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M. Chakrabarti* (chakrabm@gvsu.edu), Department of Mathematics, Grand Valley State University, Allendale, MI 49401. *A course in Computational Biology - Reaching out and Reaching within.*

This talk will relate the author's experience in designing and developing a course in bioinformatics aimed at undergraduate majors in biology, computer science, statistics and mathematics. One of the goals of such a course is to expose the student to the algorithmic and statistical techniques developed for bioinformatics problems, as opposed to following the perhaps more typical black-box, how-to style bioinformatics courses that are designed for biology students. We will discuss some strategies to make such an interdisciplinary course feasible within the confines of an existing curricular structure within the mathematics and biology departments - which often have minimal overlap. The challenges faced are numerous. These include 1) figuring out the right prerequisites to navigating the curricular constraints at the university level, 2) meeting a certain expected minimum student enrollment figure for the course to take off, 3) "selling it" within the mathematics department and 4) reaching out to our colleagues in biology and convincing them of the merits of such a course originating within the math department. We will describe our experience with a phased approach - starting with undergraduate research projects prior to the actual development of a formal course. (Received September 27, 2006)