

CANON FOR EDUCATION

THE BENEFITS OF PAPER-BASED LEARNING

If your school isn't prioritising paper-based learning as part of its educational strategy, it's missing a big opportunity to improve student outcomes.

Where
brilliance
begins



For more than 40 years, research has highlighted the benefits associated with paper-based learning. The use of printed materials in the classroom and other educational settings delivers cognitive, emotional and practical benefits to students that digital devices—so far anyway—just can't match.

POSITIVE IMPACT ON LEARNING OUTCOMES

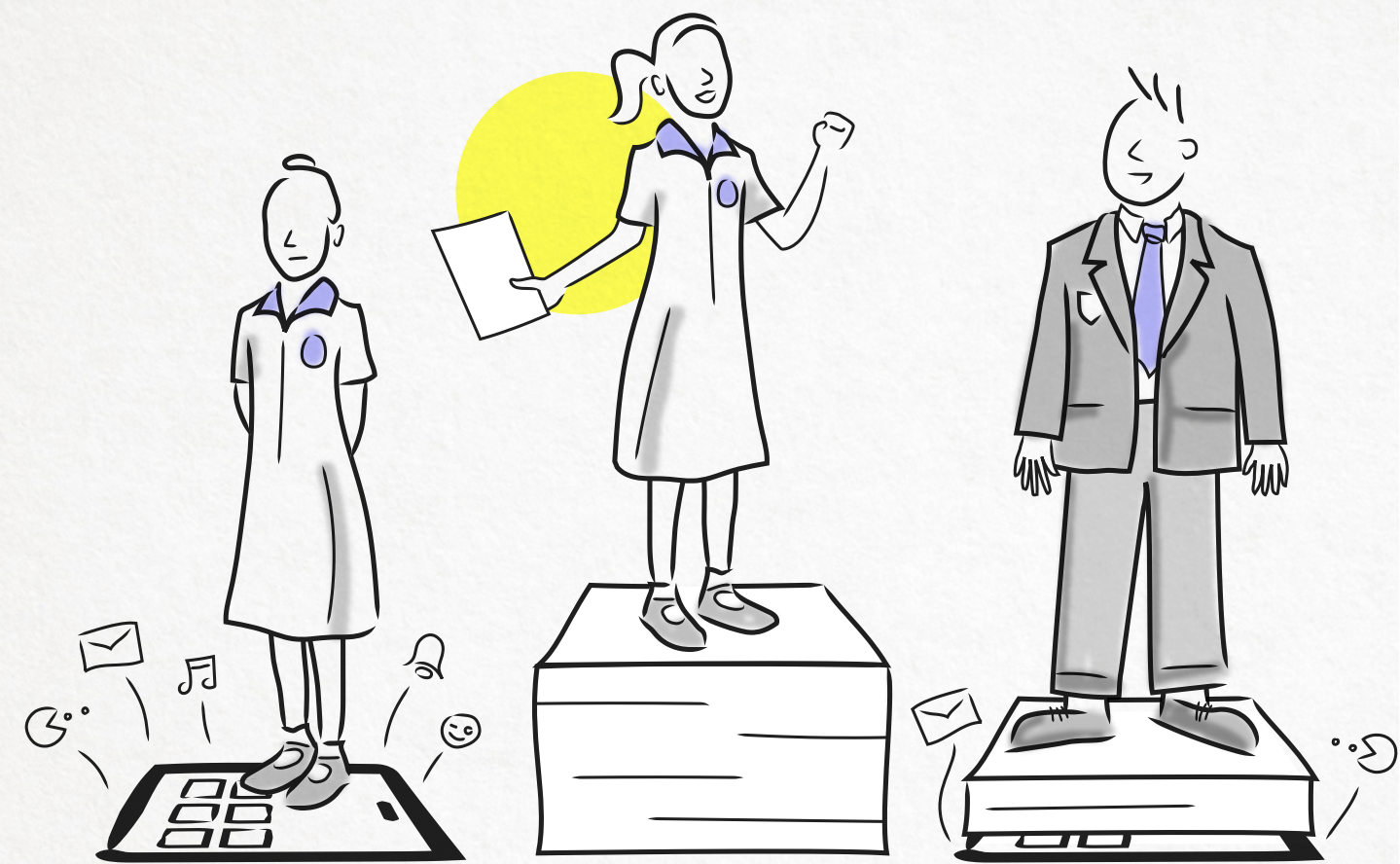
One of the most compelling arguments for the use of paper-based learning materials is the demonstrated impact they have on student learning outcomes. Numerous studies have shown that students perform better when they engage with printed educational materials rather than digital devices.

Writing in *Memory & Cognition* in 1983, Eugene A. Lovelace and Stephen D. Southall revealed that humans make mental maps during the learning process. Being able to 'place' those maps on a physical page helps us remember things. When students read books and use printed worksheets in the classroom, they're making mental maps that can be called upon later.

Comprehension is another area where paper trumps digital tools. In 2018, *researchers from Israel and Spain examined the results of 54 studies* that compared the effects of paper-based and digital reading. They found that people who read print scored better in comprehension than people who primarily used digital devices. In fact, at a time when students’ screen time is increasing, reading proficiency is decreasing.

In the U.S., *the 2019 National Assessment of Educational Progress (NEAP)* showed that reading levels of Grade 4 and 8 students had declined significantly. Fast-forward to 2022, and *the NEAP results* declined another 3 points for both Grade 4 and Grade 8 students.

PAPER MEANS PERFORMANCE



Paper-based learning materials consistently outperform digital alternatives when it comes to improving student outcomes.

EMOTIONAL WELL-BEING

Beyond improving comprehension and focus, paper-based learning materials also help support students’ emotional well-being. At a time when anxiety and mental illness are on the rise among young people in Australia, this is particularly relevant. The overstimulation associated with digital devices has been linked to anxiety and even depression. What’s more, the blue light emitted by screens has been shown by *Harvard Medical School researchers* to disrupt the production of melatonin, leading to poor sleep quality and fatigue. Conversely, printed materials offer a calming alternative, reducing stress and providing students with a much-needed respite from the digital world.

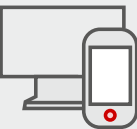
DIGITAL DISTRACTIONS

Setting aside the proven benefits of paper-based learning, it’s important to remember the distractions associated with digital devices. Notifications, pop-ups and the temptation to check TikTok instead of the text book are very real challenges faced by students and teachers every day. At Canon, we recognise the need to balance the use of technology and paper-based learning materials. Digital tools are invaluable for research, viewing multimedia content and collaboration, but they don’t necessarily foster the deep focus required to achieve optimal learning outcomes.

We’re proud to partner with schools and other educational institutions that recognise the place for paper-based learning materials in the classroom. Paper’s enduring relevance lies in its ability to support better learning outcomes, reduce distractions and promote mental well-being. As schools continue to embrace digital transformation, they should continue to embrace the timeless benefits of paper-based learning.



CANON'S PREMIUM PRINT SOLUTIONS FOR EDUCATION



Create a modern learning environment

Allow students and staff to print securely from laptops, chromebooks, smartphones and tablets, whether they are on or off school grounds.

Canon's print solutions also enable stronger collaboration with print-from and scan-to integration with leading cloud services.



Security & Compliance

Protect your schools data with our document, device and print management solutions.

Developed with zero-trust principles in mind*, students can BYO devices and integrate into your school's print environment, enabling secure printing from any device.



Control your print costs

Leverage Canon's print management solutions to improve cost visibility, track user and departmental spending and implement effective cost recovery strategies.

Enhancing your school's in-house print capabilities with Canon's large format and production print devices may also support you to reduce your outsourced print costs.



Implement more sustainable print practices

Manage print output and improve your schools environmental impact. Prevent unnecessary paper waste as students, teachers and staff only print and release what they need.

Implement double-sided and mono print rules, and reduce power consumption by eliminating "always on" print servers.*

CANON'S PREMIUM PRINT PRODUCTS



- Produce vibrant, high-quality learning materials.
- Complete document, device and network security, including encrypted secure print and Trellix Embedded Control.
- Designed with sustainability in mind, with power conserving features such as Auto shutdown, Eco Recovery and Motor Control.

PRINT MANAGEMENT SOFTWARE SOLUTIONS

- Enable students and teachers to print securely from anywhere, from any device.
- Leverage our cloud solutions to ensure you have the latest security features to support your school environment.
- Print-from and scan-to leading Cloud services.
- Ensure visibility of fleet and print costs.



PRINTERS

- High-quality print performance through a convenient desktop printer.
- Network, document and device security provided through standard security settings helps reduce threats of unauthorised access.
- Devices can be customised to print double-sided, and to enter sleep mode when not in use, to support sustainability actions.



SCANNERS

- Canon's wide range of high-speed scanners are designed to integrate into any modern school environment, from classroom, office-use and archive room.
- Included software CaptureOnTouch automates and simplifies scanning and sharing through its user friendly interface. Scan to popular cloud services, emails and folders through one-touch buttons.operation panel, all with one-touch operation.



LARGE FORMAT PRINTERS

- Enhance your in-house print capabilities and manage outsourced print costs.
- PosterArtist software enables easy poster creation tool which requires only 3 steps without any design skills.
- Pair with our Canon cameras to support students learning about the full imaging experience, from capture to print.



PRODUCTION PRINTERS

- Produce high-quality paper-based learning materials, with workflow solutions that support 24/7 job submission.
- Print on a wide range of substrates, with extensive in-line finishing options to achieve a professional look.

*Statements relate to uniFLOW Online



To learn more about how Canon
can help you inspire brilliance in your school,
visit **[canon.com.au/education](https://www.canon.com.au/education)**

Canon