

### Press Release For Immediate Release

# "Student Mentorship Programme on Innovation and Technology" Achievement Exhibition

15 Primary and Secondary School Teams Paired with Cyberport Start-ups to Enhance Projects and Ignite New Ideas

Hong Kong, 10 July 2024 - The Achievement Exhibition of the "Student Mentorship Programme on Innovation and Technology" co-organized by Cyberport and the Education Bureau, was successfully held at Cyberport on 6 July. Under the guidance of of Cyberport start-ups, 15 student teams from primary and secondary schools presented their innovative design solutions that address various social issues and competed for multiple awards. Teresa Chan, Deputy Secretary for Education, Duncan Chiu, Legislative Council Member (Technology and Innovation), and Eric Chan, Chief Public Mission Officer of Cyberport, witnessed the innovative achievements of students as officiating guests.

The "Student Mentorship Programme on Innovation and Technology" was officially launched in mid-March, judges selected students from 11 secondary schools and 4 primary schools out of over 100 schools to participate in the programme. Under the theme of "Innovative Technologies and Ideas for Better Living", the students have devised targeted solutions in the areas of urban development, city management, quality of life, and sustainable development. During the programme, students applied STEAM-related knowledge to create physical models, prototypes or software. They constantly improved their work under the guidance of the paired Cyberport start-ups. The Programme aims to motivate students to harness STEAM knowledge, skills and design thinking to deepen their understanding of Innovation and Technology (I&T) development and foster entrepreneurship among them.

Teresa Chan, Deputy Secretary for Education, said during her speech, "To align with the national development of 'new productive forces' and Hong Kong's position as an international innovation and technology centre, the Education Bureau is strengthening STEAM education in primary and secondary schools. 'The Student Mentorship Programme on Innovation and Technology' provides a platform for students to integrate STEAM knowledge and apply creativity and engineering design to come up with methods or inventions that improve quality of life. The guidance from Cyberport startup representatives has allowed students to refine their designs. The ideas and inventions of the fifteen teams concern various social and environmental issues, closely tied to social development and enhancing quality of life, embodying the essence of innovation technology. We hope to continue collaborating with all stakeholders in the future to provide students with high-quality and diverse learning activities, cultivating talents with both virtue and ability, and contributing to the innovation and technology development of the country and Hong Kong."



Ir Eric Chan, Chief Public Mission Officer of Cyberport said during his speech, "The achievement exhibition of 'Student Mentorship Programme on Innovation and Technology' fully demonstrated the innovative power and unlimited potential of our next generation. The programme has provided students with valuable learning and practical opportunities, and they have successfully applied technology to life. In just a few months, under the guidance of Cyberport startup mentors, students have continuously broken through and shown inspiring growth, fostering an entrepreneurial spirit. Cyberport will continue to promote the development of STEAM education and bridge the gap between academia and industry, to nurture new blood with creative thinking and practical skills for Hong Kong."

There are two major awards, namely the "Pitch Competition Awards" and the "Outstanding Presentation of I&T Solution Awards". The "Pitch Competition Awards" were selected by 9 professional judges to recognize students for their creative thinking and problem-solving capabilities, with winners in the Senior Secondary School, Junior Secondary School, and Primary School categories. The "Outstanding Presentation of I&T Solution Award" were chosen by on-site voting from attendees, encouraging students to present their research results in an accessible manner, with awards for the champion, first runner-up, and second runner-up.

Below is the list of winners for each award:

#### "Pitch Competition Awards"

- Senior Secondary School Category Winner:
   Raimondi College Silver "Meet" (Mentor: AESIR)
- Junior Secondary School Category Winner: True Light Middle School of Hong Kong - VIP Journey (Mentor: Fotis Lab)
- Primary School Category Winner:
  Alliance Primary School, Whampoa APSW Drainage King (Mentor: MakeOmnia)

#### "Outstanding Presentation of I&T Solution Awards"

• Champion:

Pui Kiu College - iSmart Bit Pack (Mentor: Vinci Analytics)

• First Runner-up:

St. Joseph's Anglo-Chinese Primary School - Intelligent Pet House (Mentor: iRED)

Second Runner-up :

Raimondi College – Silver "Meet" (Mentor: AESIR)

In addition to encouraging the 15 participating teams to apply for the Hong Kong ICT Awards next year, the three winning teams of Pitch Competition Awards will also be invited to participate in the Learning & Teaching Expo, so that more educators, school sponsoring



bodies and the public will be able to appreciate the students' outstanding works.

During the three-month mentoring process, Cyberport start-ups worked closely with the student teams to accelerate the development of students' finished products, providing them with professional advice and technical support through workshops and face-to-face consultations. It allowed the students to achieve breakthroughs and improvements in their solutions. Students learned in practice and gained experience in the R&D commercialization process, which deepened their understanding of I&T development and cultivated their entrepreneurship.

### Achievement Exhibition Brings Together Mainland Teachers and Local University Students to Facilitate STEAM Education Exchanges

In this exhibition, The Hong Kong University of Science and Technology, City University of Hong Kong, and Hong Kong Metropolitan University were invited to showcase their latest technological innovations. The event attracted over 50 educators from Mainland China. Besides promoting the exchange of innovative technology among students of different educational levels, the event also facilitated STEAM education exchanges between Hong Kong and Mainland China, providing a platform for students' creations to inspire new teaching directions for teachers. Additionally, it allowed teachers to explore educational technology solutions related to Cyberport, with the aim of integrating these solutions into the Mainland's education ecosystem.

## <u>Cyberport Fully Supports the Development of STEAM Education to Nurture Future Talent</u>

As Hong Kong's digital technology flagship, Cyberport has been committed to connecting start-ups with the education sector, strengthening I&T education and application, popularizing I&T education, and promoting I&T learning atmosphere. Cyberport has also been working hand in hand with the government to promote STEAM education. Last academic year, Cyberport and the Education Bureau started to co-create the "Professional Development Programme on Innovation and Technology for STEAM Co-ordinators of Schools". The diverse and commercialized I&T solutions of Cyberport community start-ups helped teachers understand I&T applications and trends, allowing them to integrate various I&T solutions and STEAM-related elements into teaching. About 600 teaching staff have benefited from it. A new round of I&T training courses has also been introduced this academic year, covering different I&T themes such as GreenTech, Generative AI, Smart Living and big data, with the addition of ethics and sustainable development topics.

###



For high-resolution photos, please download via link.



The Achievement Exhibition of "Student Mentorship Programme on Innovation and Technology" co-organized by Cyberport and the Education Bureau, was successfully held at Cyberport on 6 July. The shortlisted projects from 15 primary and secondary schools have been significantly improved and enhanced under the guidance of Cyberport start-ups.



Through proposal presentation and booth showcase, student teams vividly demonstrated the results of the project after improvement and refinement.



**Teresa CHAN, Deputy Secretary for Education**, said that to align with the national development of 'new productive forces' and Hong Kong's position as an international innovation and technology centre, the Education Bureau is strengthening STEAM education in primary and secondary schools.





**Ir. Eric Chan, Chief Public Mission Officer of Cyberport**, said that Cyberport will continue to promote the development of STEAM education and bridge the gap between academia and industry, to nurture new blood with creative thinking and practical skills for Hong Kong.



The Achievement Exhibition of the "Student Mentorship Programme on Innovation and Technology" brought together teachers from the mainland and students from local university, promoting the exchange of STEAM education.



Teresa Chan, Deputy Secretary for Education (front row, third from right), and Duncan Chiu, Legislative Council Member (Technology and Innovation) (front row, fourth from right) interacting with student teams.



**Appendix: List of Awarded Projects** 

	Awards	School Name	Project Name	Matched Start-ups	Solution Highlights	Improvement highlights
1	Senior Secondary School Category Winner of " Pitch competition Awards" and Second Runner-up of " Outstanding Presentation of I&T Solution Awards"	Raimondi College	Silver"Meet" (銀識)	AR Interactive Teaching Platform AESIR	In response to the increasing aging population in Hong Kong, this mobile application has been designed to help senior citizens to connect with like-minded friends. Apart from improving their mental well-being, the app also incorporates IT tips as daily technology advice, making it easier for the elderly to understand. The app will be promoted through Community Centres across Hong Kong, helping to create a safer community for the elderly.	Visited elderly homes and improved the interface design and content based on feedback. Included the elderly emotional screening function and intervention alert to provide emotional support for the elderly so as to reduce loneliness.
2	Junior Secondary School Category Winner of " Pitch competition Awards"	True Light Middle School of Hong Kong	VIP Journey	Carbon Reduction Solution Platform <b>Fortis</b> <b>Lab</b>	The App is designed specifically for the visually impaired individuals, with features such as audio broadcasting the bus route numbers and directions, and real-time audio reminders for individuals with visual impairments, to enhance their bus-riding experience.	Facilitated a meeting between students and Visually Impaired Individuals(VIP), for app interface design improvement further to cater their needs, such as using a flashing screen to notify the bus driver of VIP waiting for bus, and improved the user bus stop alert visibility.



	Awards	School Name	Project Name	Matched Start-ups	Solution Highlights	Improvement highlights
3	Primary School Category Winner of " Pitch competition Awards"	Alliance Primary School, Whampoa	APSW Drainage King (黃宣通渠王)	3D Printing and STEM Teaching Solution Platform MakeOmnia	To prevent flooding and reduce losses, the design includes the use of Al concept detectors to monitor water levels in drains and identify types of rubbish. Additionally, IoT concepts are used for statistics to pinpoint blockage points and report these situations to the Drainage Services Department via email.	Improved the waterproof function of the product to make it more suitable for extreme weather; Improved the design of the product by 3D printing and created a customized outer covering to make the product easier to install properly.
4	Champion of "Outstanding Presentation of I&T Solution Awards"	Pui Kiu College	Ismart Bit Pack	STEM Education Institution Vinci Analytics	The iSmart Bit Pack is designed in response to the overweight school bag problem of the students. It integrates features such as accelerometer from Micro:bit, the RFID Embedded Personal Assistant and Find my Bag GPS.	Formulated better marketing strategies to achieve mass production. Improved product user experience by utilizing the latest AI LLM to interact with users.



	Awards	School Name	Project Name	Matched Start-ups	Solution Highlights	Improvement highlights
5	First Runner-up of "Outstanding Presentation of I&T Solution Awards"	St. Joseph's Anglo- Chinese Primary School	Intelligent Pet House(智創寵 物屋)	Al School Administration and Home- School Platform <b>iRED</b>	Intelligent Pet House designed for ageing pets, providing protection, care and companionship to pets left alone at home or old pets. Includes "chatbot mimicking owner", automatic feeding device and oxygen machine.	Suggested to develop a mobile app for instant message alert. Added new feature of CO2 concentration monitoring system and Al system for water quality monitoring. Product appearance upgrade to look more appealing.
6		Aberdeen Technical School	Library Intelligent Borrowing System	Smart Building IoT Management Development Service and Crisis Management Platform Linked Technologies	A device that allows students to easily borrow books on their own, using RFID tags instead of barcodes to reduce borrowing time, a data visualization web page provides the preservation status of books, and a remotecontrol programme views books available for borrowing.	Improved design and simplified the user interface. Guided students to promote the finished product to new customers step by step.



	Awards	School Name	Project Name	Matched Start-ups	Solution Highlights	Improvement highlights
7		Choi Hung Estate Catholic Secondary School	Coral Underwater Robot	Physical Virtual Racing Experience Provider Formula Square	An underwater robot replaces divers to explore the ocean floor, conduct ocean surveys, rescue and other high-risk tasks. At the same time, the underwater robot assists in equipping the camera to shoot corals and determine the degree of coral bleaching through programming.	Improved design to gain competitive advantage by enabling products to be developed into products ready to sell at lower cost and faster time-to-market.
8		Man Kwan QualiEd College	"Smart" Fit you(「智」Fit 你)	Virtual Sports Technology Product KellyJohn Studio	A web platform designed for correct fitness posture, with a 'calibration mode' to determine whether the user's posture is correct, real-time interactive games to increase the fun of fitness.	Assisted in understanding the market operation mode and competitors. Formulated marketing strategies to gamify the product and enhance user experience.
9		St. Catharine's School for Girls	see your 'voice'	Solar Smart IoT Monitoring System Prozparity	The intelligent shelf is designed to facilitate independent shopping for individuals with visual impairment. The device has an ultrasonic detector installed, which reads the details of the corresponding goods when the visually impaired person reaches out, allowing the	Conducted target market and user analysis, influence comparison of relevant groups, pricing and financial planning, etc. Ensured that software and hardware design of the blind guiding system and the direction of technological development are more in line with the user's perspective.



	Awards	School Name	Project Name	Matched Start-ups	Solution Highlights	Improvement highlights
					visually impaired to enjoy an equal shopping experience.	
10		St. Joseph's Primary School	Smart Tree	Robot Technology and STEM Education Platform Peanut King	The application can show the location of trees and alert users of dangerous trees by scanning QR code, thus avoiding accidents of tree collapse and making the public understand more about trees and the importance of environmental protection.	Provided technical suggestion including UX/UI, backend development, image classification and sensor data acquisition.
11		Tak Oi Secondary School	COOKMATE	Intelligent mobile hydroponic planting system Farmacy	Designed for patients with cognitive impairments, this device uses an AI reader to scan food labels and vocalize the content. It's also coupled with a robotic arm to automate the cooking process. Patients simply need to put ingredients into the device and mixer for easy cooking.	Visited elderly homes to understand the actual needs of users and improve the product functions. Improved the nutritional recipes by consulting dietitians to adapt the use of the rice cookers to meet the nutritional needs of the elderly and ease of use.
12		The Hong Kong Academy for Gifted Education	func("Foresee")	Golf Practice Experience and Education Platform <b>N1</b>	A programme designed to enhance the quality of use of sports facilities, including Al analysis of slippery ground, usage situation, air quality, etc., to provide convenient choices for users and promote	Analyzed the competitiveness of the product from the business perspective and subsequently changed the application scenarios in which the product is used. Changed from the initial monitoring of LCSD's Sports Ground and



	Awards	School Name	Project Name	Matched Start-ups	Solution Highlights	Improvement highlights
					emerging sports with the programme.	Sports Centre to monitoring of road offences.
13		TWGHs Ma Kam Chan Memorial Primary School	Bin	Material Conduction System hearing aid <b>Dai3mimi</b>	In response to the upcoming implementation of the waste charging scheme, a convenient trash bin has been designed. It utilises an Al camera to recognize the anticounterfeit QR codes on the chargeable plastic bags, and automatically opens the trash bin after authentication. An ultrasonic distance measurement module is also incorporated to measure the amount of garbage inside of the bin.	New sensors were added to notify the property management service when the trash cans are full for immediate collection. Solar panels were integrated to generate battery power for energy conservation; and UV lights were equipped to reduce the spread of viruses in the trash.
14		Wah Yan College, Hong Kong	NSLink	Holographic Image Mobile Device SyZyGy	Designed to enhance consumer experience, report restaurant queue situation in real-time, use AR technology to display mall maps and IoT to record parking location.	Assisted the project students in repositioning their projects to target secondary school students in Hong Kong; and to teach them to formulate business strategies, such as exploring collaboration



	Awards	School Name	Project Name	Matched Start-ups	Solution Highlights	Improvement highlights
						opportunities with NGOs and schools.
15		YCH Law Chan Chor Si Primary School	FREE	Influencer Menu Map <b>nnenu</b>	A device and programme that allows students to exchange objects in campus, using AI technology to recognize items and generate exchange codes for later exchanges.	Assisted students in conducting market research to ensure that the solution meets user needs. Optimized program codes and improved connection stability. Suggested to develop a feedback mechanism for product improvement.



For media enquiry, please contact:

Cyberport

Audrey Man Tel: (852) 3166 3985

Email: audreymantc@cyberport.hk

**A-World Consulting** 

Carol Fung

Tel: (852) 2864 4809

Email: carol.fung@a-world.com.hk.

#### **About Cyberport**

Cyberport is Hong Kong's digital technology flagship and incubator for entrepreneurship with over 2,000 members including over 900 onsite and over 1,100 offsite start-ups and technology companies. It is managed by Hong Kong Cyberport Management Company Limited, wholly owned by the Hong Kong Special Administrative Region Government, and committed to the vision to inject new impetus into digital economy and smart city development through innovation and technology, and to connect enterprises to Mainland China and overseas markets. Cyberport strives to nurture a vibrant tech ecosystem by cultivating talents, promoting entrepreneurship among the youth, supporting start-ups, fostering technology industry development by promoting strategic collaboration with local, Mainland Chinese and international partners, and integrating new and traditional economies by accelerating digital transformation in public and private sectors.

For more information, please visit http://www.cyberport.hk