

Meeting: 1003, Atlanta, Georgia, MAA CP A1, MAA Session on Getting Students To Discuss and To Write About Mathematics, I

1003-A1-1023 **Kelly S. Cline*** (kcline@carroll.edu), Carroll College, Department of Mathematics, 1601 North Benton Avenue, Helena, MT 59625. *Creating Discussions with Classroom Voting.*

Classroom voting can be a very powerful tool for stimulating student discussions and a springboard for writing assignments, a useful technique to get students to form opinions about mathematical concepts so that they can explain them to their peers. I use classroom voting in my calculus classes, posing multiple-choice questions on an overhead projector, while the students vote on the right answer with a set of hand-held “clickers.” Their votes are recorded and tabulated with a laptop, giving me almost instantaneous feedback on student understanding. But most importantly, I have found that this technique is a very potent method for creating classroom discussions. After the vote, I then ask individual students to explain and defend their answers, to justify their vote. Sometimes the answer quickly becomes clear, but the best questions result in an extended debate, as students who chose different answers explain their thoughts. After the in-class discussion, I have found that we can solidify this learning moment by assigning everyone in the class to write a paragraph explaining the concept and why one particular option was correct. About once a week, I will select one of the better questions that provoked a good deal of confusion and controversy for such a write up. (Received October 02, 2004)