

# Online Testing and Assessment System

## Background

With the advancement of ICT, not only the instructional system but the examination and evaluation system is also being influenced to a great extent. Especially in Open and Distance learning (ODL), ICT has an important role to play. The *Open and Distance Learning* (ODL) is now being transformed into *On-Demand Learning* (ODL). Likewise, the examination On-Demand and online has become the need of the hour, making the ODL more flexible and learner friendly.

e-Test is such an innovative online testing tool developed by the NCIDE, which has multipurpose utility in the field of evaluation and assessment. This powerful software may be used for learning through assessment as well as for various types of web based testing, assessment, and survey exercises.

## Need of the Innovation

The distance learners particularly at higher education level, most of whom are working want “**instant testing-instant result**”. In today’s ICT based fast track education system the online examination and web based evaluation seems to be a viable solution, because it is quick and easy to use, and it saves time in managing tests/exams/assessments/surveys. Besides being cost effective, reliable and more learner friendly, it saves time for paper setting, evaluation and result processing. Keeping it in view, an idea of developing an online testing tool came upon and it was named as e-Test.

## Description of the Innovation

e-Test is a software application developed on dotNet platform having components of online registration for exam, test paper generation system, auto evaluation and result processing system. e-Test has any time any where testing facility for all the applications except for Online examination. The online exam will be conducted at the selected Exam Centres under closed circuit cameras. Students registered for online Exam are required to come to the selected Exam Centre for appearing in the exam. They should bring with them the Hall ticket and the Identity Card issued by IGNOU to appear in the Exam.



## Innovative Features of e-Test

e-Test is a unique application having several innovative features. Some of them are given below :

- It is a user friendly system easily accessible to any person anytime from anywhere with authorized access.
- It has a provision for separate Question Banks for each application with definite security features. Also, it is flexible in terms of number of questions and time for compatibility which may be adjusted as per the requirement of teacher/learner.
- Each learner is assigned a unique assignment/test paper and questions are selected randomly from a large question bank for generating test paper.
- It has a centralized database management system with authorized access to the users.
- Data Security and confidentiality is ensured using appropriate safety measures. Such as each session of a test has a time out provision for each student, there is no possibility of URL tempering after authentication and before proper sign-out and also the administrators' password is in encrypted form.
- Instantaneous evaluation and instantaneous result is possible.
- Online statistics is maintained to track the performance of the learners.
- Authenticated online registration for exam anytime from anywhere.
- There is a provision for online fee deposition for online exam and instantaneous admit card delivery.
- Transparent operations, secured transactions, fair examination and reliable results and the unique features of this application.

## Achievements

A prototype of the e-Test Application was designed and developed by the NCIDE. All of its components including Online Registration for Examination, Test Paper Generation, Auto Evaluation and Result Processing were tested on pilot basis using the questions taken from the Question Bank. The testing of the application was found satisfactory.

## Applications and Uses of e-Test

E-Test is a multipurpose online testing tool which can be used for online examination, online assignment, e-skill assessment and learning through testing.

Learning through problem solving is an age old common trick practiced by most of the students. e-Test provides an opportunity to learn by attempting different types of questions.

It helps learner to learn by solving problems and getting instant feedback through various types of questions. The learner gets immediate feedback question wise as well as consolidated performance of the test.

The student's assignments are very important component of the Open and Distance Learning System. But in the existing system of offline submission of assignments, there are number of problems. The Online Assignment system is another application of the e-

Test which gives solution to almost all the problems such as instant generation of Assignment Test for each block and gives instant evaluation and instant scores/grades.

It provides an online facility for continuous and comprehensive evaluation of the performance of the learner with immediate feedback and instant result. Online Assignment can be attempted from anywhere any time by the student of IGNOU. Students can check the status of their assignment submission and scores anytime from anywhere.

Aiming at instant test- instant result, the e-Test can be used for conducting online examination in various courses and also for admission and screening purposes. The online exam will be conducted at the selected Exam Centres under closed circuit cameras. In fact, the e-test is multipurpose utility for the evaluation and assessment and it can be used for the different purposes.

### **Way of Forward**

In future the e-Test can be up-scaled and be used for conducting online examination in the University. In future, it can also be need for online skill assessment method for ensuring whether the candidate has a particular skill needed for certain job or not. The assessment can address both the aspects of skills: theoretical as well as practical.

e-Test can also be used to generate and execute online Science Aptitude Test (SAT) which can be used by anybody, anytime from anywhere free of cost.

### **Coordinator and Innovator**

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