PH.D. ADMISSION NOTIFICATION
FOR THE
SESSION SPRING 2022

BIRLA INSTITUTE OF TECHNOLOGY
(Deemed to be University u/s 3 of UGC Act 1956)
MESRA, RANCHI – 835215 (INDIA)
Website: www.bitmesra.ac.in

IMPORTANT DATES

Filling of Online Application Form commence from Application fee of Rs. 2500/- (Rs. 1500/- for SC/ST)	**28.10.2021**
Last date to Apply Online	**30.11.2021**
Display of shortlisted applicants for Test	**06.12.2021**
DATE OF PH.D. WRITTEN TEST	**14.12.2021**
Date of Interview of shortlisted applicants	**15.12.2021** **1st Slot - from 10 AM to 1 PM** **2nd Slot - from 2 PM to 5 PM**
Declaration of Result	**17.12.2021**
Admission starts on	**20.12.2021**

CONTACT DETAILS:

Admission Section
Birla Institute of Technology,
Mesra, Ranchi – 835 215
Tollfree: 18003457057, 18003457058
Phone: 0651-2275868
Mobile: 9508050840
E-mail: daac@bitmesra.ac.in, coa@bitmesra.ac.in, admissions@bitmesra.ac.in

For Queries, please contact:

- Dean, Postgraduate Studies through email at dpgs@bitmesra.ac.in for Ph.D. Ordinance related issues.
- Department Head for Area of Research
- Admission Officials on 0651-2275868 or 9508050840 for admission related issues.

IMPORTANT INSTRUCTIONS:

- Before applying for the program, please refer eligibility criteria.
- Apply for one department only.

HOW TO APPLY:

- To fill online application form, click on the link **"APPLY ONLINE"** to register for the program and create password for the application process. Do not share the password with anybody. Follow instructions for filling online application form.

- Eligible candidates must complete and submit the application form online only [link available on the Institute website www.bitmesra.ac.i

- Pay application fee of Rs.2,500/- (General / OBC candidates) and Rs.1,500/- (SC/ST candidates) through Online Payment Gateway (candidates may use Net banking / Debit card / Credit card of any nationalized bank) till the last date of application process.
  Note: Fees once remitted shall not be refunded under any circumstances.

MINIMUM ELIGIBILITY CRITERIA:

Candidates with following qualification shall be eligible for admission to the Ph.D. Program of the Institute:

a) Possessing M.Tech. / M.E. / M.Sc. (Engg.) / M.Arch. / M.Pharm. / M.Plan./ M.Sc./ MCA / MBA or equivalent Degree in relevant branch from a recognized University/Institute with minimum 60% marks or 6.0 CGPA on a ten point scale in the qualifying examination are eligible to apply for admission in the relevant departments.

b) Possessing B.Tech./B.E./B.Sc. (Engg.)/B.Pharm/B.Arch./B.Plan. or equivalent Degree in relevant branch from a recognized University/Institute with a minimum of 80% marks or 8.0 CGPA on a ten-point scale in the qualifying examination and a valid GATE/GPAT score with a minimum of 80 percentile are eligible to apply for admission in the departments as per their Specialization.
   Note: In this case, the candidates need to pass in more numbers of qualifying Pre-PhD papers. For detail refer Section 9.1 of Ph.D. Regulation 2018.

c) Sponsored candidates must have minimum of two years of professional work experience, in addition to the eligibility criteria (a or b). In addition, sponsored candidates should have valid sponsorship for at least three years.

RELAXATION FOR SC/ ST CANDIDATES
Eligibility criteria will be relaxed by 5% marks for SC / ST candidates.

Note:
1. No Objection Certificate (NOC) from the Institute is mandatory for employees of the Institute which shall be obtained before appearing at the admission test for the Ph.D. program.
2. Employees from other organizations shall produce NOC from his/her respective employers before payment of admission fees.
3. In case of the candidates with other grade point scale, the decision of the equivalence made by the assigned committee of the Institute shall be final.

FELLOWSHIP AVAILABLE:

Limited number of Institute Research Fellowship (IRF) with a fellowship amount of Rs. 25,000/- per month for the first two years and Rs. 28,000/- per month for the next two years is available depending on the performance. The minimum marks required for IRF may vary across the departments and shall be decided by an appropriate committee. The IRFs shall be awarded based on the performance in the admission test, academic career and interview. Ph.D. admission test is mandatory for candidate aspiring for the IRF.

DEPARTMENT-WISE & SPECIALIZATION-WISE IRF POSITIONS [MESRA, Main Campus]

Fellowships are available in limited specializations. However, candidate can choose any specialization if desires to pursue Ph.D. in self-financing mode.

Sr No.	Department	Specialization
1.	Architecture & Planning	• Architecture Education, Building Science and Technology, Sustainability and Green Architecture • Urban and Regional Planning, Conservation Planning, Disaster Mitigation
2.	Bio-Engineering & Biotechnology	• Biosignal and Electrophysiology • Secondary metabolites, enzymes, Bioprocess development, Mushroom etc • Renewable energy, Nano heat transfer fluids
3.	Chemical Engineering	• Tribology of Composite Materials, Polymer Processing, Food Packaging • Rheology of Complex Fluids, Polymer Rheology • Polymer Compounding/Processing, Rheology, Blends & Nano-Composites, Bio active polymer coating for food preservation • Multi phase flow, Catalysis, CFD
4.	Chemistry	• Modified Biomaterials and Applications • Biomimetic Coordination Chemistry, Renewable Energy
5.	Civil & Environmental Engineering	• Water Resources Engineering
6.	Computer Science & Engineering	• Data Science and optimization • Big Data, Machine Learning, Natural Language Processing
7.	Electronics & Communication Engg.	• Cyber Security, Signal & Image Processing • Signal Processing and Automations
8.	Management	• Marketing, Technology Management, Total Quality Management • Marketing
9.	Mathematics	• Mathematical Modelling of Environmental, Ecological and Biological Systems • Qualitative study of Solutions of ODE, PDE, Difference Equations, Boundary Value Problems and Fractional Differential Equations

Sr No.	Department	Specialization
		• Applied Statistics • Computational Solid Mechanics, Operations Research, Numerical Methods
10.	Pharmaceutical Science & Technology	• Pharmacology
11.	Physics	• Plasma Physics, Bio Physics • Materials Science, Nanotechnology, Functional materials, Electronic ceramics • Nanotechnology
12.	Production & Industrial Engineering	• Manufacturing • Industrial Engineering
13.	Remote Sensing	• Natural resources and Hazard modelling, Climate change and water resources • Aerosol Study / Weather forecasting
14.	Space Engineering & Rocketry	• Rocket Propulsion

Candidates willing to pursue Ph.D. in self-financing mode (without IRF) are free to choose Ph.D. area as well as supervisor.

Department-wise possible research area(s) and faculty specializations are available in Institute website www.bitmesra.ac.in under department profile.

DEPARTMENTS OFFERING PH.D. PROGRAM:

1. Architecture & Planning
2. Bio-Engineering & Biotechnology (**Disciplines – Biotechnology and Bio-Medical Engineering)**
3. Chemical Engineering (**Disciplines – Chemical Engineering, Polymer Engineering and Food Technology)**
4. Chemistry
5. Civil & Environmental Engineering (**Disciplines – Civil Engineering and Environmental Science)**
6. Computer Science & Engineering
7. Electrical & Electronics Engineering
8. Electronics & Communication Engineering
9. Management
10. Mathematics
11. Mechanical Engineering
12. Pharmaceutical Science & Technology
13. Physics
14. Production & Industrial Engineering
15. Remote Sensing
16. Space Engineering & Rocketry

SELECTION PROCEDURES:

Provisional selection to the Ph.D. Program will be based on performance of the applicants in an Written Test, Previous Academic Career and an Interview. Only such candidates, who obtain the minimum requisite marks in Written Test will be considered for final preparation of result.

Note: Upto 20% of the selected candidates for admission to the respective Department may be allotted to Part-Time candidates depending upon their position in the merit list. However, in the departments such as Management and Architecture & Planning, the number of selected part-time candidates may be more than 20% and shall be decided by an appropriate committee.

SCHEDULE FOR WRITTEN TEST & INTERVIEW:

Date of Written Test:

Date: 14.12.2021

Venue: Main Campus at Mesra

Time: 10:00 AM to 1:00 PM IST (3-hour duration)

Pattern of question: Multiple Choice and/or Subjective

Total Marks: 100 (Full marks for each correct answer). There will be no negative marking.

Admission to Ph.D. will be of two stage process:

1) Ph.D. Written Test (WT) and

2) Personal Interview (PI).

- The written test for the Ph.D. Program shall be multiple choice and/or subjective types of questions for 100 marks (40 marks of General and 60 Marks of Applied Subject/ Domain/Department Specific) and for the duration of **three hour**. The type of multiple-choice and/or subjective types of questions will follow the sample pattern of NET and GATE/GPAT. There will be no negative marking.

- **The Written Test shall be conducted at its Main Campus at Mesra (Offline). You will be required to report physically at the campus to appear for the Test and interview.**

Date of Interview:
The interview of the selected candidates will be conducted as per the schedule given below:
[Qualified / eligible candidates of written test will be called for interview].

Date: 15.12.2021
Reporting Time: 10:00 AM at the concerned department

EXEMPTION FROM THE WRITTEN TEST:

Those with UGC-CSIR/DBT/BINC/ICMR-JRF and all other similar all India fellowships based written test for Ph.D. admission may be exempted from the Written Test but the candidate has to appear in the interview.

Note: Exempted candidates will not be entitled to get any kind of financial assistance from the Institute.

DOCUMENTS REQUIRED:

All candidates are advised to get ready with the following supporting documents in original while interview process and during verification of documents at a later stage along with a set of photocopies of the same.

1. Pass certificate and Marksheet of Class 10 (bearing date of birth)
2. Marksheet of Class 12 / Intermediate or equivalent
3. Certificate and Marksheets of Graduation
4. Certificate and Marksheets of Post-graduation
5. College Leaving Certificate
6. Migration Certificate
7. **Candidates with qualifications acquired through correspondence or distance-learning programs are eligible only if (a) they acquired such qualifications as working professionals / while in employment, (b) the programs are recognized by the DEC- UGC-AICTE or MHRD, (c) they have passed the qualifying examination at the time of applying, with minimum requisite marks as given in eligibility criteria. They must enclose photocopies of (i) work experience certificate (ii) pass certificate and marksheets of qualifying examination (iii) proof of the program recognized by the DEC-UGC-AICTE or MHRD in letter head of the Institute/College /University, with their application.**
8. UGC-CSIR/DBT/BINC/ICMR-JRF and all other similar all India fellowships based on a written test for pursuing Ph.D. Admit card and Score card (if applicable)
9. Caste certificate / special category certificate (if applicable) in proper format, signed by appropriate authority of rank not less than SDO.
10. Sponsorship letter, NOC, Experience Certificate and Facilities available to carry out the research work at their place of working (if applicable) for Sponsored / Part- Time candidates.

The Admission Office / concerned Departments may not undertake detailed scrutiny of applications before verification of documents, and shortlisted applicants will appear in the Test on purely provisional basis, subject to their eligibility being verified at the time of interviews. Merely being allowed to appear in the Test will not be considered as a ground for being eligible for admission to the Ph.D. program. Shortlisted / eligible candidates are entitled to appear for the Test.

RESIDENTIAL REQUIREMENTS:

The residential requirement is essential to build the research atmosphere in the Institute. The residential requirement for part-time Ph.D. candidates shall be a minimum period of one semester at the Institute for the candidates having PG degree and two continuous semesters at the Institute for the candidates having B.Tech./B.E./ B.Sc. (Engg.) /B.Pharm/B.Arch./B.Plan. or equivalent Degree. However, for full time scholars, the minimum residential requirement is of six semesters.

FEE STRUCTURE:

S.No.	Description	Fee (INR) Main Campus / Off Campuses	Remarks
1.	Admission Fee	5000.00	Payable at the time of admission
2.	Infrastructure Fee (One time non-refundable)	20000.00	Payable at the time of admission
3.	Caution Money (Refundable)	10000.00	Payable at the time of admission
4.	Registration Fee for Pre-Ph.D. Qualifying Examinations	2000.00 (per course)	Payable at the time of registration for the Pre-Ph.D. Qualifying Examination
5.	**Semester Fee:** Full-time Research Scholar	20000.00	Payable in each semester at the time of admission and registration
	Part-time Research Scholar (Employees of BIT)	20000.00	
	Sponsored / Part-time Research Scholar (External)	40000.00	
6.	Thesis Submission Fee	20000.00	Payable at the time of submission of thesis

Refund rules for the Ph.D. Program:

- If a student withdraws / leaves the Institute for any reason in the mid-session without completing the entire program, all fees paid including the caution money will be forfeited by the Institute.

- If a student with fellowship (Institute / QIP / Project / External) withdraws / leaves the Institute in the mid-session without completing the program, the entire amount paid to him / her towards fellowship need to be returned by the student before leaving the Institute.

Enrollment Form

Date:_____

To
The Vice Chancellor
Birla Institute of Technology
Mesra, Ranchi – 835215

Through: The Dean, Postgraduate Studies (PGS)

Dear Sir/Madam,

1. I have been admitted to the Ph.D. Program of the Institute in Department of .... I am enclosing herewith my biodata for your kind perusal and needful.

2. My proposed field of research will be:
(a) Discipline:_____

(b) Field of Research work: _____

(c) Name of the Guide: _____

(d) Proposed Course work:

Theory		Term Paper	
Code	Subject	Code	Subject

3. The No Objection Certificate from my organization (for part - time research scholar only) is attached herewith. The certificate for providing the required research facilities by my organization/institution is also attached herewith.

4. I certify that the particulars given above are correct and I undertake to
   a) Abide by the Rules of the Institute during the Ph.D. Program.
   b) Appear before the relevant Admission Committee whenever directed to do so.
   c) Take any test or qualifying examinations as specified for the Ph.D. program.

5. The proof of my date of birth, caste (General/OBC/BC/SC/ST) and qualifications are attached.

6. I shall also comply with residential requirement specified for the Ph.D. program.

Thanking you
Yours faithfully,

Signature: _____

Name: _____   Roll No. _____

Approved / Recommended / Comments _____

Chairperson (DAC/OAC):_____