Abstract:

This talk will present network analysis of discussion forums in two semesters of an introductory physics class using the CourseNetworking platform. Large introductory science courses can be isolating for students, with negative consequences for long-term retention in college. Online forums provide a pathway for students to engage with each other outside of class, which may especially benefit commuter or non-traditional students with limited on-campus time. Social network analysis has been used to track the development and beneficial effects of collaborations among students in various classroom settings, but is less well-developed in the context of online discussion forums. I will discuss properties of the two dense full-semester forum networks, reduced "backbone" networks that highlight the most consistent links between students, and some trends over time. Preliminary results show some correlations between forum position (centrality) and final course grade, but many open questions remain.