The fields of Rhetoric, Composition, and Applied Linguistics have long inquired into how people in higher education settings recognize the texts they encounter as belonging to genres that require response in the form of other genres of text, a phenomenon known as “uptake.” In their approaches to composition teaching and the use of educational texts, undergraduate composition courses have made attempts to address the growing linguistic diversity of students as well as the increasingly multimodal nature of communication in our highly networked world. However, if the educational materials teachers use and the ways in which they use them do not secure uptakes from students consonant with the goals of such attempts, then they have little merit. This dissertation is a case study carried out in two multilingual multimodal first year composition courses taught over the course of a quarter at a public research university in the Northwest. Collected data include class observations, video and audio recordings of class meetings and semi-structured interviews, and textual analysis of classroom artifacts, student work, and classroom management software. Microanalytic discourse analysis methods using Conversation Analysis tools, such as Membership Categorization Analysis and Discursive Psychology, were utilized in analyzing these data. Uptake that occurred in these classes was closely associated with the local assembly of categories of identity that participants employed as a means of inferring what they were doing in a class as well as what their obligations to one another were. While teachers had the ability to delay or disrupt habitual student uptakes by “sponsoring” alternative uptakes, this ability was limited when it came into conflict with actions identified by participants as bound to or obligatory for these categories of identity. A second source of both positive and negative interference with a teacher’s ability to sponsor uptake was the material and multimodal rhetorical effects of technologies of text composition and distribution. Based on these findings, I suggest an approach to making common classroom activities and technologies involving text composition and distribution and the identities that students and teachers perform when they engage with them the focus of classroom inquiry. By working with students to interrogate these practices and tools habitually employed in classrooms, teachers may more consciously create classroom environments and use educational texts in ways that allow students to interrogate habitual practices and develop new ones. Findings have implications for composition pedagogy and applied linguistics, particularly in the fields of materials and curriculum design, teacher training, and classroom management software development.