

YOUNG ACADEMY OF SCIENCES SUMMIT 青年科學家峰會

PROGRAMME BOOKLET

2023-2024

科學領航 啟迪未來
SCIENCE, THE PORTAL
TO NEW ENLIGHTENMENTS

Organiser :  THE HONG KONG YOUNG
ACADEMY OF SCIENCES
香港青年科學院

Co-organiser :

 大灣區共同家園投資有限公司
Greater Bay Area Homeland Investments Limited

 大灣區共同家園青年公益基金
Greater Bay Area Homeland Youth Community Foundation

Funding organisation :

 π 創新科技署
Innovation and Technology Commission

Any opinions, findings, conclusions or recommendations expressed in this material/event (or by members of the project team) do not reflect the views of the Government of the Hong Kong Special Administrative Region, the Innovation and Technology Commission or the General Support Programme Vetting Committee of the Innovation and Technology Fund.

Local academic partner

 香港都會大學
科技學院
Hong Kong Metropolitan University
School of Science and Technology

 PEAK
Member of VTC Group
VTC 成員

 Lingnan 嶺南大學
University 香港 Hong Kong

 香港中文大學
The Chinese University of Hong Kong

 香港科技大學
THE HONG KONG
UNIVERSITY OF SCIENCE
AND TECHNOLOGY

 The University of Hong Kong
Technology Transfer Office
香港大學技術轉移處

Supporting organisation

 ASTRI
香港應用科技研究院

 數碼港
Cyberport 20

 香港聯技團
HKSTP

 香港青年工業家協會
HONG KONG YOUNG INDUSTRIALISTS COUNCIL

(Listed in alphabetical order)



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01

科學領航 啟迪未來
SCIENCE, THE PORTAL
TO NEW ENLIGHTENMENTS



YOUNG ACADEMY OF SCIENCES SUMMIT 青年科學家峰會

ABOUT YASS

- Showcases the excellent research work of the young scientists in Hong Kong.
- Provides a unique platform for local young academics and scientists to gather and engage in a cross-disciplinary, cross-cultural and cross-institutional cooperation in Hong Kong.
- Demonstrates Hong Kong's unique position as a strong and energetic research base, well prepared for any knowledge transfer collaborations.



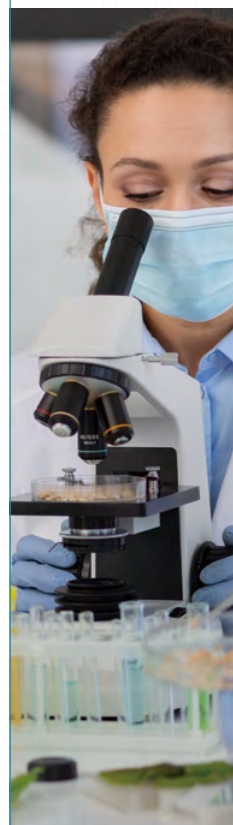
ABOUT THE ORGANISER



The Hong Kong Young Academy of Sciences

The Hong Kong Young Academy of Sciences (YASHK) was established in 2018 and is a chapter of The Hong Kong Academy of Sciences (ASHK). YASHK offers a strong platform for young scientists to make meaningful contribution to the Hong Kong community and build up a better research and education environment for science and technology. Currently, YASHK has 53 young scientists as its Members.

 <https://yashk.org.hk>





ABOUT CO-ORGANISERS



Greater Bay Area Homeland Investments Limited

The Greater Bay Area Homeland Investments Limited was jointly established by international large-scale industrial institutions, financial institutions and new economic enterprises. Greater Bay Area Homeland Development Fund is set up under the Company to grasp the historical opportunities of the development of Guangdong-Hong Kong-Macao Greater Bay Area, and the construction of an International Innovation and Technology Hub, focusing on technological innovation, industrial upgrading, quality of life, smart city and all other related industries. The Company and the Fund cover venture capital, private equity investment, listed company investment, M&A investment and so on to offer financial support for outstanding entrepreneurs and enterprises, connecting industrial and financial resources, achieving long-term returns for shareholders and investors, and contributing positively to economic and social development.

🌐 <http://www.gbahomeland.com/>



Greater Bay Area Homeland Youth Community Foundation

Founded in September 2019, the Greater Bay Area Homeland Youth Community Foundation (the "Foundation") is a charitable organisation that was established to leverage the enormous growth opportunities made possible by the Greater Bay Area concept. Guided by its mission of "For Our Youth For Our Future", the Foundation is a joint effort by young leaders from all walks of life to support Hong Kong youths in their studies, careers and entrepreneurship. Taking education and training as its focus, the Foundation hopes the work will enable young people to gain a better understanding of the region's business environment and culture that is conducive to their personal and professional growth.

🌐 <https://www.gbayouth.org.hk/>



ABOUT THE FUNDING ORGANISATION

π 創新科技署
Innovation and Technology Commission

Innovation and Technology Commission

To promote the development of innovation and technology, an Innovation and Technology Commission (ITC) was set up on 1st July 2000, with the mission to spearhead Hong Kong's drive to become a world-class, knowledge-based economy. The Commission formulates and implements policies and measures to promote innovation and technology; supports applied research, technology transfer and application; promotes technological entrepreneurship; facilitates the provision of technology infrastructure and development of human resources; and promotes internationally accepted standards and conformity assessment services to underpin technological development and international trade. The Commission works closely with its partners in the Government, industry, business, tertiary education institutions and industrial support organisations.

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YASS

ACTIVITY OVERVIEW

02

1st YASS SUMMIT

December 2023

Sub-Conference I

March 2024

Sub-Conference II

May 2024

Sub-Conference III

July 2024

2nd YASS SUMMIT

December 2024

Sub-Conference IV

February 2025

Sub-Conference V

April 2025

Sub-Conference VI

June 2025

MEMBERS OF THE PROGRAMME COMMITTEE

03

The Programme Committee provides general oversight and advice to the YASS 2023/24 & 2024/25.



Prof. Anderson SHUM
The University of Hong Kong



Prof. Stephanie MA
The University of Hong Kong



Prof. Minhua SHAO
Hong Kong University of
Science and Technology



Prof. Kathy LUI
The Chinese University of
Hong Kong



Prof. Zijian ZHENG
The Hong Kong
Polytechnic University



Prof. Johnny HO
City University of Hong Kong



Prof. Zhifeng HUANG
The Chinese University of
Hong Kong



Prof. Timothy BONEBRAKE
The University of Hong Kong



Prof. Yang CHAI
The Hong Kong
Polytechnic University



Prof. Fuk Yee KWONG
The Chinese
University of Hong Kong



Prof. Shih-Chi CHEN
The Chinese University of
Hong Kong



Prof. Giulio CHIRIBELLA
The University of Hong Kong



Prof. Kai LIU
Hong Kong University of
Science and Technology



Prof. Danguan LEI
City University of Hong Kong



Prof. Ken LEUNG
Hong Kong
Baptist University



Prof. Zuankai WANG
The Hong Kong
Polytechnic University



Prof. Amos TAI
The Chinese University of
Hong Kong



Prof. Joelle WANG
Hong Kong
Baptist University

YASS (2023-2024) PROGRAMME RUNDOWN

04

4 DECEMBER 2023

09:00 - 17:30

Charles K. Kao Auditorium,
Hong Kong Science Park

08:15 - 09:00

Registration

09:00 - 09:30

OPENING CEREMONY

Welcome Messages



Anderson SHUM

President, Hong Kong Young Academy of Sciences;
Associate Vice President (Research and Innovation) and
Professor, The University of Hong Kong

Opening Remarks



Dong SUN

Secretary for Innovation, Technology and Industry, HKSAR

SESSION 1

Success Stories of How Young Academies Groom Young Scientists into World-class Academicians

Speakers



Topic | Sharing and reflecting on my journey in mathematics

Tong YANG

Member, the Hong Kong Academy of Sciences,
Chair Professor of Mathematical Science,
The Hong Kong Polytechnic University



Topic | Empowering World Academicians: A Journey from Labs to Global Policy with the Global Young Academy

Felix MORONTA

Co-chair of Global Young Academy,
Senior Programme Specialist at the International Centre
for Genetic Engineering and Biotechnology



Topic | How young academies play a role in creating well-rounded young scientists with a holistic set of skills that make them highly competitive in the academic world

Sasitorn SRISAWADI

Co-Chair, Thai Young Scientists Academy (2019-2021);
Research Team Leader, National Science and Technology
Development Agency, Thailand



Topic | The Hong Kong Young Academy of Sciences and its role in Innovation and Technology

Anderson SHUM

President, Hong Kong Young Academy of Sciences;
Associate Vice President (Research and Innovation) and
Professor, The University of Hong Kong

Panel Discussion

Moderators



Johnny HO

Co-chair, Academic Committee,
Hong Kong Young Academy of Sciences;
Associate Head and Professor, Department of
Materials Science and Engineering, Director,
Knowledge Transfer Office, City University of Hong Kong



Zhifeng HUANG

Co-chair, Academic Committee,
Hong Kong Young Academy of Sciences;
Associate Professor, Department of Chemistry,
The Chinese University of Hong Kong

Panelists

- Tong YANG
- Felix MORONTA
- Sasitorn SRISAWADI
- Anderson SHUM

11:20 - 11:40

Break

11:40 - 12:40

SESSION 2

How Young Scientists can Contribute to the Long-term Public Policies

Speakers



Topic | **Impact Pathway: Young scientists as a game changer**

Orakanoke PHANRAKSA

Co-chair, ASEAN Young Scientists Network;
Senior IP Consultant, National Science and
Technology Development Agency (NSTDA);
Head of International Affairs,
Thailand Science Research and Innovation (TSRI)



Topic | **Engineering Biology and Biofoundry**

Akihiko KONDO

Vice President and Professor, Kobe University

Panel Discussion

Moderators



Kathy LUI

Co-chair, Policy Advisory Committee,
Hong Kong Young Academy of Sciences;
Professor, Department of Chemical Pathology,
The Chinese University of Hong Kong



Chunkit KWOK

Co-chair, Policy Advisory Committee,
Hong Kong Young Academy of Sciences;
Associate Professor, Department of Chemistry,
City University of Hong Kong

Panelists

- Orakanoke PHANRAKSA
- Akihiko KONDO

12:40 - 14:00

LUNCHEON

ClubONE on the PARK

G/F, Building 12W, No.12 Science Park West Avenue,
Hong Kong Science Park

14:00 - 15:30

SESSION 3

Translating and Commercialising Deep-tech Solutions from Universities

Speakers



Topic | Leveraging industry PoC (Proof of Concept) to facilitate commercialisation and adoption of innovative solutions/R&D outcomes

Eric CHAN

Chief Public Mission Officer, Hong Kong Cyberport Management Co. Ltd



Topic | Pain Points in Commercializing University Technologies - Lessons Learned from Stanford, Silicon Valley, Hong Kong, Hawaii and the UK

David AI

Head of Innovation (2020-2023),
The London School of Economics and Political Science



Topic | From 0 to 100 to N – The Pathway from Basic Research to Development to Commercialisation

Eric OR

Head of Partnerships,
Hong Kong Science & Technology Parks Corporation



Topic | Unleashing the Power of Collaborative Research through University-Research Institute Partnership

Alan CHEUNG

Senior Director, Trust and AI Technologies , Applied Science and Technology Research Institute

Panel Discussion

Moderators



Mingxin HUANG

Member, Hong Kong Young Academy of Sciences
Chair Professor and Head of Department of Mechanical Engineering, The University of Hong Kong



Zhiyong FAN

Founding Member, Hong Kong Young Academy of Sciences
Chair Professor, Department of Electronic & Computer Engineering, The Hong Kong University of Science and Technology

Panelists

- Eric CHAN
- David AI
- Eric OR
- Alan CHEUNG

15:30 - 15:50

Coffee break

15:50 - 17:20

SESSION 4

Interventions to Promote and Popularize Science in Schools

Speakers



Topic | In Search of Gifted STEAM Talents in Schools

Jimmy WONG

Executive Director,
The Hong Kong Academy for Gifted Education



Topic | “Youth Science and Technology Village”
Programme to Cultivate Talent

Pan SIO

Curator, Macao Science Center



Topic | Science Popularization: What exactly are we promoting?

Che Ting CHAN

Chair, Committee on Science Popularisation,
Hong Kong Academy of Sciences;
Associate Vice President for Research and
Development (Research), Daniel C K Yu
Professor of Science, Chair Professor,
Department of Physics,
The Hong Kong University of Science and Technology



Topic | Empower Our Young Generation: Enhanced
Promotion of STEAM Education in Primary and Secondary
Schools

Wai Lim William LAM

Chief Curriculum Development Officer (Science),
Education Bureau, HKSAR

Panel Discussion

Moderators



Stephanie MA

Vice President, Co-chair, Outreach Committee,
Hong Kong Young Academy of Sciences;
Professor, School of Biomedical Sciences,
The University of Hong Kong



Denvid LAU

Co-chair, Outreach Committee,
Hong Kong Young Academy of Sciences;
Professor, Department of Architecture and
Civil Engineering, City University of Hong Kong

Panelists

Jimmy WONG

Pan SIO

Che Ting CHAN

Wai Lim William LAM

17:20 – 17:30

CONCLUDING REMARKS



Anderson SHUM

President, Hong Kong Young Academy of Sciences;
Associate Vice President (Research and Innovation) and
Professor, The University of Hong Kong

18 : 30

Summit Banquet

(by invitation)

SPEAKER PROFILE



Anderson SHUM

B.S.E. (Princeton University), S.M. and Ph.D. (Harvard University)

FHKIE, FRSC

Professor, Associate Vice-President (Research and Innovation), HKU

President, The Hong Kong Young Academy of Sciences

Member of Global Young Academy

Ir. Prof. Anderson Ho-Cheung SHUM is currently the President of The Hong Kong Young Academy of Sciences; Associate Vice-President (Research and Innovation), Professor in the Department of Mechanical Engineering at the University of Hong Kong and the Director of the Advanced Biomedical Instrumentation Centre.

His strong R&D is globally recognized by receiving numerous international awards. His research areas include emulsions, biomicrofluidics, biomedical engineering and soft matter.

Prof. Shum was selected to join the Global Young Academy as a new member in 2021. He received the Croucher Senior Research Fellowships 2020, NSFC Excellent Young Scientist Fund in 2019, elected as a fellow of the Royal Society of Chemistry in 2017. He is an editorial board member of several scientific publications. Also, he serves on committees, including Mechanical Systems and Manufacturing Technology Subgroup in the Innovation and Technology Fund Research Projects Assessment Panel of the Innovation and Technology Commission.



Dong SUN

Secretary for Innovation, Technology and Industry, HKSAR

Professor Sun was appointed Secretary for Innovation, Technology and Industry, Government of the Hong Kong Special Administrative Region on 1 July 2022.

Professor Sun is a world-renowned scholar and scientist. He is a pioneer in robotic manipulation of biological cells and robot control. His research has led to breakthroughs in the use of robotics combined with various micro-engineering tools. He has also received numerous awards.

Professor Sun was elected as Fellow of Canadian Academy of Engineering, Member of the European Academy of Sciences and Arts, Fellow of the International Academy of Medical and Biological Engineering, and Fellow of IEEE.

Prior to his appointment, Professor Sun was the Chair Professor and Head of the Department of Biomedical Engineering at City University of Hong Kong, and the Legislative Council Member (Election Committee)



Tong YANG

Chair Professor of Mathematical Science, Department of Applied Mathematics, The Hong Kong Polytechnic University

PhD (UC Davis)

Academician, The European Academy of Sciences, The World Academy of Sciences

Fellow, American Mathematical Society

Member, The Hong Kong Academy of Sciences; Foreign Member, Academia Europaea

Prof Tong Yang is currently Chair Professor of Mathematical Science, Department of Applied Mathematics of the Hong Kong Polytechnic University. He obtained his BSc and MSc degrees from Zhongshan University (Sun Yat-sen University) in 1987 and 1990, respectively. He furthered his studies at University of California, Davis where he obtained his PhD in 1993. After working as a Postdoctoral Fellow at the Institute for Advanced Study in Princeton for one year, he joined CityU in 1994 and was promoted to Chair Professor of Mathematics in 2007. Prof Yang was Head of the Department of Mathematics at CityU from 2012 to 2018. He was President of the Hong Kong Mathematical Society from 2016 to 2020, and he now serves as a member-at-large of the Society. Professor Yang joined the Hong Kong Polytechnic University in 2022.

Prof Tong Yang has been working in the fields of partial differential equations and kinetic theory. He served as an Editor-in-Chief of Analysis and Applications from 2013 to 2017, and is one of the founding Editors-in-Chief of Kinetic and

Related Models launched in 2008. He also serves on several international journals, including the Editorial Advisory Board of London Mathematical Society: Bulletin, Journal, and the SIAM Journal on Mathematical Analysis. Prof Yang has been actively contributing to the research and scientific development in mainland China. He is an Honorary Professor, Visiting Chair Professor and Guest Professor of several universities in mainland China. Prof Yang was elected to be a member of the European Academy of Sciences and The World Academy of Sciences in 2018 and 2021, respectively, and a Foreign Member of the Academia Europaea in 2022. The awards and distinctions that he has received include the Senior Research Fellow by the Research Grants Council (RGC) of Hong Kong in 2020, the 2nd class State Natural Science Award of China in 2012, the Croucher Senior Research Fellowship in 2011, the Changjiang Chair Professorship by the Ministry of Education of China in 2005, National Science Fund for Distinguished Young Scholars in 2004, and the Morningside Silver Medal of Mathematics in the first ICCM in 1998.



Felix MORONTA

BSc (Universidad Central de Venezuela), PhD (Universidad de Alicante)

CO-Chair of the Global Young Academy

Senior Programme Assistant, Regulatory Science Group, International Centre for Genetic Engineering and Biotechnology ICGEB. Trieste, Italy

Dr Moronta is a visionary scientist with extensive training in strengthening the interface between science, policy, and society.

His professional dedication has been focused on assisting countries in fulfilling their international biosafety obligations.

Furthermore, he has collaborated with multilateral agencies to improve the international governance of biotech products.

These efforts are aimed at ensuring that biotech products are not only safe but also meet international standards. As the Co-Chair of the Global Young Academy, he is committed to promoting international, intergenerational, and interdisciplinary.

He is a PhD in Experimental and Applied Biology (University of Alicante, Spain) and Bachelor in Cell Biology (Central University of Venezuela)



Sasitorn SRISAWADI

Co-Chair, Thai Young Scientists Academy (2019-2021)

Research Team Leader, National Science and Technology Development Agency, Thailand

Sasitorn Srisawadi is a Research Team Leader at the National Metal and Materials Technology Center (MTEC), one of the research centers at the National Science and Technology Development Agency,

Thailand. She earned a degree in Industrial Engineering from Chulalongkorn University, Thailand. She won a scholarship from the Thai Government to further her education and received her M.S. and Ph.D. from North Carolina State University, USA, with her research work in additive manufacturing and rapid tooling. In 2011, her research career started at the MTEC where she works on additive manufacturing, or three-dimensional (3D) printing,

production process optimization, and composite material fabrication. Her track record includes a number of high-profile peer-reviewed publications and patent applications in the areas of her expertise which includes the new process of 3D printing for natural rubber and metal matrix composites. In recognition of her contribution to promoting the roles of young scientists, she was appointed as a Co-chair of the Thai Young Scientists Academy from 2019 to 2021. She was also selected as a Young Leader Fellow at the Annual Meeting of Science and Technology in Society Forum 2019 and the World Academy of Sciences Young Affiliate 2020.



Johnny HO

BS, M.S, Intel Foundation Ph.D, Ph.D., Materials Science and Engineering, University of California, Berkeley (U.S.A)

Co-chair, Academic Committee, The Hong Kong Young Academy of Sciences
Associate Head and Professor, Department of Materials Science and Engineering, Director, Knowledge Transfer Office, CityU

Prof. Johnny Ho is an Associate Head, a Professor in the Department of Materials Science and Engineering, and a core member of the State Key Laboratory of Terahertz and Millimeter Waves at the City University of Hong Kong. He also serves as the Director of the Knowledge Transfer Office at the City University of Hong Kong. In addition, he holds a Joint Appointment as a Professor at the Institute for Materials Chemistry and Engineering at Kyushu University, Japan. He got his BS, MSc, and Ph.D. degrees at

the University of California, Berkeley, USA, in 2002, 2005, and 2009, respectively. Dr. Ho was a post-doctoral researcher in the Nanoscale Synthesis and Characterization group (Materials Science Division) at Lawrence Livermore National Laboratory, California, USA (2009-2010). His current research interests focus on nanoscale materials' synthesis, characterization, and applications for electronic, optoelectronic, sensor, and energy harvesting devices. Visit his web for more information (<https://HoCityU.com>).



Zhifeng HUANG

B. Sc. (Xiamen University, China), M. Sc. (Xiamen University, China), Ph. D (Arizona State University, US)

Co-chair, Academic Committee, The Hong Kong Young Academy of Sciences
Associate Professor, Department of Chemistry, CUHK

Dr. Zhifeng Huang is an Associate Professor in Department of Chemistry at The Chinese University of Hong Kong. Dr. Huang is member of The Hong Kong Young Academy of Sciences.

Dr. Huang is devoted to the fabrication of sculptured 3D nanostructures for studying chiral nanoplasmonics, surface enhanced optical activity spectroscopies, enantioselective catalysis, enantiodifferentiation, specific differentiation of stem cells, and flexible/wearable energy generation and storage. He contributed to 2 book chapters and 6 patents, and published his studies in, e.g., Nat. Chem., Nat. Nanotechnol., Nat. Commun., Adv. Mater., Adv. Funct. Mater., ACS Nano, Nano Lett., J. Am. Chem. Soc., Adv. Sci., and Small.

Dr. Huang was awarded with Faculty Performance Award in Scholarly Work (Researcher Supervision) (HKBU, 2022), Vebleo Fellow (2021), IAAM Scientist Medal (2021), Outstanding Research Achievement (APSMR, 2017 and 2018), the Prof. Rudolph A. Marcus Award 2016. He is serving as Review Editor for Frontiers in Chemistry, Associate Editor for Science Advances Today and Science Letters Journal (Cognizure).

Dr. Huang, together with Prof. Ken Yung (Department of Biology, HKBU), co-founded a spin-off, Mat-A-Cell Ltd., to commercialize a new-generation medical device for cell culture. The invention was awarded with 2019 TechConnect Innovation Award, and Gold Medal with Congratulations of Jury (The 46th International Exhibition of Inventions of Geneva, 2018).



Orakanoke PHANRAKSA

Co-Chair, ASEAN Young Scientists Network
Senior IP Consultant, National Science and Technology Development Agency (NSTDA)
Head of International Affairs, Thailand Science Research and Innovation (TSRI)

Dr. Phanraksa is a policy specialist in the field of intellectual property laws at Technology Licensing Office, the National Science and Technology Development Agency (NSTDA), Thailand. Currently, she has been partially seconded to serve Thailand Science Research and Innovation (TSRI) to lead the International Affairs Division. She has been playing a key role to form a policy framework to promote and strengthen technology licensing offices and IP professionals in the academic and research institutions in Thailand. In 2019, she was the first to be awarded the Global IP Champion Award from the Global Innovation Policy Center, US Chamber of Commerce. In 2023,

she was selected as one of the five regional IP Policy experts by the WIPO to develop the IP Policy Model for Universities and Research institutions in ASEAN.

Dr. Phanraksa was past Co-Chair of the Global Young Academy, a non-profit organization with 200 top young scientists from all disciplines from around the world. She is the Co-Chair of the ASEAN Young Scientists Network. In 2022, she was selected and appointed as the International Science Council Fellow. She experienced in policy development by serving the Minister of Higher Education, Science, Research, and Innovation (MHESI) Thailand from 2020-2022.



Akihiko KONDO

Vice President and Professor, Kobe University
Deputy Director, RIKEN Center for Sustainable Resource Science

Akihiko Kondo received his Ph.D. from Kyoto University in Chemical Engineering (1988). He has started his faculty career in 1988 in Department of Applied Chemistry at Kyushu Institute of Technology. He was appointed as full professor of Kobe University in Department of Chemical Science and Engineering in 2003 and also appointed as a team leader at RIKEN Center for Sustainable Resource Sciences (CSRS) in 2012. He was appointed a dean of Graduate School of Science, Technology and Innovation at Kobe University in 2016. He became a member of Science Council Japan in 2017 and deputy director of RIKEN CSRS in 2020 and Vice President of Kobe University in 2021.

Kondo has developed various platform technologies such as cell surface display systems, metabolic pathway design tools, metabolic analysis technologies, genome editing and long chain DNA synthesis technologies. He also has applied these platform technologies for construction of various microbial cell factories for production of biofuels and various chemicals from biomass, and cyanobacteria and microalgae for production of oil and chemicals from CO₂. He is the scientific founder of several companies including BioPalette (genome editing), Synprogen (genome synthesis), AlgaeNexus (microalgae) and Bacchus Bio innovation (Biofundry).

He has published more than 750 peer reviewed international papers.



Kathy LUI

BS and M Phil (CUHK), Ph.D (University of Oxford, U.K.)
Professor, Department of Chemical Pathology, CUHK
Co-chair, Policy Advisory Committee, The Hong Kong Young Academy of Sciences

Kathy Lui is currently a Professor at the Department of Chemical Pathology of The Chinese University of Hong Kong. She is also an Adjunct Professor at the Australian Regenerative Medicine Institute of Monash University, Australia. She received her Ph.D. in Immunology from University of Oxford U.K. in 2009. After that, she continued her postdoctoral training at Department of Stem Cell and Regenerative Medicine, Harvard University, U.S.A., until 2014. After that, she started her own laboratory and focused on understanding how the immune system controls the development and progression of cardiovascular disease with an

attempt to promote repair and regeneration. She has published over 100 peer-reviewed articles and received numerous awards and honors including the Croucher Innovation Award in 2017, founding member of the Young Academy of Sciences of Hong Kong in 2018, the first batch of NSFC Excellent Young Scientists in Macau & Hong Kong in 2019, and the RGC Research Fellowship in 2022. She has been a member of the editorial board of Circulation Research (American Heart Association) and Cardiovascular Research (European Society of Cardiology), the top two journals focusing on the basic science of cardiovascular research.



Chunkit KWOK

BS and M Phil (CUHK), Ph.D (University of Oxford, U.K.)
Professor, Department of Chemical Pathology, CUHK
Co-chair, Policy Advisory Committee, The Hong Kong Young Academy of Sciences

In Oct 2016, Dr. KWOK's joined City University of Hong Kong (CityU) as an Assistant professor and has been promoted to Associate professor in July 2021. In 2019, he was one of the recipients of the CityU President Award and Croucher Innovation Award. In 2020, Dr. KWOK's joined the State Key Laboratory of Marine Pollution, City University of Hong Kong. In 2021, Dr. KWOK was recognized as elected member of Hong Kong Young Academy of Sciences (YASHK) and Hong Kong Institute for Advanced Study Rising Star in Chemistry. In 2022, Dr. Kwok was awarded the NSFC Excellent Young Scientist Fund (優青 (港澳)).

Dr. KWOK's current research focus is to explore the role of RNA structures and interactions in biology, especially the functions of G-quadruplex structures/interactions and non-coding RNA

structures/interactions in the mammalian transcriptome and their relevance to gene regulation, RNA metabolism and diseases. Two new research directions in the Kwok lab are to develop targeting tools for detection, imaging, intervention of these important RNA structures and interactions, as well as to invent innovative nucleic acid-based technologies for sensing chemical pollutants and pathogens.

To cultivate a stimulating learning environment for students and to establish RNA community in Hong Kong, Dr. KWOK, together with Dr. Minh Le, has founded the Hong Kong RNA Club in Aug 2017 and organized RNA seminar and symposium events regularly (<http://www.kitkwok.com/hk-rna-club.html>). The Hong Kong RNA Club has been recognized and supported by the International RNA Society and various industrial companies.



Eric CHAN

Chief Public Mission Officer of the Hong Kong Cyberport Management Co. Ltd.
Chartered Engineer
Fellow of The Institution of Engineering & Technology (UK)
Chairman of Knowledge Management Development Center, HK
Chairman, Industrial Training Advisory Committee (ICT Sector)

Mr. Eric Chan is Chartered Engineer and Fellow member of The Institution of Engineering and Technology (UK). Chan is currently Chief Public Mission Officer of Hong Kong Cyberport and is responsible for building the ecosystem of nurturing I&T start-ups and young entrepreneurs for Hong Kong. Chan is a veteran in the ICT industry and has held senior management positions at MNCs prior to joining Cyberport, including Hutchison Telecom, HGC Global Communication, Hong Kong Telecom etc.. Chan

is active in public services, especially in education, industry training, professional bodies and charitable organisations. Chan is current Chairman of ICT Industry Training Advisory Committee (Qualification Framework), Chairman of Knowledge Management Development Center, Member of university advisory committees and IMC member of secondary schools.



David AI

JD, MS, MBA

Former Head of Innovation, the London School of Economics and Political Science (LSE)
Former Chair, International Strategy Committee, AUTM (Association of University Technology Managers)
Chairman, AUTM Asia Conference 2017, at Hong Kong Science Park
Founding member, Strategic Investment Association, Silicon Valley

Mr. AI is former Head of Innovation at the London School of Economics and Political Science (LSE). Previously, he was Chief Innovation Officer at the University of Hawaii System, while serving as chairman of the International Strategy Committee at the Association of University Technology Managers (AUTM) from 2017 to 2019. Prior to Hawaii, he was Director of Knowledge Transfer at the City University of Hong Kong (2014-2018). Previously, he also worked for Stanford's Office of Technology Licensing for six years, managing inventions while spearheading Stanford's technology marketing effort in China.

In the private sector, Mr. AI was Chief Advisor at Hitachi Corporate VC (2001-2006); he has also cofounded an award-winning e-healthcare business in Beijing and a joint venture cancer center in Shanghai. During the 1990s, he was Corporate VP at Varian Medical (NYSE:VAR), VP of Marketing at Cirque Corporation (acquired by ALPS of Japan) and a Project Manager at Hewlett-Packard.

Mr. AI received a B.S. in psychology from National Taiwan University, an M.S. in computer science from Indiana University, an M.B.A. from Stanford University, and a J.D. from Santa Clara University. He is a registered patent attorney in California.



Eric OR

BSC (University of Toronto)

Head of Partnerships for Hong Kong Science and Technology Parks Corporation

Eric Or is currently the Head of Partnerships for Hong Kong Science and Technology Park. Leading the team to drive the Hong Kong I&T ecosystem through collaboration with corporate clients, channels, and system integrators.

Prior to HKSTP, Eric was Managing Director, Greater China for Jardine OneSolution (HK) Limited from Jan 2015 to Jan 2020. Eric also spent over 10 years with Atos where he served as Country Managing Director for HK & Taiwan, Regional Head of Sales for Asia Pacific. Before that, Eric also worked in IBM, EMC, HP, and NCR in various sales leadership roles

A veteran in the IT industry, Eric has over 30 years of experience in general management, sales & Major Account Management roles.



Alan CHEUNG

Senior Director, Trust and AI Technologies, ASTRI

Mr. Alan Cheung is the Senior Director of the Trust and Artificial Intelligence technologies division in ASTRI. He leads the division in driving ASTRI's initiatives, particularly in Fintech and Smart City

areas with innovative applications such as generative AI, blockchain systems, cybersecurity, secure fintech services, federated learning, risk assessment and multimedia data analytics. Being a proactive collaborator with strong business acumen, Alan is always keen to connect commercial partners to develop innovative use cases across industry sectors.



Mingxin HUANG

BEng and MSc (Shanghai Jiao Tong University (SJTU))

PhD Delft University of Technology (TU Delft), FIMMM

Chair Professor and Head of Department of Mechanical Engineering, HKU

Prof. HUANG Mingxin is currently a Chair Professor and Head of Department of Mechanical Engineering at The University of Hong Kong. Prof. Huang has been awarded Xplorer Prize, Croucher Senior Research Fellowship, Changjiang Scholar Chair Professor, Gold Medal in Geneva International Exhibition of

Inventions, HKU Outstanding Researcher Award, HKU Innovator Award, HKU Outstanding Young Researcher Award, elected as Member of the Hong Kong Young Academy of Sciences. Prof. Huang's research mainly focuses on development of high-performance metals and alloys. Prof. Huang's team works on both fundamental and translational research.

of Hong Kong. Prof. Huang has been awarded Xplorer Prize, Croucher Senior Research Fellowship, Changjiang Scholar Chair Professor, Gold Medal in Geneva International Exhibition of



Zhiyong FAN

Chair Professor, Dept. of Electronic and Computer Engineering & Dept. of Chemical and Biological Engineering, The Hong Kong University of Science and Technology

Fellow of the Royal Society of Chemistry

Fellow of Optica

Founding Member of The Hong Kong Young Academy of Sciences

Co-director of State Key Laboratory on Advanced Displays and Optoelectronics Technologies, HKUST

Founding Director of Center on Smart Sensors and Environmental Technologies, HKUST

2022 Xplorer Prize Laureate

2022 The Innaugural BOCHK Science & Technology Innovation Prize Laureate

Prof. Zhiyong Fan joined Hong Kong University of Science and Technology (HKUST) in 2010. Currently, he is the founding Director of Center on Smart Sensors and Environmental Technologies, Co-director of the State Key Laboratory of Advanced Display and Optoelectronics Technologies at HKUST, Associate Director of Materials Fabrication and Preparation Facility of HKUST, and Associate Director of Guangdong-Hong Kong-Macao Joint Laboratory for Intelligent Micro-Nano Optoelectronic Technology. He is a Fellow of the Royal Society of Chemistry, Fellow of Optica, Senior Member of IEEE, and Founding Member of The Hong Kong Young Academy of Sciences. He has won a number of awards, including 2022

Tencent Xplorer Prize, 2022 HKBOC Science and Technology Innovation Prize, Shandong Natural Science Second Prize, 2022 and 2020 Top 10 Research Progress on Semiconductors in China, HKUST SENG Young Investigator Research Award, Outstanding Research Award, etc. His research interest is focused on functional nanomaterials and structures for electronic, optoelectronic and bionic electronic devices. Till date, he has published over 240 peer reviewed papers in Nature, Nature Photonics, Nature Electronics, etc., with citations ~28,000, H index 88. He also has 30 Chinese and US patents and one national high-tech company.



Jimmy WONG

BSc (King's College, University of London), MSc. and PhD in Material Science (Imperial College London)

Executive Director, Hong Kong Academy for Gifted Education, Chairman of The Hong Kong STEM Education Association

Member, Public Libraries Advisory Committee and the Museum Advisory Committee, HKSAR Government

Dr Jimmy Wong is the Executive Director of the Hong Kong Academy for Gifted Education, which provides off-school training programmes for the most gifted and talented students aged 10 to 18 in Hong Kong.

Dr Wong graduated with a BSc degree in Physics with Astrophysics from King's College, University of London, MSc. and PhD in Material Science from Imperial College London. Upon his return to Hong Kong in the mid 1990's, he began his research and science education career. He is regarded as the 'Father of STEM Education' in Hong Kong and has nurtured numerous top students and teachers in the field of STEM and

creativity education. He is founding chairman of The Hong Kong STEM Education Association since 2002. He sits on both the Public Libraries Advisory Committee and the Museum Advisory Committee advising the HKSAR Government on the development of public libraries and the promotion of science and cultural matters.

Dr Wong was awarded the HKSAR Government Chief Executive's Commendation for Community Service in 2011 to honour his contribution in the field of science and innovation technology education in Hong Kong.



Pan SIO

Curator, Macao Science Center

Dr. Pan SIO is the curator of Macao Science Center, a council member of Macao Polytechnic University and the council chairman of Association for Promotion of Science and Technology of Macau (MAPST). He obtained a bachelor's degree

in electrical and electronic engineering, a master's degree in law and a PhD in data science. He is a government-certified engineer, a member of the Royal Institution of Chartered Surveyors (MRICS) and an international commercial mediator (CIMAI). Dr.

Pan SIO was presented the "National Award for Excellence in Innovation" in 2020 and the "Top 10 Outstanding Cantonese Youth" in 2015. Under his leadership, the Macao Science Center has promoted the popularization of science education among adolescents and popular science education in multi-areas, pushed ahead with the construction of a platform for scientific epidemic prevention and online education after the outbreak of "COVID-19", setting the stage for online and offline new-type science popularization activities.



Che Ting CHAN

BSc (HKU); PhD (University of California at Berkeley)

Member, The Hong Kong Academy of Sciences

Associate Vice-President for Research and Development (Research), Daniel C K Yu Professor of Science, Chair Professor, Department of Physics, The Hong Kong University of Science and Technology

C.T. Chan received his BSc degree from the University of Hong Kong in 1980 and his PhD degree from the University of California at Berkeley in 1985. He is currently serving as the Associate Vice-President for Research & Development (Research) at HKUST. He is also concurrently the Daniel C K Yu Professor of Science, Chair Professor of Physics, and the Director of Research Office of HKUST. He has

been elected a Fellow of the American Physical Society and the Physical Society of Hong Kong and a member of the Hong Kong Academy of Sciences. He received the Achievement in Asia Award of the Overseas Chinese Physics Association and Croucher Senior Research Fellowship. He received the Michael G. Gale Medal for Distinguished Teaching at HKUST and is a co-recipient of Brillouin Medal for his research in metamaterials.



Wai Lim William LAM

Chief Curriculum Development Officer (Science), Education Bureau, HKSAR

Dr. William Lam is a Chief Curriculum Development Officer of the Education Bureau, Hong Kong SAR Government, responsible for the development of the

science curriculum in Hong Kong. He also works on promoting STEAM and I&T education, teacher's professional development as well as producing science teaching reference materials.



Stephanie MA

B.Sc. and M.Sc. (University of British Columbia) , Ph.D. (HKU)

Vice President, Co-chair, Outreach Committee, The Hong Kong Young Academy of Sciences

Professor and Associate Director (Knowledge Exchange and Global), School of Biomedical Sciences, Faculty of Medicine, HKU

Associate Director, Knowledge Exchange Office, HKU

Professor Ma obtained her B.Sc. (Cell Biology and Genetics) and M.Sc. (Experimental Medicine) degrees from the University of British Columbia. She then graduated with a Ph.D. degree from The University of Hong Kong (HKU) with an outstanding ranking and was awarded the Li Ka Shing Prize for the Best Ph.D. Thesis of that year. Since then, she has been working at The University of Hong Kong where she is currently a Professor and Associate Director (Knowledge Exchange and Global) in the School of Biomedical Sciences at the Li Ka Shing Faculty of Medicine (HKUMed). Professor Ma's research interest is on exploiting stemness as a cancer cell vulnerability. Her team is dedicated to better understand how a more undifferentiated and stemness signature in cancer can contribute to therapy resistance and

tumor recurrence. According to the ISI Essential Science Indicator, Professor Ma has been listed, from 2010 to 2018, as the top 1% of most-cited scholars. She is also the recipient of a number of awards including the more recent 2017 University of British Columbia Alumni Builder Award (Canada), the 2021 Research Grants Council (RGC) Research Fellow Scheme as well as the 2023 Croucher Senior Research Fellowship. Professor Ma is a Founding Member of the Hong Kong Young Academy of Sciences in which she currently serves as Vice-President and Co-Chair of their Outreach Committee. She is a member of the Board of Directors at Hong Kong Science and Technology Parks Corporation.



Denvid LAU

B.Eng.(HKU), M.Phil.(HKU), S.M.(MIT), Ph.D.(MIT), MASCE, MHKIE, MIEEE, SMSPIE

Co-chair, Outreach Committee, The Hong Kong Young Academy of Sciences

Professor, Department of Architecture and Civil Engineering, CityU

Denvid obtained his Bachelor degree with first class honors and Master degree in Civil Engineering from the University of

Hong Kong (HKU), and got his second Master degree from the Department of Civil and Environmental Engineering (CEE) at Massachusetts Institute of Technology (MIT). He then received his Ph.D. in the field of structures and materials from MIT in 2012. Prior to joining City University of Hong Kong (CityU) as an assistant professor in August 2012, he worked as a postdoctoral associate at MIT. He is currently a full professor at CityU. From January to July 2020, he was a visiting professor at MIT CEE. His research focuses on the functionalized construction materials, multiscale modeling of organic-inorganic system, moisture-induced debonding, durability and fiber reinforced polymer (FRP) composites in structural rehabilitation. To date, Denvid

has attracted over HK\$17 million fund in total for research and teaching development. He is currently the editorial board member of several international journals. He has published more than 170 referred journal and conference articles and has delivered more than 40 invited talks, which include plenary and keynote speeches in international conferences. Since 2018, Denvid has been nominated and selected as a Founding Member of the Hong Kong Young Academy of Sciences (YASHK). He has received one of The President's Awards from CityU, in recognition of his remarkable academic achievement. Denvid has been granted the 2020 Outstanding Supervisor Award from CityU in view of his excellent research supervision towards Ph.D. students. Recently, Denvid has been awarded the 2022 Outstanding Teaching Award from the College of Engineering.



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