

## Poster Awards of 2023 ISCM-1

### Poster session 1 Session-A

Poster No.	Title	Authors	Affiliation
<b>High Distinction(特優) P-F-3</b>	Functionalized TiO <sub>2</sub> Photo-Electrocatalytic Carbonized Membrane for Efficient Degradation of Micropollutants	Jhen-Cih Wu <sup>1</sup> , Yi-Hsueh Chuang <sup>2</sup> , Sofia Ya Hsuan Liu <sup>3,4</sup> , Chia-Hung Hou <sup>1,*</sup>	<sup>1, 3, 4</sup> National Taiwan University, Taiwan; <sup>2</sup> National Yang Ming Chiao Tung University, Taiwan
<b>Excellence(優選) P-C-1</b>	Enhancement of Carbon Quantum Dots on P25/NH <sub>2</sub> -MIL-125 for Photocatalytic Degradation of Organic Pollutants under Visible Light	Wen-Chieh Hsiao <sup>1</sup> , Chia-Hao Tseng <sup>2</sup> , Chao-Wei Huang <sup>2*</sup>	<sup>1</sup> National Kaohsiung University of Science and Technology, Taiwan. <sup>2</sup> National Cheng Kung University, Taiwan.
<b>Excellence(優選) P-F-2</b>	Precise synthesis of Thiol-End Group Dendritic Polymers Decorated with Gold Nanoparticles Immobilized on Amino-Functionalized Graphene Oxide Thin Films for SERS Detection	Kuan-Syun Wang <sup>1</sup> , Chen-Yang Lin <sup>2</sup> , Ri-Hao Yeh <sup>2</sup> , Gong-De Lin <sup>1</sup> , Qi-Yang Xu <sup>1</sup> , Ting-Yu Liu <sup>2*</sup> , Ru-Jong Jeng <sup>1</sup>	<sup>1</sup> National Taiwan University, Taiwan. <sup>2</sup> Ming Chi University of Technology, Taiwan.
<b>Honorable Mention(佳作) P-C-3</b>	Different Phases of Phenylenediamine Carbon Quantum Dots Supported on P25/NH <sub>2</sub> -MIL-125 Composite Materials for Visible Light Photocatalytic Degradation of Organic Pollutants	Hui-Shan Chang <sup>1</sup> , Chao-Wei Huang <sup>2*</sup>	<sup>1</sup> National Kaohsiung University of Science and Technology, <sup>2</sup> National Sun Yat-Sen University, Taiwan
<b>Honorable Mention(佳作) P-C-5</b>	Reduced Graphene Oxide-MoO <sub>3</sub> Composites via Microwave-Assisted Synthesis for Dual Removal of Organic Dyes and Heavy Metal Cation Under Simulated Sunlight Irradiation	Yuan-Chun Lin <sup>1</sup> , Alfin Kurniawan <sup>2</sup> , Joey Andrew A. Valinton <sup>2</sup> , Chun-Hu Chen <sup>2</sup> , Shiow-Huey Chuang <sup>1,*</sup>	<sup>1</sup> National University of Kaohsiung, Taiwan; <sup>2</sup> National Sun Yat-Sen University, Taiwan
<b>Honorable Mention(佳作) P-F-1</b>	Photocurable Resin with Poly(Ethylene Glycol) Methacrylate Modified Graphene Nanosheets for 3D Printing Application	Wei-Han Luo,* Ting-Yu Liu, Yao-Sheng Chang, Yu-Hsiang Huang	Ming Chi University of Technology
<b>Honorable Mention(佳作) P-F-5</b>	Silver Nanoparticles on Photocatalytic g-C <sub>3</sub> N <sub>4</sub> /Graphene Oxide Nanoplatelets for Reusable SERS Detection	Guang-Zhi Peng <sup>1,2</sup> , Ting-Yu Liu <sup>1*</sup> , Chien-Ming Chen <sup>1</sup> , Hsuan-Ting Lin <sup>2</sup> , Zi-Ling Zeng <sup>2</sup> , Ming-Chien Yang <sup>2*</sup>	<sup>1</sup> Ming Chi University of Technology, Taiwan; <sup>2</sup> National Taiwan University of Science and Technology, Taiwan;

## Poster session 1 Session-B

Poster No.	Title	Authors	Affiliation
<b>High Distinction(特優) P-E-11</b>	Biomass Carbon Use Nitrogen Doping Effects via Microwave-Assisted Hydrothermal Reaction as Potential Anode Materials for Na Ion Batteries	Zhi-Ting Liu <sup>1</sup> , Tzu-Hsien Hsieh <sup>2</sup> , Wei-Ren Liu <sup>1*</sup>	<sup>1</sup> Chung Yuan Christian University, Taiwan; <sup>2</sup> CPC Corporation, Taiwan.
<b>Excellence(優選) P-E-5</b>	Silicon/Carbon Composite Anode Derived from Nano Silicon/Phenolic Resin/Pitch as Anode Materials for Lithium-Ion Batteries	Yu-Hsuan Li, Wei-Ren Liu	Chung Yuan Christian University
<b>Excellence(優選) P-E-14</b>	Si/SiO <sub>x</sub> /Al <sub>2</sub> O <sub>3</sub> From Recycled Solar Cells as a Lithium-Ion Battery Anode Material	Yu-Sin Chen <sup>1</sup> , Yen-Lin Chen <sup>1</sup> , Shih-Ming Huang <sup>2</sup> , Hsu-Min Huang <sup>2</sup> , Shih-Jen Lin <sup>2</sup> , Yi-Hung Liu <sup>1*</sup>	<sup>1</sup> National Central University, Taiwan; <sup>2</sup> ACON Greenergy Technology Co., Ltd.
<b>Honorable Mention(佳作) P-E-1</b>	Application of Environmentally Sustainable Carbon Quantum Dots in Organic Photovoltaics	Yu-En Chien <sup>1</sup> , Hsin-Te Liang <sup>2</sup> , Yan-Cheng Peng <sup>2</sup> , Jia-Chen Chang <sup>1</sup> , Chi-Heng Wei <sup>1</sup> , Ching -Chao Chiang <sup>1*</sup> , Tzong-Yuan Juang <sup>3</sup> , Chih-Ping Chen <sup>2*</sup>	<sup>1</sup> National Taiwan Normal University , Taiwan; <sup>2</sup> Ming Chi University of Technology, Taiwan; <sup>3</sup> China Medical University, Taiwan.
<b>Honorable Mention(佳作) P-E-3</b>	The Effects of Sulfonated Graphene Nanosheets Encapsulated in Polysulfone-Based Proton Exchange Membranes for Vanadium Redox Flow Battery	Ming-Yen Chien <sup>1</sup> , Ting-Yu Liu <sup>1*</sup> , Chao-Chi Lai <sup>1</sup> , Chien-Kuo Hsieh <sup>1</sup> , Chien-Hong Lin <sup>2</sup>	<sup>1</sup> Ming Chi University of Technology, Taiwan; <sup>2</sup> Institute of Nuclear Energy Research, Taiwan.
<b>Honorable Mention(佳作) P-E-4</b>	Phenolic Resin Modified by High Efficiency Oxygen Plasma for Lithium Ion Batteries with Superior Performance	Wei-Chu Hsu, Wei-Ren Liu*	Chung Yuan Christian University
<b>Honorable Mention(佳作) P-E-7</b>	High Retention Supercapacitors Using Carbon Nanomaterials/Iron Oxide/Nickel-Iron layered Double Hydroxides as Electrodes	Chung-Hsuan Hsiao, Chi-Young Lee, Nyan-Hwa Tai*	National Tsing Hua University

<b>Honorable Mention(佳作)</b> <b>P-E-10</b>	Influence of Conductive Additives in High-Energy Density Electric Double-Layer Capacitors with Organic Electrolyte	Ting-Jui Chang, Tzu-Hsien Hsieh*, Jarrn-Horng Lin*	National University of Tainan
<b>Honorable Mention(佳作)</b> <b>P-E-16</b>	Graphitic Nanofibers Supported NiSe <sub>2</sub> Nanoparticles for the Performance Enhancement of Methanol Oxidation	Jun-Kai Yang, Chien-Kuo Hsieh	Ming Chi University of Technology

## Poster session 2 Session-A

Poster No.	Topic	Presenter	Institution
<b>High Distinction(特優)</b> <b>P-B-7</b>	Fluorescent Quantum Defects in Carbon Nanotubes and their Degradability	Te-I Liu <sup>1</sup> , Carlos Quiroz <sup>1,2</sup> , Ai Phuong Nguyen <sup>1,3,4</sup> , Ching-Wei Lin <sup>1,*</sup>	<sup>1,3</sup> Academia Sinica, Taiwan; <sup>2</sup> Taipei Medical University, Taiwan; <sup>4</sup> National Tsing Hua University, Taiwan.
<b>Excellence(優選)</b> <b>P-B-9</b>	Exploring the Optical Properties and Physiological Effects of Single Chirality Carbon Nanotube Enantiomers	Carlos J. Quiroz <sup>1,2</sup> , Ching Wei Lin <sup>2,*</sup>	<sup>1</sup> Taipei Medical University, Taiwan; <sup>2</sup> Academia Sinica, Taiwan
<b>Excellence(優選)</b> <b>P-B-11</b>	Laser-Assisted Carbonization and Hydrophobicization to Fabricate Microelectrodes for Skin Patches Uses	Jui-Yang Chan <sup>1</sup> , Yi-Chang Chung <sup>1,2,*</sup>	<sup>1,2</sup> National University of Kaohsiung
<b>Honorable Mention(佳作)</b> <b>P-B-16</b>	Flexible PDMS 3D-nanostructure SERS Chip for Water Pollutants	Yun-Chu Chen, Yu-Hsiang Huang, Ting-Yu Liu*	Ming Chi University of Technology
<b>Honorable Mention(佳作)</b> <b>P-B-8</b>	Anti-Bacterial Capabilities and SERS Detection of PEDOT: PSS Coating with Graphene Oxide Nanosheets and Silver Nanoparticles by Electropolymerization	Chun-Hao Wu, Chao-Chi Lai, Ting-Yu Liu*	Ming Chi University of Technology
<b>Honorable Mention(佳作)</b> <b>P-N-2</b>	Oxidative Decomposition of Luminescent Defect-Containing Carbon Nanotubes	Yen-Hsuan Lin <sup>1,2</sup> , Ching-Wei Lin <sup>2,*</sup>	<sup>1</sup> National Taiwan Normal University, Taiwan; <sup>2</sup> Academia Sinica, Taiwan.
<b>Honorable Mention(佳作)</b> <b>P-N-7</b>	High-Performance Flexible Transparent Conductive Film Based on rGO/Ag NWs for Foldable Solar Cell	Yu-Ching Huang,* Yi-Ting Lai, Po-Yen Wu	Ming Chi University of Technology

## Poster session 2 Session-B

Poster No.	Topic	Presenter	Institution
<b>High Distinction(特優) P-D-1</b>	Development of a Diagnostic Platform for Alzheimer's Disease Using Fluorescent Nanodiamond-Based Spin-Enhanced Lateral Flow Immunoassay	Stefanny Angela, Gianna Fadhillah, Wesley Wei-Wen Hsiao*, Wei-Hung Chiang*	National Taiwan University of Science and Technology
<b>Excellence(優選) P-R-2</b>	Atmospheric Pressure Hexamethyldisiloxane Plasma Deposition of Organosilica-Carbon Films	Pin Ying Wu, Chun Huang*	Yuan Ze University
<b>Excellence(優選) P-R-15</b>	Highly Sensitivity Pressure Sensor Using Crumpled Graphene	Yi-Yan Tang, Yen-Ting Liu, Chun-Hu Chen*	National Sun Yat-sen University
<b>Honorable Mention(佳作) P-R-11</b>	Application of Magnesium Nitrate Hexahydrate/ Graphene/ Carbon Nanotube Composite Phase Change Materials in Solar Thermal Storage	Yeng-Fong Shih, Zi-ting Liao*, Nien-chen Tsai, Ying-Hsiao Chen*	Chaoyang University of Technology
<b>Honorable Mention(佳作) P-R-10</b>	Green and Ultrahydrophobic Fluorine-Doped Graphene Composite Coatings with Excellent Corrosion-Resistant Performances	Hao-Hsuan Hsia, Geng-Hua Li, Wei-Ren Liu*	Chung Yuan Christian University
<b>Honorable Mention(佳作) P-R-12</b>	Crumpled Graphene Coating to Reduce Frictional Resistance of Sailing	Tsung-Han Chan, Jyun-Hao Chen, Chun-hu Chen*	National Sun Yat-Sen University