

1077-M1-2965 **Karen Keene Allen***, North Carolina State University. *Developing a research-based calculus for elementary teachers.*

In this presentation, I will report on the development of a new NSF-funded research-based calculus course. We have developed several instructional sequences that allows students to learn the large basic concepts of calculus and how it relates to elementary school mathematics. Particularly, we talk about the development and implementation of a limit of a sequences set of materials that we have implemented and improved. We also will briefly discuss the other sequences. (Received September 23, 2011)