SDG 04

Ensure inclusive and equitable quality education and promote lifelong learning opportunities for all

As Hong Kong's leading institution for teacher education, the Education University of Hong Kong has been recognised for its commitment to professionalism in education and educational research. Our mission is to ensure inclusive and equitable quality education and promote lifelong learning opportunities for all. This is achieved through a steadfast commitment to nurturing outstanding and caring educators, advancing pedagogical innovation through research, and fostering an educational environment that is accessible, technologically advanced, and responsive to the needs of a changing world.

382 Courses

176 Researchers

370 Research Outputs
FWCI:2.61

1,999 participants

Outreach **23** events

Fostering a Sustainable Future Through Inclusive and Targeted Education

The University demonstrates a profound commitment to sustainability, deeply embedding its principles into the core of its academic offerings. This is prominently showcased through specialised programmes and courses designed to equip future educators and professionals with the knowledge and skills to address global challenges.

A cornerstone of this commitment is the Minor in Inclusive Education, which directly addresses the diverse learning needs of students with special educational needs (SEN). This programme is designed to translate the ethos of inclusive education into practical classroom strategies, whole-school programmes, and policy implementation. The curriculum provides a pathway for graduates to pursue careers in both general and special education settings and meets a growing community demand for professionals trained in special education.

Further reinforcing its dedication to global sustainability, EdUHK offers a comprehensive undergraduate course titled "**The Sustainable Development Goals and Education**". This course provides a critical examination of the 17 SDGs, with a particular focus on SDG 4, which advocates for inclusive and equitable quality education for all. It explores the pivotal role of education in tackling pressing global issues such as poverty, inequality, climate change, and environmental degradation. The course moves beyond a narrow focus on economic progress to embrace a more humanistic and holistic vision of development. Students are encouraged to consider education's impact on personal development, social and cultural advancement, national progress, and global cooperation, including fostering intercultural tolerance and planetary stewardship.

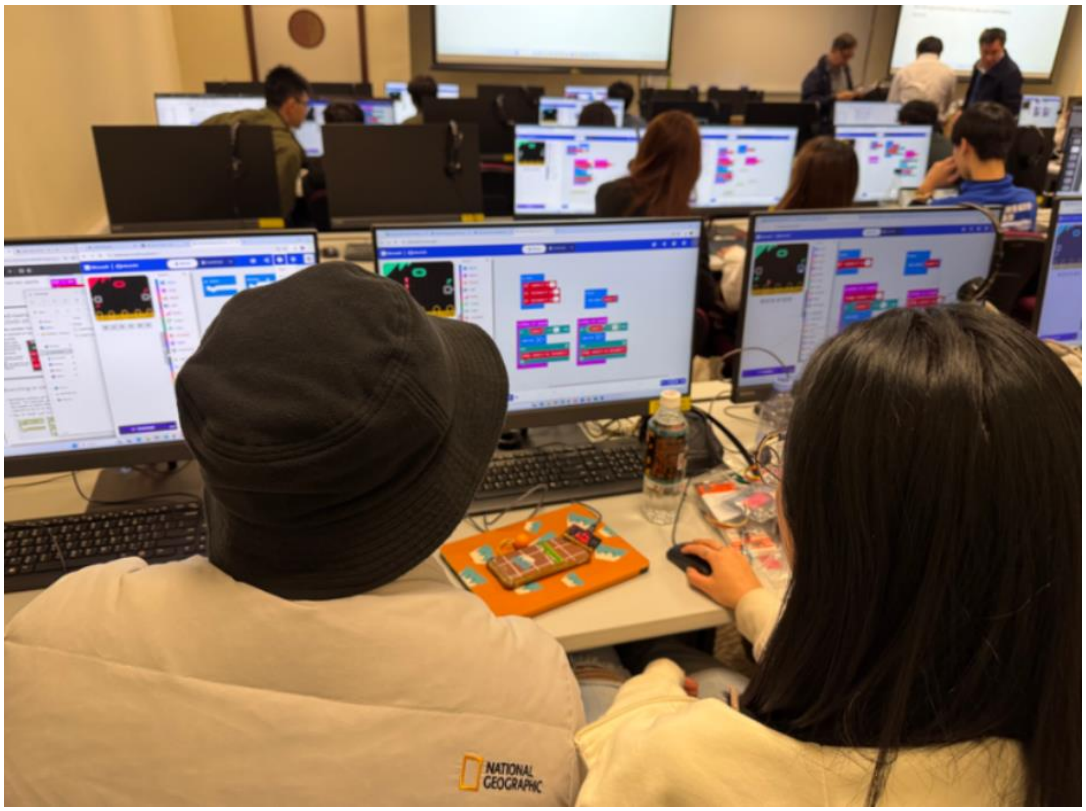
Integrating Technology and Digital Citizenship for a Sustainable Future

Through targeted undergraduate courses, the University is embedding critical competencies in technological innovation and responsible digital citizenship. This strategic focus ensures that graduates are equipped not only with technical skills but also with the ethical framework to apply them for the betterment of society.

A key component of this strategy is the "**Designing STEM Activities with Integrated Sciences and Technology**" course, which empowers students to become innovators and problem-solvers.

The course provides extensive hands-on opportunities with modern technologies such as coding, 3D printing, and data visualisation, encouraging students to devise solutions for real-world challenges. By fostering these practical skills, the course prepares students to contribute to industries of the future. This approach to STEM education is crucial for developing the creative and analytical capacities needed to tackle pressing global issues.

Complementing this focus on technological creation is the "**Digital Literacy for Future Citizenship**" course, which addresses the human and societal dimensions of our digital world. This programme develops students' abilities to find, evaluate, create, and communicate information responsibly using digital technologies. It moves beyond technical proficiency to critically examine issues such as digital rights, online security, and the ethical use of information, which is vital for preventing misinformation and cyberbullying. By integrating advanced technological training with a deep-seated understanding of ethical digital citizenship, the University is cultivating well-rounded leaders. These graduates are prepared to drive innovation and promote a safe, equitable, and sustainable digital environment for all.



4 QUALITY EDUCATION

Enhancing Educational Quality Through Research in Teacher Development and Cultural Identity

The University demonstrates its steadfast commitment not only through its teaching programmes but also through impactful, globally-recognised research that seeks to enhance the quality and equity of education. By investigating critical areas such as teacher preparedness and the role of arts in cultural identity, the University's scholars are generating vital knowledge to inform policy and practice. This research underscores the foundational elements of quality education: well-prepared educators and learning experiences that are holistic and culturally responsive.

A significant contribution from EdUHK researchers addresses a worldwide challenge in early childhood education (ECE): the inadequate preparation of teachers in music education. A position paper co-authored by scholars from EdUHK's Department of Early Childhood Education highlights that most countries fail to sufficiently train ECE teachers to meet the music-related expectations of modern curricula, which can negatively affect young children's development. The research summarises teachers' learning needs and proposes a series of sustainable, low-cost, and scalable strategies to strengthen teacher education in this key area.

Furthering the University's contribution to a holistic and inclusive education, another study involving an EdUHK researcher explores how participation in a traditional Chinese orchestra can shape the cultural identity of primary school students. This line of inquiry is crucial as it delves into how arts education can foster personal and emotional development, creativity, and a deeper connection to cultural heritage. Understanding these dynamics is essential for creating learning environments that are not only academically rigorous but also enriching and affirming of students' identities. The research also highlights the importance of student-centred, adaptive pedagogical methods that enhance engagement and creativity.

Figure 2. The school's physical environment.

Source: Guan, T., Liu, J., & Luo, N. (2025). Exploring the changes in cultural identity of primary school students in a Chinese orchestra. *International Journal of Music Education*, 43(1), 22–38

Pioneering Teacher Development in the Age of Artificial Intelligence

The University is at the vanguard of educational innovation, conducting pioneering research into the integration of Artificial Intelligence (AI) to enhance teaching quality and professional development. A systematic review led by the University's scholars provides critical insights into how AI technologies are reshaping the educational landscape. This research is fundamental to ensuring that as educational tools evolve, the teachers who use them are adequately prepared, supported, and empowered to deliver high-quality, equitable, and effective learning experiences.

The comprehensive review synthesises global research on AI's role in both classroom teaching and the continuous professional growth of educators. It identifies a significant gap in the existing literature, noting that while 65% of studies focus on the application of AI for student learning—such as through AI-driven assessment systems and immersive technologies—only 35% explore AI's potential to support teachers' own development. This finding highlights a critical need, which EdUHK is actively addressing, to focus on the professional development requirements of educators as they integrate these complex technologies into their practice. By examining the benefits and challenges of AI, the review offers a crucial roadmap for the effective and ethical implementation of AI tools, ensuring they support personalised learning and improve instructional strategies.

The study emphasises that for AI to be a true catalyst for educational innovation, its implementation must be balanced, considering not just the impact on student learning but also the essential need to support and train teachers. Through this forward-thinking research, EdUHK is helping to build a future where technology and pedagogy are seamlessly integrated to create inclusive and high-quality learning environments for all.

Elements and factors influencing teacher professional development in AI technology.

Source: Xiao Tan, Gary Cheng, Man Ho Ling, Artificial intelligence in teaching and teacher professional development: A systematic review, *Computers and Education: Artificial Intelligence*, Volume 8, 2025, 100355, ISSN 2666-920X

4 QUALITY EDUCATION

Leadership in Regional Educational Innovation and Lifelong Learning

The UNESCO Chair at EdUHK plays a vital role in the UNITWIN/UNESCO Chairs Programme, advancing the United Nations Sustainable Development Goals (SDGs) through global university partnerships. Under the leadership of Professor John Lee Chi-Kin, the University's president and a highly cited expert in curriculum and environmental education, EdUHK drives major educational and social projects across Chinese Mainland, Hong Kong, and internationally, reinforcing its commitment to lifelong learning and regional development.

EdUHK's strategic collaborations with Peking University (PKU) and the UNESCO Institute for Information Technologies in Education (UNESCO IITE) have been central to fostering innovation in learning and sustainable educational practices. This partnership has pioneered a series of forums on learning innovations and emerging technologies, providing a dynamic platform for educators, researchers, and policymakers to exchange knowledge and explore digital and AI-driven advances transforming education.

The ongoing forum series, hosted at EdUHK and beyond, highlights the University's role as a regional leader in educational innovation. It emphasises the importance of technology integration, regional cooperation, and capacity building to create resilient, inclusive, and adaptive education ecosystems. These initiatives demonstrate EdUHK's dedication to supporting learners of all ages in navigating the challenges and opportunities of the digital era.

4 QUALITY EDUCATION

Driving Educational Innovation and Professional Development Through Technology

The University is at the forefront of educational innovation, leveraging artificial intelligence (AI), entrepreneurship, and research to transform teaching and learning while promoting social equity. Central to this vision is the Artificial Intelligence Research and Education Alliance (AIREA), which fosters collaboration among academia, educators, and industry to create AI-driven solutions that enrich educational experiences.

Alongside AI initiatives, EdUHK has established the Centre for Entrepreneurship and Research to cultivate innovation and social impact. This centre supports projects aimed at economic growth and community development, demonstrating EdUHK's commitment to driving societal progress through research and enterprise.

To enhance educational leadership, the university launched the Principals and Teachers Synergistic Innovation Training Centre, which offers specialised training for Hong Kong's school principals and teachers. This centre focuses on nurturing innovative leadership and teaching methods aligned with modern educational demands.

Through these initiatives, EdUHK continues to lead in integrating technology into education, fostering innovation, and ensuring inclusive access to quality learning opportunities for all students.

4 QUALITY EDUCATION

Strengthening Global Educational Partnerships

The University is forging robust international partnerships that enhance educational quality and foster intercultural understanding. Through strategic collaborations with institutions in Kazakhstan, a key nation in the Belt and Road Initiative, EdUHK is creating impactful opportunities for academic exchange, joint research, and teacher development, thereby contributing to the global education landscape.

A pivotal moment in this partnership was the "**Hong Kong Meets Kazakhstan: A Humanities Cultural Crossroads within the Belt & Road**" event hosted by EdUHK's Faculty of Humanities. This flagship event served as a dynamic platform for academic and cultural exchange, bringing together approximately 100 participants in Hong Kong, China and 80 online from Kazakhstan. The forum featured keynote speeches and discussions on diverse topics such as multilingual education, literature, and media studies, fostering a deeper mutual understanding and laying the groundwork for future joint research and academic partnerships.

Building on this foundation of mutual respect and academic curiosity, EdUHK has entered a landmark collaboration with Abai Kazakh National Pedagogical University (Abai KazNPU) and the Kazakh National Women's Teacher Training University (KNWTTU) to establish the EdUHK-Kazakh Academy of Education. Inaugurated in February 2025, the Academy represents a new era of educational cooperation. It will facilitate academic exchange and joint projects in crucial areas including artificial intelligence in education, inclusive education, educational leadership, and assessment. This initiative directly supports the enhancement of teacher quality and educational standards, with Mr Sayasat Nurbek, the Minister of Science and Higher Education of the Republic of Kazakhstan, describing the Academy as beneficial for raising academic standards in both regions.

4 QUALITY EDUCATION

Innovating Curriculum Design to Foster Scientific Literacy and Creativity

By creating accessible, engaging, and comprehensive learning frameworks in Science and STEM, the University is empowering both teachers and students, ensuring the delivery of high-quality, equitable, and future-focused education. A prime example of this commitment is the "**SWEETIE blended STEM curriculum**," developed by Dr Peter Wan Zhihong from the Department of Curriculum and Instruction. Showcased at the Learning and Teaching Expo 2024, this engineering design-driven curriculum systematically nurtures student creativity by structuring activities around the four stages of the Industrial Revolution. The SWEETIE methodology guides students through a process of situational introduction, wondering, envisioning, exploration, thinking-back, innovation, and extension. Already implemented in over 60 schools, the programme has been lauded for its systematic approach and its practical, blended learning model that significantly lowers the barrier for teachers to deliver effective STEM education, requiring just two hours of training. The curriculum's success was recognised by the Secretary for Education, Dr Choi Yuk-lin, who praised its potential for widespread promotion.

Further demonstrating its leadership in curriculum development, EdUHK's Department of Curriculum and Instruction has launched a pioneering science curriculum for senior primary students, titled '**From Arctic Exploration to Marine Ecological Sustainable Development and Global Citizenship**' (ESDGC14). Spearheaded by Dr Margaret Ng Cheuk-wing, this initiative is designed to prepare schools for the Education Bureau's new science curriculum framework. The ESDGC14 curriculum enriches the existing STEAM framework by integrating diverse learning experiences, including insights from Arctic expeditions, English Medium Instruction (EMI) science lessons, and cross-sector mentorship programmes. It aims to cultivate scientific literacy and a sense of global citizenship by connecting classroom learning to real-world ecological challenges.

4 QUALITY EDUCATION