

# **KHUPO 20<sup>th</sup> ANNUAL INTERNATIONAL PROTEOMICS VIRTUAL CONFERENCE**

‘Transformative Proteomics for Precision Medicine’

September 14 (Mon) – 15 (Tue), 2020

Virtual Conference

The Korean Human Proteome Organization

# WELCOME MESSAGE

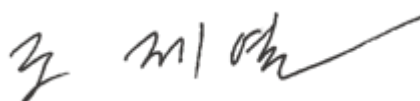
Dear colleagues,

We are delighted to announce that KHUPO's 20th Annual International Proteomics Conference is scheduled to be held as virtual in September 14-15, 2020. On behalf of the Organizing Committee, I cordially welcome you to this wonderful event.

The theme of this year's conference is "Transformative Proteomics for Precision Medicine". Two plenary lectures and four symposia are planned. The symposia will cover various subjects including two clinical proteomics sessions. We have also reserved one session for presentations by scientists in their early career to encourage the participation of the young talents in the field. As KHUPO is entering its 20th year and chosen to host AOHUPO 2020, our annual conference will continue to provide an excellent platform for sharing the ideas and building friendship among the participants.

I look forward to greeting you all in Seoul at the 20th Annual International Proteomics Conference.

Best Wishes,



Je-Yoel Cho, DVM, PhD

President, The Korean Human Proteome Organization

Professor, Department of Biochemistry, College of Veterinary Medicine

Seoul National University



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## GENERAL INFORMATION

Title	20 <sup>th</sup> Annual International Proteomics Conference
Theme	Transformative Proteomics for Precision Medicine
Date	September 14 (Mon) – 15 (Tue), 2020
Venue	Virtual Conference
Program	2 Plenary Lectures, 4 Symposia, 2 Education Session, Young Scientist session, Poster Session etc.
Industrial Events	Online Exhibition
Expected Participants	300 Participants
Organized by	The Korean Human Proteome Organization
Official Language	Korean
Website	<a href="http://2020.khupo.org">http://2020.khupo.org</a>

## PLENARY SPEAKERS

	
Beom-Tae Kim (Chemical Research Institute)	Pann-Ghil Seo (Korea Institute of Brain Research)

## SYMPOSIA

1. New technology & Single cell proteomics
2. Clinical proteomics
3. Biological proteomics
4. Multi-Omics

# PROGRAM AT A GLANCE

## SCIENTIFIC PROGRAM

September 14 (Mon), 2020

10:00	<b>Registration</b>
<b>10:20-11:59</b>	<b>Education Session 1</b>
<b>Education Session 1 (Chair: Hae-Jung Kim)</b>	
10:20-10:53	Research Design <b>Kyoung-Kon Kim</b> (Seoul Asan Hospital)
10:53-11:26	Sample pre-treatment <b>Jong-Moon Park</b> (Gacheon University)
11:26-11:59	LC/MS Methodology <b>Jong-Seo Kim</b> (Seoul National University)
<b>12:00-12:10</b>	<b>Break</b>
<b>12:10-13:50</b>	<b>CW-1(&amp; Lunch)</b>
<b>13:50-14:00</b>	<b>Opening Remark</b>
<b>14:00-14:50</b>	<b>PL-1</b>
<b>PL-1 (Chair: Young-Ki Baek)</b>	
14:00-14:50	TBA <b>Beom-Tae Kim</b> (Chemical Research Institute)
<b>14:50-15:00</b>	<b>Break</b>
<b>SYM-1 (New tech. &amp; Single cell proteomics)</b> <b>(Chair: Jong-Shin Yoo &amp; Bong-Hee Lee)</b>	
15:00-15:20	New Technology & Single Cell Proteomics <b>Kyoung-Jo Jo</b> (Seoul National university)
15:20-15:40	Exosome engineering for protein delivery via optogenetic approach <b>Ji-Hwan Park</b> (GIST)
15:40-16:00	A new chemical tool for identification and purification of proteins <b>Kyeng-Min Park</b> (Center for Self-assembly and Complexity (CSC), Institute for Basic Science (IBS))

16:00-16:20	Aerodigestive organoids in stem cells and diseases <b>Young-Tae Jeong</b> (DGIST)
<b>16:20-16:30</b>	<b>Break</b>
<b>SYM-2 (Clinical Proteomics)</b> <b>(Chair: Young-Soo Kim &amp; Chul-Joo Lee)</b>	
16:30-16:50	Mathematical model of a protein-protein interaction signaling network <b>Eun-Jung Kim</b> (KIST)
16:50-17:10	Omics-approach to explore crosstalk between gastric cancer cells and cancer associated fibroblasts. <b>Jae-Young Kim</b> (Choong Nam University)
17:10-17:30	N- & O- glycoproteome analysis using GlycoProteome Analyzer and its applications <b>Jin-Young Kim</b> (Research Center for Bioconvergence Analysis, Korea Basic Science Institute)
17:30-17:50	YN1203 as a Companion Diagnostic Biomarker for Predicting the Response of Immune Checkpoint Inhibitors <b>Byong-Chul Yoo</b> (National Cancer Center)

September 15 (Tue), 2020

<b>9:10-10:00</b>	<b>Young Scientists</b>
9:10-9:20	Common plasma protein marker LCAT in aggressive human breast cancer and canine mammary tumor <b>Hyung-Min Park</b> (Seoul National University)
9:20-9:30	High-precision Proteomics Approach to Develop Multiple Biomarker Panels to Predict Tocilizumab Response in Rheumatoid Arthritis Patients <b>Ara Cho</b> (Seoul National University)
9:30-9:40	Serum-Based Proteome Multi-marker Panel with Multiple Reaction Monitoring-Mass Spectrometry for Early Detection of Hepatocellular Carcinoma <b>In-Joon Yeo</b> (Seoul National Medical University College of Medicine)
9:40-9:50	Glycosylation of serum haptoglobin as a marker of gastric cancer: an overview for clinicians <b>Seunghyup Jeong</b> (Chungnam National University)

9:50-10:00	Isomeric glycopeptides analysis using high-temperature reversed-phase liquid chromatography coupled with mass spectrometry <b>Eun-Sun Ji</b> (Korea Basic Science Institute)
10:00-10:20	<b>Registration</b>
<b>Education Session 2</b>	
10:20-10:53	Data Processing Method Using Persus <b>Jung-Hoon Yeom</b> (Seoul Asan Hospital)
10:53-11:26	Critical Assay Review <b>Jae-Hyun Baek/Won-Seon Yang</b> (Seegene Medical Foundation)
11:26-11:59	Paper-writing Method <b>Kyoung-Kon Kim</b> (Seoul Asan Hospital)
12:00-12:10	<b>Break</b>
12:10-13:50	<b>CW-1 (&amp; Lunch)</b>
13:50-14:00	<b>Opening Remark</b>
<b>PL 2 (Chair: Je-Yeol Cho)</b>	
14:00-14:50	Balance and Communication in Life <b>Pann-Ghil Seo</b> (Korea Brain Research Institute)
14:50-15:00	<b>Break</b>
<b>SYM-3 (Biological Proteomics)</b> <b>(Chair: Ho-Jung Kwon &amp; Eugene Lee)</b>	
15:00-15:20	In vivo mitochondrial proteome mapping by proximity labeling <b>Hyun-Woo Rhee</b> (Seoul National University)
15:20-15:40	Chemical RNA digestion enables robust RNA-binding site mapping at single amino acid resolution <b>Jong-Seo Kim</b> (Seoul National University)
15:40-16:00	Targeting mitochondria for Cancer Therapy <b>Young-Chan Chae</b> (UNIST)
16:00-16:20	Machine Learning Classifies Core and Outer Fucosylation of N-Glycoproteins Using Mass Spectrometry <b>Hee-Yeon Hwang</b> (Korea Basic Science Institute)
16:20-16:30	<b>Break</b>
<b>SYM-4 (Multi-Omics)</b>	

(Chair: Byung-Chul Park & Jin Han)	
16:30-16:50	TBA <b>Kwang-Pyo Kim</b> (Kyunghee University)
16:50-17:10	Integration of multi-omics datasets to predict complications of diabetes <b>Seongho Ryu</b> (Soonchunhyang Institute of Medi-biosciences (SIMS))
17:10-17:30	Integrative proteomic and transcriptomic analyses reveal disruption of nucleocytoplasmic trafficking as a cellular senescence driver <b>Ji-Hwan Park</b> (Korea Research Institute of Bioscience and Biotechnology)
17:30-17:50	Proteogenomic analysis of human intrahepatic cholangiocarcinoma reveals new therapeutic opportunities <b>Soo-young Cho</b> (National Cancer Center)

## Online Exhibition Information

Date & Time: September 14 (Mon) – 15 (Tue) 9:00-18:00

All the exhibition will be held online during the conference.