

Discovery inspired interactive learning and teaching General Physics to students major in biology

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Abstract:

It is well-know that general physics is difficult to study due to various reasons. One of the most important one is that general physics is too conceptual, not to even to mention to teach students who have not studied physics in high school. One of the most effective methods to help these students is to inspire them such that they motivate themselves to learn better. This project is designed for the new course AP1400 Introductory Physics for Biologists offered to the first batch of students enrolled Bachelor of Veterinary Medicine (BVM) program in Fall of 2017. First, the PI will assign students to read selected biology literatures which contain rich physics principals. Besides, this project is going to apply several teaching and learning approaches to students, and compare the learning effectiveness. Thirdly, students are encouraged to think critically and ask questions. Throughout this project students are highly evolved in learning this class. Finally, a smart-phone App incorporating the lecture content and questions into the eLearning tool will be developed to facilitate the intensive interactions between the teacher and students.