# ExpertEase: Real Experts, Real Solutions

Sakshi Ashtekar<sup>\*1</sup>, Preeti Mehta<sup>\*2</sup>, Aditya Pawar<sup>\*3</sup>, Jash Sureja<sup>\*4</sup>, Prof. Priyanka Khalate<sup>\*5</sup> <sup>\*1,2,3,4</sup> Student, Department of Comp. Eng. SKNCOE, Pune, India.

\*5 Asst. Prof., Department of Comp. Eng. SKNCOE, Pune, India.

Abstract: This paper examines the innovative ExpertEase platform, which addresses the growing need for personalized learning and expert guidance in an increasingly complex world. By leveraging cuttingedge digital technologies, ExpertEase creates a bridge between those seeking specialized knowledge and industry professionals. The platform integrates AIdriven learning paths, real-time expert connections, and comprehensive career development tools to revolutionize how individuals and businesses access expertise and prepare for professional success. This study explores the key components of ExpertEase, analysing its potential to transform online learning, expert consultation, and career development. By facilitating meaningful interactions between learners and industry experts, ExpertEase aims to redefine the landscape of knowledge sharing and professional growth in the digital age.

# INTRODUCTION

Many individuals and businesses face significant challenges in finding and connecting with relevant experts when faced with complex problems or seeking specific insights. Traditional educational systems often fall short in providing personalized attention to students, leaving many with unresolved doubts and queries. This gap in accessible expertise has become a driving force behind the development of innovative solutions like ExpertEase.ExpertEase emerges as a visionary platform designed to address these challenges by creating a dynamic ecosystem that connects knowledge seekers with industry experts. At its core, the platform aims to revolutionize the way we acquire, share, and apply specialized knowledge in real-world scenarios. By advanced digital technologies, leveraging ExpertEase not only facilitates connections but also enhances the learning experience through personalized AI-driven pathways and comprehensive career development tools.The platform's approach is multifaceted, recognizing that in today's fast-paced environment, success often hinges on the ability to quickly access and apply relevant expertise. ExpertEase goes beyond

traditional e- learning models by offering a unique blend of one-on-one expert sessions, AI-powered support, and a community-driven knowledgesharing environment. One of the key innovations of ExpertEase is its flexibility in meeting user needs. The platform allows students to post doubts with specific time preferences and budget constraints, while experts can choose to address these queries during their free time. This not only provides students with personalized attention but also creates new income streams for professionals willing to share their expertise.

## BACKGROUND

In today's world, personalized learning and expert guidance especially the ones who are working in specific industry has become more important as students facing academic challenges. are Conventionally education systems were lacking in providing one to one attention to students which left the students with their unresolved doubts and queries. This became the motivation to develop ExpertEase which bridges the gap, where students can post a doubt on this platform and domain specific expert will help that student to get that doubt or query resolved by scheduling an online meet. Students can post a doubt by mentioning their time preference and charges they will be comfortable with. Scheduling one to one meet will be beneficial for students to interact with the industry experts and gain personalized attention. Choosing time preference for both student and expert will be an advantage of flexible learning which promotes convenience. ExpertEase not only provides personalized learning and education but also generates business for experts by representing their knowledge in their free times. This becomes an opportunity to both students and experts to maintain a balanced ecosystem.

## LITERATURE SURVEY

The role of chatbots in a flipped learning

environment to add to student engagement and performance expectations is emphasized in [1] by Risang Baskara. It is based on a theoretical model, by revising prior content from esteemed databases like Scopus and World of Science. The core principle of the flipped learning model is to transform conventional classroom learning by allowing students to study lecture materials in an independent environment and using the classroom time for enhanced collaborative learning through discussions and analytical thinking. This can be further enriched by chatbots, which lead to tailored assistance, encouraged cooperation, and on-the-spot critique. This helps learners administer their autonomous learning and engage in peer discussions. Nevertheless, there are very few experimental studies that provide evidence for the favourable influence of chatbots on learning consequences and their abilities to fit diverse needs.

We get an in-depth evaluation of CPS by [2] Ruan Xiaomeng, Jiang Peijie, et al., which is a fusion of intellectual and social procedures. This paper comprehensively analyses 528 studies from the last 10 years, emphasizing that CPS research mainly focuses on Computer-Supported Collaborative Learning (CSCL) and cognitive modelling. Feature extraction, task analysis, and computation modelling are found to be the vital hotspots. It also offers insights into the spatial dispersion of analysis. The imposes the consequentiality research of incorporations of tutors' CPS and ICT skills to enhance results. Moreover, the gaps due to constrained collaboration among global institutions are also emphasized.

Thorough insights are provided in [3] by Mohammed Rizvi by diving into the advancements and capabilities that AI-powered learning infrastructures possess by make use of technologies like Machine Learning, NLP, Data Analytics, etc. to provide personalized learning to students based on their learning curve, shortcomings, and concurrent educational needs. These AI-powered coaches have the power to redefine mainstream educational system. This paper also draws attention to Intelligent Tutoring Systems (ITS), which is a system that evolves based on continual performance evaluation. However, this paper also showcases some crucial obstacles including data privacy, security, and credibility of chatbot-generated responses. Not to forget, the use of chatbots may lead to some ethical dilemmas too. While these

technologies offer incredible potential, a predominant part of existing models are still in their exploratory phases, and they need to be developed considering their ability to influence a diverse range of students.

Florim Idrizi et al. comprehensively compared various pattern-searching strategies, such as Naive, KMP, Rabin-Karp, Finite Automata, Boyer-Moore, Aho-Corasick, etc in [4], as these algorithms are employed to search patterns within huge datasets. Various programming languages were compared based on the study of their complexity analysis and it was concluded that Java performs faster, notably for larger datasets. The research includes tables that outline execution times, providing a brief overview of how different algorithms execute for different programming languages and processors. However, aspects like memory usage or real- time applications in various systems are not considered.

A. Challa and N. Anute give a profound analysis of the prospering online education platforms in [5], highlighting the transition from conventional learning to app-based e-learning in India. As technological advancements continue, numerous educational institutes and students are endorsing these online learning platforms due to their resilience, versatility, and student-centered teaching approach. This paper lays out the strategic analysis of various platforms, outlining their growth patterns, specifications, and marketing strategies along with the advanced technologies and engagement tactics used to enhance real-time mentorship. Whilst these platforms might raise concerns about affordability and data privacy, addressing these gaps in convenience, cost-effectiveness, and security is crucial for these platforms to thrive.

The acquisition of online teaching methodologies is examined in [6] by Darius Preethi Sheba Hepsiba, et al., especially during COVID-19. The research included a survey of 450 students across India to study the effectiveness of online learning tools. Based on the survey, strategies like recorded lectures, virtual teamwork with peers, etc. turned out to be most impactful. While this learning environment offers flexibility in learning, challenges like network issues and distractions at home ended up being the major obstacles. Moreover, it also lacks profound analysis on impacts like retention of knowledge and lack of practical skills development strategies.

#### GAPANALYSIS

As per our research, we observed that there is an insufficient amount of trust from students due to the lack of clear expert verification. ExpertEase provides a manual multi-step verification process of experts ensuring student's trust and credibility. Proper categorization of doubts depending on their domains is what products in the market lack, ExpertEase bridges this gap by displaying a list of experts depending on student's domain to the student and list of relevant doubts depending on expert's domain to the expert. Along with this, ExpertEase provides a feature to search doubts or experts depending on various domains. To overcome the disadvantage of lack of follow up system leading in user dissatisfaction, ExpertEase provides a feedback form after every meeting for the student as well as the expert ensuring a clear interaction between the two. If any concerns are raised by either of them, the recorded meeting is reviewed by ExpertEase's backend team to ensure user satisfaction and trust.

ExpertEase has introduced a tiered pricing model which provides different charges based on feedback provided and time given by the expert which ensures a transparent pricing model for both the expert and the student. Platforms present in market lack in providing a structured expert guidance. ExpertEase offers career counselling sessions, resume reviews from industry experts, and industryspecific guidance sessions. ExpertEase provides a from onboarding, structured process expert matching, payment, consultation, to follow-up making ExpertEase a user-friendly, reliable and trustworthy platform. Further, ExpertEase aims in building a strong community of students and experts ensuring seamless knowledge sharing.

# PROPOSED SYSTEM

There are two interfaces when any user enters in the app, namely Expert and Student. All the new users are first asked to register and then login either using email or directly through google authentication.



If the user is an expert, he/she will then be directed to the expert home screen which contains various doubts posted by students. The expert is given an option to search doubts depending on the domain given in doubt description. If the expert finds a doubt which can be solved by him, he can then send a request to student. If the student approves, a meet can be scheduled using google meet given in the app and can provide his time preference along with his charges. This scheduled meet is then reflected in his as well as the student's google calendar. A push notification as well as an email notification will be sent to student to approve or decline this scheduled meeting depending on the time and charges. After the meeting, a feedback form is sent to both the expert as well as the student. Expert can see his past solved doubts in the history section of app which will be stored in database.

If the user is a student, he/she will be directed to student home screen which contains various experts of various domains. The student is given an option to search experts depending on their domain. If the student finds a relevant expert, he/she can send him a request. A push notification as well as an email notification will be sent to expert to approve or decline this scheduled meeting depending on the doubt posted by student. If the request is approved by the expert, the expert can then schedule a meet. Once the meeting is scheduled, the student is asked to pay in full through the app, and depending on the feedback from both student and expert money will be either sent to the expert or returned back to expert. A part of charges decided will still be given to the expert for his time. Student can see his past doubts in the history section of the app which will be stored in database. After the meet, either the student or the expert can upload a recording of the meet to ensure fair interaction. A 24/7 chatbot is provided to ensure immediate responses to users.

## CONCLUSION

This application is developed as an innovational doubt-solving platform that connects students with industry experts. This allows student to post their domain specific doubts and queries which can be of any field by selecting their preferred time and the price range they are comfortable with. Experts can choose these doubts in their leisure and assist students to get their queries solved bv scheduling online meet. This makes knowledge transfer more approachable and advantageous ensuring flexible and organizable resolution process. ExpertEase bridges the gap between students and experts enhancing synergic learning platform with added benefits of one-on-one sessions. It also creates new income stream for the experts by representing their knowledge in their free time. More than just a framework, it is a transformative tool that holds the power to revolutionize the way we comprehend, acting as an accelerator for personal as well as professional growth.

# REFERENCES

- 'Chatbots and Flipped Learning: Enhancing Student Engagement and Learning Outcomes through Personalised Support and Collaboration'- IJORER International Journal of Recent Educational Research 4(2):223-238. (March 2023). FX. Risang Baskara. 0.46245/ijorer.v4i2.331.
- [2] 'Research on Online Collaborative Problem-Solving in the Last 10 Years: Current Status, Hotspots, and Outlook—A Knowledge Graph Analysis Based on CiteSpace'- Mathematics 11(10):2353. (May 2023). Jiang Peijie, Ruan Xiaomeng, Feng Zirong, Jiang Yanyun, Xiong Bin. 10.3390/math11102353

- [3] 'Investigating AI-Powered Tutoring Systems that Adapt to Individual Student Needs, Providing Personalized Guidance and Assessments'- The Eurasia Proceedings of Educational and Social Sciences 31:67-73. (October 2023). Mohammed Rizvi. 10.55549/epess.1381518
- [4] 'Analysis of Pattern Searching Algorithms and Their Application'- International Journal of Recent Contributions from Engineering Science & IT (iJES) 10(04):32-42. (December 2022). Florim Idrizi, Shpend Ismaili, Florinda Imeri, Agon Memeti. 10.3991/ijes.v10i04.35295
- [5] 'Strategic Analysis of Emerging Online Tutoring Platforms in India'- Vidyabharati International Interdisciplinary Research Journal 12(2)30-9-315. (August 2021). A. Challa and N. Anute. ISSN 2319-4979.
- [6] 'A Survey on the Effectiveness of Online Teaching–Learning Methods for University and College Students'- Journal of The Institution of Engineers (India) Series B 102:1325-1334. (April 2021). Darius Preethi Sheba Hepsiba, Gundabattini Edison, Solomon Darius Gnanaraj. 10.1007/s40031-021-00581-x
- [7] 'Integration Model of Multiple Payment Gateways for Online Split Payment Scenario'-International Conference on Information Management and Technology, Semarang, Indonesia: 122-126. (2022) M. Hisyam and I. B. K. Manuaba. 10.1109/ICIMTech55957.2022.9915168.
- [8] 'A user-centric framework for educational chatbots design and development'-International Conference on Human-Computer Interaction, 32–43. (October 2020). Bahja, M., Hammad, R., & Butt, G. 0.1007/978-3- 030-60117-1\_3
- [9] 'OLMS: Online learning management system for e-learning'- World Journal on Educational Technology Current Issues 9(3):130-138. (July 2017). Vinay Kumar Ippakayala, Hosam El-Ocla. 10.18844/wjet.v9i3.1973
- [10] 'An empirical research on customer satisfaction study: a consideration of different levels of performance'- SpringerPlus 5(1). (December 2016). Yu-Cheng Lee, Yu-Che Wang, Shu-Chiung Lu, Yi-Fang Hsieh. 10.1186/s40064-016-3208-z