



Assessments and instructions for academic effectiveness

Innovative and interactive platform services
for a leading global education company

About the Client

World's largest learning company, operating in 70+ countries worldwide, provides content assessment and digital services to learners, educational institutions, employers, governments, and other partners.



Business Challenges

There was an inherent need to transform the platform for enabling the delivery of online and paper assessments, along with additional features such as:



Extend the ability for the educator to administer interim assessments quickly and easily in the classroom for the teacher.



Enable students to access assessment results, regardless of the test program, test administration, or the school year.



Address the need for the local education agencies to choose (or decline) a classroom or an interim assessment product which they intended to offer in their district.



Meet the need for the students to quickly launch an interim or classroom assessment using a standard login method.



Address the need for educators to hand-score student responses.



Implement testing and certification for the transformation of the legacy system while extending the new features/functionalities to the core platform.



Deploy a scalable hybrid automation framework to enable faster and accurate quality reports/ tests to deliver robust, stable, high-quality apps.



Platform overview


An always-on, high-performance system that enables an improved experience with higher collaboration between the teacher/educator and students in a classroom environment.

A few of the platform features are listed below:

- ◆ Use of a standard data model and standard configuration that is quick to implement.
- ◆ Support the OneRoster and EdFi industry standards.
- ◆ An enhanced graphical user interface (GUI) to make navigation flawless.
- ◆ Clients can select any combination of testing programs and give the educator access to all the administrative functions.
- ◆ Clients can avail the assessment performance of all students in a single application.

The HCL solution

HCL helped the client by designing and developing the platform for an integrated paper and online delivery of assessments with an end-to-end certification and validation solution.

- ◆ Developed a Scaled Agile Automation Framework using Behavioral-Driven Development (BDD) - Cucumber/Selenium/Rest API.
 - ◆ Implemented end-to-end automation and Continuous Integration (CI) using Jenkins to automate smoke test cases and perform a regression cycle overnight.
 - ◆ Optimized existing test cases and removed redundant steps, with online dashboard reporting of regression test results and defect status.
 - ◆ Deployed a multi-skilled resource pool to address the support needs for the evolving technology landscape.
 - ◆ Implemented system performance testing and fine-tuning using open-source tools like JMeter.
 - ◆ Incorporated seamless integration of multiple components in the core product.
 - ◆ Ensured extensive coverage of APIs testing using the ReadyAPI tool.
- 

The Benefits



Reduced 5+ person-years of effort by minimizing the technical complexity, and diversity of the portfolio.



Saved 10+ person-years of effort, leveraging the test automation suite for a transformed application portfolio.



Minimized cost of operations and saved 6+ person-years of effort by implementing a Core-Flexi demand management solution with behavioral-driven development to address seasonal project activity variations



There was increased efficiency and throughput with CI/ CD pipeline and continuous testing by implementing a scaled-up architecture.



Optimized material usage and saved 1+ person-years of the manual reconciliation effort by automating the process.



Improved team utilization through continuous functional and technical multi-skilling.



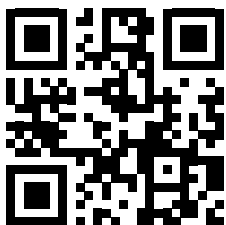
For more details contact: CS_Marketing@hcl.com



HCL Technologies (HCL) empowers global enterprises with technology for the next decade today. HCL's Mode 1-2-3 strategy, through its deep-domain industry expertise, customer-centricity and entrepreneurial culture of ideapreneurship™ enables businesses to transform into next-gen enterprises.

HCL offers its services and products through three lines of business - IT and Business Services (ITBS), Engineering and R&D Services (ERS), and Products & Platforms (P&P). ITBS enables global enterprises to transform their businesses through offerings in areas of Applications, Infrastructure, Digital Process Operations, and next generation digital transformation solutions. ERS offers engineering services and solutions in all aspects of product development and platform engineering while under P&P. HCL provides modernized software products to global clients for their technology and industry specific requirements. Through its cutting-edge co-innovation labs, global delivery capabilities, and broad global network, HCL delivers holistic services in various industry verticals, categorized under Financial Services, Manufacturing, Technology & Services, Telecom & Media, Retail & CPG, Life Sciences, and Healthcare and Public Services.

As a leading global technology company, HCL takes pride in its diversity, social responsibility, sustainability and education initiatives. As of 12 months ending on March 31, 2021, HCL has a consolidated revenue of US\$ 10.17 billion and its 168,977 ideapreneurs operate out of 50 countries. For more information, visit www.hcltech.com



www.hcltech.com