

Designing to Promote Interaction in

Online **LEARN**ing Systems

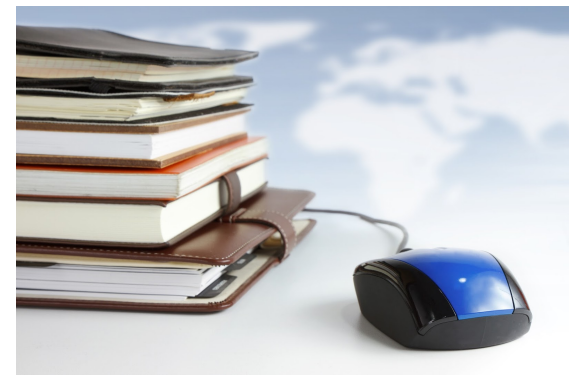


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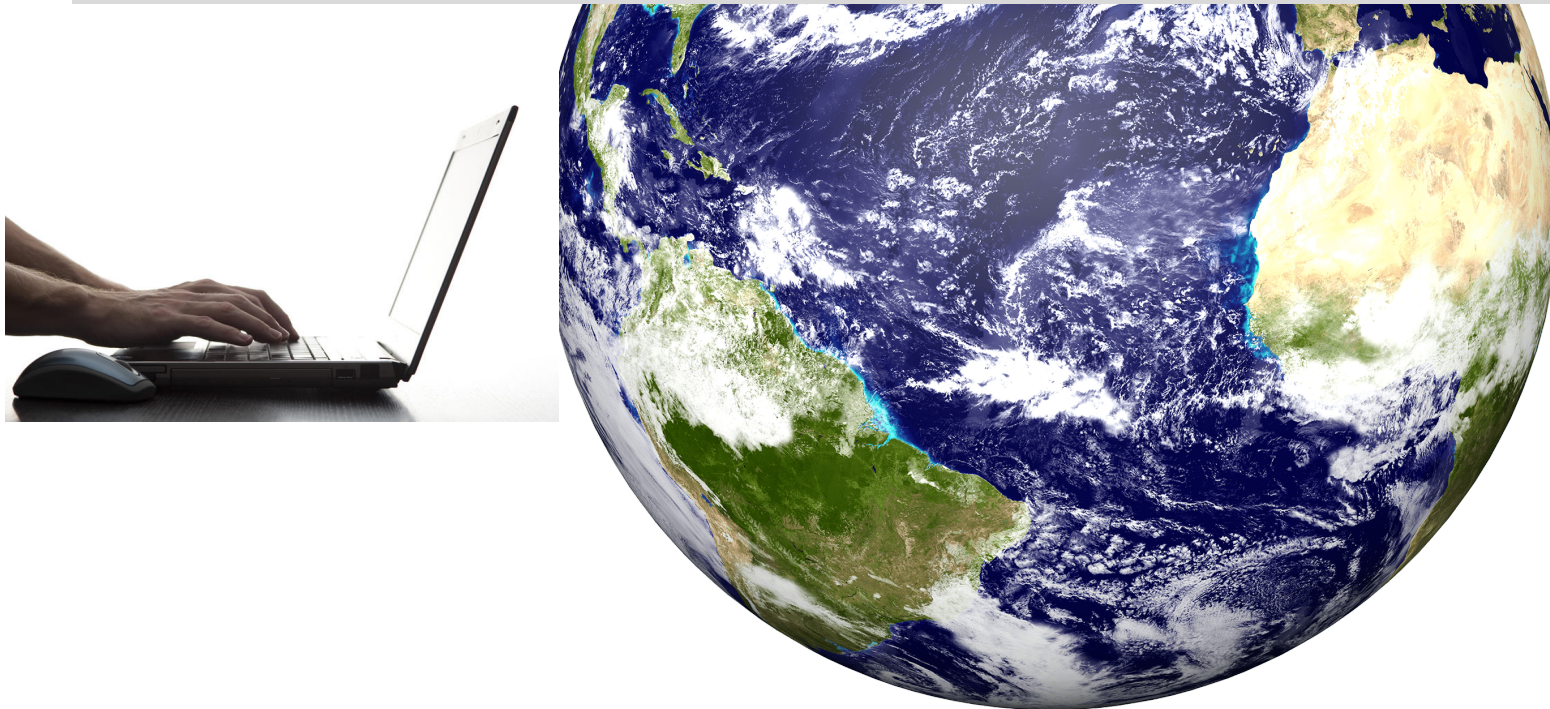
Online learning



Online learning

Advantage:

- Temporal and geographical flexibilities while learning
- Completing the course at learner's pace



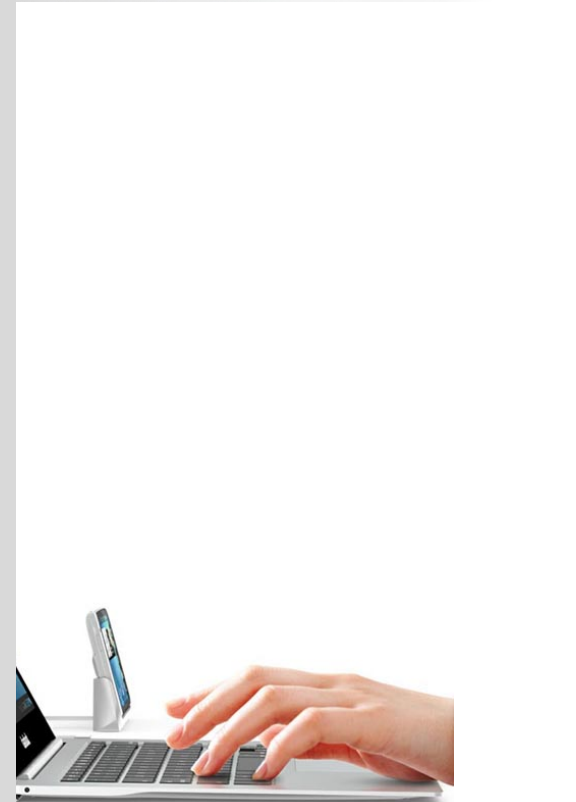
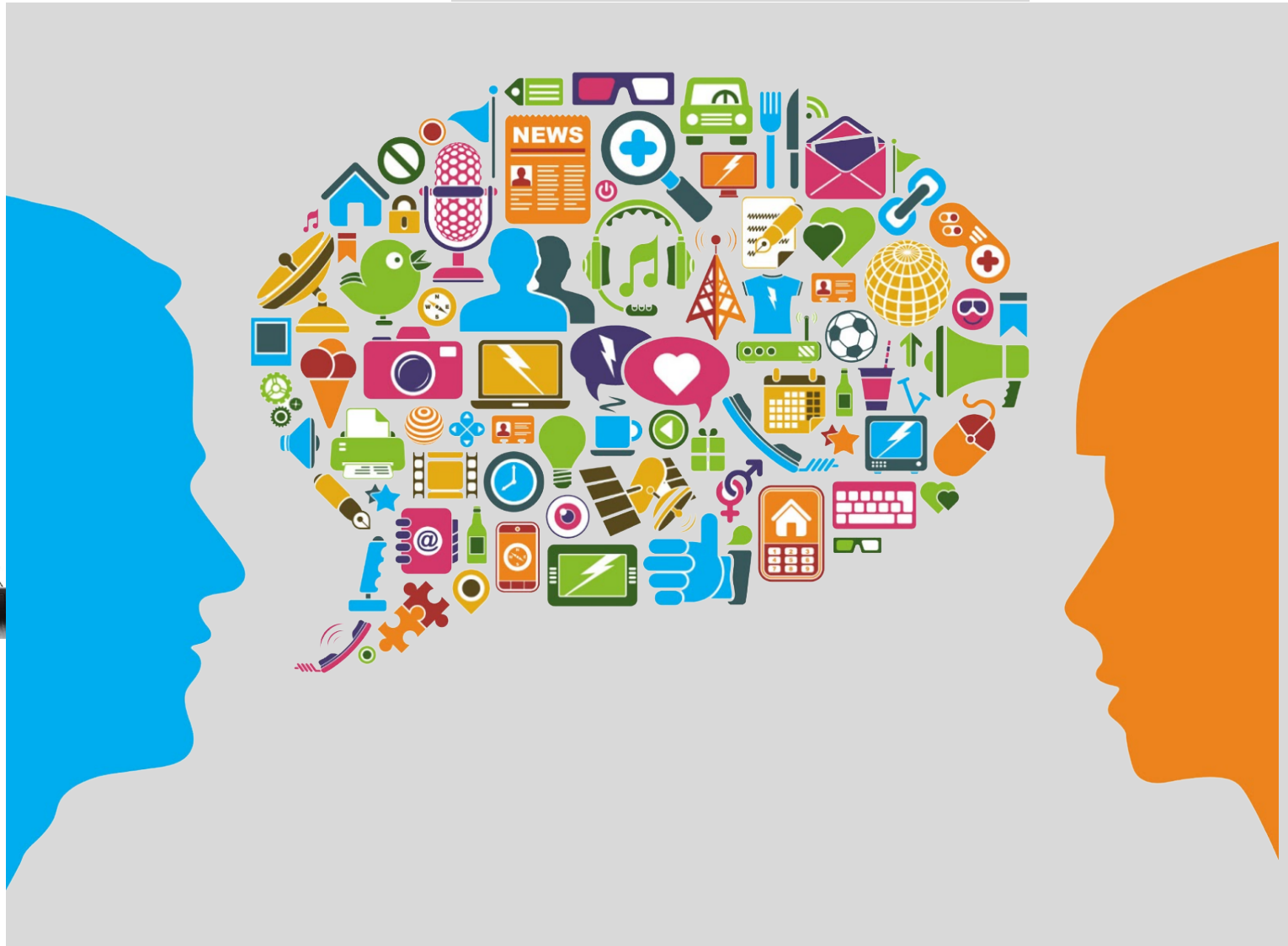
Online learning

Limitations?



Online learning

Limitations?



Online learning

Limitations?



No face-to-face interaction

Some Consequences for the learners:

- Feeling isolated or disconnected from the community
 - adverse emotions like anxiety, sadness, and depression.
- Need for instructor's influence, feedback, explanation, or confirmation
- Feeling discouraged or lost
- More



Online Learning: Interaction

- By Moore (1989):
 1. Learner-learner interaction (peers)
 2. Learner-instructor interaction
 3. Learner-content interaction
- Learner-instructor and peer interaction
 1. asynchronous
 2. synchronous

OLS: Asynchronous Communication

Message passing using

- Email communication
 - perception process may take longer time
 - may require back and forth message passing
- Forums, and discussion board
 - too much interaction leading to learner overload
- Q/A

Advantages, Drawbacks?

- Interaction can happen at learner's comfort time.
- Isolation and miscommunication are still highly likely.

OLS: Synchronous Communication

Instant messaging among peers and instructor

- Live chat:
 - How long?
 - When?
 - 24/7? --- costly, impossible
 - Chatbots? --- isolation, lack of instructor's feedback, etc
 - Users may lose their own pace and flexibilities

OLS: Synchronous Communication

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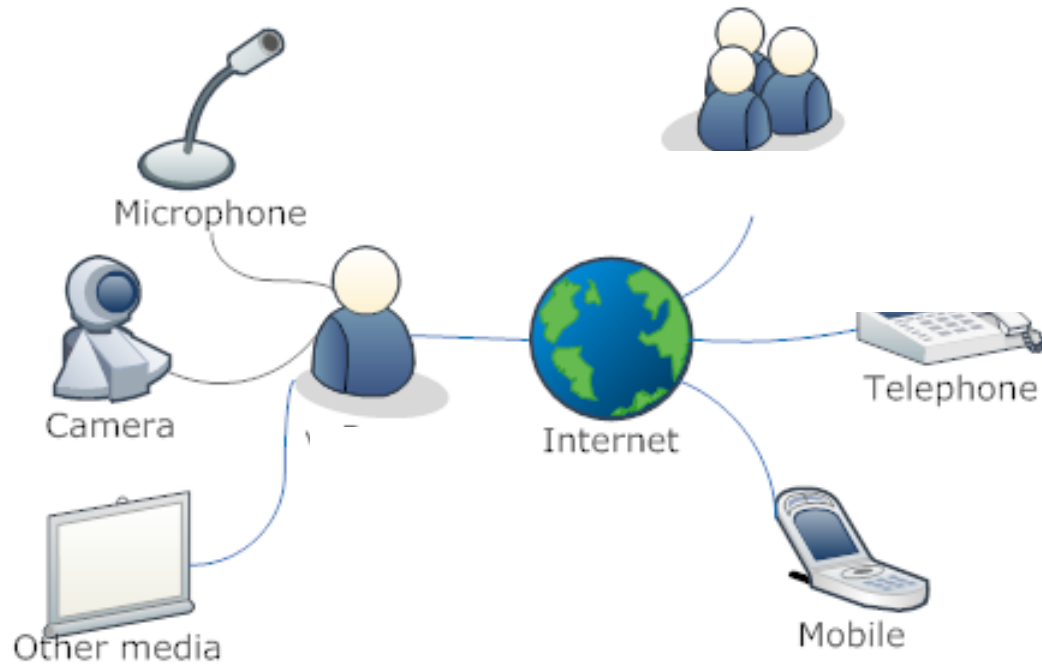
How to learn/teach at our comfort (time and location) + still being able to interact face-to-face ?

Tele-instruction

Tele-instruction: Appointments

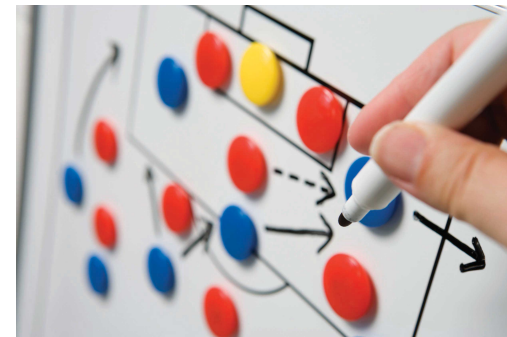


Tele-instruction: Video conferencing and File Sharing



Tele-instruction: Learning Management System

- Content and meeting management
- Addressing student's questions through the system
- Leading them to book an appointment with the instructor if needed



Tele-instruction: Trusted Technical Agents

- Agents to help instructor
- For Load balancing once needed
 - Ex. Large online classes

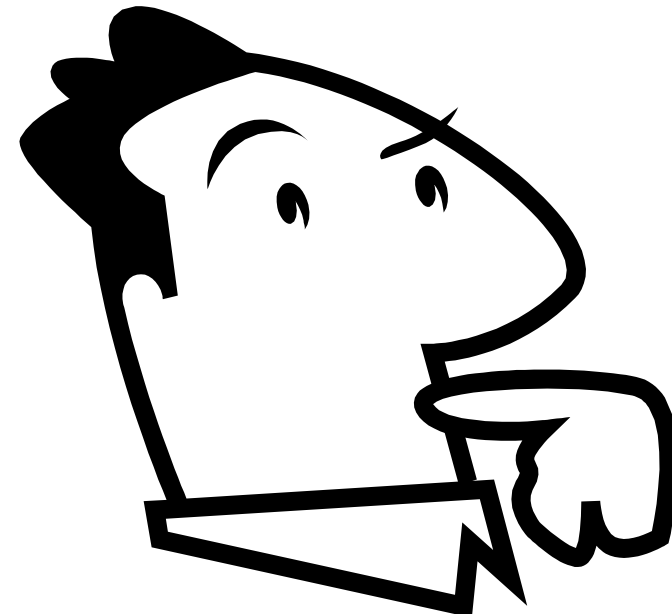


Tele-instruction

Can help with:

- Tracking progress and evaluations
- Course design and instruction adjustments

The Future?



Thank you!

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