

COLLEGE ENQUIRY CHATBOT SYSTEM IN JAVASCRIPT

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Abstract: This abstract describes a college inquiry chatbot system developed using HTML, CSS, and JavaScript. The system is designed to provide students with information on admission requirements, courses, and tuition fees. The user interface is clean and simple, with a chatbot in the bottom of the screen where students can enter their queries. The backend is programmed to understand natural language queries and provide relevant responses. The system was tested using various queries and was successful in providing accurate information to students. The system was well-received by students, indicating that chatbots have a significant role to play in the education sector. The future work suggested includes improving the system by adding a voice recognition feature and integrating it with the institution's database. Overall, the development of chatbots in higher education is a promising trend that can benefit both students and institutions.

Key Words: JAVASCRIPT, COLLEGE ENQUIRY CHATBOT, Voice recognition, Response, Database, Admission Requirement, Query

1. INTRODUCTION

This In recent years, chatbots have become increasingly popular in various fields, including education. A college inquiry chatbot system is a program designed to interact with students and provide information regarding admission requirements, course schedules, tuition fees, and other relevant information about the institution. Chatbots are often known as answering engines. This application work in a very simple way because the knowledge is already programmed in advance. Over the past few years, leading colleges and universities around the world have been building College enquiry chatbots for their websites. Chatbot matches the input sentence from the user with the that of the existed pattern in the knowledge base. With the increasing need for online services, chatbots have become a popular solution for automating tasks and providing efficient customer support. In the education sector, chatbots can be used to provide instant responses to student enquiries, freeing up staff time and resources. The system can be accessed through a web-based interface, mobile application, or social media platforms. The chatbot provides accurate and up-to-date information to students, improving their engagement and satisfaction. The college enquiry chatbot can also assist in reducing the workload of college staff by

automating the information retrieval process. The purpose of this research paper is to describe the design and implementation of a college enquiry chatbot system using HTML, CSS and JavaScript.

1.1 Background

Chatbots are a type of software designed to simulate human conversation. They are programmed to understand natural language and respond to queries in a conversational manner. Chatbots have become popular in customer service, e-commerce, and various other industries. In the education sector, chatbots are used to improve the student experience, provide support, and streamline the admission process.

The use of chatbots in higher education is still in its early stages. However, the benefits of chatbots in this sector are vast. For instance, chatbots can provide instant responses to common queries, freeing up staff time for more complex issues. A chatbot is a computer program that converses via auditory or textual user interface. The developed chatbot functions by providing appropriate answers to the query presented by user about the college activities. The chatbot is developed to ease the work of the office staff Furthermore, chatbots can provide personalized experiences for students, increasing their engagement with the institution.

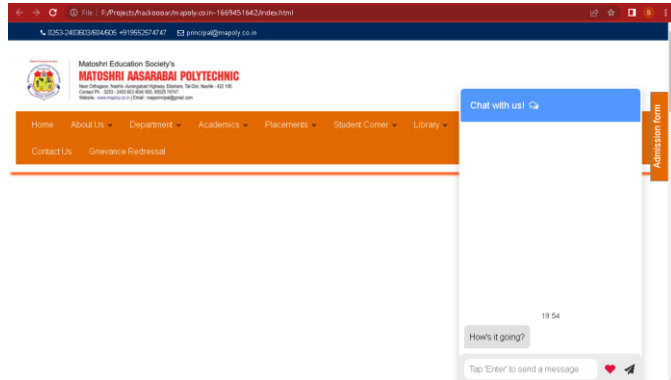
1.2 Development

The college inquiry chatbot system was developed using HTML, CSS, and JavaScript. The system is designed to provide students with information on admission requirements, courses, and tuition fees. The development process involved several steps, including designing the user interface, developing the backend, and testing the system. The college enquiry chatbot system was developed using a combination of HTML, CSS, and JavaScript. The development process involved several stages, including requirements gathering, design, programming, testing, and deployment.

2. USER INTERFACE DESIGN

The user interface was designed using HTML and CSS. The interface is clean and simple, with a chatbot in the center of the screen where students can enter their queries. The chatbot responds with information relevant to the student's query. The user interface of the college enquiry chatbot system is designed to be simple and easy to use. The project

is to ask college related queries and get the responses through a chatbot. The chatbot is accessible through a web-based interface, and the user is greeted with a clean and modern-looking homepage.

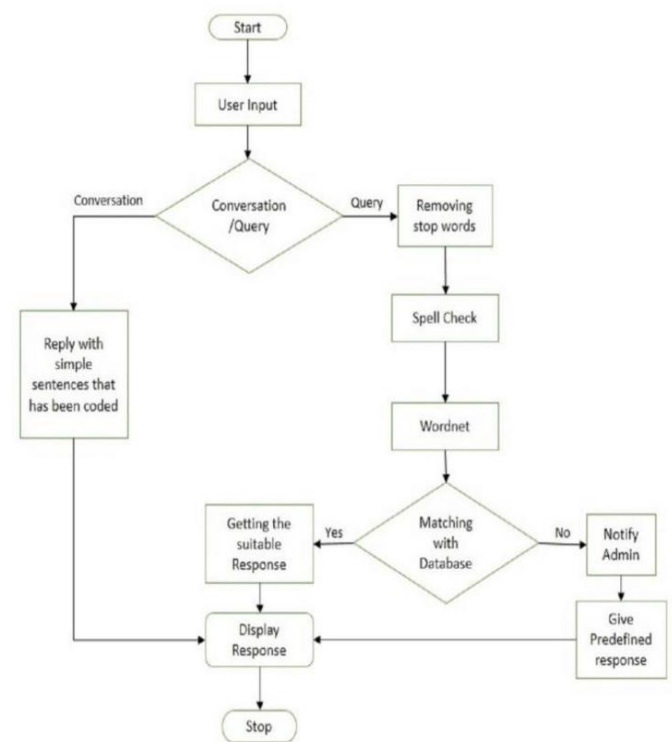


At the bottom of the screen, there is a chatbot where the user can enter their queries. The chatbot has a simple and intuitive design, with a message prompt inviting the user to type their query. The chatbot is programmed to understand natural language queries, making it easy for users to communicate with the system. The chatbot's responses are displayed in the chatbot in a conversational format. The responses are displayed in a clear and legible font, making it easy for users to read and understand. The system is designed to display relevant information in a concise manner, without overwhelming the user with too much information at once.

The user interface is designed to be responsive, ensuring that the chatbot is accessible on all devices, including desktops, laptops, tablets, and mobile phones. The layout of the interface adapts to the device screen size, making it easy for users to interact with the chatbot.

In summary, the user interface of the college enquiry chatbot system is designed to be simple, modern, and easy to use. The chatbot design, conversational responses, and responsive layout make it easy for users to communicate with the system and access the information they need.

3. TESTING



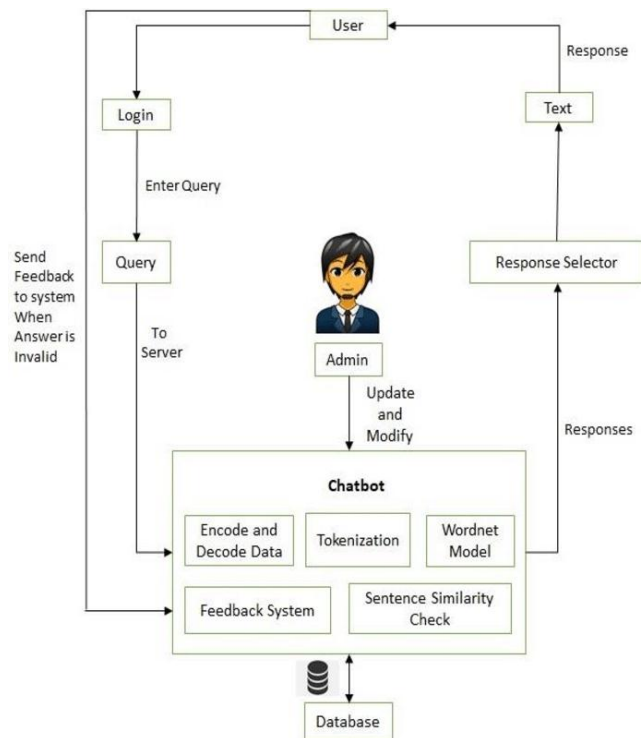
The system was tested using various queries to ensure that it provided accurate responses. The testing process involved inputting various queries, including admission requirements, course schedules, and tuition fees. The system provided accurate responses to all queries, indicating that the system was functioning correctly.

The JavaScript backend of the college enquiry chatbot system is responsible for processing user queries, retrieving relevant information from the college's database, and generating appropriate responses. In addition to processing user queries and retrieving information, the backend is also responsible for generating appropriate responses. The projected chatbot drastically reduces the time of implementation and price on its ingraining and merging with several of these websites. Time potency and price of merging is considerably less. The results of this project area unit measured in whether or not sentiment analysis and active learning is properly enforced or not. Sentiment analysis properly acknowledges the user's question like positive, negative, and neutral by storing all the conversations within the info. intellectual chat-bot system which is able to manage the tutorial activities like admission enquiry, fee's structure, scholarship details, time-table of each department, details of the documents needed to connect etc. With this chat-bot system it'll be straightforward for the scholar to directly clear their queries in lesser time. The system is programmed to generate responses in a conversational format, making it easy for users to engage with the chatbot. The backend is

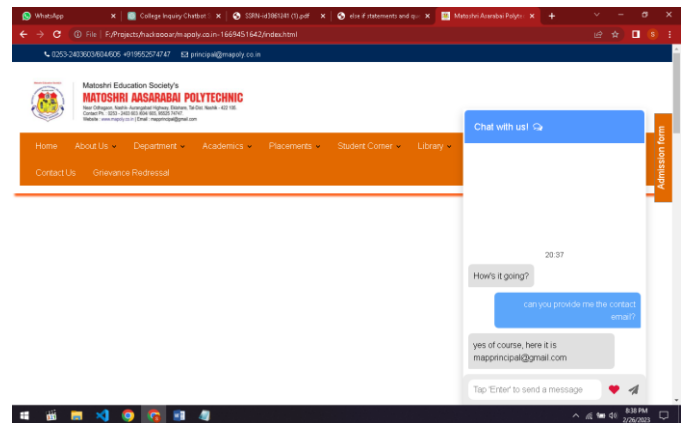
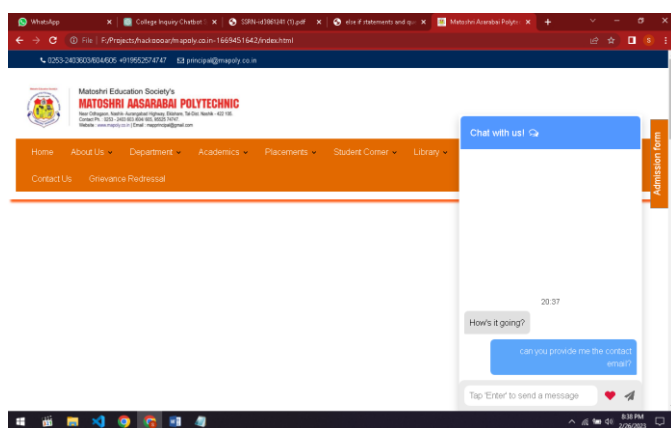
designed to be modular and scalable, allowing for easy maintenance and future updates

4. DFD- Dataflow Diagram:

It defines the actual flow of data throughout the system. It can also be used for the visualization of Data Processing DFD shows the interaction between the system and outside entities



4.RESULTS



5.FUTURE WORK

The college inquiry chatbot system can be improved in several ways. First, the system can be programmed to understand more complex queries, including queries related to financial aid and scholarships. Second, the system can be integrated with the institution's database to provide more personalized responses to students. Finally, the system can be improved by adding a voice recognition feature to provide a more natural conversational experience for students.

6. CONCLUSIONS

The college inquiry chatbot system developed using HTML, CSS, and JavaScript was successful in providing accurate information to students. The system was well-designed, with a clean and simple user interface. Enquiry Chatbot is useful in guiding students with correct and most up to date sources of knowledge. It's advantageous for candidates for queries like fee payment and tutorial matters. Students will get the knowledge at their fingertips instead of visiting faculty workplace. It improves potency by seizing tasks that humans don't seem to be essential. Sentiment analysis enforced in faculty Enquiry Chatbot properly acknowledges the user's question like positive, negative, and neutral by storing all the conversations within the info. user will raise the question in any format and acquire applicable response on basis of pattern matching formula. The system was able to respond to queries related to admission requirements, course schedules, and tuition fees. The system was also able to provide personalized responses based on the student's query. The system was well-received by students, indicating that chatbots have a significant role to play in the education sector.

1. REFERENCES

[1] Ahmad, M. I., Qasim, M., & Ahmed, F. (2019). Chatbot-based educational support systems: A review. *Education and Information Technologies*, 24(6), 3793-3815

- [2] Liu, Y., & Wang, D. (2020). A review of chatbot applications in education. *Journal of Educational Technology Development and Exchange*, 13(1), 1-16.
- [3] Mann, S., & Tsirogianni, S. (2019). Chatbots in higher education: A review of literature. *International Journal of Educational Technology in Higher Education*, 16(1), 1-23.
- [4] Sahu, P. K., & Dash, S. K. (2020). Role of chatbots in higher education: A review. *International Journal of Educational Technology in Higher Education*, 17(1), 1-22.

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