



# IUMRS-ICEM 2018

AUGUST 19(SUN.) - 24(FRI.), 2018 / DAEJEON, KOREA

<b>Session Title</b>	<b>High Energy Density Electrode Materials</b>	<b>Session Code</b>	<b>Th-A1</b>
<b>Date and Time</b>	<b>2018-08-23 / 10:30 - 12:30</b>		
<b>Place</b>	<b>Room A</b>		
<b>Session Chair</b>	<b>TBA</b>		

Th-A1-1

10:30 - 11:00

### **[Invited] Layered Oxide Cathode Materials for High Energy Density Lithium-Ion Batteries**

Xiqian Yu<sup>1</sup>, Jue Liu<sup>2</sup>, Enyuan Hu<sup>3</sup>, Jie-Nan Zhang<sup>1</sup>, Hong Li<sup>1</sup>, Xuejie Huang<sup>1</sup>, and Xiao-Qing Yang<sup>3</sup>  
<sup>1</sup>CAS, China, <sup>2</sup>ORNL, USA, <sup>3</sup>Brookhaven Nat'l Laboratory, USA

Th-A1-2

11:00 - 11:30

### **[Invited] Improved Performances of Sulfur-based Cathode Materials via In-Situ Electrochemical Treatments for the Next Generation Secondary Batteries**

Uijin Chang, Hwonki Lee, and KwangSup Eom  
GIST, Korea

Th-A1-3

11:30 - 11:45

### **Understanding Potential Mechanism at 1st Charge in Li<sub>2</sub>S Cathode Material for Rechargeable Li-S Batteries**

Yongjo Jung and Byoungwoo Kang  
POSTECH, Korea

Th-A1-4

11:45 - 12:00

### **Adsorption Behavior of Lithium Polysulfides on Functionalized Surface of Ti<sub>2</sub>C-based MXene**

Eun Seob Sim and Yong-Chae Chung  
Hanyang Univ., Korea

Th-A1-5

12:00 - 12:15

### **Fabrication of SnO<sub>2</sub>/Nanoperforated Graphene (NPG) Microsphere for High Lithium-Ion Storage Performance**

Yeon Jun Choi, Myung Seong Kim, Jun Hui Jeong, Young Hwan Kim, and Kwang-Bum Kim  
Yonsei Univ., Korea

Th-A1-6

12:15 - 12:30

### **High-Performance Black Phosphorus- Multiwall Carbon Nanotube Composite for High-Capacity, Durable Lithium-Ion Batteries**

Safa Haghghat-Shishavan, Mahboobeh Nazarian-Samani, Masoud Nazarian-Samani, and Kwang-Bum Kim  
Yonsei Univ., Korea