

Abstract Submitted
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Designing flexible instructional space for teaching introductory physics with emphasis on inquiry and collaborative active learning
TIKHON BYKOV, McMurry University — In recent years McMurry University's introductory physics curriculum has gone through a series of significant changes to achieve better integration of traditional course components (lecture/lab/discussion) by means of instructional design and technology. A system of flexible curriculum modules with emphasis on inquiry-based teaching and collaborative active learning has been introduced. To unify module elements, a technology suite has been used that consists of Tablet PC's and software applications including Physlets, tablet-adapted personal response system, PASCO data acquisition systems, and MS One-note collaborative writing software. Adoption of the new teaching model resulted in reevaluation of existing instructional spaces. The new teaching space will be created during the renovation of the McMurry Science Building. This space will allow for easy transitions between lecture and laboratory modes. Movable partitions will be used to accommodate student groups of different sizes. The space will be supportive of small peer-group activities with easy-to-reconfigure furniture, multiple white and black board surfaces and multiple projection screens. The new space will be highly flexible to account for different teaching functions, different teaching modes and learning styles.

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