## **Quiz 4: Letter of Intent**

**Title:** Simplifying the College Search Process with Chatbot Conversations

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Abstract: Our chatbot aims to facilitate a smooth college search process for prospective students of undergraduate, graduate, law, and doctoral programs. Navigating the college search process while balancing coursework and extracurricular activities can induce significant stress in students of all ages. Students often find themselves conducting endless Internet searches, talking incessantly to academic advisors, and reading three-inch-thick college reference books. While extensive research is crucial for students to determine the best fit for them academically and socially, the initial search process is often unnecessarily overwhelming. By enabling users to discuss their educational needs and preferences, our chatbot will simplify the preliminary search process, suggesting schools that can fulfill the users' educational pursuits. The chatbot takes into account a variety of potential deciding factors, such as reputation, location, cost, size, demographics, academic programs, career outcomes, religious affiliation, student organizations, and athletics. As users indicate their top priorities, the bot can filter out schools that do not satisfy user criteria.

While the system does need to collect substantial information from the user, the system will do so in an interactive and engaging manner acting like a friend who provides comforting advice and understands the stress and difficulty of the admissions process. Rather than prompting a stream of questions, the system will facilitate a smooth conversation flow so users will feel that they are proactive in determining their future plans. To do so, the system will provide customized

responses to user input to acknowledge that user responses are understood and valued. The chatbot primarily targets prospective students of various academic programs; however, it is by no means limited to this demographic. Parents of prospective students, prospective faculty and staff members, and avid learners are also encouraged to use this bot.

This chatbot will incorporate several external data sources to optimize the user experience. The most comprehensive dataset was acquired from the National Center for Education Statistics, which provides detailed information on location, size, finances, acceptance rate, graduation rate, SAT and ACT scores of incoming undergraduate freshmen, and other institutional classifications set forth by the Carnegie Classification system for 5,918 colleges and universities across the United States. To supplement the aforementioned dataset, our chatbot will also import college rankings from U.S. News & World Report to provide a more holistic representation of university reputations for the top 399 schools in the nation.

Word Count: 388