Concurrent themes for Oral Presentations and Posters

Cellular Proteomics

Disease & Clinical Proteomics

Drug & Biopharmaceutical Proteomics

Precision & Personalised Proteomics

Methods, Systems & Bioinformatics

Human Proteome Project

Plenaries

All plenary speakers have been given one of the codes below followed by -01, -02 or -03 depending on the timeslot on the day they are speaking:

SP - Sunday Plenary

MP - Monday Plenary

TP - Tuesday Plenary

WP - Wednesday Plenary

Oral Sessions

All oral sessions have been given one code below. The first letter is the day of the week, the second letter is the theme letter, the number relates to whether the session take place in the morning (1) or afternoon (2):

Day:

M = Monday T = Tuesday W = Wednesday

Theme:

A = Cellular Proteomics B = Drug & Pharmaceutical Proteomics

C = Methods, Systems & Bioinformatics D = Disease & Clinical Proteomics

E = Precision & Personlised Proteomics F = Human Proteome Project

Time:

1 = AM 2 = PM

Presentations have a secondary code related to the presentation type and position within the session:

K = Keynote Speaker

I = Invited Speaker

S = Short Oral

Sunday 17th September

15:45 – 17:45 Liffey Hall 2

HUPO Council Meeting

18:00 – 18:30 Auditorium

Opening Ceremony

OPENING PLENARY

18:30 – 20:00 Auditorium

SP-01

Systems medicine, big data and scientific wellness: transforming healthcare—a personal view

Leroy Hood, Institute for Systems Biology (ISB), USA

20:00 - 22:00 The Forum

Welcome Reception & Exhibition opens

Monday 18th September

07:45 – 08:15 The Forum

Meet the Experts Breakfast Session Bioinformatics Hub

(Pre-registration required for this session)

Chair: Andrew Pitt, Aston University, UK

YPIC Co-Chair: Christine von Törne - Helmholtz Zentrum Munich GmbH, Germany

PLENARY SESSION

08:30 – 10:00 Liffey B

Chair: Steve Pennington, University College Dublin, Ireland

08:30 - 09:10 MP-01

Sugars and proteins: towards a synthetic biology

Ben Davis, University of Oxford, UK

MONDAY

09:10 - 09:50 MP-02

Deciphering the glycoproteome: a small step towards understanding the complexity of biological systems

Pauline Rudd, NIBRT, Ireland

09:50 - 10:00

Questions and Discussion

10:00 - 11:00 The Forum

Tea / Coffee Break Exhibition, Networking, Innovation Presentations and Poster Viewing

CELLULAR PROTEOMICS MA1: CELLULAR DYNAMICS

11:00 – 12:30 Liffey A

Chair: Matthias Mann, Max-Planck Institute of Biochemistry, Germany

11:00 – 11:30 MA1-01K

Remodelling of proteome expression and turnover during cell transformation Angus Lamond, University of Dundee, Scotland

11:30 - 11:50 MA1-02I

Proteomic exploration of the scope, dynamics, and stoichiometry of lysine acetylation Chuna Choudary, University of Copenhagen, Denmark

11:50 – 12:00 MA1-03S

A pulsed SILAC-TMT multiplexing approach reveals protein synthesis and degradation differences on proteoform level

Jana Zecha, Technical University of Munich, Germany

12:00 – 12:10 MA1-04S

Proteomic analysis reveals strong secretion of IL-9 by group2 innate lymphoid cells upon IL-33/TL1A co-stimulation

Anne Gonzalez de Peredo, CNRS/IPBS, France

12:10 – 12:20 MA1-05S

Proteomic analysis of T cell activation-dependent changes in NF90 and bound histones

Timothy Wu, Stanford University, USA

12:20 – 12:30 MA1-06S

Role of adipocyte plasma membrane proteome in adipocyte differentiation and adipose function

Carmen Arasti, The University of Liverpool, UK

DRUG & BIOPHARMACEUTICAL PROTEOMICS MB1: NEW METHODS FOR DRUG DISCOVERY

11:00 – 12:30 Liffey B

Chair: Rainer Cramer, University of Reading, UK

11:00 – 11:30 MB1-01K

Cell free methods for producing protein microarrays

Joshua LaBaer, Virginia G. Piper Center for Personalized Diagnostics, USA

11:30 – 11:50 MB1-02I

Instrumentation and methods for the identification and sequence analysis of intact proteins on a chromatographic timescale

Don Hunt, University of Virginia, USA

11:50 – 12:00 MB1-03S

New proteomics capabilities using super slim high resolution ion mobility-mass spectrometry

Richard Smith, Pacific Northwest National Laboratory, USA

12:00 – 12:10 MB1-04S

MAPPs (MHC-II associated peptides proteomics): an in-vitro, pre-clinical tool to compare candidate compounds' immunogenic liabilities

Axel Ducret, F. Hoffmann-la Roche Ltd, Switzerland

12:10 – 12:20 MB1-05S

Oncogenic protein network reconstruction using multi-omics Identifies the ELF3 tumor suppressor as a Wnt Antagonist

Rob Ewing, University of Southampton, UK

12:20 – 12:30 MB1-06S

Novel chemoproteomic characterization of covalent probe binding

Jarrod Marto, Dana-Farber Cancer Institute, USA

METHODS, SYSTEMS & BIOINFORMATICS MC1: PROTEOMIC STRATEGIES

11:00 – 12:30 Liffey Hall 1

Chair: Christoph Borchers, University of Victoria, Canada

11:00 - 11:30 MC1-01K

Improved sensitivity and specificity of proximity-dependent biotinylation approaches for interactomics

Akilesh Pandey, Johns Hopkins University School of Medicine, USA

11:30 – 11:50 MC1-02I

Quantitative interaction proteomics: Insights into biological systems

Ben Collins, ETH Zurich, Switzerland

11:50 – 12:00 MC1-03S

Two-dimensional thermal proteome profiling in living cells, cell extracts and beyond Thilo Werner, Cellzome GmbH a GSK Company, Germany

12:00 - 12:10 MC1-04S

Multi-omics approach to discover hidden coding regions in so-called non-coding RNA Gerben Menschaert, Ghent University, Belgium

12:10 - 12:20 MC1-05S

Refining human proteome: integrated analysis of human tissues with a multi-omics approach

Dongxue Wang, Technical University of Munich, Germany

12:20 – 12:30 MC1-06S

Absolute venomics: absolute quantification of intact venom proteins through elemental mass spectrometry

Juan Calvete, CSIC, Spain

DISEASE & CLINICAL PROTEOMICS MD1: CLINICAL PROTEOMICS

11:00 - 12:30 Liffey Hall 2

Chair: Tami Geiger, Tel Aviv University, Israel

11:00 – 11:30 MD1-01K

Clinical proteomics: my adventures in wonderland

Daniel Chan, Johns Hopkins University, USA

11:30 – 11:50 MD1-02I

A glimpse of CNHPP: a proteomic landscape of diffuse-type gastric cancer

Jun Qin, National Center for Protein Sciences, China

11:50 – 12:00 MD1-03S

A clinical proteomics success story: from proteomics-based biomarker discovery to clinically actionable test

Bruce Wilcox, Applied Proteomics, USA

12:00 – 12:10 MD1-04S

Phosphoproteome networks identify focal adhesion kinase as new target in pancreatic ductal adenocarcinoma

Tessa Le Large, VU University Medical Center, Netherlands

12:10 – 12:20 MD1-05S

A two-step PRM strategy reveals a new biomarker signature of multiple sclerosis in cerebrospinal fluid

Philippe Marin, Institute of Functional Genomics, France

12:20 – 12:30 MD1-06S

Platelet proteomics: towards non-invasive cancer detection

Connie Jimenez, VU University Medical Center, Netherlands

PRECISION & PERSONALISED PROTEOMICS ME1: PROTEOMICS OF SURVEILLANCE

11:00 – 12:30 Liffey Meeting Room 2

Chair: Albert Heck, Utrecht University, Netherlands

11:00 – 11:30 ME1-01K

Proteomics as diagnostic tool for platelet function

Albert Sickmann, ISAS, Germany

11:30 – 11:50 ME1-02I

Proteomics and immunoproteomics of gram-positive bacteria in host-pathogen interactions

Frank Schmidt, University Medicine Greifswald, Germany

11:50 – 12:00 ME1-03S

Discovery of inflammatory signaling adaptors regulated by autophagy

Erik Verschueren, Genentech, USA

MONDAY

12:00 - 12:10 ME1-04S

Systems biology of MHC class I antigen presentation studied in human cancer cell lines

Stefan Tenzer, Universitätsmedizin Mainz, Germany

12:10 – 12:20 ME1-05S

Insidious or ingenious: complexities of antigen presentation

Anthony Purcell, Monash, Australia

12:20 - 12:30 ME1-06S

MHC peptidomics provides a new outlook on its production & presentation pipeline Arie Admon, Israel Institue of Technology, Israel

HUMAN PROTEOME PROJECT

MF1: LIVER & TOXICOPROTEOMICS

11:00 – 12:30 Chair: Oliver Poetz, NMI, Germany Liffey Meeting Room 3

11:00 – 11:30 MF1-01K

Proteomics for study of liver diseases

Barbara Sitek, Ruhr University Bochum, Germany

11:30 – 11:50 MF1-02I

Variability in mass spectrometry-based quantification of clinically relevant drug transporters and drug metabolizing enzymes in the human liver

Per Artursson, Uppsala University, Sweden

11:50 – 12:00 MF1-03S

Serum extracellular vesicles contain protein biomarkers for primary sclerosing cholangitis and cholangiocarcinoma

Felix Elortza, CIC bioGUNE, Spain

12:00 - 12:10 MF1-04S

Prioritizing popular proteins in liver cancer. Remodelling of one carbon metabolism Fernando Corrales, Centro Nacional de Biotecnologia (CSIC), Spain

12:10 – 12:20 MF1-05S

Targeted and panoramic views on the transcriptome and proteome of liver tissue and HepG2 cells

Elena Ponomarenko, Institute of Biomedical Chemistry, Moscow, Russia

12:20 – 12:30 MF1-06S

Next-generation blood biomarkers for acute liver injury: in silico discovery and proteomics evaluation

Virginie Brun, The French Alternative Energies and Atomic Energy Commission (CEA) - "Exploring the Dynamics of Proteomes" Team, France

12:45 - 13:45 Sponsored Symposia (see below symposia for room allocations)



Methods and instrumentation for a quantum leap in proteomics performance

Liffey A

Oliver Räther, Bruker Daltonik GmbH, R&D Manager, Germany Prof. Matthias Mann, Max Planck Institute of Biochemistry, Germany



Biomarkers in ovarian cancer from SWATH maps of clinical samples

Liffey B

Robert Graham Ph.D., Sr Lecturer in Clinical Proteomics, Deputy Director Stoller Biomarker Discovery Centre, University of Manchester, UK



Applying waters DIA workflows in disease research

Liffey Hall 1

David Heywood, Senior Manager Omics Business Development Prof. Daniel Martins-de-Souza, PhD, Institute of Biology, University of Campinas (UNICAMP), Brazil



Improved workflows for structural proteomics: studying protein interactions

Liffey Hall 2

Christoph Borchers, Ph.D., Director, UVic-Genome BC Proteomics Centre, Canada

Richard Scheltema, Ph.D., Junior Assistant Professor, Utrecht University, Netherlands



Introduction to CRISPR-Cas9 genome engineering and its potential application in proteomic research

Liffey Meeting Room 2

Laura Carleton, PhD

CELLULAR PROTEOMICS

MA2: CELLULAR PROTEOMICS IN HEALTH & DISEASE

14:00 – 15:30 Liffey A

Chair: Angus Lamond, University of Dundee, UK

14:00 – 14:30 MA2-01K

Studying protein structural changes on a proteome-wide scale in health and disease Paola Picotti, University of Padua, Italy

14:30 – 14:50 MA2-02I

Microvesicle-based identification of cancer biomarkers for early detection of ovarian cancer

Tami Geiger, Tel Aviv University, Israel

14:50 – 15:00 MA2-03S

Identification of a novel translation machinery regulating NF1-associated tumors by affinity purification and SWATH (AP-SWATH)

Daiki Kobayashi, Kumamoto University, Japan

15:00 – 15:10 MA2-04S

Proteomic analysis of signaling specificity in breast cancer cells

Chiara Francavilla, The University of Manchester, UK

15:10 – 15:20 MA2-05S

Large-scale proteomic analysis of SIRT1- and tissue-dependent acetylproteome in mouse liver, testis and muscle

Marie Locard-Paulet, CNRS-IPBS, France

15:20 – 15:30 MA2-06S

Differential proteome and secretome analyses of iPS-derived neural differentiation to unravel schizophrenia features

Juliana Nascimento, University of Campinas, Brazil

DRUG & BIOPHARMACEUTICAL PROTEOMICS
MB2: NEW TECHNOLOGICAL ADVANCES

14:00 – 15:30 Liffey B

Chair: Aran Paulus, Thermo Scientific, USA

14:00 – 14:30 MB2-01K

Pulse Azidohomoalanine (AHA) labeling in mammals (PALM) analysis for global analysis of newly-synthesized proteins in animal models of disease

John Yates, The Scripps Research Institute, USA

14:30 – 14:50 MB2-02I

Comprehensive glycopeptide profiling in blood plasma for clinical applications

Hans Wessels, Radboud University Nijmegen Medical Centre, Netherlands

14:50 – 15:00 MB2-03S

Scanning the precursor range with OpenECHO: adding precursor specificity back to DIA analysis

Hannes Rost, Stanford University, USA

15:00 – 15:10 MB2-04S

Mass-spectrometry of single mammalian cells quantifies proteome heterogeneity during cell differentiation

Nikolai Slavov, Northeastern University, USA

15:10 – 15:20 MB2-05S

The SOMAscan® assay and SOMAmer® reagents: characterization and utility of novel biomarker discovery tools

Sheri Wilcox, Somalogic, Inc., USA

15:20 – 15:30 MB2-06S

Multiplexed activity profiling of cellular signaling pathways by data-dependent and targeted LCMS

Kimberly Lee, Cell Signaling Technology, Inc., USA

METHODS, SYSTEMS & BIOINFORMATICS MC2: LONGITUDINAL PROTEOMICS

14:00 – 15:30 Liffey Hall 1

Chair: Andrew Pitt, Aston University, UK

14:00 – 14:30 MC2-01K

Quantitative proteomics in a wellness and disease setting

Rob Moritz, Institute for Systems Biology (ISB), USA

MONDAY

14:30 - 14:50 MC2-02I

Medical and biological insights derived from SOMAscan

Larry Gold, Somalogic, Inc., USA

14:50 - 15:00 MC2-03S

Profound aging-related changes of histone H3 tails in mouse tissues

Veit Schwämmle, University of Southern Denmark, Denmark

15:00 - 15:10 MC2-04S

Integrative omics profiling within the Swedish SCAPIS SciLifeLab (S3) wellness profiling program

Linn Fagerberg, Royal Institute of Technology, Sweden

15:10 - 15:20 MC2-05S

Identification of a damaging variant associated with idiopathic male infertility through degradation of TEX101 interactome

Andrei P. Drabovich, University of Toronto, Canada

15:20 - 15:30 MC2-06S

Longitudinal and network-based biomarker models for the prediction of ovarian cancer

Harry Whitwell, UCL, UK

DISEASE & CLINICAL PROTEOMICS MD2: CANCER MOONSHOT

14:00 - 15:30 Liffey Hall 2

Chair: Henry Rodriguez, National Cancer Institute, USA

14:00 – 14:30 MD2-01K

Prospective from Taiwan cancer moonshot to address unmet clinical needs

Yu-Ju Chen, Institute of Chemistry, Academia Sinica, Taiwan

14:30 – 14:50 MD2-02I

Proteogenomic analysis of diffuse gastric cancers

Daehee Hwang, Daegu Gyeongbuk Institute of Science and Technology, South Korea

14:50 - 15:00 MD2-03S

Enhancing protein information by integrating genomics and proteomics in UniProt reference sets

Emanuel Alpi, EMBL-European Bioinformatics Institute, UK

15:00 – 15:10 MD2-04S

Proteogenomic analysis of alternative splicing: protein isoforms as biomarkers for early detection of colorectal cancer

Malgorzata Komor, Netherlands Cancer Institute, Netherlands

15:10 – 15:20 MD2-05S

Integrated proteo-glyco-genomics identified the potential clinical target of cancer stem cells

Norie Araki, Kumamoto University, Japan

15:20 – 15:30 MD2-06S

Brain metastatic cancer cells mimicking neurons: a proteotranscriptomic analysis Hubert Hondermarck, University of Newcastle, UK

PRECISION & PERSONALISED PROTEOMICS ME2: BIOPSIES AND BODYFLUIDS

14:00 – 15:30 Liffey Meeting Room 2

Chair: Chris Sutton, University of Bradford, UK

14:00 – 14:30 ME2-01K

Towards a blood-based diagnostic biomarker panel for bipolar disorder Sabine Bahn, University of Cambridge, UK

14:30 – 14:50 ME2-02I

Development of liquid-biopsies for personalized care in prostate cancer John Semmes, Eastern Virginia Medical School, USA

14:50 – 15:00 ME2-03S

Plasma proteome profiling disentangles caloric restriction and bariatric surgery induced weight loss

Philipp Geyer, Max Planck Institute of Biochemistry, Germany

15:00 – 15:10 ME2-04S

Evaluation of plasma extracellular vesicles isolation protocols for proteome analysisKeiko Kasahara, National Institutes of Biomedical Innovation, Health and Nutrition, Japan

15:10 – 15:20 ME2-05S

Accessing archival, formalin-fixed, paraffin-embedded tissue sample resources for proteomic analysis via PCT-SWATH

Tiannan Guo, Westlake Institute for Advanced Study, China

MONDAY

15:20 - 15:30 ME2-06S

High throughput, single shot plasma proteome profiling on a robust capillary flow setup of 1564 DiOGenes samples

Roland Bruderer, Biognosys AG, Switzerland

HUMAN PROTEOME PROJECT MF2: DIABETES AND CARDIOVASCULAR

sponsored by



14:00 - 15:30

Liffey Meeting Room 3

Chair: Jennifer Van Eyk, Cedars Sinai Medical Center, USA

14:00 - 14:30

MF2-01K

Pattern of MAP kinase phosphatase, DUSP1, in human obesity, diabetes and cardiovascular diseases

Ali Tiss, Dasman Diabetes Institute, Kuwait

14:30 - 14:50

MF2-02I

The surfaceome of human cells: a sweet source of novel immunophentotyping and immunotherapy targets

Rebekah Gundry, Medical College of Wisconsin, USA

14:50 - 15:00

MF2-03S

Prognostic role of molecular forms of B-type natriuretic peptide in cardiovascular disease

Muhammad Zubair Israr, University of Leicester, UK

15:00 - 15:10

MF2-04S

MASP1, THBS1, GPLD1 and ApoA-IV are novel biomarkers associated with prediabetes: the KORA F4 study

Christine Von Toerne, Helmholtz Zentrum Munich GmbH, Germany

15:10 - 15:20

MF2-05S

Validation of novel plasma markers for venous thromboembolism using affinity proteomics combined with mass spectrometry

Laura Sanchez-Rivera, Science For Life Laboratory-Stockholm, Sweden

15:20 – 15:30 MF2-06S

Proteomics of activated macrophages identifies novel innate immune signalling pathway promoting phenotypic switch in obesity

Matthias Trost, Newcastle University, UK

15:30 – 16:30 The Forum

Tea / Coffee Break Exhibition, Networking, Innovation Presentations and Poster Viewing

PLENARY SESSION

16:30 – 17:30 Liffey B

Chair: Susan Weintraub, UT Health San Antonio, USA

16:30 – 17:10 MP-03

Probing biopharmaceutical proteins and protein assemblies by hybrid mass spectrometry approaches

Albert Heck, Utrecht University, The Netherlands

17:10 - 17:30

Questions and Discussion

17:30 – 18:30 The Forum

Poster Reception

PhD Abstract Competition (Innovation Stage)

Tuesday 19th September

07:45 – 08:15 The Forum

Meet the Experts Breakfast Session Bioinformatics Hub

(Pre-registration required for this session)

Chair: Steve Pennington, University College Dublin, Ireland YPIC Co-Chair: Dina Resetar - University of Rijeka, Croatia

PLENARY SESSION

08:30 - 10:00 Liffey B

Chair: Mark Baker, Macquarie University, Australia

TUFSDAY

08:30 - 09:10 TP-01

The proteome in context

Ruedi Aebersold, Institute of Molecular Systems Biology and University of Zurich, Germany

09:10 - 09:50 TP-02

The human protein atlas - implications for human biology, drug development and precision medicine

Matthias Uhlen, Royal Institute of Technology (KTH), Sweden

09:50 - 10:00

Questions and Discussion

10:00 – 11:00 The Forum

Tea / Coffee Break Exhibition, Networking, Innovation Presentations and Poster Viewing

CELLULAR PROTEOMICS

TA1: REGULATION OF SPATIAL PROTEOMES

11:00 - 12:30 Liffey A

Chair: Matthias Mann, Max-Planck Institute of Biochemistry, Germany

11:00 - 11:30 TA1-01K

What controls the three dimensional proteome?

Kathryn Lilley, University of Cambridge, UK

11:30 – 11:50 TA1-02I

TMT-based proteomic analysis identifies novel viral evasion pathways

Paul Lehner, University of Cambridge, UK

11:50 – 12:00 TA1-03S

An image-based subcellular map of the human proteome

Emma Lundberg, Science For Life Laboratory (KTH), Sweden

12:00 - 12:10 TA1-04S

Determining network topology, distance restraints and activation markers from endogenous protein complexes

Marco Faini, ETH Zurich, Switzerland

12:10 – 12:20 TA1-05S

Quantifying and localizing the mitochondrial proteome using SWATH-MS

Yibo Wu, IMS, RIKEN, Japan

12:20 – 12:30 TA1-06S

ImportOmics: a new method for charting organellar proteomes by quantitative mass spectrometry

Christian Peikert, Albert Ludwigs University of Freiburg, Germany

DRUG & BIOPHARMACEUTICAL PROTEOMICS TB1: CELL SIGNALLING AND DRUG DISCOVERY

11:00 – 12:30 Liffey B

Chair: Ben Collins, Institute of Molecular Systems Biology, Switzerland

11:00 – 11:30 TB1-01K

Chemical proteomics reveals the target space of clinical kinase inhibitors

Bernhard Kuster, Technical University of Munich, Germany

11:30 – 11:50 TB1-02I

Systems biology of oncogenic kinase signalling

Pedro Cutillas, Barts Cancer Institute, QMUL, UK

11:50 – 12:00 TB1-03S

Comparative proteomics of dying & surviving cancer cells pinpoints drug targets & reveals essential proteins

Amirata Saei Dibavar, Karolinska Institutet, Sweden

12:00 – 12:10 TB1-04S

Selectivity determination of 1000 small molecule kinase inhibitors using chemical proteomics

Maria Reinecke, Technical University of Munich, Germany

12:10 – 12:20 TB1-05S

NSCLC cells use increased cell-cell contacts to resist early TKI treatment

Celine Mulder, Utrecht University, Netherlands

12:20 - 12:30 TB1-06S

Glucagon was identified as potential therapy target in colorectal cancer through label-free quantitative proteomic analysis

Min Li, Binzhou Medical University, China

METHODS, SYSTEMS & BIOINFORMATICS TC1: MULTIPLEX TECHNOLOGIES

11:00 – 12:30 Liffey Hall 1

Chair: Roz Jenkins, University of Liverpool, UK

11:00 - 11:30 TC1-01K

Immunoassays in multiplex for biomarker discovery and validation

Thomas Joos, NMI Naturwissenschaftliches und Medizinisches Institut, Germany

11:30 - 11:50 TC1-02I

Standardising MS Omics for precise and accurate qualification/quantification

Andrew Percy, Cambridge Isotope Laboratories, Inc., USA

11:50 – 12:00 TC1-03S

Functional protein networks and disease: an affinity based approach

Marius Ueffing, University Of Tübingen, Germany

12:00 – 12:10 TC1-04S

Using cross-linking mass spectrometry and integrated modeling to study architecture and dynamics of signaling complexes

Florian Stengel, University of Konstanz, Germany

12:10 - 12:20 TC1-05S

Open-glycomics: an open-access platform for automated glycan identification and quantitation

Christopher Ashwood, Macquarie University, Australia

12:20 - 12:30 TC1-06S

Omics discovery index: supporting multi-omics analysis with public data

Yasset Perez-Riverol, The European Bioinformatics Institute (EMBL-EBI), UK

DISEASE & CLINICAL PROTEOMICS TD1: PROTEOMICS APPLIED TO DISEASE

11:00 - 12:30 Liffey Hall 2

Chair: Oliver FitzGerald, St Vincents University Hospital & Conway Institute UCD, Ireland

11:00 – 11:30 TD1-01K

Psoriatic arthritis through the omics lens

Vinod Chandran, University of Toronto, University Health Network, Canada

11:30 – 11:50 TD1-02I

Development of a large scale integrated platform for clinical proteomics and drug target discovery

Tony Whetton, The University of Manchester, UK

11:50 – 12:00 TD1-03S

Proteomics of differentiated cultures of human bronchial epithelial cells exposed to spores of Aspergillus fumigatus

Scott Tebbutt, University of British Columbia, Canada

12:00 – 12:10 TD1-04S

Urine angiotensin II signature proteins as biomarkers of fibrosis in patients with kidney transplant

Zahraa Mohammed-ali, University Health Network, Canada

12:10 – 12:20 TD1-05S

Detection of psoriatic arthritis at early onset: a multi-proteomic approach to developing a blood test

Angela Mc Ardle, University College Dublin, Ireland

12:20 – 12:30 TD1-06S

Antigen microarrays identify autoantibodies as potential predictors of response to anti-TNFα therapies in rheumatoid arthritis

Lucia Lourido, Science for Life Laboratory, Sweden

PRECISION & PERSONALISED PROTEOMICS TE1: CANCER DIAGNOSTICS AND PROGNOSTICS

11:00 – 12:30 Liffey Meeting Room 2

Chair: Robert O'Conor, Irish Cancer Society, Ireland

11:00 – 11:30 TE1-01K

Bridging the gap in oncology diagnostics: converting omic data into clinically relevant assays

William Gallagher, University College Dublin, Ireland

11:30 – 11:50 TE1-02I

Tissue and plasma proteomics allows early stage colorectal cancer detection/ stratification that improves patient outcome

Mark Baker, Macquarie University, Australia

TUFSDAY

11:50 - 12:00 TE1-03S

Stroma liquid biopsy - the next wave of proteomic profiles for cancer biomarkers Matthew Kuruc, Biotech Support Group Llc, USA

12:00 – 12:10 TE1-04S

Refining treatment recommendations for lymph-node-negative breast-cancer patients using novel protein-based prognostic signature: the OncoMasTR assay

Arman Rahman, University College Dublin, Ireland

12:10 – 12:20 TE1-05S

Possible causal link between insulin signaling deregulation and its etiology of aggressive prostate cancer

Spiros Garbis, University of Southampton, UK

12:20 – 12:30 TE1-06S

Discovery, verification and pre-validation of novel candidate urinary biomarkers of prostate cancer

Jonathan M Blackburn, University of Cape Town, South Africa

HUMAN PROTEOME PROJECT TF1: PLASMA & IMMUNOPEPTIDOMICS

11:00 - 12:30

Liffey Meeting Room 3

Chairs: Jochen Schwenk, KTH Royal Institute of Technology, Sweden & Etienne Caron, ETH Zurich. Switzerland

11:00 - 11:30 TF1-01K

Developmental proteomics: the importance of age specific differences in the human plasma proteome

Vera Ignjatovic, Murdoch Children's Research Institute, Australia

11:30 – 11:50 TF1-02I

The human immunoepeptidome project – accelerating the development of personalized cancer immunotherapy

Michal Bassani, Lausanne University Hospital, Switzerland

11:50 – 12:00 TF1-03S

An optimised quantitative multidimensional protein identification technology for indepth profiling of the human plasma proteome

Diana Baquero, University of Southampton, UK

12:00 - 12:10 TF1-04S

A comprehensive HLA peptidomic resource used to generate immunotherapeutics based on high affinity T-cell receptors

Alex Powlesland, Immunocore Ltd, UK

12:10 - 12:20

TF1-05S

Novel proteomic signatures of human blood vessel maturation revealed by SWATH analysis

Michael Taggart, Newcastle University, UK

12:20 - 12:30

TF1-06S

Deciphering HLA motifs across in-depth and large-scale immunopeptidomics datasets correctly predicts neo-antigens

Michal Bassani-Sternberg, Lausanne University Hospital, Switzerland

12:45 - 13:45

(see below symposia for room allocations)

Sponsored Symposia



Decyphering the proteome complexity

Liffey A

Hans Wessels, Ph.D., Radboud University, Medical Center, Netherlands

Andrew Webb, Ph.D., Walter and Eliza Hall Institute, Australia



The future of high-throughput human plasma proteomics

Liffey B

Prof. Manuel Mayr, King's College London Dr. Roland Bruderer, Biognosys AG, Switzerland



Robust front-end solutions for clinical proteomics

Liffey Hall 1

Matthias Mann, Max Planck Institute of Biochemistry, Germany



Proteome profiling for the cancer moonshot program: from basic research to large scale analyses

Liffey Hall 2

Aaron Gajadhar, Ph.D.: Strategic Marketing Specialist, Thermo Fisher Scientific. USA

Gyorgy Marko-Varga, Ph.D.: Associate professor, Lund University Sweden

TUESDAY



Metabolomics analysis for confirmation of proteomics insights

Agilent Technologies Liffey Meeting Room 2

Christine Miller: Agilent Technologies, UK Jennifer Van Eyk: PhD, Cedars-Sinai, USA

CELLULAR PROTEOMICS TA2: CELLULAR PHOSPHOPROTEOMICS

14:00 - 15:30 Liffey A

Chair: Sara Zanivan, CRUK Beatson Institute - University of Glasgow, UK

14:00 - 14:30 **TA2-01K**

Probing the insulin network using phosphoproteomics

David James, University of Sydney, Australia

14:30 - 14:50 **TA2-02I**

Dissecting phosphotyrosine signaling networks by quantitative phosphoproteomics Jesper Olsen, University of Copenhagen, Denmark

14:50 - 15:00 **TA2-03S**

Alternative proteins: the hidden world of potential biomarkers Julien Franck, Prism Inserm U1192, France

15:00 - 15:10 **TA2-04S**

Quantitative phospho-proteomics in the mouse liver uncovers diurnal regulatory landscapes

Antonio Nunez-Galindo, Nestlé Institute of Health Sciences (NIHS), Switzerland

15:10 - 15:20 **TA2-05S**

In-depth analyses of protein abundance, phosphorylation, synthesis and degradation during neuronal development and synaptic plasticity

Maarten Altelaar, Utrecht University, Netherlands

15:20 - 15:30 **TA2-06S**

Profiling the phosphotyrosine interactome of receptor tyrosine kinases

Runsheng Zheng, Technical University of Munich, Germany

DRUG & BIOPHARMACEUTICAL PROTEOMICS TB2: DRUG DISCOVERY

14:00 - 15:30

Liffey B

Chair: Pauline Rudd, National Institute for Bioprocessing Research and Training, Ireland

14:00 - 14:30

TB2-01K

How proteomics impacts projects in pharma

Hanno Langen, Roche, Switzerland

14:30 - 14:50

TB2-02I

Drug resistance assessed by mass spectrometry based omics technologies Simone Lemeer, Utrecht University, Netherlands

14:50 - 15:00

TB2-03S

Physiological relevance of in vitro models of the liver for drug safety assessment Rosalind Jenkins, University of Liverpool, UK

15:00 - 15:10

TB2-04S

Quantitative characterization of hepatic cytochrome P450 and UDPglucuronosyltransferase enzymes: evaluation against catalytic activity

Brahim Achour, University of Manchester, UK

15:10 - 15:20

TB2-05S

Therapeutic target discovery by cancer proteomics in the era of large-scale genomeresequencing

Tesshi Yamada, National Cancer Center Research Institute, Japan

15:20 - 15:30

TB2-06S

Pharmacoproteomics of non-human primate cerebrospinal fluid upon BACE inhibition, a drug target for alzheimer's disease

Stephan Mueller, German Center for Neurodegenerative Diseases (DZNE), Germanv

METHODS, SYSTEMS & BIOINFORMATICS TC2: DATA QUANTIFICATION AND EXTRACTION

14:00 - 15:30

Liffey Hall 1

Chair: Rainer Cramer, University of Reading, UK

14:00 - 14:30

TC2-01K

False discovery rates in proteomics: a tale of two extremes

Lennart Martens, Ghent University, Belgium

TUFSDAY

14:30 - 14:50 TC2-02I

The ups and downs of protein expression regulation

Christine Vogel, New York University, USA

14:50 - 15:00 TC2-03S

Efficient and user friendly label-free quantification with the proline software suite David Bouyssié, IPBS/CNRS, France

15:00 - 15:10 TC2-04S

iOmicsPASS: integrative-omics approach for predictive analysis with subnetwork signatures

Hiromi Koh, National University of Singapore, Singapore

15:10 – 15:20 TC2-05S

An unbiased protein association study on public human proteome reveals biological connections between co-occurring protein-pairs

Surya Gupta, VIB, Belgium

15:20 - 15:30 TC2-06S

Systematic analysis of drug-protein targets in native biological systems

Ilaria Piazza, ETH Zurich, Switzerland

DISEASE & CLINICAL PROTEOMICS TD2: CLINICAL PROTEOMIC TUMOUR ANALYSIS CONSORTIUM

14:00 – 15:30 Liffey Hall 2

Chair: Chris Kinsinger, National Cancer Institute, USA

14:00 – 14:30 TD2-01K

Proteogenomic insights for cancer biology, prognosis and treatment

Karin Rodland, Pacific Northwest National Laboratory, USA

14:30 - 14:50 TD2-02I

Democratizing cancer proteogenomic data

Bing Zhang, Baylor College of Medicine, USA

14:50 - 15:00 TD2-03S

Strategic use of targeted proteomics for triage of biomarker candidates

Tao Liu, Pacific Northwest National Laboratory, USA

15:00 – 15:10 TD2-04S

Multiplexed mass spectrometric screening of EGFR mutation in non-small-cell lung cancer

Chi-Ting Lai, Academia Sinica, Taiwan

15:10 – 15:20 TD2-05S

Development of targeted mass spectrometry-based assays for ERCC1-202/XPF as potential biomarkers in lung cancer

Daniela Antonelli, Luxembourg Institute of Health (LIH), Luxembourg

15:20 – 15:30 TD2-06S

Deep phospho- and phosphotyrosine proteomics identified active kinases and phosphorylation network in Cetuximab-resistant colorectal cancer

Yuichi Abe, National Institute of Biomedical Innovation, Health and Nutrition, Japan

PRECISION & PERSONALISED PROTEOMICS TE2: GLOBAL PROTEOME AND MODIFICATIONS

14:00 – 15:30 Liffey Meeting Room 2

Chair: John Timms, University College London, UK

14:00 – 14:30 TE2-01K

The cell-based human proteome project: mapping human proteins and their complexes with complete molecular specificity

Neil Kelleher, Northwestern Univ., USA

14:30 – 14:50 TE2-02I

Perspectives of proteomics in laboratory medicine and total lab automation Andrea Urbani, Catholic University of The "Sacred Heart", Italy

14:50 – 15:00 TE2-03S

Post-translational modification profiles on tau are distinct for alzheimer's disease and other tauopathies

Hanno Steen, Boston Children's Hospital, USA

15:00 – 15:10 TE2-04S

Combining heavy-methyl SILAC labelling with targeted MS to profile the dynamic histone methyl-proteome

Alessandro Cuomo, European Institute of Oncology, Italy

TUFSDAY

15:10 - 15:20 TE2-05S

Pervasive co-expression of spatially proximal genes is buffered at the protein level Georg Kustatscher, Wellcome Trust Centre for Cell Biology, UK'

15:20 – 15:30 TE2-06S

The citrullinome in tissue and biofluids for disease phenotyping & personlized medicine

Allan Stensballe, Aalborg University, Denmark

HUMAN PROTEOME PROJECT TF2: CANCER & GLYCOPROTEOMICS

14:00 – 15:30 Liffey Meeting Room 3

Chairs: Nicki Packer, Macquarie University, Australia

14:00 – 14:30 TF2-01K

Targeted glycoproteomics for novel bladder cancer biomarkers: a step towards precision oncology

José Alexandre Ferreira, Portuguese Institute of Oncology of Porto, Portugal

14:30 - 14:50 TF2-02I

Glycoproteins: candidate urinary biomarkers in prostate cancer

Giuseppe Palmisano, University of Sao Paulo, Brazil

14:50 – 15:00 TF2-03S

Fucosylated glycoproteins associated with advanced prostate cancer

Hui Zhang, Johns Hopkins University, USA

15:00 – 15:10 TF2-04S

A site-specific O-GlcNAc of tumor suppressor FoxO3a serves as a molecular signature of pancreatic cancer

Young-Ki Paik, Yonsei University, South Korea

15:10 – 15:20 TF2-05S

pTyr-phosphoproteomics of serial tumor biopsies from patients with advanced cancer treated with protein kinase inhibitors

Mariette Labots, VU Medical Center, Netherlands

15:20 – 15:30 TF2-06S

Phosphoproteomics in metastatic colorectal cancer for predicting response to anti-EGFR therapy

Robin Beekhof, VU Medical Center, Netherlands

15:30 – 16:30 The Forum

Tea / Coffee Break Exhibition, Networking,
Innovation Presentations and Poster Viewing

15:45 – 16:15 Liffey Hall 2

British Society for Proteome Research AGM

PLENARY SESSION

16:30 – 17:30 Liffey B

Chair: Emma Lundberg, Science for Life Laboratory (kth), Sweden

16:30 – 17:10 TP-03

Proteomics for signaling and clinical studies

Matthias Mann, Max-Planck Institute of Biochemistry, Germany

17:10 - 17:30

Questions and Discussion

17:30 – 19:00 Liffey Hall 1

HUPO2017 General Assembly

19:30 – 00:00 The Guinness Storehouse

HUPO2017 Gala Evening

(transport provided from congress venue to CCD)

Wednesday 20th September

07:45 – 08:15 The Forum

Meet the Experts Breakfast Session Bioinformatics Hub
Chair: Andrea Urbani, Catholic University of The "Sacred Heart", Italy

YPIC Co-Chair: Maarten Dhaenens - Ghent University, Belgium

WEDNESDAY

PLENARY SESSION

08:30 – 10:00 Liffey B

Chair: Mike Snyder, Stanford University, USA

08:30 - 09:10 WP-01

Changing the course and impact of chronic disease: personalizing medicine Jenny van Eyk, Cedars Sinai Medical Center, USA

09:10 - 09:50 WP-02

Omics convergence in cancer research: advances in precision medicine Henry Rodriguez, National Cancer Institute, USA

09:50 - 10:00

Questions and Discussion

10:00 - 11:00 The Forum

Tea / Coffee Break Exhibition, Networking, Innovation Presentations and Poster Viewing

10:10 - 10:50 Liffey Meeting Room 3

ECR Manuscript Competition

CELLULAR PROTEOMICS

WA1: CELLULAR STRESS RESPONSES

11:00 – 12:30 Liffey A

Chair: Kathryn Lilley, University of Cambridge, UK

11:00 – 11:30 WA1-01K

Remodeling of the SUMO proteome in response to proteotoxic stress

Ron Hav. University of Dundee, UK

11:30 – 11:50 WA1-02I

Novel roles of PRMT1-mediated protein-methylation in DNA damage response and miRNA biogenesis revealed by MS-proteomics

Tiziana Bonaldi, European Institute of Oncology (IEO) Italy

11:50 – 12:00 WA1-03S

Identifying oxidation-specific post-translational modifications during diet-induced liver inflammation

Juliane Weisser, CeMM Research Center for Molecular Medicine, Austria

12:00 – 12:10 WA1-04S

Characterising the role of protein kinase CK2 in regulating aluminium toxicity in yeast Filip Veljanoski, Western Sydney University, Australia

12:10 – 12:20 WA1-05S

Defining the dynamic pro-inflammatory response of human monocyte-derived macrophages using the hyperLOPIT spatial proteomics approach

Claire Mulvey, University of Cambridge, UK

12:20 – 12:30 WA1-06S

Links between cell wall remodelling and metabolism in E. coli, a proteomic view

Thibault Chaze, Institut Pasteur, France

DRUG & BIOPHARMACEUTICAL PROTEOMICS WB1: BIOPHARMACEUTICALS AND BIOMARKERS

11:00 – 12:30 Liffey B

Chair: Hanno Langen, Roche, Switzerland

11:00 – 11:30 WB1-01K

Bioprocess monitoring using quantitative proteomics, glycomics and glycoproteomicsJonathan Bones, National Institute for Bioprocessing Research and Training, Ireland

11:30 - 11:50 WB1-02I

Serum N-glycome - a biomarker for ovarian cancer diagnosis

Veronique Blanchard, Charité Medical University, Germany

11:50 – 12:00 WB1-03S

Improved top/middle-down antibody characterization using multiple ion activations on an Orbitrap Tribrid mass spectrometer

Kristina Srzentić, Northwestern University, USA

12:00 – 12:10 WB1-04S

Better access to intact proteoforms by cold vaporization of tissues with picosecond infrared laser ablation

Marcel Kwiatkowski, University of Groningen, Netherlands

12:10 – 12:20 WB1-05S

Identification and quantification of host cell proteins (HCPs) in human plasma derived biotherapeutics

K. Ilker Sen, Protein Metrics Inc., USA

WEDNESDAY

12:20 - 12:30 WB1-06S

Characterization and quantification of CHO host cell proteins during monoclonal antibody purification by SWATH-MS

Chia-Yi Lillian Liu, Bioprocessing Technology Institute, Singapore

METHODS, SYSTEMS & BIOINFORMATICS WC1: BIG DATA

11:00 – 12:30 Liffey Hall 1

Chair: Mark Baker, Macquarie University, Australia

11:00 – 11:30 WC1-01K

Knowledge mining from -omics datasets in the era of big data

FuChu He, National Center for Protein Sciences, China

11:30 – 11:50 WC1-02I

Proteomics, embracing the chaos

Juri Rappsilber, Institute of Technology, Berlin, Germany & University of Edinburgh, Scotland

11:50 – 12:00 WC1-03S

A leap over the hurdle in label-free quantitative proteomics: uniting spectral counting and peak-intensity-based methods

Ludger Goeminne, VIB/Ghent University, Belgium

12:00 – 12:10 WC1-04S

Controlling false discovery rates on large-scale proteome datasets in jPOST

Yasushi Ishihama, Kyoto University, Japan

12:10 – 12:20 WC1-05S

PECAsuite: a comprehensive software package for time-specific, multi-layered analysis of gene expression regulation

Hyungwon Choi, National University of Singapore, Singapore

12:20 - 12:30 WC1-06S

Direct detection of stop codon read-through events using proteomics in Drosophila melanogaster

Simon Hubbard, The University of Manchester, UK

DISEASE & CLINICAL PROTEOMICS WD1: CANCER PROTEOMICS

11:00 – 12:30 Liffey Hall 2

Chair: Juri Rappsilber, Institute of Technology, Berlin, Germany & University of Edinburgh, Scotland

11:00 – 11:30 WD1-01K

Subcellular proteomics and friends; finding lipid raft-dependent RNA-binding proteins that regulate exosome microRNA cargo selection

Michelle Hill, QIMR Berghofer Medical Research Institute, Australia

11:30 – 11:50 WD1-02I

Using proteomics to explore the pro-invasive crosstalk between stromal and cancer cells

Sara Zanivan, CRUK Beatson Institute, UK

11:50 – 12:00 WD1-03S

Time-resolved proteome & phosphoproteome analysis to dissect pemetrexed induced signaling cascade in non-small-cell lung cancer

Denise Putri, Taipei Medical University, Taiwan

12:00 – 12:10 WD1-04S

Mass spectrometry imaging (MSI) and laser micro dissection for cancer diagnostics on tumour tissue

Peter Hoffmann, University of South Australia, Australia

12:10 – 12:20 WD1-05S

The integration of proteomic, imaging and clinical features into a classifier that riskstratifies lung nodules

Paul Kearney, Integrated Diagnostics, US

12:20 – 12:30 WD1-06S

Spatial tissue proteomics quantifies inter- and intra-tumoral heterogeneity in hepatocellular carcinoma

Alessandro Ori, Leibniz Institute On Aging, Germany

PRECISION & PERSONALISED PROTEOMICS WE1: FROM BENCH TO THE CLINICS

11:00 – 12:30 Liffey Meeting Room 2

Chair: Thomas Joos, NMI Naturwissenschaftliches und Medizinisches Institut, Germany

WEDNESDAY

11:00 – 11:30 WE1-01K

Integrated 'omics and their role in personalized healthcare now and in the future

Alain Van Gool, Radboud University Medical Center, Netherlands

11:30 – 11:50 WE1-02I

Integrated omics for tissue-based mapping of the human proteome

Cecilia Lindskog, Uppsala University, Sweden

11:50 - 12:00 WE1-03S

Proteomes of paired plasma and cerebrospinal fluid and their association with biomarkers of Alzheimer disease

Loïc Dayon, Nestlé Institute of Health Sciences, Switzerland

12:00 – 12:10 WE1-04S

Exploratory affinity assays for personalized plasma profiling

Jochen Schwenk, Science for Life Laboratory (KTH), Sweden

12:10 - 12:20 WE1-05S

Platelet extracellular vesicles in human plasma contain biomarkers suited for early diagnostics of alzheimer's disease

Helmut Meyer, ISAS - e.V. - Dortmund, Germany

12:20 - 12:30 WE1-06S

Applying proteomics to build a precise, predictive test for diabetic kidney disease

Richard Lipscombe, Proteomics International, Australia

HUMAN PROTEOME PROJECT WF1: INFECTIOUS DISEASE & FOOD AND NUTRITION

11:00 – 12:30 Liffey Meeting Room 3

Chair: Concha Gil, Complutense University of Madrid, Spain & Paola Roncada, Instituto Spallanzani, Italy

11:00 - 11:30 WF1-01K

Viral infection-driven dynamics of proteome organization

Ileana Cristea, Princeton University, USA

11:30 – 11:50 WF1-02I

Metaproteomic tools to study individual human gut microbiota

Daniel Figeys, University of Ottawa, Canada

11:50 – 12:00 WF1-03S

Identification of potential biomarkers for vivax malaria using clinical isolates: a proteomics intervention

Sanjeeva Srivastava, Indian Institute of Technology Bombay, India

12:00 – 12:10 WF1-04S

Studying the effect of food systems on gut epithelium cells analyzed by LC-MS proteomics

Steffen Bak, Dupont Nutrition Biosciences ApS, Denmark

12:10 – 12:20 WF1-05S

Host macrophage modulation of cell death and related pathways during early MSSA and MRSA infection

Alessio Soggiu, University of Milan, Italy

12:20 – 12:30 WF1-06S

A personalized model of cholesterol homeostasis mechanisms based on trans-omics data integration

Peter Blattmann, ETH Zurich, Switzerland

12:45 - 13:45

(see below symposia for room allocations)

Sponsored Symposia



Advances in accurate, high-throughput quantitative proteomics

Liffey Hall 1

James Duncan, Ph.D.:Assistant Professor Fox Chase Cancer Center Kathryn Lilley, Ph.D.:Cambridge Centre for Proteomics, Department of Biochemistry, University of Cambridge



Quantitative analysis of two cancer signaling pathways using multipleximmunoprecipitation and targeted mass spectrometry

Liffey Hall 2

John Rogers, Senior R&D Manager, Thermo Fisher Scientific



Improving high-throughput proteomics research

Liffey Meeting Room 2

Rudi Grimm: Agilent Technologies

Prof Manuel Mayr: MD, PhD, King's College London

WEDNESDAY

CELLULAR PROTEOMICS WA2: REGULATORY NETWORKS

14:00 – 15:30 Liffey A

Chair: Matthias Mann, Max Planck Institute of Biochemistry, Germany

14:00 – 14:30 WA2-01K

The proteomics of protein kinase signaling

Michael Yaffe, Massachusetts Institute of Technology, USA

14:30 – 14:50 WA2-02I

Integrated analyses of epigenetic complexes and networks

Michael Washburn, Stowers Institute for Medical Research, USA

14:50 - 15:00 WA2-03S

Composition and dynamics of the myddosome during the innate immune response

Aleksandra Nita-Lazar, NIH: National Institute of Allergy and Infectious Diseases, USA

15:00 – 15:10 WA2-04S

A human lectin microarray for sperm surface glycosylation analysis

Sheng-ce Tao, Shanghai Jiao Tong University, China

15:10 – 15:20 WA2-05S

Library and de novo sequencing hybridization: a method for identification of cisspliced MHC peptides

Pouya Faridi, Monash University, Australia

15:20 – 15:30 WA2-06S

Quantitative mass spectrometry to identify oviductal fluid proteins related to reproduction

Hans Yu, University of Veterinary Medicine Vienna, Austria

DRUG & BIOPHARMACEUTICAL PROTEOMICS WB2: LATE BREAKING

14:00 - 15:30 Liffey B

Chair: Fernando J. Corrales, Centro Nacional de Biotecnología (CSIC), Spain

14:00 – 14:30 WB2-01K

Proteomic dissection of the tumour microenvironment in prostate cancer

Steve Pennington, University College Dublin, Ireland

14:30 – 14:50 WB2-02I

Translating MS protein assays into the clinic: potential of post-translationally modified proteins for clinical MS protein tests

Dobrin Nekelov, Isoformix, USA

14:50 - 15:00 WB2-03S

Development of a novel LC concept for clinical proteomics

Nicolai Bache, Evosep Biosystems, Denmark

15:00 – 15:10 WB2-04S

Bioorthogonal labeling of human prostate cancer tissue slice cultures for glycoproteomics

David Spiciarich, University of California, US

15:10 – 15:20 WB2-05S

Omics investigation of FDG-PET based heterogeneity in solid tumors

Mohamed Jarboui, WSIC, Department of Preclinical Imaging and Radiopharmacy, Germany

15:20 – 15:30 WB2-06S

Metabolites imaging and shotgun proteomics to decipher the role of epididymis in sperm maturation

Charles Pineau, Protim, France

METHODS, SYSTEMS & BIOINFORMATICS WC2: ONE HEALTH

14:00 – 15:30 Liffey Hall 1

Chair: Subhra Chakraborty, National Institute of Plant Genome Research, India

14:00 – 14:30 WC2-01K

We are not alone: the roles of farm animal proteomes for human health

Emøke Bendixen, AARHUS - Department of Molecular Biology and Genetics, Denmark

14:30 – 14:50 WC2-02I

Immunoproteomic approaches to host-pathogen interactions

David Goodlet, University of Maryland, USA

14:50 – 15:00 WC2-03S

Proteomic and functional analysis of NBDHEX in Giardia duodenalis

Marialuisa Casella, Istituto Superiore di Sanità, Italy

WEDNESDAY

15:00 - 15:10 WC2-04S

High-resolution quantitative proteomics applied to the discovery of biomarkers of innate immune response in tuberculosis

Jesús Mateos, Spanish Research Council-CSIC, Spain

15:10 – 15:20 WC2-05S

A system approach to identify genetic and environmental regulators of virulence in Mycobacterium tuberculosis

Amir Banaei-Esfahani, ETH Zurich, Switzerland

15:20 – 15:30 WC2-06S

Towards a quantitative map of the human proteome: monitoring of tissue specific proteins during meningitis

Johan Malmstršm, Lund University, Sweden

DISEASE & CLINICAL PROTEOMICS WD2: PROTEIN STRUCTURES AND MODIFICATIONS

14:00 – 15:30 Liffey Hall 2

Chair: Juri Rappsilber, Institute of Technology, Berlin, Germany & University of Edinburgh, Scotland

14:00 - 14:30 WD2-01K

A dream: from a protein's sequence to its structure - modern structural proteomics techniques

Christoph Borchers, University of Victoria, Canada

14:30 – 14:50 WD2-02I

Unbiased enrichment of the phosphoproteome gives unprecedented insight into novel human signalling mechanisms through pHis, pAsp, pLys, pArg

Claire Eyers, University of Liverpool, UK

14:50 – 15:00 WD2-03S

Phosphoproteomics of an AML cell line panel pinpoints hyperactive tyrosine kinases as targets for treatment.

Carolien Van Alphen, VU Medical Centre, Netherlands

15:00 – 15:10 WD2-04S

LC-SRM targeted quantification of 20S proteasome complexes stoichiometry & dynamics using absolute SILAC

Thomas Menneteau, IPBS - CNRS UMR, France

15:10 – 15:20 WD2-05S

Phosphoproteomics dissection of the cross-talk between MAPK & PI3K-mTOR pathways in different cancer models

Maruan Hijazi, Queen Mary University of London, UK

15:20 – 15:30 WD2-06S

Comprehensive analysis of human protein N-termini enables assessment of various protein forms

Cheolju Lee, Korea Institute of Science and Technology, Republic of Korea

PRECISION & PERSONALISED PROTEOMICS WE2: HEALTH AND DISEASE

14:00 – 15:30 Liffey Meeting Room 2

Chair: Alex Ebhardt, University College Dublin / Systems Biology Ireland, Ireland

14:00 – 14:30 WE2-01K

Managing health and disease using big data

Mike Snyder, Stanford University, USA

14:30 – 14:50 WE2-02I

Proteome landscape of hepatocellular carcinoma

Ying Jiang, National Center For Protein Science, China

14:50 - 15:00 WE3-03S

Establishment of a fully synthetic, mirror-image biological system

Jörg Hoheisel, German Cancer Research Center, DKFZ, Germany

15:00 – 15:10 WE2-04S

Mass spectrometry histochemistry unveils hidden treasures in formalin fixed paraffin embedded biobanked tissue

Peter Verhaert, ProteoFormiX, Belgium

15:10 – 15:20 WE2-05S

Stratification biomarkers in personalised medicine for osteoarthritis: results from the MOVES study

Valentina Calamia, Inibic, Spain

WEDNESDAY

15:20 – 15:30 WE2-06S

Analysis of proteomic variation in the human population: a comprehensive iPS cell proteome

Dalila Bensaddek, University of Dundee, UK

HUMAN PROTEOME PROJECT WF2: PSI AND KIDNEY/URINE

14:00 - 15:30 Liffey Meeting Room 3

Chair: Henning Hermakob, EMBL-European Bioinformatics Institute, UK

14:00 - 14:30 WF2-01K

Enabling the dissemination and reuse of proteomics data: status and new projects of the HUPO proteomics standards initiative

Eric Deutsch, Institute for Systems Biology, USA

14:30 – 14:50 WF2-02I

Towards standardization of urine proteomics and peptidomics

Tadashi Yamamoto, Niigata University, Japan

14:50 - 15:00 WF2-03S

The draft human proteome as of 2017: metrics from the HUPO human proteome project Gilbert Omenn, University of Michigan, USA

15:00 – 15:10 WF2-04S

The ProteomeXchange consortium: 2017 update

Juan Antonio Vizcaino, EMBL-European Bioinformatics Institute, UK

15:10 – 15:20 WF2-05S

Large scale quantitative urine proteomics of Japanese healthy volunteers

Bo Xu, Niigata University, Japan

15:20 – 15:30 WF2-06S

All that's listed does not code

Michael Tress, Spanish National Cancer Research Centre (CNIO), Spain

15:30 – 16:00 Liffey Foyer Area

Tea / Coffee Break

CLOSING PLENARY SESSION

16:00 – 18:00 Liffey B

Chair: Rob Moritz, Institute for Systems Biology. USA

16:00 -16:45 WP-03

Translating a trillion points of data into therapies, diagnostics and new insights into disease

Atul Butte, Institute for Computational Health Sciences, University of California, USA

16:45 - 18:00

HUPO/EuPA/BSPR/MCP Awards Ceremony and Lectures

18:00

Congress Close

EMBL-WELLCOME GENOME CAMPUS CELLULAR PROTEOMICS TRACK AT HUPO2017

HUPO2017 are delighted to have partnered with EMBL-Wellcome Genome Campus in the Cellular Proteomics track at this year's HUPO Congress. We would like to thank them for their support. See the full programme listing for the sessions and speakers in the Cellular Proteomics track.





ADVANCED COURSES AND SCIENTIFIC CONFERENCES

THE BIOINFORMATICS HUB

The Bioinformatics Hub is a place where bioinformaticians gather together with three aims: (i) to provide their advice, knowledge, and support to anyone with a relevant question; (ii) to discuss current issues and challenges in proteomics informatics with the entire community; and (iii) to work on interesting, synergistic projects and to freely exchange tools, algorithms and know-how with each other, across all labs, seniorities and levels of experience.

The Bio-Inormatics Hub will be open daily from 09:30 – 17:30

The BioInformatics Hub is proudly sponsored by



