



# TOWN HALL MEETING Make BME Great Together

http://www.bme.cuhk.edu.hk/new/files/undergraduatest d/TownHallMeeting18Mar2022.pdf

## Prof. Raymond Tong

18 March 2022

(BME Website => Students => Undergraduate Students => Town Hall Meeting)





# Agenda

- 1. Programme Outcome & HKIE Required Outcomes
- 2. Updates on Summer Exchange and Internship
- 3. Stream Declaration of Final Year Graduating Students
- 4. Students' Stream Preference
- 5. Proposed Elective Course Offering in 2022-23
- 6. Policy of Course Cancellation due to Low Enrollment Rate
- 7. Graduate Employment Survey
- 8. Student Ambassadors Scheme
- 9. Biomedical Engineering Outstanding Achievement Scholarships
- 10. BME Society
- 11. BME Activities

# Programme Outcome & HKIE Required Outcomes (1)

Programme Outcome					
PO 1	an ability to master the required knowledge of mathematics, science, and engineering and apply them appropriately to the BME discipline in general and/or to a specialized BME area				
PO 2	an ability to design and conduct experiments, collect data on humans and other biological specimens, and to analyze and interpret data to address health-related issues				
PO 3	an ability to design a system, component or process to meet desired needs within realistic constraints, and to develop innovative technologies to serve the healthcare needs of society				
PO 4	an ability to identify, formulate and solve engineering problems critically				
PO 5	an ability to use the techniques, skills, and modern engineering tools necessary for BME practice				
PO 6	an ability to use the computer/IT tools relevant to the BME discipline along with an understanding of their processes and limitations				
PO 7	an ability to communicate effectively				
PO 8	an ability to demonstrate leadership, to manage projects, and to function on multi-disciplinary teams				
PO 9	an ability to understand professional and ethical responsibility, and the impact of engineering solutions in a global and social context, especially the importance of health, safety and environmental considerations to both workers and the general public				
PO 10	a readiness to engage in lifelong learning to stay abreast of contemporary issues, and a capacity to acquire new knowledge and skills across disciplinary boundaries				

# Programme Outcome & HKIE Required Outcomes (2)

### Matching between the Programme Outcomes and the HKIE Required Outcomes

HKIE's Graduate Attributes	BME Programme Outcomes
a) an ability to apply knowledge of mathematics, science, and engineering appropriate to the degree discipline	PO1
b) an ability to design and conduct experiments as well as to analyze and interpret data	PO2
c) an ability to design a system, component or process to meet desired needs within realistic constraints, such as economic, environmental, social, political, ethical, health & safety, manufacturability & sustainability	PO3
d) an ability to function on multi-disciplinary teams	PO8
e) an ability to identify, formulate and solve engineering problems	PO4
f) an ability to understand professional and ethical responsibility	PO9
g) an ability to communicate effectively	PO7
h) an ability to understand the impact of engineering solutions in a global and social context, especially the	
importance of health, safety and environmental considerations to both workers and the general public	PO9
i) an ability to stay abreast of contemporary issues	PO10
j) an ability to recognize the need for, and to engage in lifelong learning	PO10
k) an ability to use the techniques, skills, and modern engineering tools necessary for engineering practice appropriate to the degree discipline	PO5
<ol> <li>an ability to use the computer/IT tools relevant to the discipline along with an understanding of their processes and limitations</li> </ol>	PO6 4

# Programme Outcome & HKIE Required Outcomes (3)

## Matching between the Programme Outcomes and the HKIE Required Outcomes

### Example:

Programme Outcomes	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10
	Apply knowledge of math, science & engineering to BME	Experiment on humans & biological specimens, analyze & interpret data	Innovate a system, part or process to meet desired needs within constraints	Identify, formulate, & solve engineering problems critically	Use techniques, skills, & modern engineering tools for BME practice	Use IT tools relevant to BME with an understanding of their limitation	Communicate effectively	Lead, manage projects, & function on multi-disciplinary teams	Understand ethics, global, societal & professional responsibilities	Learn new knowledge & skills across disciplines & continuously
HKIE Graduate Attributes	A	В	С	E	К	L	G	D	F, H	I,J
REQUIRED COURSES										
BMEG2001 Intro to BME	✓	$\checkmark$	$\checkmark$	$\checkmark$	√					
BMEG2011 BME Lab & Hospital Experience	✓	✓	✓	✓	✓	✓	✓	✓		

# **Updates on Summer Exchange and Internship**

## **Overseas Summer Research Internship**

Overseas University	No. of BME Students who have confirmed to be accepted by the oversea hosts (as of 17 March 2022)
New Jersey Institute of Technology, USA	1
National Taiwan University, Taiwan	1
Chang Gung University, Taiwan	1
University of Limoges, XLIM Research Institute (CNRS), France	2

>> apply & follow-up on visa application ASAP

### Local Summer Industrial Internships

More may be available later in April/May, e.g. EMSD, Johnson & Johnson's etc. START to PREPARE your CV for the potential Interview by companies

\* Please be alerted of our email notification

# Placement & Internship Programme via CINTEC https://pip.cintec.cuhk.edu.hk/web/

PIP C	инк	Guest								Guest <del>-</del>
	A Home / Posted Jobs									
æ	Posted Jobs	5								
Jobs	Q Search All Jobs	(Click to Expand)								
<b>-&gt;</b>	List out all posted	l jobs.								
	Type description: (	G: Graduate Employment W: Work Study Programme S: Sun	nmer Internship (P: Pert-time Jobs)							
	Job ID 🗘 🗘	Company ÷	Job Title	÷	Туре	÷	Deadline	÷	Status	Action
	2508	FansWiFi Limited	Sales & Marketing Intern		P		05-02-2018		Posted	
	3797	Red Soldier Ltd.	IOS/Android/Web Developer 1-year intern (R201704_IOSI, R201704_AI, R201704_WI)		W		31-03-2018		Posted	
	3798	Red Soldier Ltd.	IOS/Android/Web Developer Summer intern (R201704_IOSSI, R201704_ASI, R201704_WSI)		5		31-03-2018		Posted	
	3818	Sengital Ltd	Engineering Manager / Project Manager		G		31-03-2018		Posted	2
	3819	Sengital Ltd	Electronic Engineer / Project Engineer		G		31-03-2018		Posted	
	3825	Sengital Ltd	Assistant Engineering Manager / Assistant Project Manager		G		31-03-2018		Posted	
	3839	Jetta Company Limited	Graduate Scheme A Trainee (MCL)		G		01-06-2018		Posted	
	3841	Jetta Company Limited	Electronic Engineering Trainee		G		23-06-2018		Posted	
	3850	Hututa Technologies Limited	Software Engineer, System Engineer		G		01-06-2018		Posted	
	3857	5mina Limited	Software Engineer - Mobile and Web Infrastructure		W		23-02-2018		Posted	
	3884	A-oneTech Limited	Assistant Software Engineer		W		31-03-2018		Posted	
	3886	A-oneTech Limited	Assistant Mechanical Engineer		W		31-03-2018		Posted	
	3906	Document On Ready Ltd	Web Programmer		W		30-04-2018		Posted	
	3941	TopOne Information Technology Limited	Technical Engineer		G		30-06-2018		Posted	
	3942	Lakoo Games Limited	Fullstack Developer		G		30-04-2018		Posted	
	3943	Lakoo Games Limited	Growth/Marketing		G		30-04-2018		Posted	
	3964	ITE Smartcard Solutions Limited	System Engineer (Trainee)		W		30-04-2018		Posted 7	
	3965	ITE Smartcard Solutions Limited	Electronic Engineer (Trainee)		W		30-04-2018		Posted	
>	3966	ITE Smartcard Solutions Limited	Mechanical Engineer (Trainee)		W		30-04-2018		Posted	

# Placement & Internship Programme via Career Planning and **Development Centre (CPDC)**

https://cpdc.osa.cuhk.edu.hk/



### LATEST NEWS

ALL NEWS

- United Nations Major Group for Children and Youth Remote Internship 20 November 2020
- STEM Internship Scheme 2020 (Winter Intake) Job Vacancies and Guidelines for CUHK Students 20 November 2020

### **OUICK LINKS**

### PHOTO GALLERY

- Office of Student Affairs
- Careers E-coach
- CU Job Link
- Joint Institutions Job Information System (JIJIS)



# Faculty Undergraduate Summer Research Internship

### https://www.erg.cuhk.edu.hk/erg/SummerResearchInternship

Non-final year undergraduate students with a *cumulative GPA of 3.4 or above* are eligible to apply.



### **EDUCATION**

- > DEPARTMENTS
- > ACADEMIC PROGRAMMES
- > TEACHING AND LEARNING

### > INFORMATION FOR NEW STUDENTS

> ELITE Stream

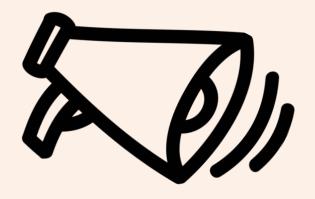
## **Undergraduate Summer Research Internship**

### Objective

The Faculty Undergraduate Summer Research Internship programme is launched to offer CUHK engineering undergraduate students with funding support to undertake a research project under the supervision of professors in summer. The objectives are to give students exposure to research environment, and grooms them for graduate studies and overseas summer research schemes.

The Scheme

- 1. Non-final engineering year undergraduate students with a CGPA of 3.4 or above are eligible.
- 2. Students who are planning and/or is going to participate summer programmes; or take summer courses overseas for more than three weeks accumulatively; or need to take more than three weeks of accumulated leave are NOT eligible for the internship programme.
- 3. The scheme is for undergraduate students with research interest to join on the voluntary basis, and it is



# Stream Declaration for BME Final Year Graduating Students

i.e. Students who are expected to be graduated in 2021-22 Term 2



## **Stream Declaration Form:**

https://forms.gle/8SZ51GFT7bg3EAAP6

Please complete the online google form by 10 June 2022 (Friday)

\*\* Certified Letter for BME Stream will be issued to students who have fulfilled the course requirement of stream of their admission year



香港中文大學生物醫學工程學系 Department of Biomedical Engineering

The Chinese University of Hong Kong





香港中文大學生物醫學工程學系 Department of Biomedical Engineering The Chinese University of Hong Kong



\_\_\_\_\_\_ 1 August 2020

### TO WHOM IT MAY CONCERN

Dear Sir/Madam,

### Stream of Specialization

This is to certify that <Student Name> (Student ID: XXXXXXXX) has fulfilled all the requirements for the stream of specialization in **Biomedical Imaging**, **Informatics and Modeling** for the B.Eng. degree in Biomedical Engineering.

For verification of student data, please send request to <u>bmeinfo@cuhk.edu.hk</u> or contact us (+852) 3943 1935.

Yours faithfully,

Professor Raymond K.Y. Tong Chairman Department of Biomedical Engineering The Chinese University of Hong Kong

TO WHOM IT MAY CONCERN

Dear Sir/Madam,

1 August 2020

### Stream of Specialization

This is to certify that <Student Name> (Student ID: XXXXXXXX) has fulfilled all the requirements for the stream of specialization in **Medical Instrumentation and Biosensors** for the B.Eng. degree in Biomedical Engineering.

For verification of student data, please send request to <u>bmeinfo@cuhk.edu.hk</u> or contact us (+852) 3943 1935.



香港中文大學生物醫學工程學系 Department of Biomedical Engineering The Chinese University of Hong Kong



1 August 2020

### TO WHOM IT MAY CONCERN

Dear Sir/Madam,

### Stream of Specialization

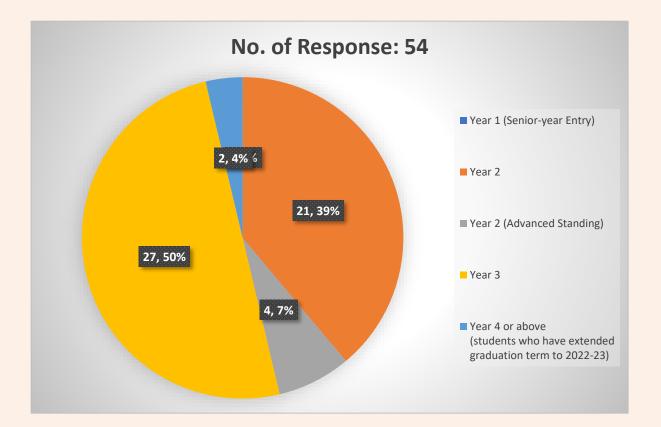
This is to certify that <Student Name> (Student ID: XXXXXXXX) has fulfilled all the requirements for the stream of specialization in Molecular, Cell and Tissue Engineering for the B.Eng. degree in Biomedical Engineering.

For verification of student data, please send request to <u>bmeinfo@cuhk.edu.hk</u> or contact us (+852) 3943 1935.

# Report on Survey Results for Stream Preference & Elective Course Offering in 2022-23

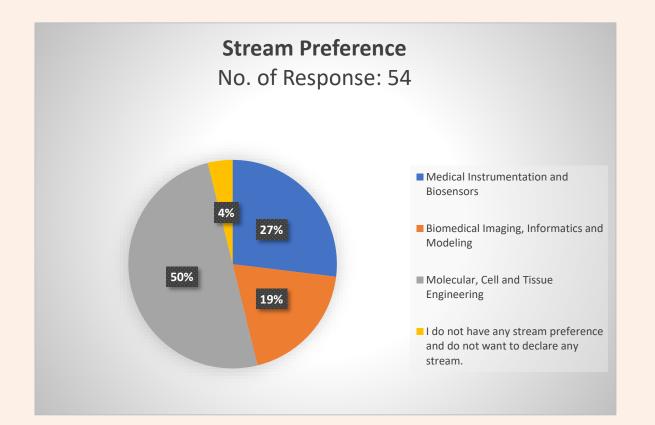
Survey on Preference of Stream & BMEG Elective Courses in 2022-23

54 students responded to the survey

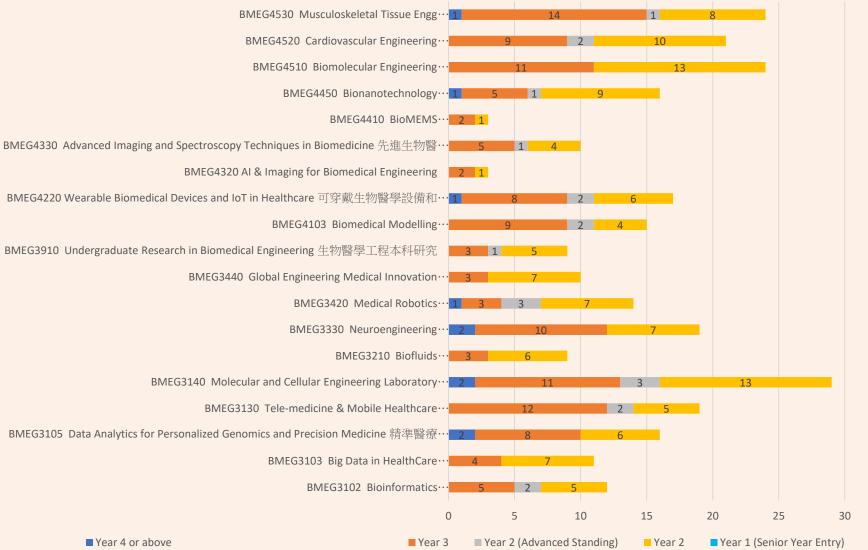


### **Students' Stream Preference:**

- 1<sup>st</sup> Molecular, Cell and Tissue Engineering (MCTE)
- 2<sup>nd</sup> Medical Instrumentation and Biosensors (MIB)
- 3<sup>rd</sup> Biomedical Imaging, Informatics and Modeling (BIIM)



## Students' Preference of BMEG Elective Course offering in 2022-23



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Survey on Preference of BMEG Elective Courses in 2022-23

(students who have extended graduation term to 2022-23)

Proposed BMEG elective course offering in 2022-23 for consideration \*TBC – subject to the final teaching assignment (final teaching assignment is not yet confirmed, the course offering plan and offering term may vary)

Course Code	Stream	Course Title	Unit(s)	2019-20	2020-21	2021-22	2022-23 Pending
BMEG3102	BIIM	Bioinformatics	3	Term 2	Term 2	Term 2	Х
BMEG3103	MIB/ BIIM	Big Data in HealthCare	3	Х	Х	Term 2	Х
BMEG3105/ ESTR3605	BIIM/MCTE	Data Analytics for Personalized Genomics and Precision Medicine	3	Х	Х	Term 1	Х
BMEG3130	MIB	Tele-Medicine and Mobile Healthcare	3	Х	Term 1	Х	Term 1
BMEG3140/ESTR3604	MCTE	Molecular and Cellular Engineering Laboratory	3	-	Term 2	Term 1	Term 1
BMEG3210/ESTR3212	МІВ/МСТЕ	Biofluids	3	Х	Х	Term 2	Х
BMEG3330/ESTR3602	МІВ	Neuroengineering	3	Х	Term 2	Term 2	Term 2
BMEG3420/ESTR4200	МІВ	Medical Robotics	3	Х	Х	Term 2	Term 2
BMEG3440	MIB/BIIM/MCTE	Global Engineering Medical Innovation	3	-	Term 2	Term 2	Term 2
BMEG3910	-	Undergraduate Research in Biomedical Engineering	3	Term 1/2	Term 1/2	Term 1/2	Term 1/2
BMEG4103	BIIM	Biomedical Modelling	3	Х	Х	Х	Х
BMEG4220	МІВ	<del>Body Sensor Networks</del> -Wearable Biomedical Devices and IoT in Healthcare	3	Х	х	х	Term 1/2
BMEG4320/ESTR4200	BIIM	AI & Imaging for Biomedical Engineering	3	х	х	Term 1	х
BMEG4330/ESTR4201	MIB/BIIM	Advanced Imaging and Spectroscopy Techniques in Biomedicine	3	Term 1	х	х	х
BMEG4410/ESTR4203	MIB/MCTE	BioMEMS	3	Term 2	Х	Term 1	Х
BMEG4450/ESTR4202	MIB/MCTE	Bionanotechnology	3	Term 2	Х	Term 2	Term 2
BMEG4510/ESTR4204	MCTE	Biomolecular Engineering	3	Х	Term 1	Х	Term 1
BMEG4520	MIB/BIIM/MCTE	Cardiovascular Engineering	3	Term 1	Term 2	Term 2	Term 2
BMEG4530/ESTR4214	MCTE	Musculoskeletal Tissue Engineering	3	Term 2	Term 2	Х	Term 2

# Course Offering in 2021-22

## **BMEG4220** Wearable Biomedical Devices and IoT in Healthcare

- Course Renamed (previous course name: Body Sensor Networks)
- Course Offering: 2021-22 Term 1

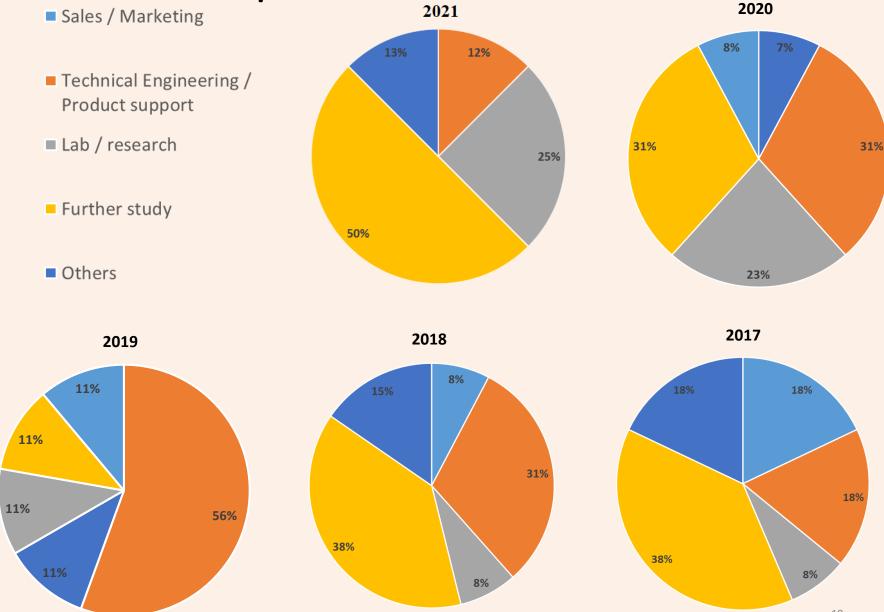
### **Course Description:**

This course addresses two closely related areas in biomedical engineering. The contents of the first part include: an introduction to wearable medical devices and bio-sensing technologies, design of on-body and in-body biosensors, communication topologies, protocols, standards and media of body sensor networks (BSN). The second part is concerned with deployment of healthcare services through the internet system. Specific topics include: review of remote healthcare deployment through an information network, enabling technologies such as high definition imaging and mobile communication, information security, data management and state-of-the-art development.

# Policy of Course Cancellation Due to Low Enrollment Rate

- Minimum enrollment no. for elective courses: 12
- Elective courses may be cancelled if the enrollment no. is <u>BELOW 12</u> after the course registration period of the semester
- General Office will inform students who registered the course will be cancelled and provide assistance to students for course registration

# **Graduate Employment Survey**



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# BME Student Ambassadors 2021-22

Name	Admission Channel	Year of Study	Gender	Contact
CHAN Chi Chung Francis	JUPAS	Year 4	М	1155126345@link.cuhk.edu.hk
LEUNG Chi Kit Boris	Non-JUPAS Local	Year 4	м	1155124628@link.cuhk.edu.hk
LI Xuanxuan	Non-JUPAS International	Year 4	F	1155123725@link.cuhk.edu.hk
NG Wing Fai Sofie	Non-JUPAS Local	Year 4	F	1155113921@link.cuhk.edu.hk
Dayeon ROO	Non-JUPAS International	Year 4	F	1155122982@link.cuhk.edu.hk
Moldir SHYNGYS	Non-JUPAS International	Year 4	F	1155120928@link.cuhk.edu.hk
LI Szehon Anson	JUPAS	Year 3	М	1155141910@link.cuhk.edu.hk
SZE Hoi Kuen Patrick	JUPAS	Year 3	М	1155142404@link.cuhk.edu.hk
WONG Chee Ching CC	Non-JUPAS Local	Year 2	F	1155155836@link.cuhk.edu.hk



Dayeon Francis Boris XuanXuan Sofie Moldir

Anson

Patrick

October 2021 Give sharing to secondary school students (Consultation Day)



Leong Chun Ping

Leung Chi Kit

March 2021

Career Forum 2021

Wong Hoi La



Trang TRAN

ng Yin LEE





Chung Yin TSANG

Michael Chit Yau K.

January 2021 Local-International Buddy Scheme

Hoi Lam WONG

SHYNGYS

## **BME Student Ambassadors**

## RECRUITMENT 2022-23

http://www.bme.cuhk.edu.hk/new/studentambassadors.php

- nurture peer connections between junior and senior students
- helps new students explore CUHK's learning environment
- develop social network through sharing and interactions with BME buddies

### **Eligible Applicants**

Year 2 or above undergraduate students who are:

- Enthusiastic about serving BME
- Creative, cheerful and confident
- Sincere to share and patient to listen

### Recognition

Certificate of Appreciation will be awarded to Student Ambassadors

Apply Now! **\*\*Online Application Form**\*\*

Application Deadline: 25 July 2022 (Monday)

# Biomedical Engineering Outstanding Achievement Scholarships 2020-21

### **Number of Award**

EIGHT awards of \$10,000 each

### **Eligibility and Award Criteria**

- $\checkmark$  Year 1 to Year 4 or above BME undergraduate students
- $\checkmark$  Year GPA of 3.0 or above in the previous year of study

✓ Participated in co-curricular and/or extra-curricular activities:

- Awards, especially those related to BME discipline
- Community Service, e.g. contributions to BME Department and/or Profession
- Other achievement, e.g. sports, competitions, voluntary work
- ✓ Financial needs

### \*Awardees in 2020-21:

Name	Year of Study in 2020-21
WONG, Chee Ching	Year 1
LEE, Wing Yin	Year 2
LIN, Yi Ting	Year 2
MAK, Kin Shing Wickey	Year 2
TRAN, Thi Trang	Year 2
SZE, Hoi Kuen	Year 2
WANG, Han Yi	Year 2
BAEKOVA, Aiana	Year 3
SHYNGYS, Moldir	Year 3
CHENG, Chak Kit	Year 4

\* Special Approval in 2020-21 for the extra two awards



For details and application procedure, we will email to students on around May 2022, application deadline will be on early July 2022. Please be alerted of our notification email later on.

# **BME** Society

# Flaretrikos 蔡鷖工 – 12<sup>TH</sup> Biomedical Engineering Society



## cuhk\_flaretrikos





### osition

Wember		Position
MAN, Kin Tai (Kirtus)	文健泰	President & Representative of United College
YEUNG, Lok Yeung (Kart)	楊樂暘	Internal Vice President & Representative of New Colleges
HO, Yu On (Martin)	何予安	External Vice President & Representative of United College
CHAN, Cheuk Ka (Ka)	陳綽家	Secretary & Representative of Chung Chi College
CHAN, Ching Yeung (Tom)	陳正揚	Financial Secretary
LUK, Chun Kit (Karl)	陸俊杰	Representative of New Asia College & Publication and Design Officer
CHEUNG, Shun Hang (Jo)	張信恒	Publication and Design Officer
AU-YEUNG, Yau Sang (Henry)	歐陽祐生	Representative of Shaw College & Recreation and Sports Officer





# **BME** Activities

### Lab Exposure 2022 (Year 1 students only)



### March - April 2021 Photo Day



### **1 April 2022 BMF** Career Forum **Registration is required** https://forms.gle/YqVe8CYsGFx3Ctzr7

2022 **BME CAREER FORUN** 1 April 2022 (Friday) Join us on ZOOM! 2:30 - 4:30p.m. \*\* Registration is required Zoom login Information will be emailed to the registered students. Hosts: Department of Biomedical Engineering, CUHK Se Prof. Raymond Tong & Prof. Aaron Ho 🛩 **Speakers:** Electrical and Mechanical Services Department (EMSD) Sector/Kowloon Central Sector/Kowloon Central Johnson and Johnson (HK) Limited PMr. Roddick Yuen - Senior Regional Franchise Manager 9- Ms. Sarah Tse, Product Manager of DePuy Synthes The Hong Kong Institution of Engineers – Biomedical Division Service In Jerry Heung, Biomedical Engineer of HA - Ir Oliver Chan, Biomedical Engineer of HA Head Office 9- Dr. Ricky Chiu, Chairman & CEO of Phase Scientific P Dr. Russell Chan, CTO of Gense Technologies Sanwa Biotech Limited - Mr. William Yim - Executive Chairman & CTO

Stryker Asia Pacific

- P Dr. SY Mak & Clinical Education, Mako Training & Segmentation Manager
- Winner Medical (Hong Kong) Limited
- Pr. Kevin Orr Group Vice President, Chief Investment Officer

Department of

### Enquiries: 3943 0632 / bmeinfo@cuhk.edu.hk



http://www.bme.cuhk.edu.hk **Biomedical Engineering** BMEDEP MeWe CUHK BME CUHK Biomedical Engineering

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