The commitment to discover solutions to various health disorders is one of top priorities in modern biology. The biomedical science is an interdisciplinary field that primarily focuses to surpass the quality of life by improving the overall human health. Biomedical research delves with the identification of physiological and molecular factors responsible for the onset of a disease and development of new therapies to manage such health issues. Further, personalized and preventive medicines are the new emerging areas of biomedical research that will accelerate the diagnosis, treatment and prevention of a health ailment according to the genetic makeup of an individual. The present international meet will focus on emerging aspects of biomedical research and will provide a suitable platform for the young researchers to interact with the different biomedical scientists who have done remarkable work in this field.

**Speakers**

- **Dr. Katsunori MATSUOKA**  
  Vice-President & Director General, AIST, Japan

- **Dr. Yoshihiro OHMIYA**  
  Director, Biomedical Research Institute, AIST, Japan

- **Dr. Sunil KAUL**  
  Chief Senior Research Scientist, BMRI, AIST, Japan

- **Dr. Yoshiaki ONISHI**  
  Deputy Director, BMRI, AIST, Japan

- **Dr. Renu WADHWA**  
  Prime Senior Researcher and Head, DAILAB BMRI, AIST, Japan

- **Dr. Tsutomu NAKAMURA**  
  Senior Researcher, BMRI, AIST, Japan

- **Dr. Mitali MUKERJI**  
  Senior Principal Scientist, CSIR Institute of Genomics & Integrative Biology, Delhi.

- **Dr. Durai SUNDAR**  
  Dupont Young Professor, Department of Biochemical Engineering & Biotechnology, IIT-Delhi, India

- **Dr. Ajaikumar B. KUNNUMAKKARA**  
  Associate Professor, Department of Biosciences and Bioengineering, IIT, Guwahati

- **Dr. Yoshihiro OHMIYA**  
  Director, Biomedical Research Institute, AIST, Japan

- **Dr. Sunil KAUL**  
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- **Dr. Tsutomu NAKAMURA**  
  Senior Researcher, BMRI, AIST, Japan

**Who Should attend**

- Faculty from reputed academic institutions and technical institutions.
- Student at all levels (B.Sc./MSc/ MTech/PhD) of Life sciences including Biotechnology, Biochemistry and molecular biology, Botany, Microbiology, Human genetics, Zoology etc.
- Researchers /Post-doc/ Research associate from Universities, Govt. and R&D laboratories.

**Course Registration Fee :**

- Students/Research Scholars : Rs. 500/-
- Faculty members: Rs. 1000/-

The candidates are required to register in the prescribed format and submit the registration form through email: imflgndu18@gmail.com along with scanned copy of Demand Draft in favour of Registrar, Guru Nanak Dev University, Amritsar.

* Candidate should bring the original Demand Draft at the time of Conference.

**Website & Links :**

http://online.gndu.ac.in/conference-and-seminars_Organised.aspx

**Coordinators :**

- **Prof. (Dr.) Pratap Kumar Pati**, Head, Department of Biotechnology, Guru Nanak Dev University, Amritsar, Punjab  
  Phone :0183-2258802-09 Ext. 3218, 3222 Mobile: 9915091910 Email: pkpati@yahoo.com

- **Dr. Sunil Kaul**, Chief Senior Research Scientist, DBT (India) - AIST (Japan) International Laboratory for Advance Biomedicine (DAILAB) BMRI, National Institute of Advanced Industrial Science & Technology (AIST) Japan
Coordinators

Dr. Pratap Kumar Pati  
Professor & Head,  
Department of Biotechnology, Guru Nanak Dev University, Amritsar

Dr. Sunil Kaul  
Chief Senior Research Scientist  
DBT (India) - AIST (Japan) International Laboratory for Advance Biomedicine (DAILAB)  
BMRI, National Institute of Advanced Industrial Science & Technology (AIST) Japan

Organizing Committee

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Professor  
Department of Biotechnology, Guru Nanak Dev University, Amritsar

Dr. Prabhjeet Singh  
Professor  
Department of Biotechnology, Guru Nanak Dev University, Amritsar

Dr. Jatinder Singh  
Professor & Head  
Department of Molecular Biology & Biochemistry, Guru Nanak Dev University, Amritsar

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Department of Pharmaceutical Sciences, Guru Nanak Dev University, Amritsar

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Department of Biotechnology, Guru Nanak Dev University, Amritsar

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Department of Molecular Biology & Biochemistry, Guru Nanak Dev University, Amritsar

Dr. Balbir Singh  
Assistant Professor  
Department of Pharmaceutical Sciences, Guru Nanak Dev University, Amritsar

Mr. Bhupesh Kumar  
Programmer  
Department of Biotechnology, Guru Nanak Dev University, Amritsar

Key Speakers

Dr. Katsunori MATSUOKA  
Vice-President & Director General, AIST, Japan

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Dr. Gurcharan KAUR  
Professor, Department of Biotechnology, Guru Nanak Dev University, Amritsar

Dr. Pratap Kumar PATI  
Professor, Department of Biotechnology, Guru Nanak Dev University, Amritsar
Who Should attend
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Last date of submission of Abstarct & Registration 17/03/2018

Abstract for poster presentation (maximum 250 words) formatted on MS Word in Time New Roman, Font Size 12 should be send only by e-mail at imflgndu18@gmail.com along with Title, Name of Author(s), full address of correspondence including e-mail and name of the presenting author should be underlined. Abstract received after due date will not be accepted.

Poster size should not exceed A0 (841 x 1189 mm)

How to reach Amritsar

The Organizing Committee has great pleasure in inviting you and your colleagues to participate in the International meet. The meeting offers scope for discussing recent developments and future directions in the field of Biomedical Research. We are hopeful that in addition to the scientific activities, the surroundings of holy city Amritsar will make your trip memorable.

Amritsar, the City of Golden Temple, is well connected to all major cities of India by a fine network of railways, road and air.

By Air: The airport at Amritsar named Guru Ram Dass International Airport offers excellent services. The airport is well connected to other parts of the country by regular flights.

By Rail: Amritsar is directly connected to New Delhi via rail route. It takes about 8 to 10 hours to reach Amritsar from New Delhi by train.

By Road: G T Road connects Delhi to Amritsar. Regular buses are available from I.S.B.T. Delhi to Amritsar. You can choose from local, semi deluxe, deluxe and super deluxe buses offered at I.S.B.T. Delhi. If you want to reach Amritsar from places other than Delhi, then you may have to change your bus at a midway destination such as I.S.B.T. Delhi and then board again the corresponding bus, train or airplane.

For details Contact
Prof. (Dr.) Pratap Kumar Pati, Head, Department of Biotechnology, Guru Nanak Dev University, Amritsar, Punjab
Phone: 0183-2258802-09 Ext. 3218, 3222 Mobile: 9915091910 Email: pkpati@yahoo.com / imflgndu18@gmail.com
REGISTRATION FORM

Conference on
"International Meet on Frontiers in Life Science"
(22nd March, 2018)

Name (Block Letters): ........................................................................................................

M/F: ................................................................................................................................

Designation/ Professional Title: ..........................................................................................

Organization: ......................................................................................................................

Address: ............................................................................................................................

...........................................................................................................................................

Abstract enclosed □ Yes □ No Mode of Presentation : Poster

Attend only □

Abstract Title: .....................................................................................................................

Tel: ........................................ Mobile: ..................................................................................

E-mail: .................................................................................................................................

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Date: ______________________________ Signature

Registration Fee : Students/Research Scholars : Rs. 500/- and Faculty members: Rs. 1000/-
The candidates are required to register in the prescribed format and submit the registration form
through email: imflgndu18@gmail.com
along with scanned copy of Demand Draft in favor of
Registrar, Guru Nanak Dev University, Amritsar.

* Candidate should bring the original Demand Draft at the time of Conference.

Last date to submit the complete application form is 17th March, 2018
INTERNATIONAL MEET ON FRONTIERS IN LIFESCIENCE
INAUGURATION OF SISTER DAILAB &
PIKNIKH SERIES XXIV
Organized by: Department of Biotechnology & Molecular Biology & Biochemistry
Guru Nanak Dev University, Amritsar- 143 005, India

Sponsored by:
Centres with Potential For Excellence In Particular Area (CPEPA)

March 22, 2018

<table>
<thead>
<tr>
<th>Time</th>
<th>Event details</th>
</tr>
</thead>
<tbody>
<tr>
<td>9:30</td>
<td>Arrival and Exchange of Business Cards, PRAYER- Shabad and Lighting of Lamps</td>
</tr>
<tr>
<td>9:40</td>
<td>Welcome address and Introduction of the Department of Biotechnology Dr. Pratap Kumar PATI, Professor &amp; Head, Department of Biotechnology, GNDU, Amritsar</td>
</tr>
<tr>
<td>9:45</td>
<td>Introduction of AIST- Scholars, Strengths &amp; Strategies for Supporting Society Dr. Katsunori MATSUOKA, Vice-President &amp; Director General, AIST, Japan</td>
</tr>
<tr>
<td>9:50</td>
<td>Introduction of Biomedical Research Institute (BMRI) Dr. Yoshihiro OHMIYA, Director, BMRI, AIST, Japan</td>
</tr>
</tbody>
</table>

Coordinators
Sunil KAUL, Chief Senior Research Scientist DBT (India)-AIST (Japan) International Laboratory for Advanced Biomedicine (DAILAB), BMRI, National Institute of Advanced Industrial Science & Technology (AIST), Japan
E-mail: s-kaul@aist.go.jp

Pratap Kumar PATI, Professor and Head, Department of Biotechnology, Guru Nanak Dev University, Amritsar, INDIA
E-mail: pkpati@yahoo.com
<table>
<thead>
<tr>
<th>Time</th>
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</tr>
</thead>
<tbody>
<tr>
<td>9:55</td>
<td>Introduction of DAILAB and DAICENTER</td>
</tr>
<tr>
<td></td>
<td>Dr. Sunil KAUL, Chief Senior Research Scientist, AIST, Japan</td>
</tr>
<tr>
<td>10:05</td>
<td>Signing of MoU and Inauguration of SISTER DAILAB@GNDU</td>
</tr>
<tr>
<td>10:10</td>
<td>Inaugural Address</td>
</tr>
<tr>
<td></td>
<td>Dr. Jaspal Singh SANDHU, Vice-Chancellor, Guru Nanak Dev University, Amritsar</td>
</tr>
<tr>
<td>10:20</td>
<td>Presentation of Mementos</td>
</tr>
<tr>
<td>10:25</td>
<td>Vote of Thanks</td>
</tr>
<tr>
<td></td>
<td>Dean Life Sciences, Guru Nanak Dev University, Amritsar</td>
</tr>
<tr>
<td>10:30</td>
<td>High Tea and Interaction</td>
</tr>
</tbody>
</table>

**Plenary Session**

<table>
<thead>
<tr>
<th>Time</th>
<th>Event</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Session Chairs: Avinash NAGPAL &amp; Yoshiaki ONISHI</td>
</tr>
</tbody>
</table>

**Plenary Lecture I**

<table>
<thead>
<tr>
<th>Time</th>
<th>Title</th>
<th>Speaker</th>
</tr>
</thead>
<tbody>
<tr>
<td>11:00</td>
<td>Ashwagandha health benefits: Biology to biotechnology</td>
<td>Renu WADHWA (<a href="mailto:renu-wadhwa@aist.go.jp">renu-wadhwa@aist.go.jp</a>) National Institute of Advanced Industrial Science &amp; Technology (AIST), Japan</td>
</tr>
</tbody>
</table>

**Plenary Lecture II**

<table>
<thead>
<tr>
<th>Time</th>
<th>Title</th>
<th>Speaker</th>
</tr>
</thead>
<tbody>
<tr>
<td>11:20</td>
<td>Ayurgenomics: a novel integrative approach for understanding human individually for precision medicine</td>
<td>Mitali MUKERJI (<a href="mailto:mitali@igib.res.in">mitali@igib.res.in</a>) CSIR Institute of Genomics &amp; Integrative Biology, Delhi, India</td>
</tr>
</tbody>
</table>

**Scientific Session**

<table>
<thead>
<tr>
<th>Time</th>
<th>Title</th>
<th>Speaker</th>
</tr>
</thead>
<tbody>
<tr>
<td>11:40</td>
<td>Bioinformatics inputs to the therapeutic potential of Ashwagandha actives</td>
<td>Durai SUNDAR (<a href="mailto:sundar@dbeb.iitd.ac.in">sundar@dbeb.iitd.ac.in</a>) Indian Institute of Technology (IIT-Delhi), India</td>
</tr>
<tr>
<td>11:55</td>
<td>Ashwagandha : Insights in its multifunctional role for mental health</td>
<td>Gurcharan KAUR (<a href="mailto:kgurcharan.neuro@yahoo.com">kgurcharan.neuro@yahoo.com</a>) Guru Nanak Dev University, Amritsar</td>
</tr>
<tr>
<td>12:10</td>
<td>Ashwagandha for modulation of circadian rhythm</td>
<td>Yoshiaki ONISHI (<a href="mailto:y-onishi@aist.go.jp">y-onishi@aist.go.jp</a>) National Institute of Advanced Industrial Science &amp; Technology (AIST), Japan</td>
</tr>
<tr>
<td>Time</td>
<td>Title</td>
<td>Speaker</td>
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<tr>
<td>12:25</td>
<td><strong>Biotechnological interventions in improvement of Withania somnifera</strong></td>
<td>Pratap Kumar PATI (<a href="mailto:pkpati@yahoo.com">pkpati@yahoo.com</a>) Guru Nanak Dev University, Amritsar</td>
</tr>
<tr>
<td>12:40</td>
<td><strong>Curcumin for oral cancer and health</strong></td>
<td>Ajaikumar B. KUNNUMAKKARA (<a href="mailto:akunnumakkara@gmail.com">akunnumakkara@gmail.com</a>) IIT-Guwahati, India</td>
</tr>
<tr>
<td>12:55</td>
<td><strong>Structural change of archaeal peroxiredoxin upon oxidation</strong></td>
<td>Tsutomu NAKAMURA (<a href="mailto:nakamura-t@aist.go.jp">nakamura-t@aist.go.jp</a>) National Institute of Advanced Industrial Science &amp; Technology (AIST), Japan</td>
</tr>
</tbody>
</table>

13:10 LUNCH

14:00-16:00 Student Training for Advanced Research Recitations - STAR Session
            10 students with 12 min each (10+2 min)

16:00-16:30 Tea Break and Poster Session

16:30-18:30 Lab visit and putting up DAILAB name plate
            Move to the venue for Scientific Interactions and Networking