Our Joint School Team Achieves Gold and Receives Two Award Nominations in International Biotechnology Competition, Gaining Global Acclaim

In November 2023, a team composed of our school and four other secondary schools embarked on a remarkable journey to Paris as the HK-Joint-School team. They participated in the International Genetically Engineered Machine (iGEM) competition and achieved outstanding results, competing against teams from around the world. Ultimately, the HK-Joint-School team won the gold medal, setting a new record in the history of Hong Kong secondary school participation. They were also simultaneously nominated for the "Past Education Project Award" and the "Past Sustainable Davalonment Project Award" (renking

"Best Education Project Award" and the "Best Sustainable Development Project Award" (ranking within the top 5 in the high school village), bringing honor to Hong Kong.

Founded by the Massachusetts Institute of Technology (MIT) in 2003, the iGEM competition is now the most prestigious and renowned international event in the field of biotechnology, attracting participation from high school students, university students, and researchers worldwide. This year, over 400 research teams from 44 countries participated, with a total of over 7,000 participants.

Under the theme of "Antimicrobial Black Soldier Fly Ecoplaster", the team conducted research using genetic engineering techniques. They introduced genes from the black soldier fly into *Escherichia coli*, successfully synthesizing antimicrobial peptides with bactericidal properties. Additionally, they extracted the exoskeleton of the black soldier fly to create a bandage material that rapidly degrades in soil. Through mathematical modeling, they determined the optimal concentration of antimicrobial peptides for sterilization.

The participating students delivered speeches on the podium at the Grand Jamboree in the Paris Expo Porte de Versailles, presenting their research findings to the judges, other participating teams, and the media. They showcased their presentation skills, adaptability, and problem-solving abilities, successfully capturing attention and admiration.

Please find the links below to the media-related reports:

星島日報:研可降解抗菌膠布港生揚威海外

https://std.stheadline.com/daily/article/2557475/%E6%97%A5%E5%A0%B1-%E6%95%99%E8%82%B2-%E7%A0 %94%E5%8F%AF%E9%99%8D%E8%A7%A3%E6%8A%97%E8%8F%8C%E8%86%A0%E5%B8%83%E6%B8% AF%E7%94%9F%E6%8F%9A%E5%A8%81%E6%B5%B7%E5%A4%96

經濟日報: 【中學科研】五校組隊赴法國參加iGEM奪金 創造生物可降解抗菌膠布 https://topick.hket.com/article/3656499/

香港01: 五校中學生組隊研製降解抗菌膠布 國際遺傳工程機器設計競賽奪冠 https://www.hk01.com/article/964103?utm_source=01articlecopy&utm_medium=referral

明報:中學生製降解膠布 奪國際遺傳工程賽金獎 https://news.mingpao.com/pns/%e6%95%99%e8%82%b2/article/20231122/s00011/1700584704334



