“HOW DID YOU LEARN TO MAKE GEOLOGIC MAPS?”

THE IMPACT OF EMBODIMENT, COMMUNITY, AND INSTRUCTION

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RESULTS FOR THEME FOUR: INSTRUCTION

STRUCTURED INSTRUCTION

Feedback is used to improve learning and performance.

Students get regular and timely formative feedback that is used to improve work:

- Students get formal feedback about specific aspects of their work.
- Students get informal feedback through instructor interaction and questioning.
- Students get regular and timely formative feedback that is used to improve work.
- Coded segments were reviewed by all authors and an independent peer group to ensure reliability.

LEARNING HOW TO PERFORM A TECHNIQUE THAT WILL BE USED DURING MAPPING GIVES STUDENTS TOOLS THAT ARE USEFUL IN THEIR FUTURE PROFESSION.

Students read/learn about concepts in the classroom and apply their ideas in the field:

- Students get regular and timely formative feedback that is used to improve work.
- Coded segments were reviewed by all authors and an independent peer group to ensure reliability.

PRACTICE AND MASTERY

Learning to translate: accumulation of experience and building on prior experience and knowledge leads to expertise.

- Students practice: the more you do it, the better you get, especially if you have a range of experiences.
- Coded segments were reviewed by all authors and an independent peer group to ensure reliability.

PRACTICAL EXERCISES:

The practical exercises are designed to

- Have the students work in groups or pairs.
- Have the students work in small groups.
- Have the students work in pairs.

Participants were asked: What did you learn by doing these exercises? What did you learn by doing these exercises? What did you learn by doing these exercises?

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