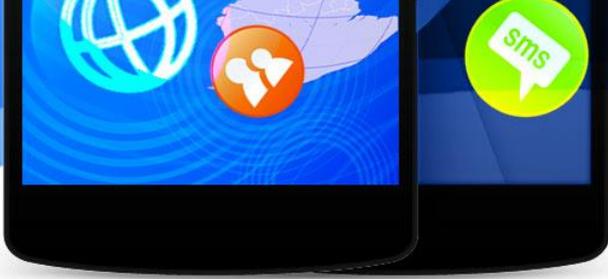
- Technological Pedagogical Knowledge
- Generic
  - Course Management Systems
  - Grade books
  - Discussion boards





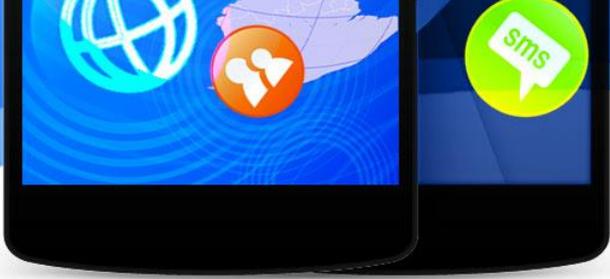
# TPACK





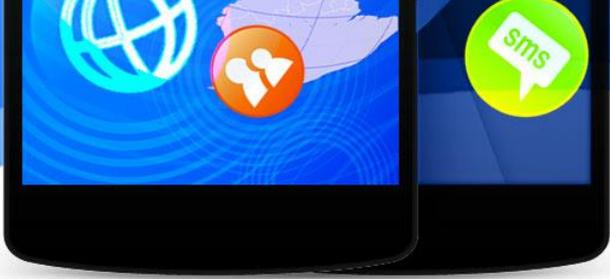
## Technology by Design

- Not using a tool because it is available
- Not using a tool because it easy
- Not using a tool because you know it
- Not using a tool because it is trendy
  
- Learning the tool that fits your purpose



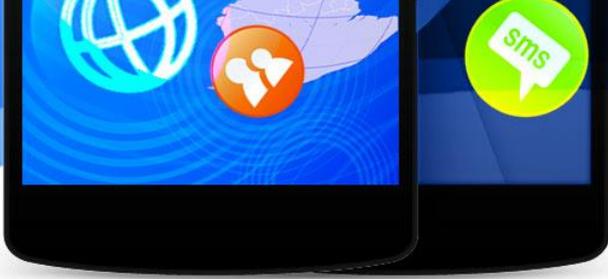
## Technology by Design

- There is no single technological solution that applies to every teacher, every course or every view of teaching.
- Develop appropriate, context specific strategies and representations
- Authentic problem solving using technology



## Lesson Planning

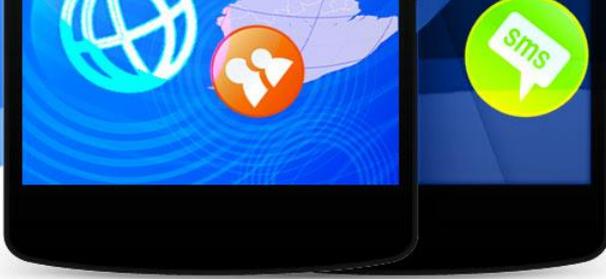
- Technology should always be last
  1. Clear learning outcomes – what do you want the students to be able to do with your content?
  2. Assessment – How will you evaluate it?
  3. Instructional Strategies – What activities will you use?
  4. The appropriate technology – What tools can you use?
- The technology tool must add value



## How to find the right tool

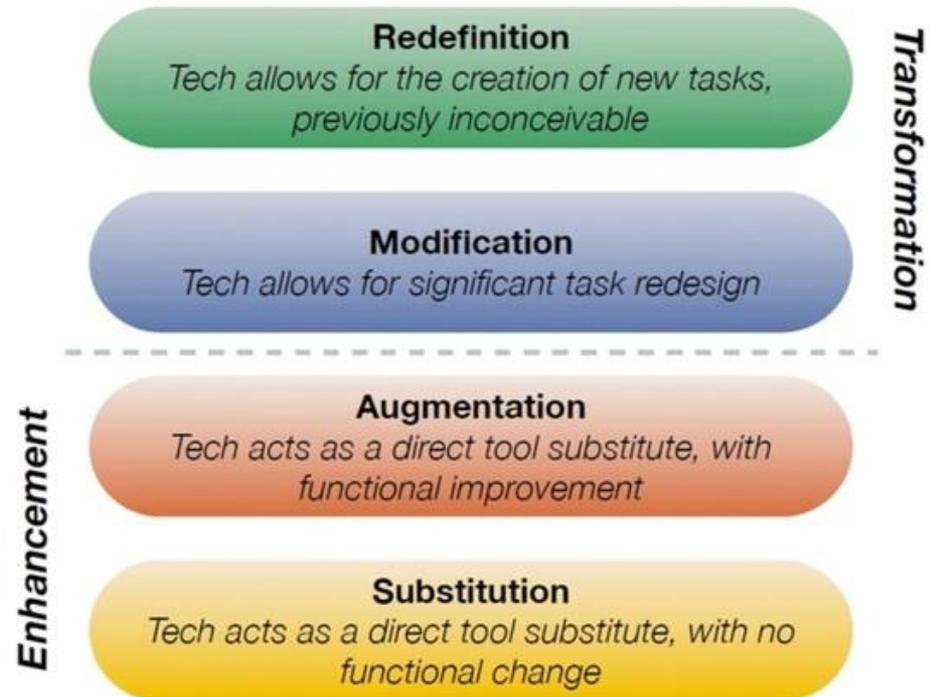
- What is the purpose of the tool?

[Top Tools for Learning](#)

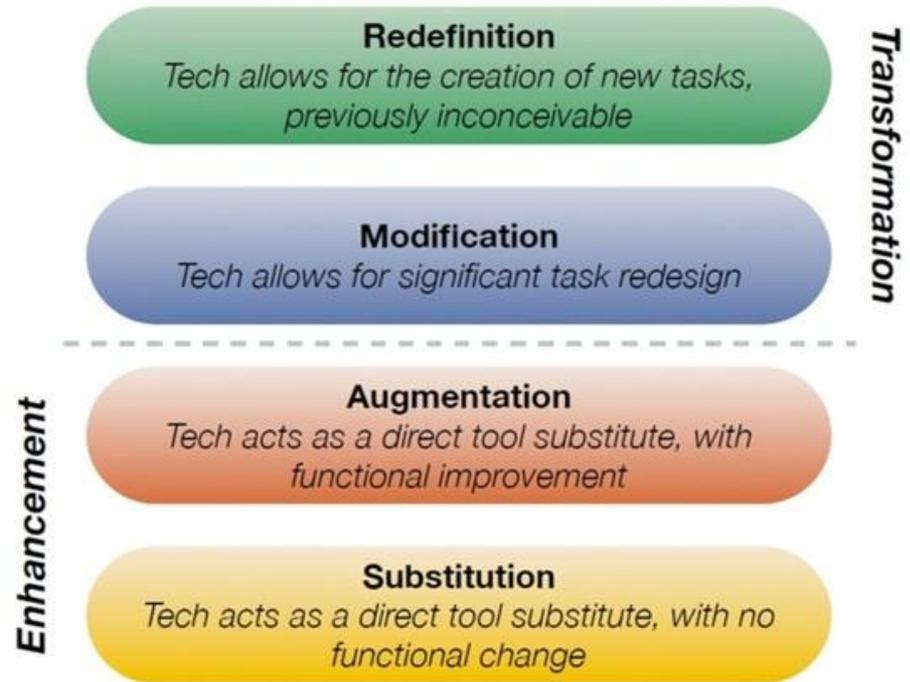
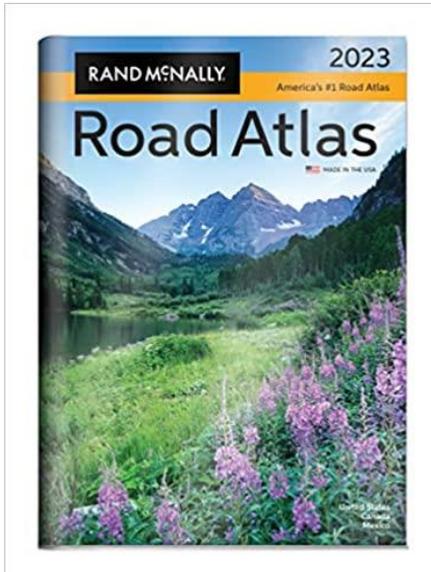
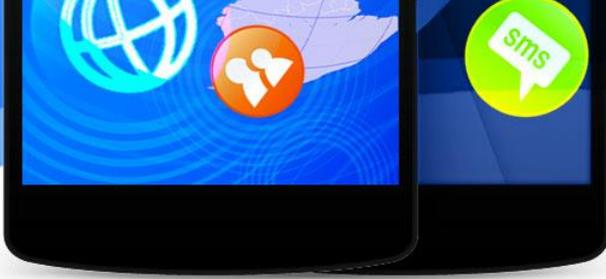


## How to evaluate a tool

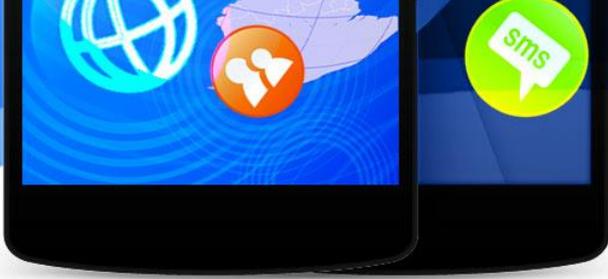
### SAMR Model



Puentedura, R. (2012).

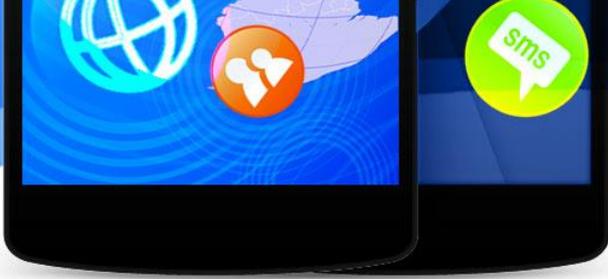


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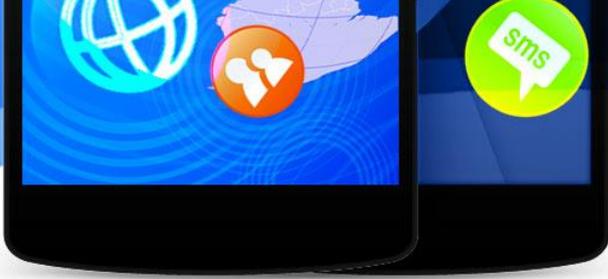
## Survey of Three Tools From PED627 – Pedagogy of Digital Learning

- Identify a pedagogical concern
- Is there a possible digital solution?
- Find three tools
- Evaluate the tools

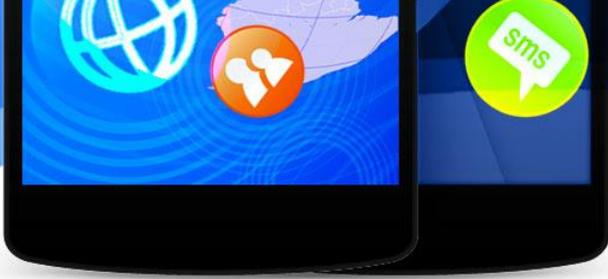


## How to evaluate the tools

- In breakout rooms
- Introduce yourselves and choose a speaker and a note taker
- Brainstorm all ideas to evaluate digital tools. There are no bad answers.
- Categorize or rank the judging criteria.

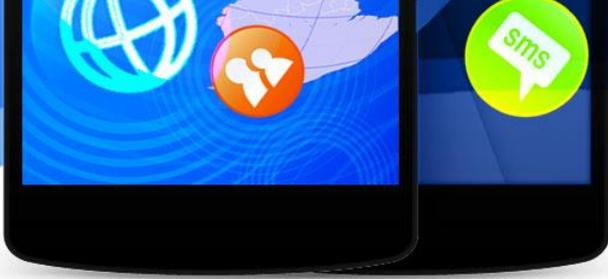


What have you come up with?



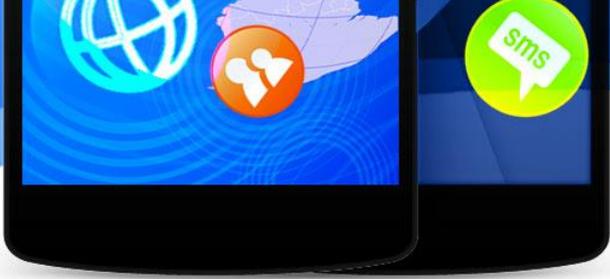
## Evaluation Checklist

- ✓ Available features
- ✓ Does it accomplish the task?
- ✓ Limitations to free versions / Costs
- ✓ Learning curve – for students and teachers
- ✓ Integration into your LMS
- ✓ Look and design
- ✓ Does it add value?
- ✓ Does it increase learning?
- ✓ Does it address diverse needs?
- ✓ Worth adding another tool?

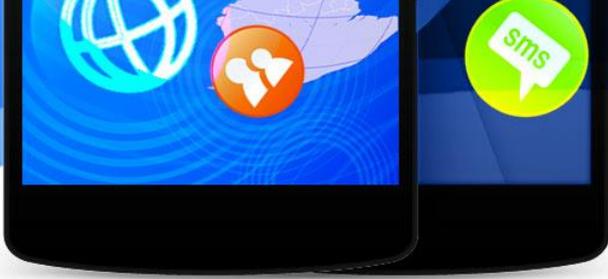


## Interactive Videos

Vialogue	PlayPosit	TedEd	Edpuzzle	H5P
Looks awful Hard to work with	Best question types  Free version too limiting Cost too high	Not interactive during video – all at the end  Good for starting discussions	Easiest to use	Integrated into Moodle  Can be part of larger lessons  Look isn't great



Questions?  
Comments?



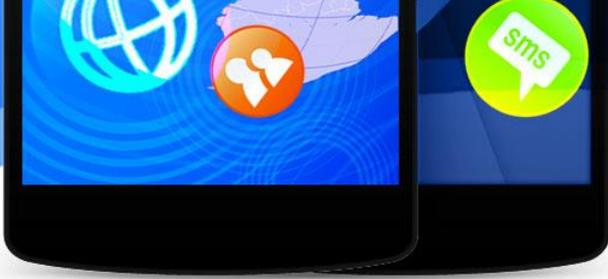
## Acknowledgements

This workshop was developed for Performa at the *Université de Sherbrooke* with a grant from the *Ministère de l'Éducation et de l'Enseignement Supérieur*.

Special thanks to Sawsen Lakhali and Christine Gaucher at UdeS.

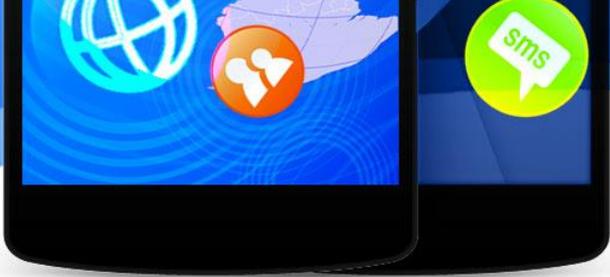
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At the end of the day, please take a few minutes to fill in the event evaluation

- <https://forms.office.com/r/0UViXBRCNe>



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