Curriculum and Learning Innovation Centre

NSW Department of Education & Training uses Adobe® software to facilitate a range of digital learning resources and interactive tools for teachers and students across the state.

Laptops lead the way for education's new era

A division of the New South Wales Department of Education & Training (NSW DET), the Curriculum and Learning Innovation Centre (CLIC) supplements traditional classroom learning with interactive and emerging technology resources. CLIC develops products and services to support both teachers and students in schools across New South Wales—Australia’s most populous state—as well as TAFE, a vocational training program for higher education students.

In 2009, the NSW DET began implementation of the Digital Education Revolution (DER) initiative, aiming to optimise broadband access as well as provide laptop computers to teachers and secondary students across the state, equipping them with the necessary tools to embrace the move to a digital learning era.

Raju Varanasi, director of CLIC, saw the DER’s infusion of new IT infrastructure as the ideal opportunity to optimise its own resources. A laptop for each secondary teacher and each year 9-12 student signalled an unprecedented chance to foster education innovation across the state and connect users with content that would add an interactive element to traditional classroom curriculum.

Tech tools for teachers

As laptop distribution approached, Varanasi’s team acted quickly to develop a set of engaging resources, aligned to the syllabus, to help teachers and students adapt to the new layer of technology introduced to their daily routines. "At the beginning, many teachers were unsure what to do with the equipment they received, so we aimed to quickly provide a set of digital materials with strong links to the existing classroom curriculum to get each year group accustomed to using digital resources."

CLIC chose to use several popular Adobe applications to create a wide range of dynamic and rich media content to be housed on the Teaching and Learning exchange, a digital portal operated by NSW DET. The team specifically chose Adobe solutions including Adobe Acrobat® Pro, Adobe Premiere® Elements, Adobe Photoshop® Elements, Adobe Presenter, Adobe Captivate®, Adobe Dreamweaver®, and Adobe Flash® Professional for the ease of using the software to achieve sophisticated results.

Varanasi recognised that the digital offerings from Adobe should be an essential part of a modern-day curriculum. "We had to show teachers how easy it is to use the software to heighten classroom learning in a way that resonates with today’s tech-savvy students," he says.

Becoming software scholars

CLIC devised an offering called “Laptop Wraps”, a series of concise online tutorials bundled in a way that is simple to understand and palatable for teachers looking to gain a working knowledge of the new Adobe products available to them. The Wraps feature links to existing Adobe tutorials as well as interactive curriculum-related tasks for students.
“By helping them to establish a proficiency and second-nature comfort level with software such as Adobe products, we believe these kids will have the necessary skill set to stay ahead.”

Raju Varanasi
Director, Curriculum and Learning Innovation Centre

The Teaching and Learning exchange also houses a section of “Tools4U” pages, which provide support for the range of Adobe educational software—including step-by-step tutorials and clear examples of how to use the resources in the classroom. The tasks are set up in small steps to ensure appropriate tutorial resources for beginners and tech mavens. For example, the Acrobat Pro page explains how to create forms for quizzes and develop PDF Portfolios featuring photos, videos, MP3 files, and more.

As proficiency with the new software offerings increased, teachers inquired about using the Adobe resources to develop their own content to share with the online community. In response, CLIC introduced “UCreate”, an online hub for one-page, self-created guides to support teachers using technology in the classroom.

The UCreate guides explain how to develop materials like audio podcasts, animations, music tracks, and interactive diagrams to supplement what is taught in the classroom. UCreate also provides tips for teachers to develop their own Laptop Wraps using Dreamweaver, the web development software from Adobe.

Laptops make learning fun
As was expected of the tech-savvy student body, the kids have enthusiastically embraced the shift in learning and the new resources available to them.

No longer bound to textbooks and static presentations, students across New South Wales rely on Adobe Acrobat Pro to create dynamic and interactive presentations featuring video content developed with the Adobe applications.

CLIC owns and operates a professional video studio which produces Learncast TV, an online service for the delivery of video content to any computer on the DET network through a mix of live events and a library of media content available on demand. Learncasts are produced using Flash Professional and edited at CLIC’s onsite studio with Adobe Premiere Elements video editing software from Adobe.

Specifically for the youngest students, CLIC utilised applications delivered with Flash technology to teach kids about the importance of eye health, with interactive safety games and educational diagrams to prevent eye injuries at home and in the playground.

One of the most engaging and popular learning resources CLIC has developed is “Murder Under the Microscope”, an interactive online game involving student detective groups investigating environmental ‘victims’, ‘villains’, and ‘crime sites’ over a six-week period each year. Created using Adobe Flash Professional, each day a new clue is delivered to participants via video, voice, or SMS to keep year five to year eight students engaged.
Learning by the numbers

Despite some teachers' initial apprehension about the Digital Education Revolution and the move to a digital world, CLIC has reported a steady increase in resource downloads month over month since the rollout of the laptops. For example, when first developed, CLIC's UCreate materials received just over 100 downloads per month. As teachers have become more comfortable with the technology, UCreate pages regularly receive close to 8,000 downloads each month.

The CLIC team reports that a significant number of downloads are occurring beyond New South Wales, proving undeniable demand for this type of online educational content.

Paving the pathway for computer pros

"It's exciting to not only witness such a significant change in learning, but to also be able to facilitate this evolution in schools across the state," said Varanasi. "We're able to give teachers the tools to expand their working digital knowledge and empower them to connect in a relevant way with today's technology-aware kids."

Varanasi also notes the considerable benefits for students. "We have a responsibility to prepare today's students to enter the real world with the digital literacy they need to be successful. By helping them to establish a proficiency and second-nature comfort level with software such as Adobe products, we believe these kids will have the necessary skill set to stay ahead."