TEZPUR UNIVERSITY

(A Central University)

OFFICE OF THE CONTROLLER OF EXAMINATIONS

TEZPUR-784028:: ASSAM

ADMISSION ANNOUNCEMENT

(Academic year 2021-22)

F.11-3 /5 /2003(Acad)/

Dated the 5th July,2021

Online applications are invited from eligible candidates for admission to the following programmes of study for the academic year 2021-22:

Programmes of study:

(i) B.Tech.: (i) Civil Engineering, (ii) Computer Science & Engineering, (iii) Electronics and Communication Engineering, (iv) Electrical Engineering, (v) Food Engineering & Technology and (vi) Mechanical Engineering.

(ii) B.Tech. (Lateral entry): (i) Electrical Engineering and (ii) Food Engineering and Technology.

Candidates will be selected for admission to B. Tech. programmes on the basis of All India Rank (CRL) of JEE (Main) conducted by the NTA (for details please visit JEE website: www.jeemain.nic.in). Candidates for B.Tech. (lateral entry to second year) will be selected based on the (i) Personal Interview and (ii) Academic Performance. If the candidate is yet to complete the qualifying examination, then the marks of pre-final examination will be considered. All the B.Tech. applicants will be required to submit the marksheets of class10 and 10+2 examinations.

Sixty percent (60%) seats are reserved for the candidates of North- East States and they only need to submit the online application through the Tezpur University admission portal. Admission to the remaining seats will be open for all candidates and they will be admitted through the Central Counseling conducted by the JoSAA. The candidates of NE states will be required to producePermanent Residence Certificate (PRC) issued by the Competent Authority of thestate of domicile. Counseling and admission of the shortlisted candidates will be held online.

(iii) M. Tech.: (i) Civil Engineering, (ii) Computer Science and Engineering, (iii) Information Technology, (iv) Food Engineering & Technology, (v) Electronics Design & Technology, (vi) Bioelectronics, (vii) Energy Technology and (viii) Mechanical Engineering.

(a) Candidates having valid GATE score in the concerned discipline will be directly admitted on merit basis against the seat earmarked for the

GATE qualified seats.

(b) Some seats are available for the non-GATE candidates. They will be selected based on (i) Personal Interview, (ii) academic performance in qualifying examinations and (iii) other performances (such as research publication, research experience, and class 10 and 10+2 marks).

(IV) <u>Ph. D:</u>

(i) **Departments under School of Sciences**: Chemical Sciences, Environmental Science, Molecular Biology & Biotechnology, Mathematical Sciences, and Physics.

(ii) **Departments under School of Engineering**: Computer Science & Engineering, Civil Engineering, Electronics & Communication Engineering, Electrical Engineering, Energy, Food Engineering & Technology, Mechanical Engineering, and Applied Sciences.

(iii) Departments under School of Management Sciences: Business Administration, and Commerce.

(iv) **Departments under School of Humanities and Social Sciences:** English, Hindi, Mass Communication and Journalism, Sociology, and Social Work.

The candidates will be selected by the concerned Departments for admission to PhD programme based on (i) academic performance (marks of class 10 onwards), (ii) Statement of Purpose (SOP) and online questions, and (iii) Personal Interview. However, candidates with UGC-(NET/JRF)/UGC-CSIR(NET/JRF)/DBT-JRF/ICMR-JRF/ICAR-NET/GATE/ SLET / M. Phil. will be required to appear in the Personal Interview.

The candidates are required to note the following:

(1) Candidates who have completed the pre-final examinations and received the marksheets will be eligible to apply for M.Tech. and PhD programmes. They will be required to upload the marksheets of all the examinations from class 10 onwards.

(2) In the application form, the candidate must provide semester-wise total marks secured and total examinations marks in the corresponding semester.

(3) The candidates must declare that he /she has no backlog subjects up to the pre-final semester. Candidates having backlog course of earlier semester, not cleared up to pre-final semester, will not be considered.

(4) Candidates must provide CGPA to equivalent percentage conversion formula of the University/ Institute.

(5) Applications without this information and supporting document will be treated as incomplete and will be rejected.

(V) Other programmes will be notified shortly.

Reservation and relaxation: As per Govt. of India Rules.

Interested candidates may visit the Tezpur University website: www.tezu.ernet.in for prospectus, eligibility criteria, intake and other details and submit online application through the link: ***https://www.tezuadmissions.in*** by paying the application fee of Rs. 800/- per candidate (Rs. 400/- for SC, ST and PWD candidates).

Important dates:

- Display of online application form : 06.07.2021
- Last date of submission of online application : 10.08.2021

Controller of Examinations

Eligibility Criteria:

I. For B.Tech. programme

B. Tech. in Civil Engineering	10+2 Standard or equivalent examination with minimum 60% aggregate marks† and pass marks† in (1) Physics, (2) Mathematics, (3) Language, (4) Chemistry/Biology/Biotech/ Technical vocational subject (any one of them), and (5) any other Subject.
B. Tech. in Computer Science and Engineering	
B. Tech. in Electrical Engineering	
B.Tech. in Electronics and Communication Engineering	
B. Tech. in Food Engineering and Technology	
B. Tech. in Mechanical Engineering	
Lateral Entry to 2nd year of B.Tech. in Electrical Engineering	10th Standard examination with minimum 60% marks in aggregate as well as separately in Mathematics, and minimum 70% aggregate marks † in diploma programme (duration of minimum 3 years after 10th standard) in the respective or allied discipline.
Lateral Entry to 2nd year of B.Tech. in Food engineering and Technology	Diploma in Food Engineering and Technology or Allied subjects from an AICTE approved program. Duration of Diploma must be: 02 Years Diploma after 10+2 **OR** 03 years after 10th (Matriculation) in conventional system **OR** 04 years after 10th (Matriculation) in modular system. The Candidate must have passed 10th (Matriculation) with 60% marks† in aggregate and must have secured 60% marks in Mathematics, as well as must have a minimum aggregate of 70% marks† at Diploma level.

II. For M.Tech programme:

M.Tech. in Civil Engineering	B.E./B.Tech. Degree in Civil Engineering with minimum 50% aggregatemarks.
M. Tech. in Information Technology	B.E./B.Tech. or equivalent Bachelor‘s Degree in Computer Science and Engineering/ Information Technology/ Electronics and Communication Engineering/any other allied Discipline, or MCA or its equivalent Degree, or M.Sc. Degree in Computer Science/ Information Technology/ Electronics/Mathematics/ Statistics with minimum 50% aggregate marks. Candidates selected under GATE should have a valid GATE score in Computer Science.
M. Tech. in ComputerScience and Engineering	B.E./B.Tech. or equivalent Bachelor ‘s Degree in Computer Science andEngineering or MCA Degree with minimum 50% aggregate marks.

M. Tech. in ElectronicsDesign and Technology	B.E./B.Tech. or equivalent Bachelor's Degree in Electronics/Electrical/Instrumentation Engineering or M.Sc. Degree in Electronics/ Instrumentation/Physics (Electronics as specialization) with minimum 50% aggregate marks.
M.Tech. in Bioelectronics	B.E./B.Tech. or equivalent Bachelor's Degree in Electronics and Communication Engineering/ Instrumentation/ Chemical Engineering/ Computer Science and Engineering/ Electrical Engineering/ Biomedical Engineering/Bioengineering/ Neuroengineering / Genetic Engineering/ Biotechnology or M.Sc. Degree in Biotechnology/ Biochemistry/ Chemistry/ Polymer Science/ Physics/ Electronics/ Nano Science and Technology/ Instrumentation or MBBS Degree with minimum 50% aggregate marks.
M. Tech. in Energy Technology	B.E./B.Tech. or equivalent Bachelor's Degree in Mechanical/Electrical/Electronics/Instrumentation/Chemical/Agri cultural/ Energy Engineering or M.Sc. Degree in Physics/Chemistry withminimum 50% aggregate marks.
M. Tech. in Food Engineering and Technology	B.E./B.Tech. /M.Sc. in Food Engineering and/or Technology/ Agricultural Engineering/ Chemical Engineering and/or Technology/ Dairy Engineering and/or Technology with minimum 50% aggregate marks†. Also, candidates must have Mathematics at 10+2 Standard with minimum 50% marks† or as a subsidiary subject in the specified Degree Pro-grammes. Candidates having valid GATE score in the eligible disciplines will be considered against the GATE seats for direct admission with GATE fellowship from AICTE. GATE seats remaining vacant will be filled up through TUEE merit list.
M. Tech. in Mechanical Engineering (Specialization: Machine Design)	B.E./B.Tech. or equivalent Bachelor's Degree in Mechanical/Aerospace/Automobile Engineering or in any other relevant Engineering Discipline with minimum 50% aggregate marks.
M. Tech. in Mechanical Engineering (Specialization: Thermo Fluids Engineering)	B.E./B.Tech. or equivalent Bachelor's Degree in Mechanical/ Energyand Power/Aerospace/Aeronautical/ Automobile Engineering or in any other relevant Engineering Discipline with minimum 50% aggregate marks.

III. Pre-Requisites and area of research of the Ph.D. programme are given below.

Sl.No	Department	Pre-requisite	Area of Research
1	Applied Sciences	PHYSICS BRANCH: M.Sc./Integrated M.Sc. in Physics/ Astrophysics/ Electronics/ Geophysics/ Material Science/ Applied Mathematics/ Nanoscience and Technology/ Biotechnology/ Environmental Science and Chemical Science. **OR** M.Phil., M.Tech. in Solid State Material/ Material Science/ Electronics/ Energy/ Nanoscience and Technology/ Biotechnology/ Environmental Science and Chemical Sciences.	Low-dimensional Material Physics, Optical Spectroscopy, Electron Energy Loss Spectroscopy, Scanning Transmission Electron Microscopy, Theoretical Modeling of Astrophysical Flows, Study of X-ray Binaries, X-ray Data Analysis and Interpretation.

		OR M.S Astronomy and Astrophysics. **OR** B.Tech. in Engineering Physics with 80% marks in aggregate or equivalent CGPA.	
		MATHEMATICAL SC. BRANCH: M.Sc./M.A./M.E./M.Tech./MS/BS-MS/Integrated M.Sc. Degree in Mathematics/Statistics/Engineering Mathematics/ Mathematics and Computing/ Applied Mathematics/ Operations Research/ Mechanical Engg./ Industrial Engineering/ Computer Science and Engineering/ Information Technology/any allied subject with 55% marks in aggregate or equivalent CGPA. **OR** B.Tech. in Mathematics and Computing/any allied subjects with 75% marks in aggregate or equivalent CGPA with a valid GATE Score. Minimum two recommendation Letters from the Institute/ University from where B.E./B.Tech degree was obtained.	Spectral Graph Theory, Application of Linear Algebra in Graph Theory, Graphs and Matrices, Operations Research, Inventory Modelling, Fuzzy Mathematics and Applications, Multi Criteria Decision Making Problems
		CHEMICAL SC. BRANCH: M.Sc in Chemistry/ Chemical Sciences/ Polymer Chemistry/ Polymer Science/ Physics/ Nano Science/ Material Science/ Environmental Science or allied subjects **OR** M.E./M.Tech in allied subjects (Chemical Engineering/ Polymer Technology/ Material Sciences/ Environmental Engineering/ Energy etc.)	Functional Organic and Metal-organic Polymers, Energetic Materials, Materials for Energy and Environmental Applications.
2	Business Administration	M.B.A., M.Com., M.A. / M.Sc. in Economics, M.A. in Psychology/ Sociology/Social Work/ Cultural Studies, MCA, M.T.M. / M.T.A. FCA/ FCS/ FICWA.	Finance,HR, Accounting, Taxation,Social Development Issues, Marketing & Tourism, Operation, Project Management, Rural Development, Entrepreneurship, Tourism, Marketing.
3	Chemical Sciences	M.Sc. in all branches of Chemical Science/ Physics/Nanoscience/ Material Science/ Biotechnology/ Biochemistry/ Bioinformatics/ Environmental Science. M.E./M.Tech. in allied subjects (Chemical Engineering/ Polymer Technology/ Material Sciences/ Environmental Engineering etc.).	Water Purification Techniques, Polymer Chemistry, Polymer Nanocomposites, Electrocatalysis, Synthetic Organic Chemistry, Organic Synthesis & Catalysis, Physical Chemistry.
4	Civil	(a) M.E./M.Tech. /M.Sc.(Engg.) in	Geotechnical Engineering/Environmental

	Engineering	Civil Engg. Or allied areas or (b) M.Sc. in relevant discipline with minimum 70% marks in aggregate or equivalent CGPA or (c) B.E. / B.Tech with 75% marks in aggregate or equivalent CGPA with a valid GATE Score. Minimum two recommendation Letters from the Institute/University from where B.E./B.Tech degree was obtained.	Engineering
5	Commerce	1. M.Com., 2. M.A./M.Sc. in Economics, 3. FCA/ FCMA/ FCS.	Accounting, Finance, Sustainability, Corporate Governance, Development Economics
6	Computer Science & Engineering	M.Tech. in Computer Science/ I.T./ Electronics MCA M.Sc. in Computer Science/ I.T. B.E. / B.Tech with 75% marks in aggregate or equivalent CGPA witha valid GATE Score. Minimum two recommendation Letters from the Institute/ University from where B.E./B.Tech. degree was obtained.	Natural Language Processing, Speech Processing, Wireless Networks, Blockchain, Elastic Optical Networks, Data Mining, Image Processing Data Mining, Algorithms, Pattern Recognitions, Image Processing, Remote Sensing, Image Analysis, Bioinformatics, Cognitive Radio Network, Resource Allocation in CRN, Blockchain, Network Security Trust & Reputation, Machine Learning,Speech Processing, Artificial Intelligence.
7	Electrical Engineering	(a) ME/MTech/MS/ in Electrical/ Electronics/Communication/ PowerSystem/Power Electronics/ Instrumentation/Control/ ComputerScience & Engineering/ MBBS with MD/MS and any other relevant discipline. (b) BE/B.Tech. with 75% marks in aggregate or equivalent CGPA with a valid GATE Score. Minimum two recommendation Letters from the Institute/ University from where B.E./ B.Tech degree was obtained.	Sensor & Sensor Fabrication, IoT & Health Monitoring, Control & its application, Food Technology, Signal Conditioning, Green Energy Technology, IoT, Smart Energy Systems, Control Systems, Water Management, Smart Healthcare. Power electronics and Drives, Vehicular electronics, Instrumentation and its control, Control techniques in power electronics and drives, Electric vehicle/hybrid electric vehicle and microgrid/smart grid.
8	Electronics & communication Technology	M.E. / M.Tech. / M.Sc. Engg. / M.S. in Electronics/ Communication/Electronics Design/ Electrical/ Instrumentation/Control/ Microwave/Biomedical/ Bioelectronics/ Biotechnology/ Computer Science/ Information Technology. M.Sc. in Electronics/ Physics/ Applied Mathematics. MCA with Physics, Chemistry and Mathematics in Bachelor's degree,	Quantum image processing. Hydrogen fuel energy, solar cell, Quantum instrumentation, Biosensors and Bioelectronics,Microwave antennas, Bioelectronics device, Power electronics, traction control of electric vehicles, Neuroengineering, Bioelectronics, Instrumentation Health care, Image Processing, Computer vision, Deep learning for Biomedical image, Signal analysis, Image and video processing, Computer

		MBBS with MD/ MS degree. B.E. / B.Tech with 75% marks in aggregate or equivalent CGPA with a valid GATE Score. Minimum two recommendation Letters from the Institute/ University from where B.E./ B.Tech degree was obtained.	vision, deep learning, content-based image retrieval, Rehabilitation Robotics. Biomedical Signal Processing, Nanoelectronic Devices and sensors, Flexible Electronics, Biosensors, SPR based photonic devices. VLSI & Microelectronics, Nanotechnology, Gas sensors, Simulation, and Modelling of Semiconductor Devices.
9	Energy	M.Sc. / M.E. / M.Tech. degree in Energy Technology/ Energy Management/Energy related Engineering and Technology/ Physics/ Chemistry/Agriculture Allied subjects.	Renewable Energy, Bioenergy and Biofuels, Energy–Environment interaction, Biomass Gasification, Building Energy and Thermal Comfort, Photovoltaic Systems, Hybrid Energy Systems, Fuel Cell, Hydrogen Energy, Graphene, Energy Storage, Electrochemical Systems, Energy Conservation and Management, Instrumentation & Control, GridIntegrated System, Solar Photovoltaics system, RAC, Heat Transfer, Nanofluids, Hydrogen Energy.
10	English	M.A. in English (specialization may be in Literature, English Language Teaching or Linguistics), M.A. in Linguistics.	Literature, ELT, Linguistics
11	Environmental Science	Masters in any Science/ Applied Science / Engineering disciplinewith at least 55% marks or equivalent CGPA. At Bachelor's level the candidate must have attended Science / Technology programme.	Atmospheric Chemistry Air Pollution, source apportionment, Forest ecology and biodiversity Conservation, Fluvial Geomorphology, riverine hazards, application of RS & GIS in atmospheric, hydro-geomorphic studies, Water and sediment geochemistry environmental pollution, Plant stress physiology sequestration and CHG emission from Agricultural and forest ecosystem, Solid Waste Management soil pollution, soil carbon management and nuclear analysis, Plant nutrition, Botanicals as pesticides, Insects plant, Air pollution Meteorology, climate impact modelling, noise pollution and deep learning, Ecology, Eco-hydrology, Nanotechnology in Environmental Research, Indoor air pollution, human environment interactions,

12	Food Engineering & Technology	M.Tech. / M.E. /Integrated M. Tech.in Food Engineering and Technology/ Food and Dairy related other programme /MechanicalEngineering/Chemical Engineering/Bio-Process/Bio-Chemical/Biotechnology, or, M.Sc. and Integrated M.Sc. in Food Engineering and Technology/Food and Dairy related other programme/Applied Microbiology/Microbiology/Bio-Chemistry/Chemistry/ Biotechnology/Bioscience and Informatics, or,B.E./B.Tech (in Food Engineering and Technology/Food and Dairy related other programme) with 75% marks in aggregate or equivalent CGPA with valid GATE Score). Minimum two recommendation Letters from the Institute/University from where B.E./B.Tech degree was obtained.	Food Chemistry, Food Quality of locally important fruits & vegetables. Emerging non-thermal processing; Fruits & Vegetable Processing and Machinery; Process and Food Engineering; Food Rheology; Hurdle Technology, Bioprocess Engineering, Starch/Protein modification and application
13	Hindi	M.A. in Hindi	Bhasha Vigyan, Lok Sahitya aur Bharitiya Kavyashastra, Linguistics, Poetry & Journalism.
14	Mass Communication & Journalism	M. A. in Mass Communication, Mass Communication & Journalism/ Communication. Master of Mass Communication (MMC). Master of Journalism & Mass Communication (MJMC). Master of Science in Communication (M.S. Communication). M. Sc.Communication. Master of Journalism.	Communication for Social Change, Journalism, Science Communication.
15	Mathematical Sciences	M.A. / M.Sc. in Mathematics or M.A./M.Sc. in Statistics with requisite background in Mathematics.	Number Theory, Non-parametric Statistics, Ring Theory and Finite Field Theory, Computational Fluid Dynamics, Differential Equations and Harmonic Analysis, Algebra and Graph Theory, Finite Element Method
16	Mechanical Engineering	M.E. / M.Tech. / M.Sc. (Engg.) in Mechanical Engg. Or allied areas. B.E. / B.Tech with 75% marks in aggregate or equivalent CGPA with a valid GATE Score. Minimum two recommendation Letters from the Institute/University from where B.E./B.Tech degree was obtained.	Thermodynamic modelling (steady and dynamic) and optimization of (i) solar thermal power and cooling systems (ii) Gas turbine based combined power systems with steam Rankine, organic Rankine and Kalina as bottoming cycles (iii) vapour absorption cooling systems Design/Optimization, Solar thermal energy, Drying Technology, Thermal Energy Storage, Biomass Energy Conversion, Materials Engineering and Manufacturing, Microalloying, Thermo-Mechanical Processing, Microstructural

			Characterization, Mechanical Metallurgy, Failure Analysis, Tribology, Creep and High Temperature Deformation Behavior, Computational Material Science, Carbon nanotubes-based composites, Fiber-reinforced composite materials and Graphene-reinforced composites
17	Molecular Biology and Biotechnology	Masters in any branches of Life Sciences/ Physical Sciences/ Chemical Sciences/ Mathematical Sciences/ Agricultural Sciences / Veterinary or Sciences / Engineering Sciences /Medical Sciences or in any allied field. B. Tech./ B. E. degree with80% marks in CGPA (with GATEscore > 90.00 percentile) in Chemical Engineering/ Chemical Sciences/ Bioinformatics or any allied field. MBBS or BVSc. Degree with atleast 60% marks or equivalent CGPA. Apart from the above, candidates havingconsistently good academic record will be preferred.	Molecular Evolution, Impact of Asana and Food on Human Biochemistry, Microbial Biotechnology, Human Molecular Genetics, Synthesis Biology, Genomics and Systems Biology in Leishmania, Cancer Biology, Inflammation Biology, Virology and Scrub typhus, Metabolic disease Biology, Bioinformatics, Modelling and simulation, Plant pathogen interaction and gene regulation.
18	Physics	M.Sc. in Physics/ Electronics/ Geophysics/ Material Science/ Applied Mathematics/ Nanoscience and Technology/ Biotechnology/ Environmental Science and Chemical Science. M.Phil., M.Tech. in Solid State Material/ Material Science/ Electronics/Energy/ Nanoscience and Technology/ Biotechnology/ Environmental Science and Chemical Sciences. B.Tech. in Engineering Physics with 80% marks in aggregate or equivalent CGPA.	Quantum materials and phenomena, Condensed matter physics, Microwave material and devices, Soft Matter Phys and Nanotechnology , Neutrino Physics, Baryon Asymmetry and Dark Matter, Photonics and optical sensing systems, Experimental and Computational Optics, Astro-particle Physics, Neutrino Physics, Dark matter, High Energy Physics, Astrocosmic Fluid dynamics, Plasma Physics, Nonlinear Dynamics, Experimental materials science
19	Social Work	MA in Social Work and allied Social Sciences such as Sociology, Psychology, Rural Development, Development Studies, Law, Public Health, Education and Management.	Ecology and Social Work, Tribal Studies, Rural Development and Livelihood, Social Work & Mental Health, Substance, Street Children, Disaster, Migration, Development issues, Gender.
20	Sociology	Post Graduation in Sociology / Cultural Studies/ Anthropology (with specialization in Social Anthropology) / Economics / History / Political Science / Philosophy / Mass Communication / English / Law / Management/ Social Work.	Tribal Studies, Marginality Studies, Northeast India Studies, Agrarian Studies Sociology of Religion/ Sociology of Culture Sociology of Science Sociology of Governance Sociology of

			Development/Migration/Environment Sociology of Health and Illness Sociology of Gender and Identity Politics Sociology of Education Sociology of Body, Gender and Sexuality

(L.Boral)
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