Skill Evaluation Lab   Case Study

Sathyabama University Deploys Skill Evaluation Lab, Online Exam Management System to Meet Exam Accessibility for placement and college exam needs.

Electronic supported assessment or online exam assessment is the current computer based assessment models focus on the assessment of knowledge rather than deeper understandings, using auto evaluation type questions. This study explored a new system based on next generation exam needs and EPractize Labs come up with an assessment tool named Skill Evaluation Lab. The system has been made available for other researchers to use at http://www.onlineexamlab.com .

Sathyabama University is a pioneer institute imparting knowledge in the areas of engineering, science, technology and education. The institution's progress and contribution in the field of technical education for over two decades made the Ministry of Human Resources Development, Govt. of India to grant Deemed University status on 16th July , 2001 and University status on 13th September , 2006 under section(3) of the UGC Act, 1956.

The University offers courses in 24 branches of Engineering at the UG level and 24 courses at PG level in addition to Sciences, MBA, MCA and Ph.Dprograms in all disciplines. The University has excellent infrastructural facilities including modern laboratories, library with video, Internet and other general amenities. To its credit it has been awarded as Category " A " University by Ministry of Human Resource Development (MHRD) , Government of India . The University has undertaken various sponsored and collaborative Research and Development projects funded by national organizations such as Indian Space Research Organization (ISRO), Department of Science and Technology (DST), Indira Gandhi Centre for Atomic Research (IGCAR), Defense Research and Development Organization (DRDO), National Institute of Ocean Technology (NIOT), Ministry of Environment and Forests (MoEF) etc,. The University holds great promise to expand the applications of space technology, benefiting the common man and enriching the quality of life in association with Indian Space Research Organization (ISRO) the university is successfully conducting non formal education programs through 18 Village Resource Centers (VRCs) all over the state.

Challenge

The university began exploring options to help enable their candidates to take exams remotely while maintaining integrity. As part of their research, they needed the solution to satisfy two important criteria; first, the ability to completely secure (or invigilate) an exam remotely and secondly, a complete scalable platform to take exams for up to 2000 candidates at a time.

Solution

EPractize Labs partnered with Sathyabama University to explore the potential solutions for securing their exams remotely. Their approach took into consideration the following:

The placement cell wants to conduct online test for more than 1000 concurrent users (up to 2000). EPractize Labs recommends single server with the following configurations.

RAM: 3 GB (4 GB recommended)
System Type: 64 Bit
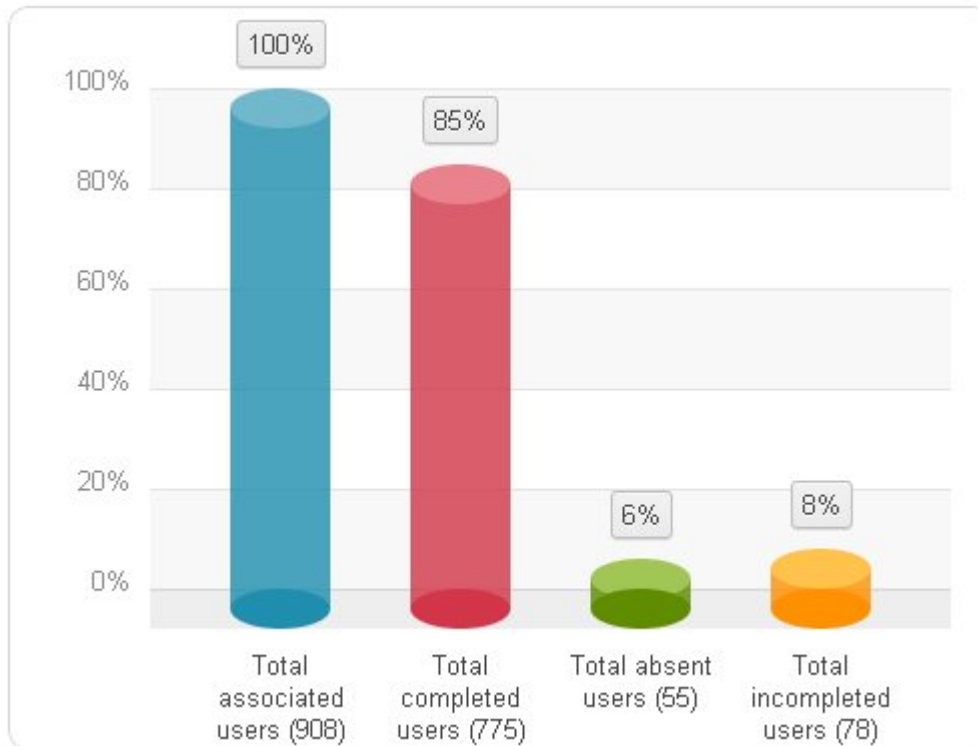Processor: 2.2 GHZ or higher
OS: Windows/Linux

Results

EPractize Labs team executed trial test at Sathyabama University campus and proved that Skill Evaluation Lab platform meet their online exam requirements.
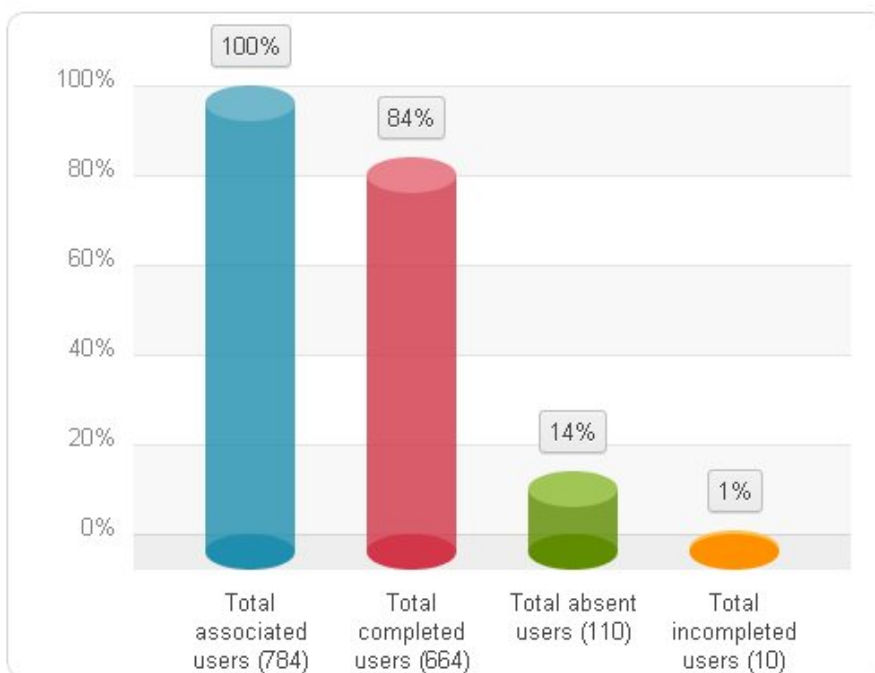
Execution (Charts taken from Skill Evaluation Lab)

Day 1: 11-Sep-2012

The test event went well on day 1 with few login issues. The tech team from EPractize Labs sorted out this issue on the exam venue instantly.

Day 2: 12-Sep-2012

The test event went really well when compared to day 1.

Conclusion

The test event does not have evidence about scalability issue. The product proved to support more than 1000 concurrent access within SathyabamaUniversity's network from single server instance.