

Background

Probiotics are micro-organisms that have claimed health edges once consumed. Bifidobacterium and Lactic acid bacteria (LAB) are the foremost common formulations of microbes used as Probiotics. However, reports of clinical infections, the spread of antibiotic resistance genes, and development of new and/or modified probiotic LAB strains, have been of much public concern. *National Institute for Biotechnology and Genetic Engineering (NIBGE)* has established a strong infra-structure to carry out cutting edge research related to this promising field. The Probiotics & Food Safety Research group at NIBGE is a dynamic and active group equipped with the most sophisticated, advanced & state of the art research instrumentation. Our focus is on assessing the biosafety of LAB and gut microbiota. Bacterial from healthy humans and immuno-compromised patients, commercially available products and new probiotic LAB are being actively investigated. Following an elaborate array of molecular and biochemical procedures for taxonomic identification, their biosafety is assessed by using latest in-vitro protocols. Our research interest is in food safety and quality assessment of novel food processing technologies and to conduct research pertaining to relevant questions of industrial and regulatory importance.

The workshop will include lectures, demonstrations and hands-on training through interactive practical sessions. We shall endeavor to bring together a mix of participants ranging from lab investigators, academics to industrial workers and healthcare givers. The workshop is envisaged to serve as a catalyst for laying the scientific basis of verifying health and functional claims associated with Probiotics and Nutraceuticals. The workshop will also serve as an opportunity for information exchange and generating new concepts for the rapidly evolving global Food Safety sector.

Course Outlines:

- Concepts and regulatory aspects of Probiotics
- Training of molecular identification and Ribotyping at strain level by practical demonstration
- Microbial phylogenetics and Biochemical testing etc



National Institute for Biotechnology and Genetic Engineering (NIBGE) was established in 1992 with the aim of establishing a solid applied biological research platform in the country. It is an affiliated center of the International Center of Genetic Engineering and Biotechnology (ICGEB), Italy. In addition, it is also serving as **Center of Excellence in Biotechnology** in the country.

The **National Probiotic Laboratory (NPL)** was established in 2013 with the financial support of PSDP program of the Federal Government of Pakistan. Its specific aim is to lay the foundation of a modern scientific system of functional food safety standards in Pakistan. NPL has some of the latest advanced equipment at its disposal not only in the country but for the whole SAARC region altogether. Currently NPL boasts having Bioflux, Riboprinter, Anaerobic chamber, SpectraMax, Biosafety II cabinets, Olympus microscope, Spiral plater and automated GC Systems in its scientific arsenal. Our lab aims to develop as a cutting-edge facility in the field of Probiotics and through achieving advancements in this area, we will pursue life-science research initiatives that contribute to the betterment of health of man and animal.

Specifically our resources and expertise is focused on addressing the following key objectives of the lab:-

- Taxonomic description of probiotic and other LAB.
- Detection of resistance and HGT of antibiotic resistance genes in LAB.
- Detection of known and new virulence properties of LAB.
- Survival, adhesion and colonization of probiotic LAB in the human gut.

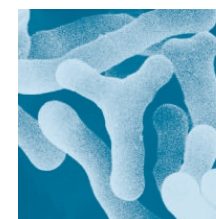
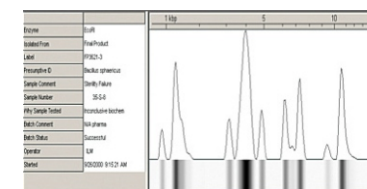


National Probiotic Lab (NPL)
Creating Values for Nutritional Safety and Health

International Training Workshop On

**“Ribotyping & Probiotics Safety”
Advanced Strain-Level Portrayal
&
Practical Applications of Ribotyping**

January 8-9, 2015



Chair of the Organizing Committee

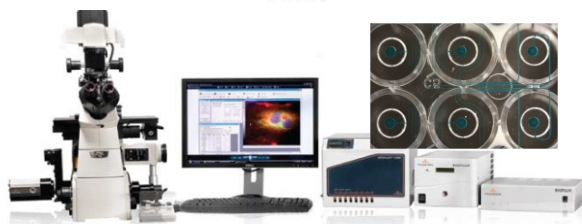
Dr. Shahid Mansoor Director, NIBGE

Advisory Committee

Dr. S.M. Javed Akhtar Member Science PAEC
Dr. Shahid Mansoor Director, NIBGE
Dr. Syed Javed Khurshid Director, Proj. Coord. PAEC

Organizers

Dr. Arsalan Zaidi Pr. Scientist NIBGE
Dr. Muhammad Tariq Sr. Scientist NIBGE



Training Faculty

Engr. Yang Ming Xu, Mr. Owais Yaqub, Dr. Arsalan Zaidi, Dr. Muhammad Tariq

Who can participate

Researchers/Scholars under 40 years of age from academics, R & D organizations and industrial laboratories with background in Microbiology, Food Sciences, Biotechnology, Biochemistry and Molecular Biology. Preference will be given to individuals/employees who are planning to initiate work in this area.

Participants: 15

Registration Fee

For Students Rs. 2,000/-

For Employees Rs. 4,000/-

For Foreign Nationals USD 100/-

Note

All dues should be paid before or at the time of registration by the selected participants in the form of Cash/Bank Draft in favor of "Accounts Officer, NIBGE, Fsd".

Registration Closing Date: January 5, 2015

Please send complete application form and CV to:

Dr. Arsalan Zaidi

Project Director, National Probiotic Lab

NPL- National Institute for Biotechnology & Genetic Engineering (NIBGE),

P. O. Box. No. 577, Jhang Road, Faisalabad.

Cell# 0305-5888875

Email: azlanzaidi@yahoo.com

Application forms can be downloaded from: **www.nibge.org**

Application Form

Name _____

Date of Birth _____ Gender _____

CNIC No. _____

Affiliation: _____

Institute: _____

Designation: _____

Address: _____

Cross Cheque No. _____

Phone: _____ Fax: _____

Email: _____

Research/Training Experience: _____

Accommodation Required: YES/NO

Applicant's Signature: _____

Head of Department: _____

(Signature with Official Stamp)