IISER KOLKATA

INDIAN INSTITUTE OF SCIENCE EDUCATION AND RESEARCH KOLKATA

2018

PLACEMENT BROCHURE

2018-2019

CENTER FOR CAREER DEVELOPMENT

IISER KOLKATA

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IISER KOLKATA

About IISER Kolkata

Indian Institute of Science Education and Research Kolkata (IISER Kolkata) was established in 2006 by the Ministry of Human Resource Development (MHRD), Government of India. IISER Kolkata is designed to reach the prestigious position in the global setting that IISc, IIMs and IITs presently enjoy. IISER Kolkata is an autonomous institution awarding its own degrees. The central theme of the IISER Kolkata is to integrate education with research so that undergraduate teaching as well as doctoral and postdoctoral research work could be carried out in symbiosis.

The Institute has a flexible academic programme and hosts state-of-the-art research facilities. Currently, it has five academic departments (Biological Sciences, Chemical Sciences, Earth Sciences, Mathematics & Statistics, Physical Sciences) and several centres of excellence: (1) Center of Excellence in Space Sciences in India (CESSI) supported by Ministry of Human Resource Development, (2) National Centre for High Pressure Studies, supported by the Ministry of Earth Sciences. An institute supported “Centre for Advanced Functional Materials (CAFM)” has also been established recently. Two interdisciplinary centres (1) Centre for Climate and Environmental Studies (CCES) and Centre for Large Scale Computing (CLSC) are being created vith the Institute initiative.

About BS-MS Programme

Our 5 year BS-MS course aims to integrate the conventional bachelors and masters programs into a more holistic science education experience, bringing together conventional disciplines in the biological, chemical, mathematical, physical and earth sciences. The program focuses on the unified nature of science and aims to train some of the brightest young minds of our country, through some of the best practitioners of science in India. Our students are encouraged to take part in research activities, both in IISER and in other leading research laboratories, thus providing them a symbiotic relationship between conventional education and research.

The first two years involve a set of comprehensive mandatory courses in all areas of basic sciences, viz, Math, Physics, Chemistry, Earth Sciences and with a few courses from Humanities and English. These two years are devoted to creating a broad knowledge base in the basic sciences.

The third and fourth years are devoted to developing a few specific areas in depth as they choose their major subject. They involve a choice of specialized courses from the within the broad areas introduced in the first two years.

The final year at IISER Kolkata does not involve any course work, so students focus entirely on their research project and the resulting Masters thesis. This model has resulted in a large number of publications involving undergraduate student authors.

COURSE STRUCTURE

The first two years involve a set of comprehensive mandatory courses in all areas of basic sciences, viz, Math, Physics, Chemistry, Earth Sciences and with a few courses from Humanities and English. These two years are devoted to creating a broad knowledge base in the basic sciences. The third and fourth years are devoted to developing a few specific areas in depth as they choose their major subject. They involve a choice of specialized courses from the within the broad areas introduced in the first two years. The final year at IISER Kolkata does not involve any course work, so students focus entirely on their research project and the resulting Masters thesis. This model has resulted in a large number of publications involving undergraduate student authors.

MATHEMATICS & STATISTICS

- Mathematics I
- Mathematics II
- Analysis I
- Analysis II
- Probability I
- Linear Algebra I
- Mathematics III
- Mathematics IV
- Analysis III
- Analysis IV
- Topology
- Geometry of Curves and Surfaces
- Advanced Data Structures and Algorithms
- Computer Laboratory
- Topics in Networks
- Time series analysis
- Ordinary Differential Equations
- Statistics Laboratory
- Fourier Analysis
- Differential Geometry
- Algebraic Topology
- Algebra I
- Algebra II
- Introduction to Graph Theory
- Linear Algebra II
- Numerical Analysis
- Numerical Analysis Laboratory
- Mathematical Statistics I
- Complex Analysis
- Functional Analysis
- Algebra III
- Partial Differential Equations

CHEMICAL SCIENCES

- Elements of Chemistry
- Chemistry Lab I
- Inorganic Chemistry I
- Quantum Chemistry I
- Inorganic and Spectroscopy Laboratory
- Chemistry of Transition Elements
- Organic Synthesis
- Quantum Chemistry II
- Stereochemistry and asymmetric synthesis
- Advanced Physical Chemistry Laboratory
- Supramolecular Chemistry
- Organometallic Chemistry and Catalysis
- Molecular Structure and Symmetry
- Chemical Thermodynamics
- Group Theory and Spectroscopy
- Organic synthesis laboratory
- Inorganic Chemistry Laboratory
- Statistical Thermodynamics
- Research Methodology
- Bonding in Chemistry
- Symmetry in Chemistry
- Important Perspectives of Organic Chemistry
- Fluorescence Spectroscopy
- Chemical Perspectives of Biological Pathways
- Mathematics for Chemist
- Principles of Inorganic Chemistry
- Principles of Organic Chemistry
- Principles of Physical Chemistry
- General Physical Chemistry
- Physical Chemistry Laboratory
- Fundamentals of Spectroscopy
- Reaction Mechanisms in Organic Chemistry
- Synthesis and Characterization Laboratory
- Chemistry of Transition Elements
- Physical Organic Chemistry
- Instrumentation in Chemistry
- Bioinorganic Chemistry
- Natural Products and Medicinal Chemistry
- Physical Methods of Structural Elucidation
- Chemistry of Materials
- Molecular Reaction Dynamics
- Polymer Chemistry

COURSE STRUCTURE

IISER KOLKATA

EARTH SCIENCES

Earth System Processes
Geophysics
Basic Structural Geology and Tectonics
Sedimentology
Geotechnical Engineering
Seismology Lab
Geology of Natural Resources I
Structural Geology Fieldwork
Principles of Paleontology
Paleontology Laboratory
Environmental Sciences Fieldwork
Isotope Geology
Principles of Atmospheric Science
Geology of Natural Resources II
Earth and Planetary Sciences
Biogeochemical Cycles
Hydrology and Geomorphology
Advanced Structural Geology
Structural Geology Laboratory
Mineralogy Laboratory
Mineralogy
Seismology
Igneous and Metamorphic Petrology
Petrology Laboratory
Geochemistry
Geochemistry Laboratory
Inverse Theory
Environmental Geosciences
GIS and Remote Sensing

BIOLOGICAL SCIENCES

Introduction to Biology I
Biology Laboratory I
Biochemistry
Biology Laboratory III
Immunology
Cell Biology
Microbiology
Biology Laboratory V
Biology Laboratory VI
Plant Biology
Physiology
Developmental Biology
Biology Laboratory IX
Neurobiology
Cognition
Epigenetics
Scientific Communication
Statistical Thermodynamics
Research Methodology
Introduction to Biology II
Biology Laboratory II
Evolutionary Biology
Molecular genetics
Biology Laboratory IV
Ecology and Conservation
Gene Regulation and Cellular Communication
Biophysics II
Biology Laboratory-VII
Biology Laboratory-VIII
Structural Biology
Biostatistics
Advanced Biochemistry and Cellular Metabolism
Cancer Biology
Bioinformatics
Biology Lab X
Marine Biology
Basic Mathematics and Computational Biology

COURSE STRUCTURE

PHYSICAL SCIENCES

Physics I
Physics Laboratory I
Physics III
Electricity and Electronics
Physics Laboratory III
Intermediate Classical Mechanics
Intermediate Quantum Mechanics
Mathematical Methods of Physics
Electronics Laboratory
Computational Physics
Introductory Astrophysics
Condensed Matter Laboratory
Nonlinear Dynamics
Advanced Mathematical Methods of Physics
Field Theory and Relativistic Quantum Mechanics
Advanced Electricity, Magnetism, and Optics
Space Astronomy
Fluid- and Magneto-hydrodynamics (FM-HD)
Quantum Field Theory II

Biological Physics
Introduction to Computer Programming
Physics II
Physics Laboratory II
Physics IV
Physics Laboratory IV
Basic Statistical Mechanics
Advanced Quantum Mechanics
Advanced Optics Laboratory
Basic Nuclear Physics - Theory and Laboratory
Advanced Experimental Physics
Advanced Statistical Mechanics
Research Methodology
High Energy Physics
General Theory of Relativity and Cosmology
Quantum Many-body Theory
Quantum Information Processing
Soft Condensed Matter Physics
Quantum Field Theory II

THE FACULTIES

The students of IISER Kolkata are mentored by some of the best faculty in the country and from abroad. In addition to their research contributions that are globally recognized by the Scientific Community, their genuine interest in promulgating science education at the undergraduate level translates to a very vibrant student-faculty relationship here at IISER Kolkata.

Dr. Anirban Banerjee
Associate Professor
Spectral graph theory
PhD: Max-Planck Institute for Mathematics (University of Leipzig)

Dr. Asok Kumar Nanda
Professor
Reliabillity, Statistics
PhD: Panjab University, Chandigarh, India

Dr. Rajib Dutta
Assistant Professor
Numerical Analysis of PDEs, Hyperbolic Conservation Laws, Nonlinear Dispersive Equations, Linear and Nonlinear Partial Differential Equations
PhD: Tata Institute of Fundamental Research, Centre for Applicable Mathematics

Dr. Satyaki Mazumder
Assistant Professor
Outlier detection in high dimensions

Dr. Shibananda Biswas
Assistant Professor
Operator theory, Multivariable operator theory
PhD: ISI Bangalore

Dr. Somnath Basu
Assistant Professor
Algebraic Topology
PhD: University of New York, Stony Brook, USA

Dr. Subrata Shyam Roy
Associate Professor
Operator Theory

Dr. Swarnendu Datta
Assistant Professor
Geometric representation theory of unipotent groups
PhD: The University of Chicago

Dr. Anirvan Chakraborty
Assistant Professor
Functional and infinite dimensional data Non-parametric and robust statistics Stochastic processes data depth
PhD: Indian Statistical Institute, Kolkata, India

Dr. Koel Das
Assistant Professor
Biological and Machine Learning, Computational Neuroscience, Visual Perception, Feature Extraction and Pattern Classification,Brain-Computer Interface
PhD: Irvine (University of California)

Dr. Ratikanta Behera
Assistant Professor
Wavelet Analysis, Wavelets in Signal Processing, Wavelets Methods for Solving Partial, Differential Equations, Tensor Computation
PhD: Indian Institute of Technology, Delhi

Dr. Saugata Bandyopadhyay
Associate Professor
Calculus of Variations, Differential Inclusions and Partial Differential Equations
PhD: Ecole Polytechnique Fédérale de Lausanne

Dr. Shirshendu Chowdhury
Assistant Professor
Linear and Nonlinear Partial Differential Equations, Fluid Mechanics, Compressible Navier-Stokes equations, Control of PDE
PhD: Tata Institute of Fundamental Research, Centre for Applicable Mathematics, Bangalore, India

Dr. Soumya Bhattacharya
Assistant Professor
Number Theory
PhD: University of Bonn, Germany

Dr. Sushil Gorai
Assistant Professor
Several complex variables
PhD: Indian Institute of Science, Bangalore

THE FACULTIES

Dr. Sourav Pal
Professor
Quantum Chemistry
PhD: IACS(Calcutta)

Dr. Arindam Mukherjee
Associate Professor
Metal complexes, magnetism, DNA cleavage, Anti-cancer agents, metalloproteins, microcalorimetry
PhD: Indian Institute of Science, Bangalore

Dr. Balaram Mukhopadhyay
Associate Professor
Synthetic Organic Chemistry (Carbohydrate), Glyco-nano-technology
PhD: IACS (Jadavpur University)

Dr. Chilla Malla Reddy
Associate Professor
Supramolecular Chemistry, Crystal Engineering
(University of Hyderabad)

Dr. Debasis Koley
Associate Professor
Computational Chemistry
PhD: Max-Planck-Institute for Coal Research, Mülheim an der Ruhr, Germany

Dr. Devarajulu Sureshkumar
Assistant Professor
Asymmetric metal and organocatalysis
PhD: Indian Institute of Science, Bangalore

Dr. Mousumi Das
Associate Professor
Computational and Theoretical Chemistry
PhD: Indian Institute of Science, Bangalore

Dr. Pradip Kumar Ghorai
Associate Professor
Computational and Theoretical Chemistry
PhD: Indian Institute of Science, Bangalore

Dr. Prasun Kumar Mandal
Associate Professor
Research Area: Single Molecule Spectroscopy
PhD: University of Hyderabad, India

Dr. Priyadarshi De
Associate Professor
Research Area: Polymer Chemistry
PhD: Indian Institute of Science, Bangalore

Dr. Amlan K Roy
Associate Professor
Theoretical Chemistry
PhD: Panjab University, Chandigarh

Dr.Ashwani Kumar Tiwari
Associate Professor
Theoretical Reaction Dynamics
PhD: Indian Institute of Technology, Kanpur

Dr. Biplab Maji
Assistant Professor
Molecular catalysis
PhD: Ludwig-Maximilians-Universität München

Dr. Debansu Chaudhuri
Associate Professor
Organic Semiconductors
PhD: Indian Institute of Science, Bangalore

Dr. Debasish Haldar
Associate Professor
SupraMolecular Bio Organic Chemistry
PhD: Indian Association for the Cultivation of Science/Jadavpur University

Dr. Dibyendu Das
Assistant Professor
Amyloid based functional soft materials, Materials for Photothermal Therapy
PhD: IACS (Jadavpur University)

Dr. Pradip Kumar Tarafdar
Assistant Professor
Synthesis of Lipids, Organic Methodology and Drug-delivery
PhD: University of Hyderabad, India

Dr. Pradipta Purkayastha
Associate Professor
Research Area:Photochemistry and Spectroscopy
PhD: Jadavpur University

Dr. Rahul Banerjee
Associate Professor
Hydrogen Storage and Carbon Dioxide Sequestration in Metal Organic Frameworks
PhD: University of Hyderabad, Hyderabad

Dr. Raja Shunmugam
Associate Professor
Polymer Chemistry
PhD: IIT Madras, Chennai

THE FACULTIES

Dr. Ratheesh K Vijayaraghavan
Assistant Professor
Study of electro chemical, optical properties, self assembling behaviour and nano fabrication of electronic devices
PhD: NIIST (CSIR)

Dr.Sayam Sen Gupta
Associate Professor
Bio-inspired Catalysis and Materials, Inorganic Reaction Mechanism
PhD: Carnegie Mellon University, Pittsburgh, USA

Dr. Soumyajit Roy
Associate Professor
Materials Science
PhD: University of Bielefeld, Germany

Dr. Suman De Sarkar
Associate Professor
Transition metal and metal free catalysis
PhD: Westfälische Wilhelms-University Muenster, Germany

Dr. Debasis Koley
Assistant Professor
Computational Chemistry
PhD: Max-Planck-Institute for Coal Research, Mülheim an der Ruhr, Germany

Dr. Venkataramanan Mahalingam
Assistant Professor
Luminescent Nanomaterials & Nanocomposites
PhD: IIT Madras

Dr. Sanjio S. Zade
Associate Professor
Organic Electronics Materials
PhD: IIT Bombay

Dr. Sayan Bhattacharyya
Associate Professor
Materials Chemistry, Nanotechnology
PhD: Indian Institute of Technology, Kanpur

Dr. Subhajit Bandyopadhyay
Associate Professor
Photochromic materials; biomimetic chemistry
PhD: University of Victoria, British Columbia, Canada

Dr. Sumit Khanra
Associate Professor
Organometallic Chemistry
PhD: Max-Planck Institute for Bioinorganic Chemistry, Germany

Dr. Supratim Banerjee
Assistant Professor
Supramolecular polymers in aqueous media using host-guest chemistry
PhD: Indian Institute of Science, Bangalore

Dr. Swadhin Mandal
Assistant Professor
Organometallic Catalytic Transformations, Nanomaterials
PhD: Indian Institute of Science, Bangalore

THE FACULTIES

Dr. Devapriya Chattopadhyay
Associate Professor
Invertebrate Paleontology
PhD: University of Michigan

Dr. Gopala Krishna Darbha
Assistant Professor
Environmental Hydrogeochemistry
PhD: Jackson State University, USA

Dr. Manoj Kumar Jaiswal
Associate Professor
Geomorphology, Quaternary Geochronology, Palaeoseismics and palaeoclimatic studies
PhD: M.S. University of Baroda, Vadodara

Dr. Sayantan Sarkar
Assistant Professor
Aerosol chemical characterization, transport and source apportionment;
PhD: Jawaharlal Nehru University

Dr. Sujata Ray
Associate Professor
Environmental Science and Engineering
PhD: Princeton University, USA

Dr. Tapabrato Sarkar
Assistant Professor
Metamorphic and igneous petrology
PhD: University of Kiel, 2. Kiel, Germany

Dr. Kajaljyoti Borah
Assistant Professor
Shallow crustal structure and High resolution tomographic image using Ambient Noise
PhD: ISM Dhanbad

Dr. Kathakali Bhattacharyya
Associate Professor
Structural Geology
PhD: University of Rochester, USA

Dr. Prasanta Sanyal
Professor
Paleoclimatology,Paleomonsoon, Paleoecology, River Response to Climate
PhD: Physical Research Laboratory (University of Baroda)

Dr. Supriyo Mitra
Professor
Seismology, Continental Tectonics
PhD: University of Cambridge

Dr. Swastika Chatterjee
Assistant Professor
Computational Mineral Physics
PhD: S.N.Bose National Centre for Basic Sciences

THE FACULTIES

Dr. Amit Ghosal
Associate Professor
Theoretical Condensed Matter Physics
PhD: Tata Institute of Fundamental Research, Mumbai

Dr. Ananda Dasgupta
Associate Professor
Quantum Phenomena
PhD: Jadavpur University

Dr. Ayan Banerjee
Associate Professor
Precision Optical Spectroscopy; Optical micromanipulation
PhD: IISc, Bangalore

Dr. Bipul Pal
Assistant Professor
Ultrafast Optical Spectroscopy and Semiconductor Nano-structure
PhD: Tata Institute of Fundamental Research, Mumbai

Dr. Dhananjay Nandi
Associate Professor
Laser-Electron-Molecule collisions, Photoelectron/Photoion Imaging Spectroscopy
PhD: Tata Institute of Fundamental Research, Mumbai

Dr. Golam Mortuza Hossain
Associate Professor
Gravitation & Cosmology (Classical and Quantum)
PhD: IMSc, Chennai

Dr. Kamaraju Natarajan
Associate Professor
Ultrafast dynamics and nonlinear optics of condensed matter in UV, VIS, IR and THz regime
PhD: Indian Institute of Science, Bangalore

Dr. Nirmalya Ghosh
Associate Professor
Optics & Spectroscopy, Biophotonics
PhD: Raja Ramanna Centre for Advanced Technology

Dr. Prasanta K. Panigrahi
Professor
Quantum Computation and Quantum Information, Bose-Einstein Condensates, Cold Fermions, Nonlinear Dynamics, Field Theory and Wavelet Transform
PhD: University of Rochester, New York, USA

Dr. Anandamohan Ghosh
Associate Professor
Non-linear dynamics; mathematical and theoretical biology
PhD: National Chemical Laboratory, Pune

Dr. Arindam Kundagrami
Associate Professor
Theoretical Soft Condensed Matter Physics
PhD: University of Pennsylvania, USA

Dr. Bhavtosh Bansal
Associate Professor
Condensed Matter Physics (Experimental)
PhD: Indian Institute of Science, Bangalore

Dr. Chiranjib Mitra
Associate Professor
Quantum Information Processing, Quantum Magnetism, Strongly Correlated Electron Systems and Magnetooptics
PhD: Tata Institute of Fundamental Research, Mumbai

Dr. Dibyendu Nandi
Associate Professor
Astrophysical Magnetohydrodynamics, Sun-Earth-System Science, Space Science
PhD: Indian Institute of Science, Bangalore

Dr. Goutam Dev Mukherjee
Associate Professor
Experimental Condensed Matter Physics
PhD: University of Hyderabad

Dr. Narayan Banerjee
Professor
Gravitation & Cosmology
PhD: Jadavpur University

Dr. Partha Mitra
Assistant Professor
Magnetism in mesoscopic systems and spintronics application
PhD: University of Florida

Dr. Rajesh Kumble Nayak
Associate Professor
General Theory of Relativity, Relativistic Astrophysics and Cosmology
PhD: Indian Institute of Astrophysics, Bangalore

Dr. Rangeet Bhattacharyya
Associate Professor
Non-equilibrium Quantum Dynamics; Open Quantum Systems; NMR
PhD: Indian Institute of Science, Bangalore

THE FACULTIES

Dr. Rumi De
Assistant Professor
Theoretical Biological Physics; Soft Condensed Matter; Nonlinear Dynamics
PhD: Indian Institute of Science, Bangalore

Dr. Satyabrata Raj
Associate Professor
Condensed Matter Physics (Experimental)
PhD: Institute of Physics, Bhubaneswar

Dr. Soumitro Banerjee
Professor
Nonlinear Dynamics
PhD: IIT Delhi

Dr. Subhasis Sinha
Associate Professor
Condensed Matter Physics (Theory)
PhD: Institute of Mathematical Sciences

Dr. Siddhartha Lal
Associate Professor
Low-dimensional quantum condensed matter
PhD: Indian Institute of Science, Bangalore

Dr. Arindam Kundagrami
Associate Professor
Theoretical Soft Condensed Matter Physics
PhD: University of Pennsylvania, USA

Dr. Sourin Das
Associate Professor
Mesoscopic physics
PhD: Harish-Chandra Research Institute

Dr. Supratim Sengupta
Associate Professor
Complex Systems, Biophysics, Computational Biology & Bioinformatics
PhD: Institute of Physics, Bhubaneswar

THE FACULTIES

Dr. Amirul Islam Mallick
Assistant Professor
Host-pathogen interaction Nonlinear Dynamics
PhD: Aligarh Muslim University

Dr. Annagiri Sumana
Associate Professor
Behaviour and Ecology
PhD: Evolution Ecology Animal Behaviour

Dr. Arnab Gupta
Assistant Professor
Cell biology, membrane trafficking, eukaryotic copper metabolism
PhD: Indian Institute of Chemical Biology

Dr. Bidisha Sinha
Assistant Professor
Biophysics
PhD: National Centre for Biological Science

Dr. Malancha Ta
Assistant Professor
Molecular characterization and differentiation of mesenchymal stem cells isolated from human umbilical cord/bone marrow/adipose tissue
PhD: National Institute of Immunology

Dr. Neelanjana Sengupta
Associate Professor
Theoretical and Computational Biophysics
PhD: University of California, Irvine

Dr. Rituparna Sinha Roy
Associate Professor
Peptide based therapeutics, cancer nanomedicine
PhD: IISc Bangalore

Dr. Robert John Chandran
Assistant Professor
Ecology
PhD: IISc Bangalore

Dr. Rupak Datta
Associate Professor
Biology of Diseases
PhD: Indian Institute of Chemical Biology

Dr. Supratim Datta
Associate Professor
Biochemical Engineering and Bioenergy
PhD: Boston University, Boston

Dr. Anindita Bhadra
Assistant Professor
Animal Behaviour, Evolution, Ecology
PhD: Indian Institute of Science, Bangalore

Dr. Anuradha Bhat
Assistant Professor
Community Ecology, Biodiversity and Conservation, zebrafish behavioural ecology
PhD: Indian Institute of Science

Dr. Babu Sudhamalla
Associate Professor
Epigenetics and Bioinformatics
PhD: University of Hyderabad

Dr. Jayasri Das Sarma
Professor
Neural Cell Biology, Neuro Science
PhD: Indian Statistical Institute

Dr. Mohit Prasad
Associate Professor
Cell and Developmental Biology
PhD: CCMB (JNU), Delhi

Dr. Partha Pratim Datta
Assistant Professor
Structural & Molecular Biology
PhD: Indian Institute of Chemical Biology

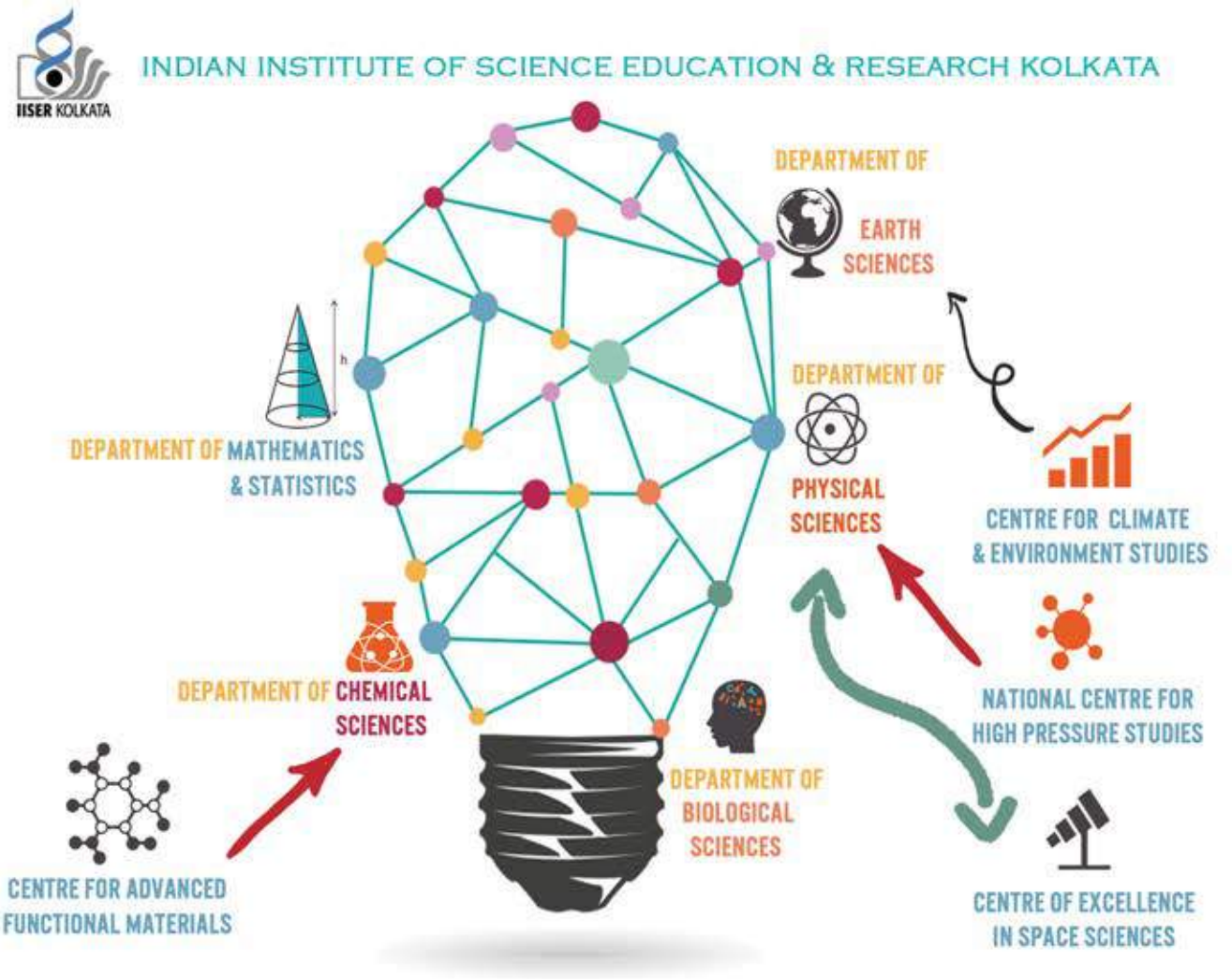
Dr. Partho Sarothi Ray
Assistant Professor
Molecular Biology, Translational Control, RNA-Protein Interaction
PhD: Indian Institute of Science, Bangalore

Dr. Punyasloke Bhadury
Associate Professor
Marine Microbiology, Climate Change and Ocean Acidification, Microbial Ecology
PhD: Plymouth Marine Laboratory (University of Plymouth)

Dr. Rahul Das
Assistant Professor
Mechanism of signal transduction across the plasma membrane
PhD: McMaster University, Ontario, Canada

Dr. Sankar Maiti
Assistant Professor
Actin Cytoskeleton
PhD: IMTECH, Chandigarh (Punjab University)

State-of-the-art Facilities



In the current scenario, science has become a very competitive field. Raw intelligence is often not enough for carrying out cutting edge scientific work. especially where experiments are involved. It has to be aided with the entire front running technological supplements that are available. IISER Kolkata boasts this fact and has furnished all its labs with state -of-the-art equipments and facilities. These facilities are not only availaible for faculties and research scholars but also for interested undergraduate students. A small subset is listed below:

CHN Analyzer

Digital Polarimeter (Rudolph)

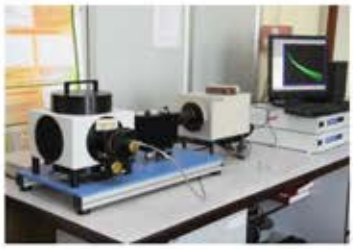
Electron paramagnetic resonance spectrometer (EPR)

State-of-the-art Facilities

Matrix-Assisted Laser Desorption Ionization (MALDI)

Differential scanning calorimeter(DSC)

FESEM



Fluorescence-lifetime imaging microscopy (FLIM)

Fluorescence spectrometer

Gel Permeation Chromatograph GPC (Waters)

High Performance Liquid Chromatograh, HPLC (Waters)

LC-MS (Waters)

Micro-calorimeter (GE)

NMR Spectrometer

Rheometer

Single crystal X-ray diffractometer

Powder X-ray diffraction

Single crystal X-ray diffractometer(SXRD)

CENTER FOR CAREER DEVELOPMENT

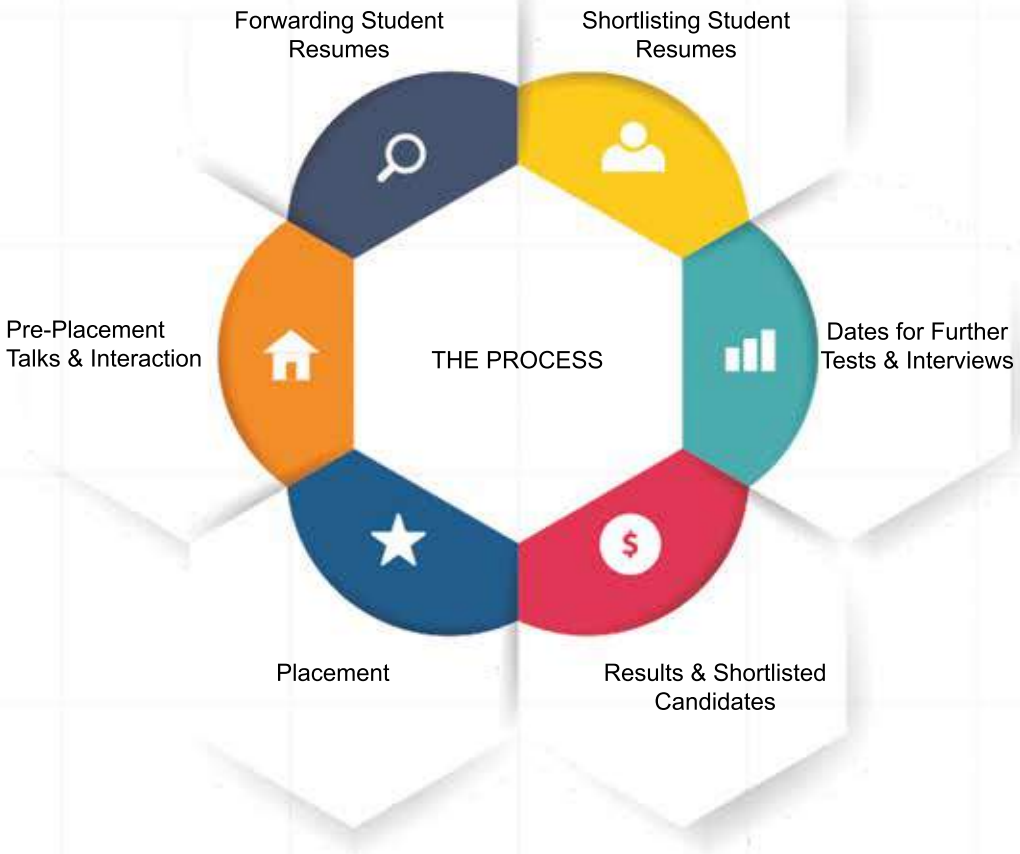
The Center for Career Development (CCD) is committed to assisting IISER Kolkata students with career planning, career exploration, graduate school advising, job search strategies and in-campus interviews for full-time employment, internships and related opportunities.

The Center for Career Development (CCD) aims to provide full-time job and internship in-campus interviewing opportunities to Masters students seeking employment in industries (private/public).

CENTER FOR CAREER DEVELOPMENT
IISER KOLKATA

Along with recruitment (full-time/internship) opportunities, the CCD aims for the holistic development of the students to shape their careers and contribute to their respective fields.

CCD works to guide and mentor students preparing for subsequent academic programmes in judiciously navigating through the entire spectrum of opportunities and careers they can embark on and contribute to, after the transformation brought in them by IISER Kolkata.



International Collaborators

The following MoUs are in active operation:

Sl No.	Name of the Institute	Country
01.	Institute Environmental Research of the Faculty of Chemistry	Germany
02.	Max Planck Gesellschaft (MPG)	Germany
03.	Max Planck-Institute fur Kernphysik, Heidelberg	Germany
04.	Lund University	Sweden
05.	Institute of Molecular Science (IMS) – Indo Japan Collaborative Research Projects in Molecular Science	Japan
06.	National Institute of Biomedical Genomics (NIBMG), Kalyani, West Bengal	India
07.	Changshu Institute of Technology	China

Recently MoU(s) have been signed between all the IISERs and The Ecoles Normales Superieures, ENS (France) in Cachan, Lyon, Paris, Rennes for Academic and Research Cooperation. MoU is in the process of being operational between IISER Kolkata & Bose Institute for scientific interaction at multiple levels. Initiatives are being taken for establishing MoUs between IISER Kolkata, University of Central Florida (UCF), Technische Universitat Dortmund and other reputed universities.

Apart from generous funding from DST, CSIR, DBT and Ministry of Earth Sciences:

The Max Planck Society, Germany
Swedish International Collaborative Scheme
Alexander Von Humbholdt Foundation
Ernst Mach Research Grant
CIMMYT: The International Maize and Wheat Improvement Programme
Mathematical Sciences Research Institute - Berkeley
Natural Sciences and Engineering Research Council of Canada
University of Hong-Kong
Geological Survey of China
DBT - Welcome Trust India Alliance
Defence Research and Development Organization
WWF India

Why Choose us?

The advanced interdisciplinary curriculum, imparts a creative yet analytical aproach in students, the research exposure through voluntary summer projects and compulsory semester projects make each student an excellent problem solver, with a host of standard, crossover and unconventional techniques in the repertioire.

Our teaching lab is modeled on research labs. Our students start developing the skill and experience in operating state of-the-art equipment from the very first year of the undergraduate education.

Numerous courses starting from proficiency in Unix operating system, delving in to the programming languages Python, Fortran, Java, Perl, and Matlab etc. as per their respective requirements.

Students are encouraged to participate in eight to twelve weeks of summer internship in national/international industries/research labs outside their parent institutes every year. Students also gain experience by visiting various research labs as part of summer and winter schools in different institutes. Some of the learning centers where our students have represented are listed below:

Statoil, ncbs, University of Cambridge, Shell, asianpaints, Princeton University, tifr, Georg-August-Universität Göttingen, Nanyang Technological University

IISER Kolkata At A Glance

ALUMINI REACH

IISER KOLKATA

Syngene

Reliance Industries Limited

BASF
We create chemistry

HARVARD MEDICAL SCHOOL

C-CAMP
Centre for Cellular and Molecular Platforms

WW-P
Education Foundation

OmiX Labs
We make healthcare different

INVICTUS ONCOLOGY

navamcapital

drishtICONe

SPECTRAL INSIGHTS

TCG Lifesciences | CHEMBIOTEK

REACH US

Placement Officer
Email: placement@iiserkol.ac.in
Indian Institute of Science Education Research Kolkata
Placement Office,
Mohanpur, Nadia - 741 246,
West Bengal, India