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**Mental Chatbot**

In recent years, humanity has seen a rise in psychological issues, leading to suicides or the harm of others. These individuals struggle to handle their psychological disorders due to inadequate access to finances and the limited availability of healthcare professionals. Also, modern mental health services are corrective rather than preventative, meaning they only offer aid after a crisis has occurred. Patients that show symptoms of psychological disorders will require access to immediate, cheap, and judgment-free support before their conditions escalate. Artificial intelligence will be pivotal in this by providing accessible, personalized, and cost-efficient care to its users.

Artificial intelligence, when given the mass amounts of data that doctors have collected over the centuries, can give an accurate diagnosis at a fraction of the cost. A mental health chatbot created from artificial intelligence can serve as the vanguard for individuals experiencing mental health challenges. This chatbot would use natural language processing to engage in conversations with users and use machine learning to analyze user input. The chatbot would quickly recognize their disorders and provide a diagnosis. For example, if signs of suicidal ideation or the thought of harming others are shown, the chatbot would immediately flag users to seek human professionals. Otherwise, patients that have been diagnosed with other less severe disorders can choose options given by artificial intelligence to treat their disorders.

The mental health chatbot offers many benefits, but it also raises ethical concerns. First, privacy is critical, as users share personal information with the chatbot. Second, proper encryption, along with regulations like GDPR, is needed to protect user information. Third, the accuracy of the chatbot is important because the wrong diagnosis could potentially harm the user. Finally, cultural acknowledgment is important because a lack of it could lead to skewed performance across demographics. Addressing these ethical concerns will be essential to ensure the effectiveness of the chatbot.

This mental health chatbot has the potential to revolutionize mental health support by providing accessible, cheap, and personalized assistance. By leveraging NLP and machine learning, the chatbot can engage users in meaningful conversations, detect signs of distress, and connect them with appropriate resources. However, careful attention must be paid to ethical concerns such as privacy, accuracy, and bias to ensure the solution is both effective and responsible. This type of artificial intelligence will require extensive testing from doctors and willing patients to be successful.