International Society

# TARGETING MICROBIOTA Towards Clinical Revolution



0CT. 17>19 - 2023 -VENICE ITALY

# Program 2023



10th World Congress on

# **Targeting Microbiota**

October 17-19, 2023 - Isola di San Servolo, Venice, Italy

On behalf of the International Society of Microbiota, we are pleased to inform you that the 10th Annual World Meeting on Targeting Microbiota will be held on October 17-19 in Venice, Italy.

During Targeting Microbiota 2023, the following topics will be discussed:

- Targeting Microbiota in Disease: Recent Advances and Strategies
- Environment, Lifestyle & Microbiota: A "One Health" Approach
- Microbiota & The Medicine of Tomorrow: Preventative & Therapeutic Strategies
- 8 Minutes Pitch: Dedicated to Start-ups, Academics, Industries & Investors

A workshop will be organized 1 day before the Congress, on October 17:

### "Microbiota Analysis Kits & Probiotics Formulation for Humans & Animals"

- How to develop microbiota analysis kit for humans and animals?
- Formulation of probiotics strains for humans and animals

I hope to meet you this October to capture moments of conviviality and scientific inspiration by the many and best scientists we have in the world studying the various aspects of the microbiota.

All our warmest regards,



**Prof. Peter C. Konturek** Teaching Hospital of the University of Jena, Germany President of ISM



**Prof. Maria Cecilia Giron** University of Padova, Italy Local Organizer of Targeting Microbiota 2023



#### Under the local organization of



Università degli Studi di Padova

#### With the patronage of



Università Ca'Foscari Venezia

#### **ISM Speakers 2023**



COVID 19 and Microbiota - A Story with a Long Tail Peter C. Konturek, President of ISM from Teaching Hospital of the University of Jena, Germany



Microbiota & Myelinazation: The Latest Findings Maria Cecilia Giron, University of Padova, Italy



Domestic Cleaning and Human Microbiome -Is There a Link? Markus Egert, Furtwangen University, Germany





Environmental Drivers of Avian Enteric Neuroendocrine Plasticity in the Context of Foodborne Pathogen Carriage Joshua Lyte, United States Department of Agriculture, Agricultural Research Service, USA



Skin Microbial Changes during Space Flights Pamela Tozzo, University of Padova, Italy



Gut Microbiota and Cancer Immunotherapy Andrew Y. Koh, University of Texas Southwestern Medical Center, USA



Computational Modeling Microbial Community Networks: Pros and Con Barbara Di Camillo, University of Padova, Italy



Gut microbiota and prebiotics in Parkinson's disease: The RESISTA-PD Trial Andreas Schwiertz, Institute of Microecology, Germany



Microbiome Engineering: Reprograming microbes to rewire host-microbiome interactions Matthew Chang, National University of Singapore, Singapore



Multi-omics in Colon Cancer and Role of the Microbiome Souhaila Al Khodor, Sidra Medicine, Qatar



Marine Heatwaves and Microbiome in the Mediterranean Sea: Insights From Non Model Organism Manila Clam Maria Elena Martino, University of Padova, Italy



Microbiota Modulation: The Missing Link Marvin Edeas, Founder & Chairman of ISM Committee, Institut Cochin, INSERM, Université de Paris, France



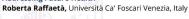
Engineered Escherichia Coli for the in Situ Secretion of Therapeutic Nanobodies in the Gut Cammie Lesser, Harvard Medical School , USA



Microbiota and Interactions with Gut and the Enteric Nervous System Karl-Herbert Schäfer, Kaiserlautern University of Applied



Anthropology and Research on the Microbiome: Addressing Future Health



Sciences, Germany



Gut Microbiota & Microbiota-Derived Metabolites Role in Endometriosis Ramakrishna Kommagani, Baylor College of Medicine, USA



Fecal Gut Microbiota and Metabolite Signatures as Biomarkers for Gastrointestinal Disorders Lena Öhman, University of Gothenburg, Sweden



Arresting microbiome development limits immune system maturation and resistance to infection in mice Michael Silverman, University of Pennsylvania, USA



Microbiota, Enteric Nervous and Immune Systems: Barrier Defenses against Foodborne Pathogens Carriage in Poultry

Valentina Caputi, United States Department of Agriculture, Agricultural Research Service, USA Evaluation of Transitional Changes Shaping the Infants'



Gut Microbiota in Early Life: The CI.EMME Study Vincenzo Di Pilato, University of Genoa, Italy



Clinical Applications of Gut Microbiota: Gut Microbiome for Prediction of Colorectal Neoplasia Francis K L Chan, The Chinese University of Hong Kong, China



Effect of Gut Microbiota Regulation on Non-Alcoholic Fatty Liver Disease Yu Chen, The 7th Affiliated Hospital of Southern Medical University, China

#### www.microbiota-site.com

## Day 1 – October 17, 2023

### ISM 2023 Workshop

## Workshop

### Microbiota Analysis Kits & Probiotics Formulation for Humans & Animals

The aim of this workshop is to elaborate the curation of microbiota research, implementation and product development as a business platform. It will also explain the microbiota analysis kit (self-test kit) development and its content for human and animal use. The workshop will also dedicate time to discuss with attendees the strategies to overcome the barriers in microbiome businesses, as well as all strategies to have a successful launch.

### Workshop Outline:

### 13h00 - Welcoming of Attendees & Badges distribution

### 14h00 - Session 1: How to develop microbiota analysis kit for humans and animals?

- a- Microbiota analysis kit : Introduction
  - Definition and content of the microbiota analysis kit (what it contains inside)
  - How it works (technical process); from sample collection to result report
  - Scientific background for microbiota analysis kit
  - Insight into current microbiota analyzing companies
  - Challenges and limitations of microbiota analysis kit
  - Provision of recommendations and solutions
- b- Practical aspects of kits development
  - Microbiota-based scientific literature search, storage and curation
  - Generating knowledge database
  - Developing product prototypes
  - Integrating the knowledge database to dashboard (website)
  - Launching the product to potential consumers (B2C, B2B, etc.)

### 16h00 – Session 2: Formulation of probiotics strains for humans and animals

- Scientific literature (clinical studies) search, storage and curation
- Probiotic strains selection process
- Probiotic dose determination
- Inclusion of minerals and vitamins in probiotic
- Inclusion of prebiotic in probiotic (as symbiotic) and its scientific basis
- Regulatory aspect of probiotic, such as safety, claim, labeling etc.

### 18h00 – End of the Workshop





**Dr. Tewodros Debebe,** PhD Scientific Officer International Society of Microbiota

# **International Society of Microbiota**

### Day 2 - Wednesday, October 18, 2023

#### 8h00 Materials Distribution & Welcome Coffee

#### 8h50 Welcome Note of Targeting Microbiota 2023

Peter C. Konturek, President of ISM, Teaching Hospital of the University of Jena, Germany Marvin Edeas, Founder & Chairman of ISM's Committee, Institut Cochin, INSERM, Université de Paris, France Maria Cecilia Giron, Local Organizer of Targeting Microbiota 2023, University of Padova, Italy

### Session 1: Targeting Microbiota in Disease: Recent Advances and Strategies

Chairpersons: Peter C. Konturek and Maria Cecilia Giron



9h00 – COVID 19 and Microbiota – A Story with a Long Tail Peter C. Konturek, President of ISM from the Teaching Hospital of the University of Jena, Germany



9h25 – Microbiota and Interactions with the Enteric Nervous System Karl-Herbert Schäfer, Kaiserlautern University of Applied Sciences, Germany



9h50 – Arresting Microbiome Development Limits Immune System Maturation and Resistance to Infection in Mice Michael Silverman, University of Pennsylvania, USA



10h15 – Evaluation of Transitional Changes Shaping the Infants' Gut Microbiota in Early Life: The CI.EMME Study Vincenzo Di Pilato, University of Genoa, Italy

10h40 – 11h20 Coffee Break, Networking, & Poster Session



11h20 – Gut Microbiota & Microbiota-Derived Metabolites Role in Endometriosis Ramakrishna Kommagani, Baylor College of Medicine, USA



11h45 – Microbiota & Myelinazation: The Latest Findings Maria Cecilia Giron, University of Padova, Italy

#### Short Oral Presentations (8 minutes + 2 minutes for discussion) 12h10

Diabetes is Associated with Increased Intestinal Permeability of Bacterial Metabolites and Changes in Intestinal Ras Kinga Jaworska, Medical University of Warsaw, Poland

Enterococcus Faecalis Induces Cardiometabolic Alterations Accompanied by Redox Imbalance and Impairment of **Endothelial Function** Ariela Maína Boeder, Karolinska Institute, Sweden

### Safety and Feasibility of Kefir in the Critically ill

Lioudmila Karnatovskaia, Mayo Clinic, USA

12h40 – 14h00 Lunch Break, Networking, & Poster Session

Chairpersons: Markus Egert and Karl-Herbert Schäfer



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14h00 – Environmental Drivers of Avian Enteric Neuroendocrine Plasticity in the Context of Foodborne Pathogen Carriage Joshua Lyte, United States Department of Agriculture, Agricultural Research Service (USDA), USA



14h25 – Microbiota, Enteric Nervous and Immune Systems: Barrier Defenses against Foodborne Pathogens Carriage in Poultry Valentina Caputi, United States Department of Agriculture, Agricultural Research Service (USDA), USA



14h50 – Anthropology and Research on the Microbiome: Addressing Future Health Roberta Raffaetà, Università Ca' Foscari Venezia, Italy

15h15 – 16h00 Coffee Break, Networking, & Poster Session

### Session 2: Environment, Lifestyle & Microbiota: A "One Health" Approach



16h00 – Domestic Cleaning and Human Microbiome - Is There a Link? Markus Egert, Furtwangen University, Germany



16h25 – Mapping the Kitchen Microbiota in Five European Countries Birgitte Moen, Nofima — Norwegian Institute of Food, Fisheries and Aquaculture Research, Norway



16h50 – Mapping the Kitchen Microbiota in Five European Countries Birgitte Moen, Nofima — Norwegian Institute of Food, Fisheries and Aquaculture Research, Norway

### 17h15 Short Oral Presentations (8 minutes + 2 minutes for discussion)

Development of an in Vitro Model for the Study of Multispecies Biofilms in Real Time: Experimental and Clinical Applications for the Oral Microbiota María D. Ferrer, Fisabio Foundation, Spain

The Role of Microbiome in Multiple Sclerosis: A Multidimensional Approach Laura Barcutean, University of Medicine, Pharmacy, Science and Technology George Emil Palade Targu Mures, Romania

18h00 End of Congress Day 1

20h00 Meet the Speakers Dinner (Reserved for ticket holders only)



Day 3 - Thursday, October 19, 2023

8h30 Opening of Day 3

### Session 3: Microbiota & The Medicine of Tomorrow: Preventative & Therapeutic Strategies

Chairpersons: Marvin Edeas and Cammie Lesser



9h00 – Microbiota Modulation: The Missing Link Marvin Edeas, Founder & Chairman of ISM's Committee, Institut Cochin, INSERM, Université de Paris, France



9h25 – Fecal Gut Microbiota and Metabolite Signatures as Biomarkers for Gastrointestinal Disorders *Lena Öhman*, University of Gothenburg, Sweden



9h50 – Clinical Applications of Gut Microbiota: Gut Microbiome for Prediction of Colorectal Neoplasia Francis K L Chan, The Chinese University of Hong Kong, China



10h15 – Gut microbiota and prebiotics in Parkinson's disease: The RESISTA-PD Trial Andreas Schwiertz, Institute of Microecology, Germany

10h40 – 11h20 Coffee Break, Networking, & Poster Session



11h20 – Multi-omics in Colon Cancer and Role of the Microbiome Souhaila Al Khodor, Sidra Medicine, Qatar



11h45 – Engineered Escherichia coli for the in Situ Secretion of Therapeutic Nanobodies in the Gut Cammie Lesser, Massachusetts General Hospital/Harvard Medical School, USA



12h10 – Microbiome Engineering: Reprograming microbes to rewire host-microbiome interactions *Matthew Chang, National University of Singapore, Singapore* 

12h35 – 13h35 Lunch Break, Networking, & Poster Session



Chairpersons: Andreas Schwiertz and Lena Öhman



13h35 – Skin Microbial Changes during Space Flights Pamela Tozzo, University of Padova, Italy



14h00 – Computational Modeling Microbial Community Networks: Pros and Cons Barbara Di Camillo, University of Padova, Italy



14h25 – Gut Microbiota and Cancer Immunotherapy Andrew Y. Koh, University of Texas Southwestern Medical Center, USA



15h15 – 15h45 Coffee Break, Networking, & Poster Session

### Short Oral Presentations: 8 Minutes-Pitch: Dedicated to Start-ups, Academics, Industries & Investors

Physicochemical and Molecular Characterization of Several Cutanaeous Bacteria's Adhesion Mechanisms Ahmad Khodr, L'Oréal R&I, France

A Novel Approach for Strain-Level Engraftment Analysis in FMT and LBP Treatments Pernille Neve Myers, Clinical Microbiomics, Denmark

Topical Administration of Lactiplantibacillus Plantarum (SkinDuo™) Serum Improves Anti-Acne Properties Christine Podrini, The BioArte Ltd, Malta

The Potential of Streptococcus Thermophilus Iha318 on Hyaluronic Acid Production and Relieving Dry Eye Syndrome Shao-Yu Lee, Percheron Bioceutical, Taiwan

Investigating the Extent That Digestion and Fermentation of Postbiotic-Rich Fermented Food Impacts Potential Health Benefits Conferred by Specific Postbiotic Strains Emma Scott, UGent, Belgium

Endolysin Inhibits Skin Colonization by Patient-Derived Staphylococcus Aureus and Malignant T Cell Activition in Cutaneous T Cell Lymphoma Niels Odum, University of Copenhagen, Denmark



Vaginal Microbiome Study Provides the Identification of the Biomarker Species in Polycystic Ovarian Syndrome (PCOS) Metagenome Anjana Dhirajlal Ghelani, Shree Ramkrishna Institute, Sarvajanik University, India

# Differentiating the Gut Microbiome of Two Ethnic Groups with an Unequal Diabetic Burden by Short-Chain Fatty Acid-Producing Taxa (Online Talk)

Eric Nayman, Florida International University, USA

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16h55 The ISM Initiative: Phage-Microbiome Consortium

**Targeting Microbiota 2023 Awards** 

17h00 End of Targeting Microbiota 2023



For more information, please visit: <u>www.microbiota-site.com</u> or contact us at microbiota(at)microbiota-ism.com.