

Department of Pharmaceutical Technology

E
S
T.
1963



Approval



Pharmaceutical
Technology



Pharmacy Council of India



All India Council for Technical Education



Programmes Offered



Pharmaceutical
Technology

- **Bachelor of Pharmacy: 70**
- **Master of Pharmacy: 33**
- **Doctor of Philosophy in Pharmacy**

Department Portfolio: Faculty



Designation	Number
Professor	13
Associate Professor	03
Assistant Professor	05
Total	21



Department Portfolio: Faculty

Dr. Kunal Roy

Ph. D (Pharmacy)

Professor & HOD

Experience (Year): 26

Specialization: **Pharmaceutical Chemistry**

Research area: **QSAR & Molecular Modeling**

Scopus h-index: 43



Dr. Tarun Jha

Ph. D (Pharmacy)

Professor

Experience (Year): 35

Specialization: **Pharmaceutical Chemistry**

Research area: **Anticancer Drug Design & Discovery**

Scopus h-index: 25



Dr. Lakshmi Kanta Ghosh

Ph. D (Pharmacy)

Professor

Experience (Year): 29

Specialization: **Pharmaceutics**

Research area: **Novel Drug Delivery Systems**

Scopus h-index: 13



Dr. Tanmoy Bera

Ph. D (Pharmacy)

Professor

Experience (Year): 29

Specialization: **Biochemistry**

Research area: **Nanomedicines**

Scopus h-index: 14



Dr. Tapan Kumar Maity

Ph. D (Pharmacy)

Professor

Experience (Year): 29

Specialization: **Pharmaceutical Chemistry**

Research area: **Synthetic & Natural Product Research**

Scopus h-index: 14



Dr. Biswajit Mukherjee

Ph. D (Pharmacy)

Professor

Experience (Year): 24

Specialization: **Pharmaceutics**

Research area: **Drug Targeting & Antisense therapeutics**

Scopus h-index: 23



Department Portfolio: Faculty



Pharmaceutical
Technology

Dr. Jasmina Khanam

Ph. D (Pharmacy)

Professor

Experience (Year): **30**

Specialization: **Pharmaceutical Engineering**

Research area: **Dosage Form Design**

Scopus h-index: **16**



Dr. Subhash C. Mandal

Ph. D (Pharmacy)

Professor

Experience (Year): **24**

Specialization: **Pharmacognosy**

Research area: **Traditional Medicine & Drug Discovery**

Scopus h-index: **37**



Dr. Pulok Kumar Mukherjee

Ph. D (Pharmacy)

Professor (**On lien**)

Experience (Year): **26**

Specialization: **Pharmaceutical Chemistry**

Research area: **Natural Product Studies**

Scopus h-index: **47**



Dr. Sanmoy Karmakar

Ph. D (Pharmacy)

Professor

Experience (Year): **22**

Specialization: **Pharmacology**

Research area: **Cardiovascular & Toxicology**

Scopus h-index: **14**



Dr. Amalesh Samanta

Ph. D (Pharmacy)

Professor

Experience (Year): **31**

Specialization: **Pharmaceutical Microbiology**

Research area: **Drug Delivery & Tissue Engineering**

Scopus h-index: **15**



Dr. Pallab Kanti Haldar

Ph. D (Pharmacy)

Professor

Experience (Year): **20**

Specialization: **Pharmacology**

Research area: **Phytotherapy and Pharmacology**

Scopus h-index: **20**



Cont.....

Department Portfolio: Faculty



Pharmaceutical
Technology

Dr. Saikat Dewanjee

Ph. D (Pharmacy)

Associate Professor

Experience (Year): 14

Specialization: **Pharmacognosy**

Research area: **Discovery of lead & Toxicity**

Scopus h-index: 24



Dr. Tapan Kumar Giri

Ph. D (Pharmacy)

Associate Professor

Experience (Year): 20

Specialization: **Pharmaceutics**

Research area: **Novel Drug Delivery Systems**

Scopus h-index: 18



Dr. Probir Kumar Ojha

Ph. D (Pharmacy)

Associate Professor

Experience (Year): 10

Specialization: **Pharmaceutical Chemistry**

Research area: **QSAR & Molecular Modeling**

Scopus h-index: 17



Dr. Ketousetuo Kuotsu

Ph. D (Pharmacy)

Assistant Professor

Experience (Year): 13

Specialization: **Pharmaceutics**

Research area: **Novel Drug Delivery Systems**

Scopus h-index: 9



Dr. Shovanlal Gayen

Ph. D (Pharmacy)

Assistant Professor

Experience (Year): 11

Specialization: **Pharmaceutical Chemistry**

Research area: **Drug Design and Discovery**

Scopus h-index: 22



Dr. Kajal Ghosal

Ph. D (Pharmacy)

Assistant Professor

Experience (Year): 15

Specialization: **Pharmaceutical Engineering**

Research area: **Novel Drug Delivery Systems**

Scopus h-index: 11



Cont.....

Department Portfolio: Faculty



Pharmaceutical
Technology

Dr. Manas Bhowmik

Ph. D (Pharmacy)

Assistant Professor

Experience (Year): **11**

Specialization: **Pharmaceutics**

Research area: **Formulation Development**

Scopus h-index: **14**



Dr. Nilanjan Adhikari

Ph. D (Pharmacy)

Assistant Professor

Experience (Year): **12**

Specialization: **Pharmaceutical Chemistry**

Research area: **QSAR & Molecular Modeling**

Scopus h-index: **20**



Mr. Kaushik Mukherjee

M. Pharm.

Assistant Professor

Experience (Year): **5**

Specialization: **Pharmaceutics**

Research area: **Novel Drug Delivery Systems**

Scopus h-index: **2**



Associated Centers



Pharmaceutical
Technology

- AICTE QIP (Pharmacy) Center
- Bioequivalence Study Center
- Dr. V Ravichandran Center for Advanced Research in Pharmaceutical
Sciences

AICTE QIP (Pharmacy) Center



Pharmaceutical
Technology

Department of Pharmaceutical Technology, Jadavpur University is one of the AICTE QIP (Pharmacy) Centers

Programmes offered: PhD (QIP) & Short Term Courses for Teachers

Co-ordinator: HoD, Pharm. Tech., JU

Student - Teacher Ratio



Programme	Number of Students	Number of Teachers	Ratio
Bachelor of Pharmacy	280	21	14:1
Master of Pharmacy	60	20	3:1

Area of Major Research

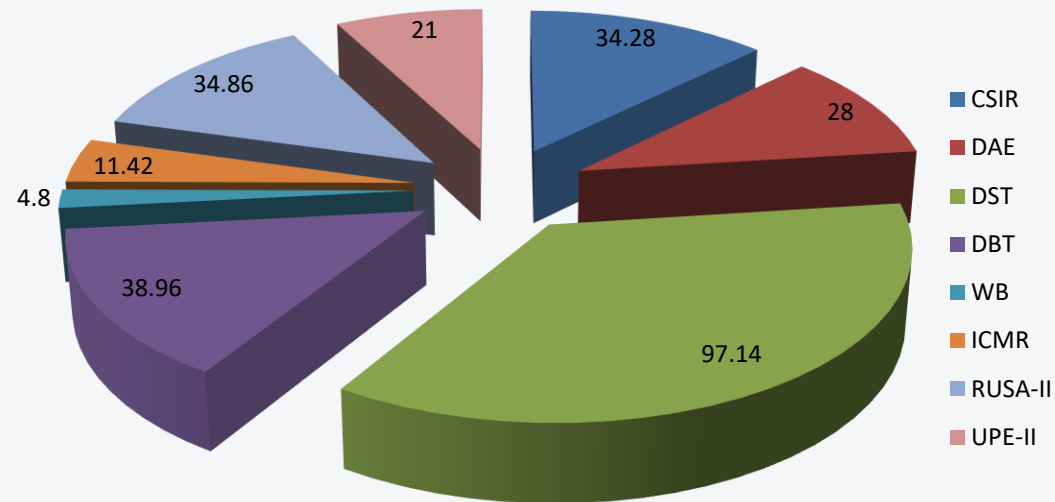


QSAR and Molecular Modeling	Novel Formulation Development
Chemo-informatics	Nanomedicines & Nanotechnology
Drug Design & Discovery	Gel Delivery
Ecotoxicological Modeling	Crystal Engineering
Tissue culture & Tissue Engineering	Natural Products & Bioanalysis
Anticancer & Antileishmanial Drug Development	Solubility & Bioavailability enhancement
Traditional Medicine & Drug Discovery	Network Pharmacology
Molecular Pharmacology & Toxicology	Bioequivalence Studies

Research Projects: Completed (2016-2020)



No. of Projects	Sanctioned amount (Lakh)
15	270.46



Funding agency wise sanctioned amount (Lakh)

Research Projects: Completed (2016-2020)



Pharmaceutical
Technology

Name of the PI	Title of the project	Duration (months)	Sanctioned amount (lakh)	Funding Agency	Year
Prof. K. Roy	In silico modeling of property toxicity activity of nanomaterials using chemometric tools	36	7	CSIR	2017-2020
Prof. K. Roy	Application of QSARs for the design of PET and SPECT imaging agents	36	28	DAE BRNS	2018-2020
Dr. S. Dewanjee	Strategies for dereplication of novel anti-diabetic leads from <i>Myrica esculanta</i> Myricaceae A Sikkim himalayan medicinal plant	36	27.28	CSIR	2017-2020
Prof. T. K. Maity	Design Microwave assisted synthesis Molecular Docking and Evaluation of Anticancer and Antibacterial Activity of Hybrid Thiadiazole Derivatives	12	9.8	RUSA-II	2019-2020

Cont.....

Research Projects: Completed (2016-2020)



Pharmaceutical
Technology

Name of the PI	Title of the project	Duration (months)	Sanctioned amount (lakh)	Funding Agency	Year
Prof. T. K. Maity	Synthesis Characterization and Evaluation of Anticancer Activity of Some Novel Pyrimidine Derivatives	36	8.73	UPE-II	2016-2019
Prof. A. Samanta	Natural Products and Drug Delivery	36	8.73	UPE-II	2016-2019
Prof. A. Samanta	Desining of Campecitabine Loaded Gum Odina-Alginate Based Microsphere for Colon Cancer Management	12	5.32	RUSA-II	2019-2020

Cont.....

Research Projects: Completed (2016-2020)



Pharmaceutical
Technology

Name of the PI	Title of the project	Duration (months)	Sanctioned amount (lakh)	Funding Agency	Year
Prof. B. Mukherjee	Nanoparticle based apigenin delivery intended to control hepatocellular carcinoma	60	14.34	DST	2013-2018
Prof. B. Mukherjee	Development of Paclitaxel loaded PLGA nanoparticles directed against liver cancer	36	3.54	UPE-II	2013-2016
Prof. B. Mukherjee	Targeted delivery of Doxorubicin to Breast cancer cells by using Antibody conjugated nanoparticles as Drug carrier	60	11.424	ICMR	2013-2018
Prof. B. Mukherjee	Development of Apigenin loaded nanoliposomes	24	4.8	Govt. of West Bengal	2016-2018

Cont.....

Research Projects: Completed

(2016-2020)



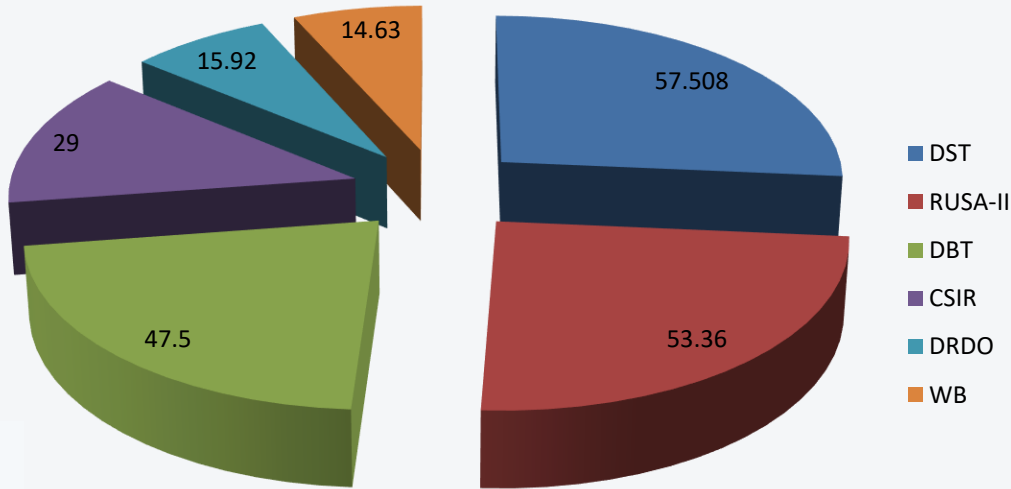
Pharmaceutical
Technology

Name of the PI	Title of the project	Duration (months)	Sanctioned amount (lakh)	Funding Agency	Year
Prof. B. Mukherjee	Design and development of Galactosamine conjugated biodegradable nanoparticles containing Paclitaxel for specific distribution of drugs in the hepatocellular carcinoma	24	70.8	DST PURSE II	2016-2018
Dr. K. Kuotsu	Design, Development and Characterization of Colon Targeted Oral Anticancer Drug Delivery System, Modulation with Poly-l-lysine	9	19.74	RUSA-II	2019-2020
Prof. P. K. Halder	Induction of Apoptosis: Target for Cancer treatment from natural sources.	36	12	DST SERB	2013-2016
Prof. S. C. Mandal	Chemical Profiling of Joha and Black rice of NER for Nutritional, Nutraceutical Parameters and Aromatic Compounds	36	38.96	DBT	2016-2019

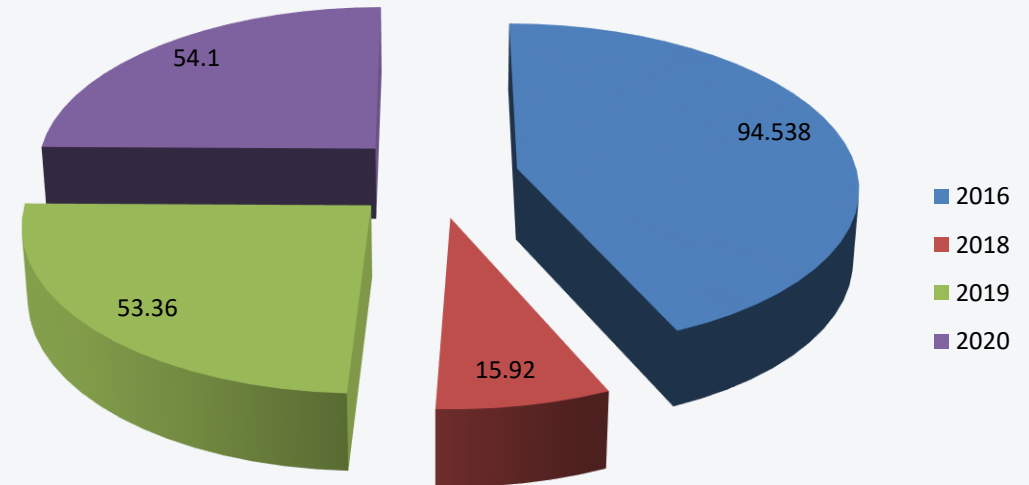
Research Projects: Ongoing (2016-2020)



No. of Projects	Sanctioned amount (Lakh)
11	217.918



Funding agency wise sanctioned amount (Lakh)



Year wise sanctioned amount (Lakh)

Research Projects: Ongoing (2016-2020)



Pharmaceutical
Technology

Name of the PI	Title of the project	Duration (months)	Sanctioned amount (lakh)	Funding Agency	Year
Prof. K. Roy	Development of a novel workflow of Quantitative Read-Across QRA analysis for application as a non testing method in regulatory toxicology	36	6.6	DST SERB	2020-2022
Dr. Souvik Dey (Ramalingaswamy Fellow)	Regulatory roles of Glycogen synthase kinase and calcineurin in mammalian sperm physiology: development of potential male contraceptives	60	40	DBT	2020-2025
Prof. T. Jha	Design and experimental validation of some derivatives and analogs of isoglutamine as dual inhibitors of matrix metalloproteinase MMP and histone deacetylase HDAC by synthesis and biological evaluation to get some useful anticancer agents	12	9.92	RUSA-II	2019-2020

Cont.....

Research Projects: Ongoing (2016-2020)



Pharmaceutical
Technology

Name of the PI	Title of the project	Duration (months)	Sanctioned amount (lakh)	Funding Agency	Year
Prof. A. Samanta	Fabrication and Characterization of Natural Polysaccharide Based Bioerodible Localized Spongy Scaffold A New Advanced Wound Care Tool	36	15.92	DRDO-LSRB	2018-2021
Prof. P. K. Haldar	Studies on anti-SARS-CoV-2 activity of selected medicinal plants and formulations in cell culture model of virus	36	7.5	DBT-Ayush	2020-2023
Prof. P. K. Haldar	Zebrafish: Model for drug development	36	18.56	RUSA -II	2019-2022
Prof. P. K. Haldar	<i>In vitro</i> and <i>in vivo</i> screening of phytoconstituent against streptozotocin induced metabolic disorder	36	14.63	DST-West Bengal	2016-2021

Cont.....

Research Projects: Ongoing (2016-2020)



Pharmaceutical
Technology

Name of the PI	Title of the project	Duration (months)	Sanctioned amount (lakh)	Funding Agency	Year
Prof. P. K. Halдар	Strategies for dereplication of novel antidiabetic leads from <i>Myrica esculenta</i> (Myricaceae): A Sikkim Himalayan Medicinal Plant	36	29	CSIR	2016-2021
Prof. S. Karmakar	Micro Organic decomposer in Biotoilet A sustainable development initiative in Indian Scenario	12	17	RUSA-II	2019-2022
Prof. S. Karmakar	Investigating combinations of Indian Medicinal Plant Isolates for Human Histamine Receptor Type-I Suppression - With a focus on Management of allergy	12	7.88	RUSA-II	2019-2020
Prof. S. Karmakar	Medicinal Plants of Cucurbitaceae family – Metabolomic study and Therapeutic Evaluation	36	50.908	DST-SERB	2016-2021

Research Collaboration (International)



Pharmaceutical
Technology



Cont.....

Research Collaboration (International)



Pharmaceutical
Technology



UNIVERSITÀ DEGLI STUDI
DI SALERNO



UNIVERSITEIT VAN PRETORIA
UNIVERSITY OF PRETORIA
YUNIBESITHI YA PRETORIA

iMed.
ULisboa



UNIVERSITI
TEKNOLOGI
MARA | Hospital
UiTM



Cont.....

Research Collaboration (National)



Pharmaceutical
Technology



Infrastructure: Major Instruments



Name of the Instrument	Qnt.	Name of the Instrument	Qnt.
Auto Dissolution Apparatus	8	Gel Doc Bio-Rad	1
Auto analyzer	1	Gel Doc Apparatus	1
Binocular Microscope	1	Gene Sequencer	1
Bio-Rad Gel Electrophoresis	1	HPLC	6
CO2 INCUBATOR	1	ITBS100 Integrated Tissue Bath System & ECG	1
Cold Centrifuge	4	LCMS-MS	3
FTIR	1	LCMSMSQTOF	1
Flow cytometer	1	Low pressure liquid chromatography for proteins	1

Infrastructure: Major Instruments

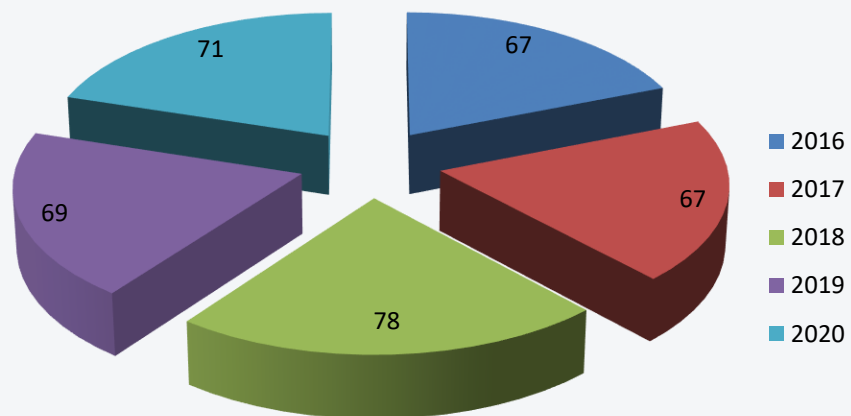


Name of the Instrument	Qnt.	Name of the Instrument	Qnt.
Lyophilizer	1	Porosity testers	1
Micro ultracentrifuge CS150FNX	1	Real Time PCR System	1
Micro-Synthesis Station	1	Rotary Vacuum Evaporator	3
MULTISCAN GO Thermo Fisher	1	Shaking BOD Incubator	4
Olympus Fluorescence Microscope (Inverted & Upright)	1	UV Spectrophotometer	6
		Vacuum Dryer	1
Phase Contrast microscope	1	Zetasizer	1

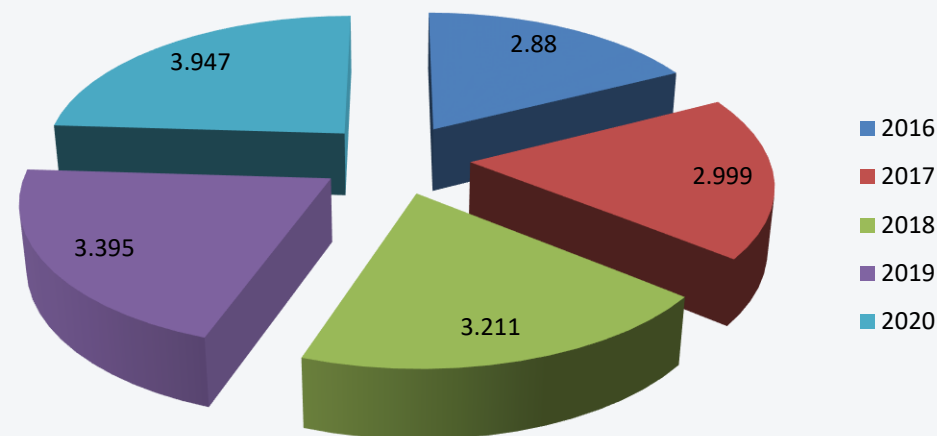
Publication: Research Journal (2016-2020)



No. of Publications	Average Impact Factor
352	3.286

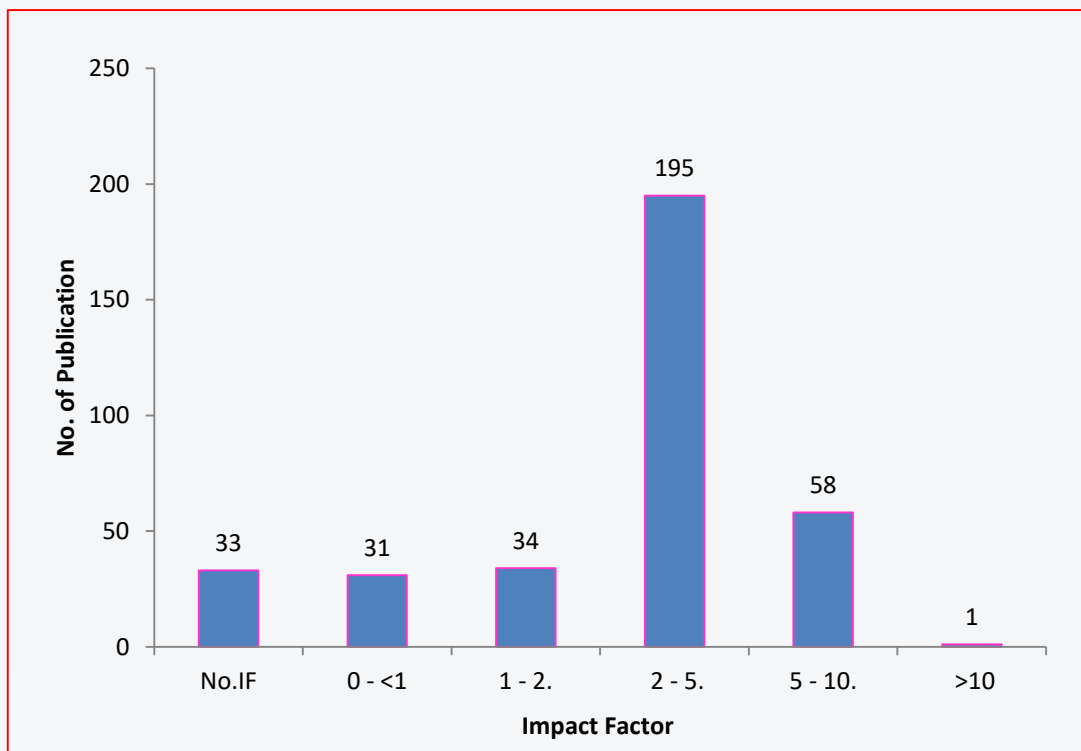


Year wise publication

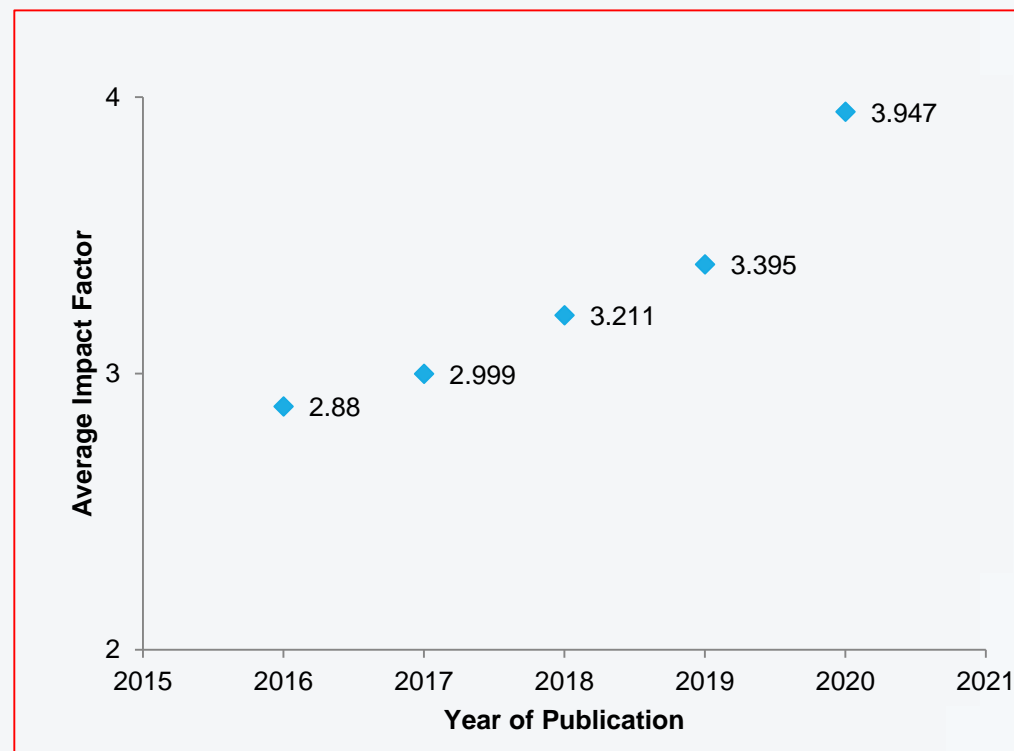


Year wise average impact factor

Publication: Research Journal (2016-2020)

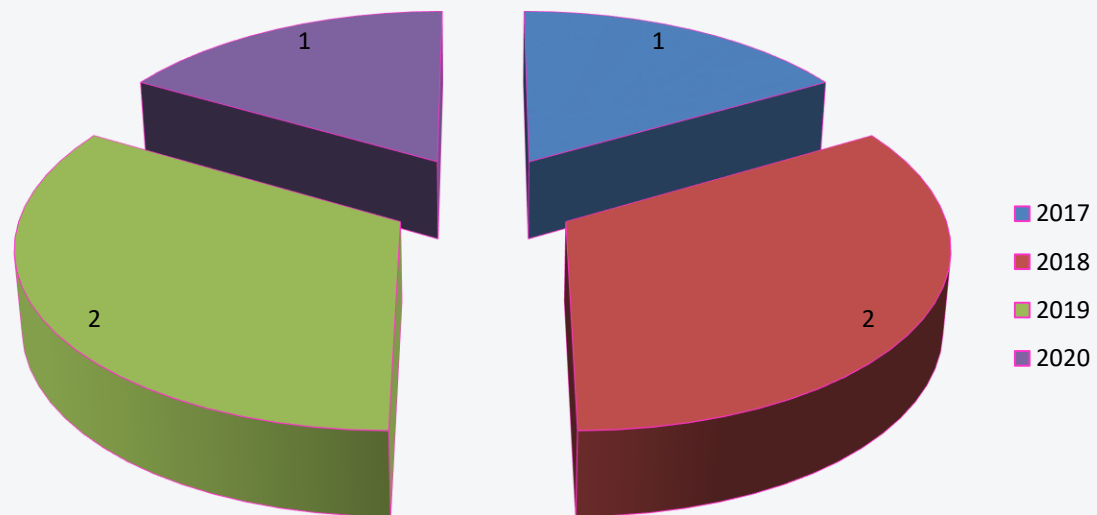


No. of publication based on impact factor classification



Year wise average impact factor

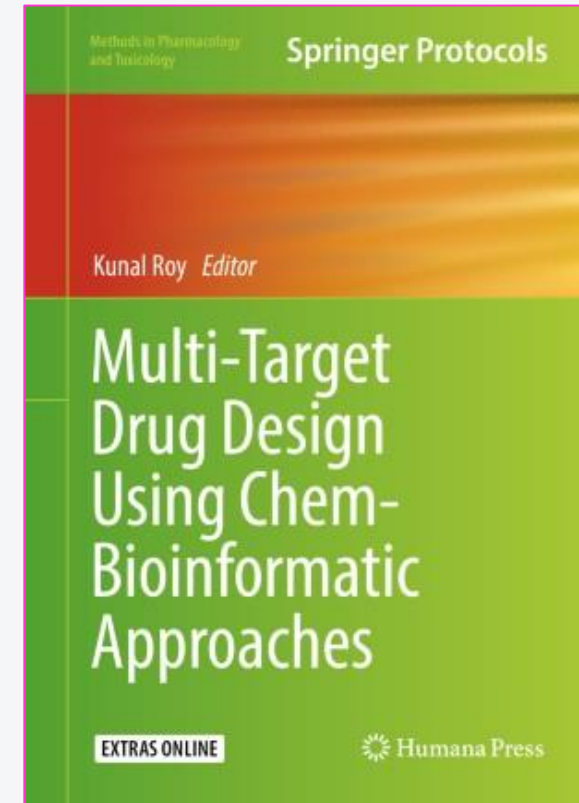
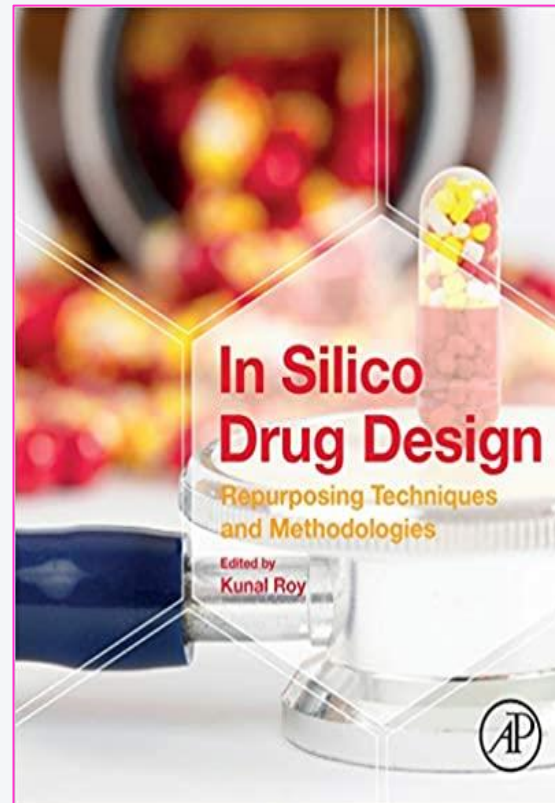
Publication: Edited Book (6 nos.) (2016-2020)



Publication: Edited Book (6 nos.) (2016-2020)



Pharmaceutical
Technology

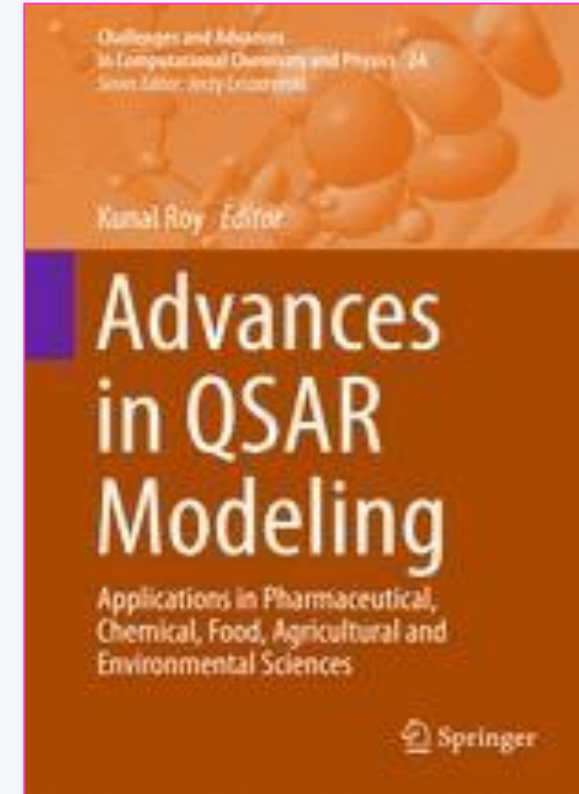
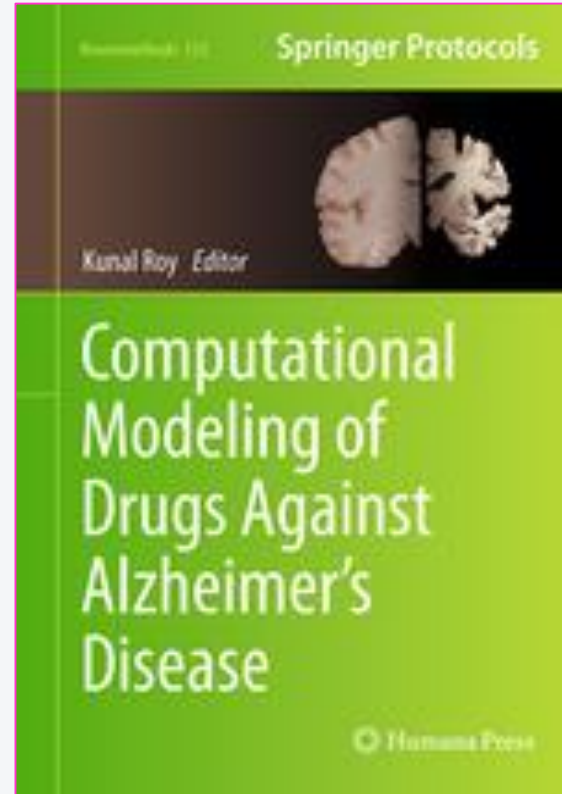
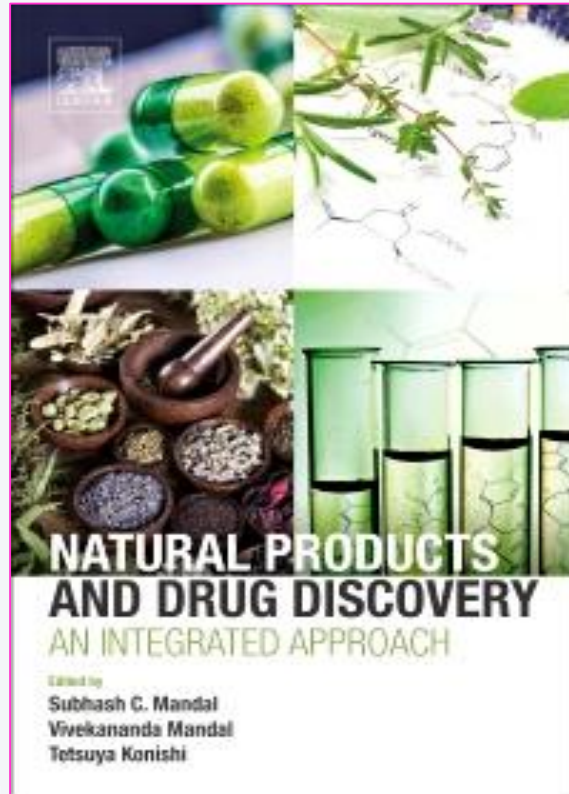


Cont.....

Publication: Edited Book (6 nos.) (2016-2020)



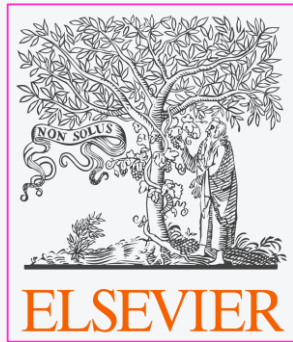
Pharmaceutical
Technology



Publication: Book Chapter (60 nos.) (2016-2020)



Pharmaceutical
Technology



15



27



1



5



5

Cont.....

Publication: Book Chapter (60 nos.) (2016-2020)



Pharmaceutical
Technology



2



1



1



2



1

Award/Fellowship Received by Teachers (2016-2020)



Name of the teacher	Name of the Award	Year of Award	Awarding Agency
Prof. Kunal Roy	Professor R. D. Desai 80th Birthday Commemoration Medal & Prize (2017)	2018	Indian Chemical Society
Prof. Biswajit Mukherjee	<i>ASEM-DUO Fellowship Programme</i>	2019	Govt. of Belgium
Prof. Biswajit Mukherjee	Prof. C. J. Shishoo award for Research in Pharmaceutical Sciences	2016	Association of Pharmaceutical Teachers of India

Award/Fellowship Received by Teachers (2016-2020)



Pharmaceutical
Technology

Name of the teacher	Name of the Award	Year of Award	Awarding Agency
Prof. Subhash C. Mandal	Siksha Ratna award	2020	Government of West Bengal
Prof. Subhash C. Mandal	Eminent Teacher Award	2019	Society of Pharmaceutical Education and Research
Prof. Subhash C. Mandal	Motan Devi Dandiya Prize	2019	Professor Prem Chand Dandiya Endowment Trust
Prof. Subhash C. Mandal	Prof. P. C. Datta Memorial Award	2017	Botanical Society of Bengal

Honors and Recognitions Received by Teachers (2016-2020)



Pharmaceutical
Technology

Name of the teacher	Honors or recognitions	Name of the recognized bodies
Prof. Kunal Roy	Editor-in-Chief	Molecular Diversity (Springer Nature)
Prof. Kunal Roy	Top 2% Science- Wide Author Database of the World (Medicinal & Biomolecular Chemistry)	Stanford University
Prof. Biswajit Mukherjee	Invited Editor-2020	Frontiers in Pharmacology
Prof Subhash C. Mandal	Top 2% Science- Wide Author Database of the World (Medicinal & Biomolecular Chemistry)	Stanford University
Dr. Saikat Dewanjee	Member	Association for African Medicinal Plants Standards, Indian Society of Pharmacognosy, Society of Ethnopharmacology
Dr. Saikat Dewanjee	Associate editor	BMC Complementary and Alternative Medicine & Plos One

Cont.....

Honors and Recognitions Received by Teachers (2016-2020)



Pharmaceutical
Technology

Name of the teacher	Honors or recognitions	Name of the recognized bodies
Prof. Tanmoy Bera	Member	Indian Association for the Cultivation of Science
Prof. Tarun Jha	Member of the EC & Academic Advisory Committee	National Board of Accreditation
Prof. Tarun Jha	Member of the Ph. D. Committee	Maulana Abul Kalam Azad University of Technology
Dr. Tapan Kumar Giri	World's top 2% Indian Scientist for 2019	Stanford University
Prof. Lakshmi Kanta Ghosh	Member of the Board of Governors of NIPER-Guwahati-2019	NIPER-Guwahati
Prof. Lakshmi Kanta Ghosh	Central Council Member (2014-2019)	Pharmacy Council of India
Prof. Sanmoy Karmakar	Certificate of Appreciation for contributions as Pharmacy Professionals-2020	Neotia University

Workshops/Seminars/FDP Conducted



Event type	Title of the event	Organizer (S)	Date(s)
National Seminar	Clinical Research: Present Scenario in Pharmacovigilance and Clinical Trials	Department of Pharmaceutical Technology, Jadavpur University	17-Feb-18
National Workshop	Pharmaceutical Technology: How it works	Department of Pharmaceutical Technology, Jadavpur University	Oct-19
Continuing Education Programme	Continuing Education Programme for Pharmacy Teachers	Department of Pharmaceutical Technology, Jadavpur University funded by the Pharmacy Council of India	2018
National seminar	Pharmacy and Healthcare: Traditional Knowledge to Modern Techniques	Advanced Pharmacognosy Research Laboratory, Department of Pharmaceutical Technology, Jadavpur University	14-Sep-18

Faculty Participation in Seminars/Conferences



No. of Faculty	International level	National level	State level
Attended Seminars/ Workshops	1	4	1
Presented papers	9	4	NA
Resource Persons	9	23	2

Patents



Sl. No.	Title	Filed (Application No. with date)	Awarded No. with date	Inventors with affiliation
1	Gum Odina As New Pharmaceutical Excipients	Application No: 00061/KOL/2006A; dated: 20.01.2006	International classification: A61K 9/00, 9/20.	Biswajit Mukherjee & Amalesh Samanta [Department of Pharmaceutical Technology, Jadavpur University, Kolkata, India]
2	Isolation of Phytoconstituents from <i>Bombax ceiba</i>	-	Patent No- 304196, 2018	Subhash C Mandal [Department of Pharmaceutical Technology, Jadavpur University, Kolkata, India], Emdad Hossain (College of Pharmacy , Azamgarh, UP) and J K Gupta (JU) [Department of Pharmaceutical Technology, Jadavpur University, Kolkata, India]
3	Process and carrier for targeting drugs/diagnostics of peripheral and central nervous system.	Application No: 201731033454; Dated: 20.10.2017	(Published on 20.10.2017)	Mukherjee Biswajit, Sengupta Soma, Paul Paramita, [Department of Pharmaceutical Technology, Jadavpur University, Kolkata, India]

Patents



Pharmaceutical
Technology

Sl. No.	Title	Filed (Application No. with date)	Awarded No. with date	Inventors with affiliation
4	A Microwave Assisted Process for Extraction of Total Phenolic Antioxidants from plant material	-	Patent No-290354, 2017	Subhash C Mandal [Department of Pharmaceutical Technology, Jadavpur University, Kolkata, India] ,V Mandal (Guru Ghasidas University) and A K Das (Assam University)
5	Design, synthesis and amino acid composition of fullerene based peptidomimetics against leukemia and ovarian cancer	201611004953 A, 12/02.2016	33/2017, 18/08/2017	Dr. K. Nagarajan [KIET School of Pharmacy, KITE Institute, Ghaziabad 201206, UP, India], Parul Grover, Mayuri Mishra, Dr. Vinayak Kumar, Dr. L. K. Ghosh [Department of Pharmaceutical Technology, Jadavpur University, Kolkata, India]
6	Two novel triterpenoid isolated from <i>Terminalia arjuna</i>	-	Ref. No. E-2/527/2012-KOL	Prof. Pallab Kanti Haldar [Department of Pharmaceutical Technology, Jadavpur University]

MOU



Name of collaborating organization	Objective of MOU	Outcome	Year
<p>North Dakota State University (Dr. Mohiuddin Qadir) & Jadavpur University (Prof Biswajit Mukherjee)</p>	<p>International collaboration for the development of a Nano-drug delivery system for the delivery of anticancer drugs.</p>	<p>Under progress</p>	<p>2021-2023</p>

Consultancy



Pharmaceutical
Technology

Name	Title of the work	Duration	Name of the Institution/Industry	Amount Received (Rs.)
Prof. S. Karmakar	BioToilet under Swach Bharat Programme	2019-2020	AFFRA Engineering Pvt. Ltd.	15000

Library Resources



SL. No.	Category	Available Titles	Available Nos.
1	Book	615	6926
2	Journal (International & National) Printed	70	-
3	E-Journal (International & National)	130	-

Placement



Year	No. of Students appeared for campus interview	No. of Students placed	% Students placed
2017-2018	49	44	90
2018-2019	48	40	83
2019-2020	34	26	76

GPAT/Other Competitive Examinations



Year	No. of Students Qualified		
	GPAT*	NIPER JEE*	Other*
2020	10	03	GATE- 01 CAT- 01
2019	09	05	IELTS- 01
2018	10	07	-
2017	03	-	-
2016	13	11	-

*Collected information

Full Time Research Fellows (2021)



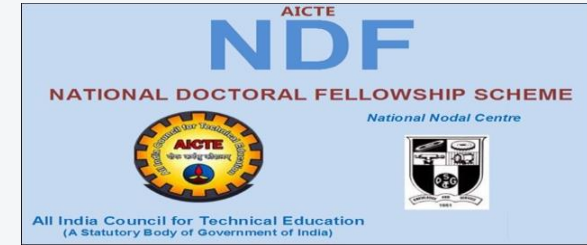
Pharmaceutical
Technology



10



2



6



4



2



5



2



1



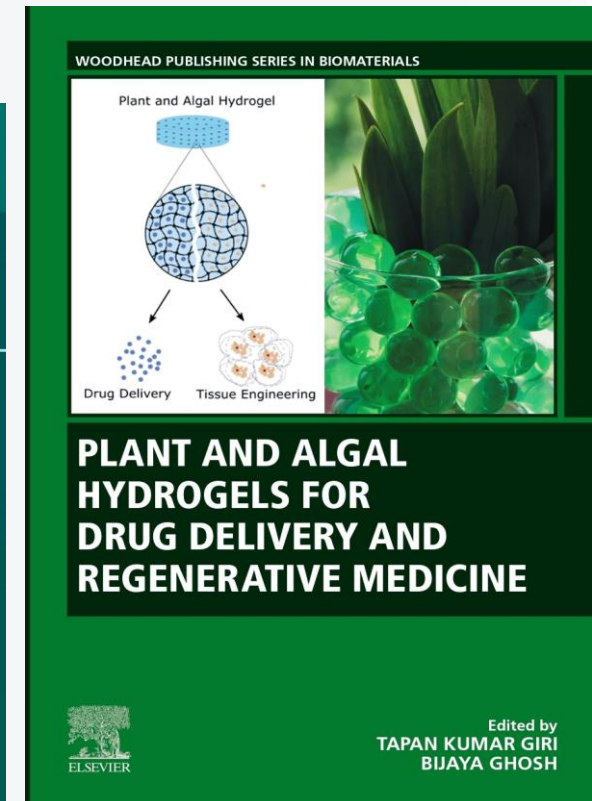
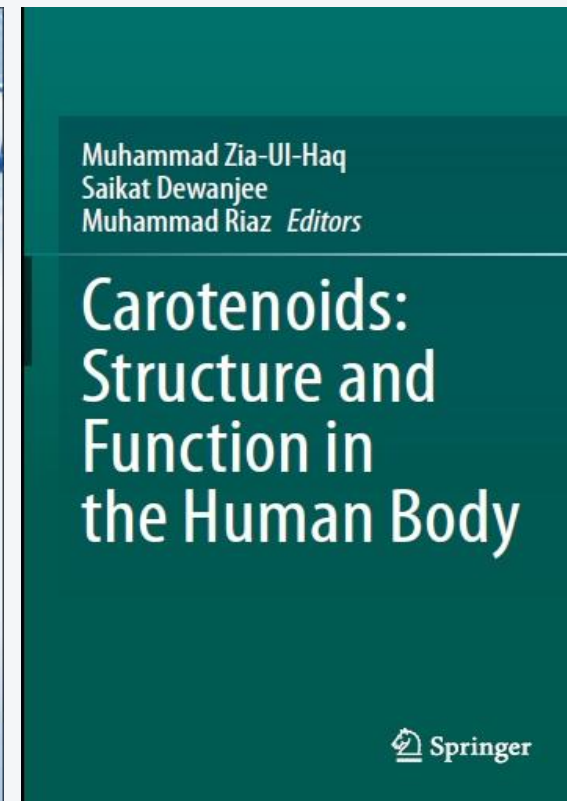
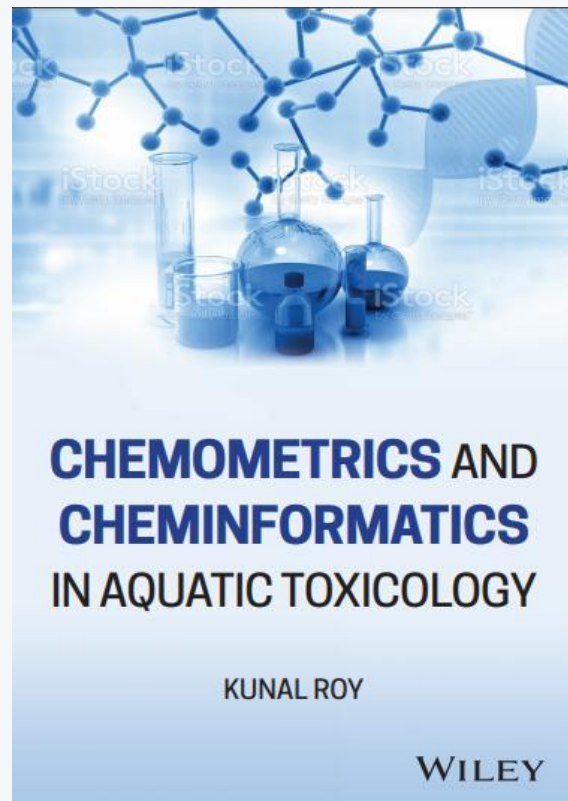
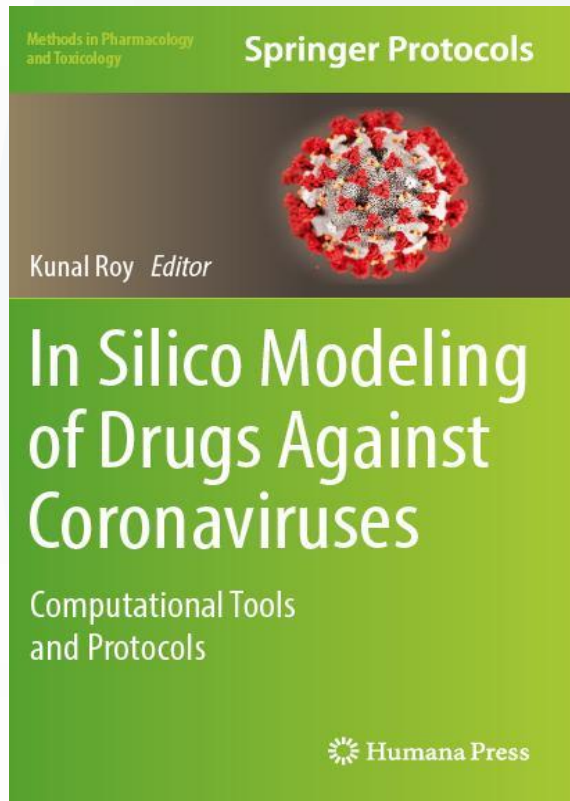
6

Upcoming Activities (2021...)



Pharmaceutical
Technology

Publication: Edited Books





Thank you

For further information, please contact

officepharmtech@gmail.com

Phone: 033 2457 2455