

Instructor: Xu Wang (xwanghci@umich.edu)

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Time: MW 1:30pm-3pm, Remote

Prerequisites: Graduate standing; or permission from instructor



Block-based programming



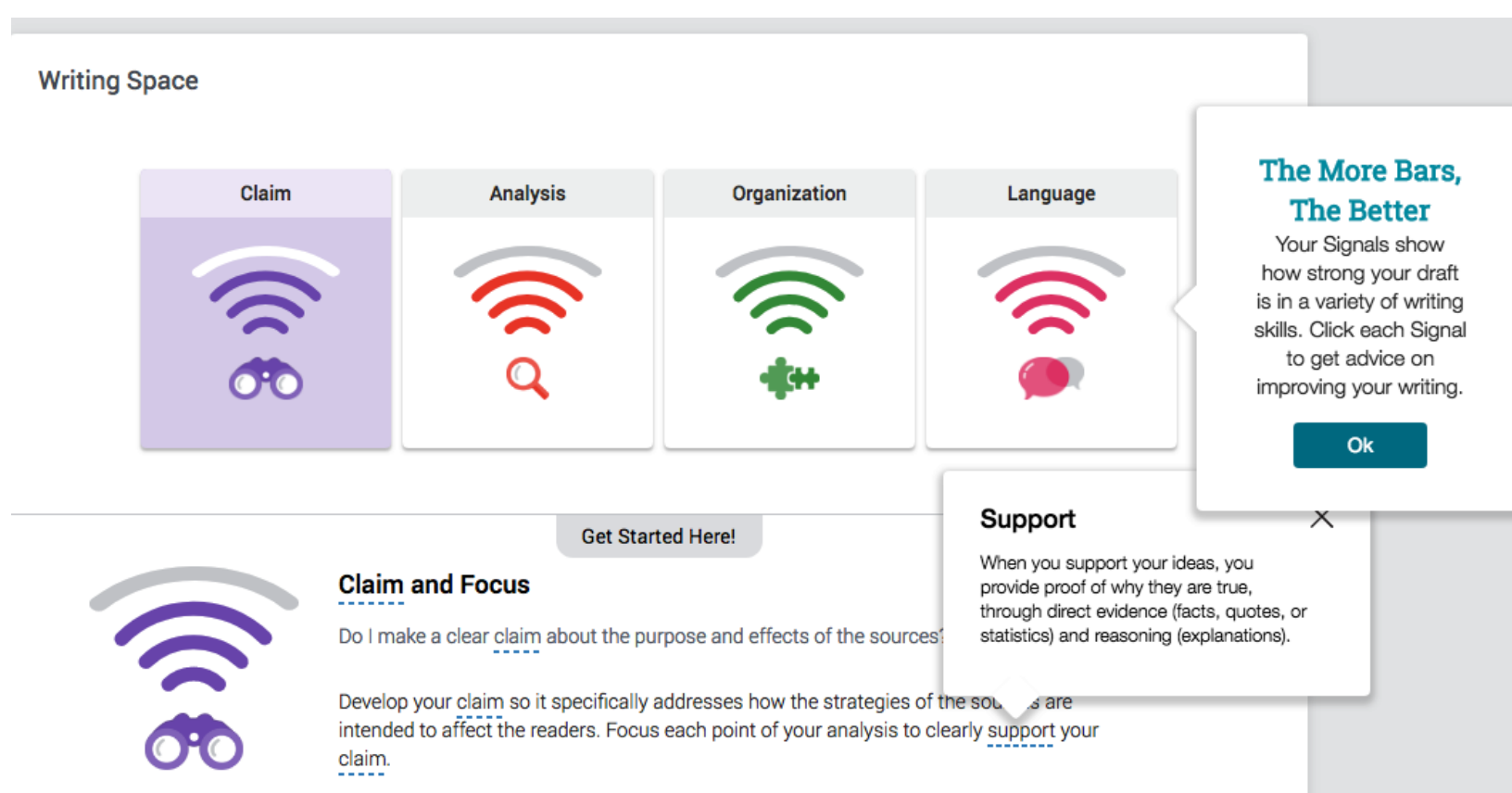
Culturally congruent pedagogical agents



Classroom sensing with computer vision



AR to augment teaching



A feedback system for student essays

Here is a Storyboard created by a previous student. Please examine the content and answer the question.

This storyboard addresses the following user need: Students need to know whether an area is safe at a given time.

Lead Question: Have you ever wanted to know more about the safety conditions for your walk home at night?

Which of the following is the most informative feedback you could offer?

- This is a good example of Storyboard.
- Storyboards shouldn't focus on specific screen designs.
- The lead question should evoke the participant to discuss a similar situation they may have been in.
- Storyboards should be designed based on users' needs rather than other stakeholders' needs;

Upgrade Feedback: Great! You gave the same feedback to this Storyboard as an instructor.

Auto-generate educational materials

The advances in computing have changed the ways people learn. In this seminar, we will review **educational technologies** that draw a wide range of techniques from Augmented Reality, Computer Vision, Natural Language Processing, Crowdsourcing, etc. We will also discuss how these systems are guided by **theories of how humans learn** and the **HCI methods** used to design and evaluate them.

Join our discussion to build the next generation of educational technologies!