eGain SWE Take-Home Assignment

Customer Service Chatbot Interaction Designer

Introduction

Welcome to eGain! As a leader in customer engagement solutions, we're constantly innovating ways to improve customer service interactions. For this assignment, you'll be designing a small but interesting chatbot conversation flow that demonstrates your creativity, problem-solving skills, and understanding of user experience.

Assignment Overview

Task: Design a simple chatbot conversation flow for one of the following scenarios:

1. Helping a customer track a lost package
2. Assisting a customer with choosing the right product (e.g., laptop, phone plan, etc.)
3. Guiding a customer through a simple technical troubleshooting process

Requirements

1. **Conversation Design**: Create a flowchart or decision tree showing the conversation paths
2. **Prototype**: Implement a simplified version of your chatbot using either:
   a. HTML/CSS/JavaScript (basic web interface)
   b. Python (command-line interface)
   c. Any other programming language/tool you're comfortable with
3. **Error Handling**: Include at least two examples of how your chatbot handles unexpected user inputs
4. **Presentation**: Prepare 3-4 slides explaining:
   a. Your design choices
   b. Technical implementation
   c. Challenges faced
   d. How you would improve the chatbot with more time

Evaluation Criteria

We'll be looking at:

- **Creativity**: Is your solution innovative and engaging?
- **Technical Skills**: How well did you implement the prototype?
- **Problem Solving**: How effectively does your chatbot handle the chosen scenario?
- **Presentation**: How clearly can you explain your thought process and implementation?

Submission Instructions

1. Create a GitHub repository for your code
2. Include a README.md with:
    a. Setup/installation instructions
    b. Brief explanation of your approach
    c. Screenshots/examples of the chatbot in action
3. Prepare your presentation (3-4 slides, PDF format)
4. Send the GitHub link and presentation to [recruiter_email] by [deadline]

Tips for Success

- Focus on creating a smooth, logical flow rather than complex technical features
- Consider edge cases in customer interactions
- Keep your code clean and well-commented
- Test your chatbot with a few different conversation paths

Time Management Suggestion

- Planning/Design: 15 minutes
- Implementation: 30 minutes
- Documentation/Presentation: 15 minutes

Good luck! We're excited to see your creative solutions.