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Design of Online Quiz System for Practice & Assessment During Covid-19

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ABSTRACT

After the new Coronavirus illness (COVID-19) case spread quickly in Wuhan-China in December 2019, World Health Organization (WHO) affirmed that this is a hazardous infection which can be spreading from one people to another through drops and airborne.. This pandemic has forced Educational institutions (schools, colleges, and universities) in whole world dramatically to odapt to e-learning. In right now, colleges, instruction controllers and educators are associated with much conversation how to best get ready test framework for assesemtn so understudies can accomplish their scholastic exhibition and can rehearse for MCQ based tests. The utilization of online apparatuses to show courses in different orders has acquired prominence during this pandemic. In This paper we will develop an Online Quiz system for free self practice so students can judge their own performance before sit in professional online exam.they will get idea from that self practice Online Quiz system or online quiz board development is a training package designed to test students ' comprehension of translating the timing diagram into an analogous ladder diagram. [3].

Key words: E-Learningnin, Covid-19, Internet, Quiz, design assessment.

1. INTRODUCTION

The dangerous and convincing infection Corona Virus regardless called Covid-19 has essentially influenced the general economy. This difficulty has additionally stirred up the planning district, and this dread is probable going to reverberate across the mentoring area generally. The Covid-19 pandemic emits constrained different schools and universities

all in all we can every instructive area.. to stay shut for a brief time. Because of the COVID-19 pandemic, innovative and authoritative frameworks for carrying out internet learning, and the foundation that upholds its entrance and conveyance, needed to adjust rapidly. While access stays a huge issue for some, broad assets have been designated and measures created to associate students with course exercises and materials, to work with correspondence among educators and understudies, and to deal with the organization of web based learning. Ways for more noteworthy access and freedoms to online schooling have now been produced, and there is a reasonable course for the up and coming age of adopters of online training. Prior to the pandemic, the main role of distance and online schooling was giving admittance to guidance to those generally incapable to take an interest in a conventional, place-based scholastic program. As its motivation has moved to supporting progression of guidance, its crowd, just as the more extensive learning biological system, has changed. It will be fascinating to see which parts of crisis distant instructing stay in the up and coming age of schooling when the danger of COVID-19 is not, at this point a factor. Yet, online training will without a doubt discover new crowds. Furthermore, the adaptability and taking in conceivable outcomes that have risen up out of need are probably going to move the assumptions for understudies and teachers, decreasing further the line between study hall based guidance and virtual learning. According to WHO report 1.2 billion children are out of the classroom during pandemic.it also difficult to conduct physical assemnts with standard operating procedure (SOP). A standard working methodology (SOP) is a lot of little by little bearings amassed by a relationship to assist workers with doing routine undertakings. Now a days almost all Educational institutes using E-learing and taking online quizes to judge students performace instead of descripitive written questions. In Online quiz system its good thing that everything understudy can sit in a test from any area through web. Online Quiz System (OQS), is an electronic test framework; a framework that can be utilized by speakers to assess understudies adequately, productively and impeccably. The fundamental

reason for develponig Online Quiz System is to understudies would self be able to rehearse and get familir with online test framework. In pur created test framework answers are naturally stamped. Online Quiz System is created by utilizing a standard based calculation. Rule-based calculation utilized in this framework is short answer dependent on catchphrase. The main purpose of this system that We have designed this web based app with the purpose of allowing the students to give practice quiz for the preparation of their exams and can view their result. Through online quiz system students are able to focus on the questions that which type of questions may come in their exam and examine themselves.

2. PROBLEM STATEMENT

Today the world has done the great progress in the field of science and technology. Now a days students are not interested doing studies through paper or pen they want everything digitalized. By using the platform like our online quiz system student can prepare themselves and can achieve good grades. It is also problem for teacher to check manually quiz for every students, its time consuming and boring practice. also problem for students they can not practice their quizes form nay location bacesua they can not take bag of books to any where. To over come this we heve developed a Quiz system to practice from any location.

3. RELATED WORK

Online Quiz framework site is created to work with clients particularly educators and understudies in the instruction field to improve their abilities through stepping through examinations and tests. The sites can help educators and understudies to save time.[1] .Online Quiz System is an electronic test framework for getting to understudies. It's anything but a framework by which understudies can sit in a test that needs no pencil and paper. These days, understudies take tests physically[2],[4],[5],[6],[7,] were the educational based develpeod projects, progressions in advancement have made distance preparing easy[3]. "By a landslide a huge bit of the terms (electronic, open, web based learning, m-learning, for ex.) share for all concentrations and reason the capacity to utilize a PC related with an association, that offers the likelihood to get from any spot, whenever, in any musicality, with any means"[4]. Worked with learning can offer a huge load of chances for socially organized exertion [3]). Amidst this dangerous corrupting spread such online stages are required where (a) video conferencing inside any occasion 40 to 50 understudies are possible, (b) discussions with understudies ought to be reachable to keep classes customary, (c) web affiliations are worthy, (d) addresses are open in PDAs moreover and not just PCs, (e) likelihood of seeing viably recorded discussions, and (f) the second assessment from understudies can be refined and endeavors can be taken[3], [8][9][10][11][12][13][14][15][16] study shows that how to asses students performance.

4. METHODOLOGY

In this section, we have discused subtleties of approach being utilized in programming advancement. The task approach is significant on the grounds that it assists with getting sorted out examination in a logical manner to defeat issues, construction, plan, and control the way toward fostering a data system. The framework will utilize Iterative Model advancement as a structure procedure.



Figure 1: SDLC life cyle

After framework has been totally evolved, it ought to be tried to ensure it accomplishes the goals of the venture. Additionally, we will clarify the utilization case graph of Quiz framework. There are various types of models in the Software Development Life Cycle (SDLC). which are Waterfall Model, V-Shaped Model, Evolutionary Prototyping Model, Spiral Model, Iterative Model, and Agile Model. One of the sorts is an Iterative Model. In This quiz system Studens can login to enter in quiz, Admin can Create, update delete questions of subjects according to updated verion of books. User can view attempt questions and after finishing it, maks will be calculate according to automatic result marking and result sheet generate user can view result.result score.

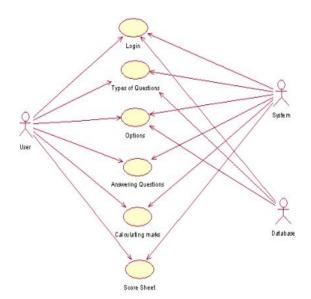


Figure 2: Research Methodoly of System

5. METOOLS AND TECHNOLOGY

Visual studio tool we used visual studio to write code for develop quiz system. Features combine help for examining, language structure including, sharp code fulfillment, pieces, code refactoring, and implanted Git also we have used some scrpiting languages to develop system PHP,HTML,CSS, Java script etc. PHP (PHP which is intialy was persanl home page but after some time it called for PHP server side scripting language, it is an extensively used opensource and master side setting up programming language which is made to store a substitute number of fundamental and convenient web applications progress which can be run and overseen on any working operating system. PHP is scropitng language as discssued early stages. It is fundamental. overwhelming, and object-oriented language in updated version. PHP code can be perfectly embeded into HTML(Hypertex mrkup lnaguage) basicall html is know as markup language, annals additionally as we wnt to make it user interface so we breaking point and its grant is freed from cost. Additionally, JQuery and AJAX ,javascript are mostly used as helping instruments with markup and server side scripting languages to make good user intafce applications and dynamic websites.CSS represents Cascading Style Sheets. It is customer side prearranging language and used to give style to a website page.MySQL data base we have used this project to store entries, Results, user, questions and types of questions. My SQL stands for Structured Query Language. It is used for storing data data base we used.

5.1 Manger Authorities(system admin)

When an administrator is first signed into the framework, He is diverted to the primary page. From that point, he can play out his specialists. One of the specialists given to the administrator can make test, plan questions, oversee subjects oversee clients, results, the administrator can Update own Profile, and furthermore see all that which is accessible at administrator board and displayed on Fig3..



Figure 3: System Admin Login page Panel

5.2 CRUD operations(Create, Updatem, Delete and Status)

The Manager of of this developed quiz system has rights to perfrom CRUD operation in this system. CRUD mean create, update, delete, mean Admin can perform all taskin under his rights. He can delete any user or update name or addres of any user registerd in system. Fig 4.

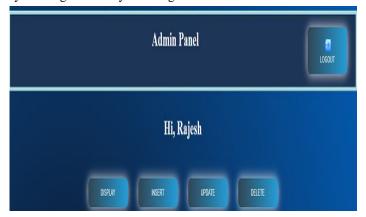


Figure 4: Crud Operations

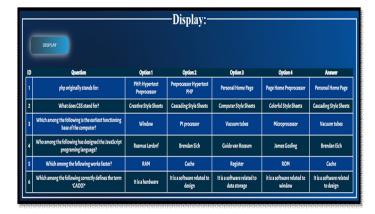


Figure 5: Display page

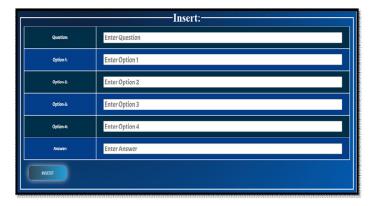


Figure 6: Create/Insert question

Like the above figure admin can update, create and delete the quesiotn and can perfrom taks mentioned in Administritive authorties section.

5.3 User Authorities

At the point when a client is first signed into the framework, He is diverted on the principle page. From that point, he can rehearse for Quizzes to pass judgment on their own presentation. He can practice quiz multiple times, every time question will be apopear randomized so he practice more affectively after finifng the quiz result score will be apper at the bottm of user page from he can check their score, totak correct question, wrong questions, and answers of all corect questions. as shown on Fig5.



Figure 7: Uers Quiz

6. RESULTS

Total 100 students were asked to practice the quiz. More than 75 students were satisfied with online quiz system to practice on quize system (according to survey taken via google form) before sit in real online exam system.most of the students agreed by using online quiz system we can parctice it from any location. Hence our result showd that our developed online quiz system is good for practice to ensure your exam prepration is good.

7. CONCLUSION

Now a days Pandimic forced to replace manual education in online examination system unexpectedly, so many students are not familiar with online education. Thats why we have developed an online quiz system for self practice to check your prepration before sit in real online exam. In our developed online system it help users to familiar with online education, understand, how to attempt question, and manage time in real time online exam system. After the completing the exam user can view result of attempted practice exam. And again user can attempt exam. no limit for practice many time one user can practice online exam. This will also help for instructors to verify results from automatic marks result system. It help to save time to check copies manually.

8. FUTURE WORK

In our quiz system we have focused only multiple choise question based exam, it can be further improved with some additiaonl features like descrtion written questions, students can invite more friends, chatbox can impletent in this to chat with friend and can discuss the problem statements because friends each other can explain it in beteer way with discussion.

REFERENCES

- [1]ABID, FAIZA. "ONLINE QUIZ SYSTEM SPA ONLINE QUIZ SYSTEM." PhD diss., University of Management and Technology, 2013..
- [2]IBRAHIM, ROSHIDAYU BINTI. "ONLINE QUIZ SYSTEM."
- [3]Mohammad'Afif Kasno, Nik Muhammad Firdaus Zaimi, Kamaru Adzha Kadiran, Shahrizal Saat, A. F. Z. Abidin, Mohammad Faisal Abdul Waduth The Electronic Educational Quiz Board Development to Test Student's Timing Diagram Knowledge of the Ladder Diagram in Programmable Logic Controller. V-9, Issue-5 IJATCSE(2020)
- [4]McBrien, J. L., Cheng, R., Jones, P. (2009). Virtual spaces: Employing a synchronous online classroom to facilitate student engagement in online learning. The International Review of Research in Open and Distributed Learning, 10(3), 1–17
- [5]Cojocariu, V.-M., Lazar, I., Nedeff, V., Lazar, G. (2014). SWOT analysis of e-learning educational services from the perspective of their beneficiaries. Procedia-Social and Behavioral Sciences. 116, 1999–2003
- [6]Singh, V., Thurman, A. (2019). How many ways can we define online learning? **A systematic literature review of definitions of online learning** (1988-2018). American Journal of Distance Education, 33(4), 289–306.
- [7] Lister, R., & Leaney, J. (2003). Introductory programming, criterion-referencing, and bloom. ACM SIGCSE Bulletin, 35 (1), 143-147.
- [8] Liguori, E. W., Winkler, C. (2020). From offline to online: Challenges and opportunities for entrepreneurship education following the COVID-19 pandemic. Entrepreneurship Education and Pedagogy
- [9]Bhargav H S, Application of Blooms Taxonomy in day-to-dayExaminations IEEE(2016)
- [10] Song, L., Singleton, E. S., Hill, J. R., Koh, M. H. (2004). Improving online learning: Student perceptions of useful and challenging characteristics. The **Internet** and **Higher Education**, 7(1), 59–70.
- [11] A. Subiyakto, A. R. Ahlan, M. Kartiwi, and S. J. Putra, "Measurement of the information system project success of the higher education institutions in Indonesia: a pilot study," International Journal of Business Information System.
- [12] M. Lloyd, "Towards a definition of the integration of ICT in the classroom," AARE'05 Education Research Creative Dissent: Constructive, pp. 1-18, 2006
- [13] Chen Ying-ying. The Design and Implementation of Online Examination System with Characteristics of Cloud Service [D]. Beijing University of Posts and Telecommunications, 2013.

- [14] Man Yong. The Design and Implementation of Online Examing System [D]. Hunan University, 2012.
- [15] Rajesh Kumar ,Bhawani Shanker Chowdhry ,
 Hameed Ullah Kazi, "Identifying Cognitive
 Weaknesses in Students
 Learning through Blooms Taxonomy",Journal Of
 Information Communication Technologies And
 RoboticsApplications(JICTRA),December2017,
 Volume 8, p 68-73 [ISSN: 2226-3683].
- [16] Wang Kun. The Design and Implementation of Online Examination. IEEE(2015)