



# राष्ट्रीय प्रौद्योगिकी संस्थान, राउरकेला

## NATIONAL INSTITUTE OF TECHNOLOGY, ROURKELA

### ADVERTISEMENT FOR FACULTY POSITION

**Advt. No. – NITR/02/2014**

NIT, Rourkela, an institute of national importance under Ministry of HRD, Govt. of India invites applications from Indian nationals possessing excellent academic background along with commitment to quality teaching and research for faculty positions at the level of **Professor, Associate Professor and Assistant Professor** in most branches of Engineering, Science, Management and Humanities as per following table:-

Sl. No.	Name of the Post	Pay Scale	Vacancy*	Age preferably Below
1	Asst. Professor (on Pre-Ph.D. Contract)	PB – 3(15,600 – 39,100) AGP – 6,000/-	Total – 95	30
2	Asst. Professor (on Contract)	PB – 3(15,600 – 39,100) AGP – 6,000/-		35
3	Asst. Professor	PB – 3(15,600 – 39,100) Minimum Pay in Pay-band 30,000 AGP – 8,000/-		40
4	Associate Professor	PB – 4(37,400 – 67,000) Minimum Pay in Pay-band 42,800 AGP – 9,500/-		45
5	Professor	PB – 4(37,400 – 67,000) Minimum Pay in Pay-band 48,000 AGP – 10,500/-		50

\* Distribution of vacancy among Professor, Associate Professor and Assistant Professor is flexible.

#### **Educational Qualification & Experience:-**

Detailed Educational Qualification & Experience are given in [Annexure – I](#).

#### **Reservations and Relaxations:-**

Reservations and relaxations to the candidates belonging to the Scheduled Castes, Scheduled Tribes, Other Backward classes, Ex-serviceman and other special categories are applicable as per Govt. of India Norms.

#### **Academic compensations and Incentives:**

In addition to normal pay and allowances as applicable to the central Govt. employees stationed at Rourkela, following additional incentives are also available to the faculty members:-

- Full funding for attending national/international conference either for presenting a paper or chairing session as per Institute guidelines membership of professional Societies and purchase of books under Professional Development Allowance (PDA), limited to Rs.3.00lakhs in 3 years for all taken together.

- b. Reimbursement of telephone charges up to Rs.500/- per month.
- c. Reimbursement of **relocation charges** from within India to join the institute.
- d. Attractive Medical facility including referral to outside specialized and reputed hospitals.
- e. **Accommodation:** Suitable residential accommodation as per rules subject to availability will be provided in the Institute Campus. HRA may be paid in lieu of residential accommodation.

**Important notes:**

- a. As an institute of national importance, NITR strives to have a workforce which reflects an all-India character and hence candidates from all over the country are encouraged to apply.
- b. NITR strives to have a workforce which also reflects gender balance and hence women candidates are especially encouraged to apply.
- c. No person, (i) who had entered into or contracted a marriage with a person having a spouse living; or (ii) who having a spouse living, has entered into or contracted a marriage with any person, shall be eligible for appointment to the said post; provided that the Board of Governors may, if satisfied that such marriage is permissible under the personal law applicable to such a person and the other party to the marriage and that there were other grounds for so doing, exempt any person from the operation of this rule.
- d. Fresh appointments beyond the age of 60 years is discouraged except in the case of faculty with exceptionally brilliant research (particularly industrial research involving a strong record of patents) career and with ongoing or approved externally funded research projects.
- e. There shall be no distinction between external and internal candidates with regard to the requirements of qualification and experience except that there shall be no age bar nor specialisation constraint on existing faculty applying for a higher post.
- f. Minimum requirement of experience may be relaxed for otherwise outstanding candidates.
- g. Mere fulfilment of minimum qualification and experience requirements does not entitle any candidate for a call for interview. A short listing criterion may be set higher than the minimum advertised.
- h. Depending on perceived availability of qualified candidates, different departments may set different short listing criteria.
- i. Apart from merit, the specialization of a candidate within a department will play a vital role in selection. Candidate with specialization in greater need by the department will be given preference. Candidates with studentship or work experience in reputed universities, institutions or industry or with greater relevance to the academic programmes of the department will be given preference. The institute's decision on reputation of other universities/institute will be binding.
- j. Experienced and/or meritorious candidates may be granted higher starting pay on recommendation of selection committees.
- k. For the same achievement in terms of research record, younger candidates will be given preference.
- l. Candidates possessing qualifying degrees in branches other than the one being approved for but possessing superior academic record, appropriate course background and relevant research experience will be considered on merit.
- m. Candidate without Ph.D. degree will be required to enrol in the Institute's Ph.D. programme while taking a reduced teaching load.
- n. Candidates in an advanced stage of Ph.D. in any Institute are encouraged to apply. If selected, the candidate may be given time up to one year to complete Ph.D. and join NITR or complete the programme (Ph.D.) after joining NIT Rourkela. This will be considered on case to case basis.

- o. Candidates who are unable to attend the interview for being abroad or for any other reason can be permitted to attend the interview through video conferencing on a case-to-case basis.
- p. Students pursuing Ph.D. will need to enclose a reference letter from their thesis supervisor indicating the status of his/her project and the expected time required for completion of research work.
- q. No correspondence whatsoever will be entertained from the candidates regarding the conduct and result of the interview and reasons for not being called for an interview or selection.
- r. Canvassing in any form will lead to rejection of the application form.
- s. If suitable candidates are not available for positions of Professor or Associate Professor, the positions may, at the discretion of the Board, be utilized for recruiting faculty in lower positions.
- t. The Institute reserves the right to place a reasonable limit on the total number of candidates to be called for a test and/or interview. Mere fulfillment of qualification per se does not entitle a candidate to be called for a test and/or interview.
- u. The Institute reserves the right to call for an interview of all the eligible candidates or short-listed candidates after screening by the Institute. The Institute also reserves the right to defer or cancel the selection process without assigning any reason thereof. The decision of the Institute in this regard will be final and binding on all the applicants who respond to this advertisement. No interim communication on the status of application will be entertained.
- v. Persons employed in Government / Semi-Government Organizations / Autonomous Bodies should submit their applications through the proper channel. Alternatively, they may send an advance copy of the application and may submit the NOC at the time of interview.
- w. The Institute reserves the right to offer a lower post including an entry-level post of the cadre to any candidate if sufficiently qualified and experienced candidates with commensurate performance in trade test and interview are not available at higher GP/AGP.
- x. In order to attract bright candidates and enhance competition, the Institute reserves the right to publicize the vacancies through letters, email and telephone and other media sent to selected institutes, organizations and individuals in addition to the basic mode of advertising on the Institute website and/or newspapers.
- y. Applications received before the published closing date will be considered for scrutiny and selection. Applications received after the closing date may still be considered at the discretion of the Institute depending on the number and quality of applications received within the due date. In such cases, all applications received till the revised closing date will be considered. The revised closing date, if any, may be different for different departments and posts.

#### **HOW TO APPLY:-**

- a. Candidates willing to apply for one or more posts are requested to apply online at "[http://www.nitrkl.ac.in/ JOBS & TENDERS /Faculty Position](http://www.nitrkl.ac.in/JOBES & TENDERS /Faculty Position)".
- b. Persons employed in Government and Semi-Government organizations may apply directly against the standing advertisement. For this the application should be completed online. The printout of the application generated online should be submitted through the employer if shortlisted for interview.
- c. The online application can be filled in multiple sessions.
- d. Candidates are required to check the Institute website from time to time for the latest information, application status, call for interview, change of dates and final results.
- e. Applications shall be received online only. Please do not send applications or CVs against this advertisement by email or letter mail.

**Annexure – I**

**QUALIFICATION & PAY SCALES UNDER 4-TIRE FLEXIBLE FACULTY STRUCTURE**

Sl. No.	Name of the Post	Pay Scale	Basic Educational Qualification & Experience	Additional Academic/Research Requirement	Remark
1	Asst. Professor (on Pre-Ph.D. Contract) (For candidates pursuing Ph. D. and expecting submission within a year)	Pay Band – PB/3 (15,600 – 39,100) AGP – 6,000/-	i. Qualification – Post Graduate from a reputed Institute/University in one of the appropriate branch with specialization as mentioned in <a href="#">Anx-II</a> with good academic record throughout. ii. Experience – Not Applicable	Not Applicable	i. Assistant Professors to be recruited on contractual basis are not part of the regular faculty cadre in NITs. Appointment at this level may be made on contract basis to enable bright young Ph. D. scholars to teach and earn experience in premier institutions. ii. To encourage fresh Ph.D.s to join the teaching system, at least 10% of the total faculty strength should be recruited at this (AGP-6,000/-) level. iii. Relaxation in respect of educational qualifications may be given up to 25% of total Asst. Professors recruited. The reasons for such relaxations should be duly recorded and reported to the Board of Governors.
2	Asst. Professor (on Contract)	Pay Band – PB/3 (15,600 – 39,100) Pay in PB – 22,240/- AGP – 6,000/- Initial Basic Pay – 28,240/-	iii. Qualification – Ph. D. from a reputed Institute/University in one of the appropriate branch with specialization as mentioned in Anx-II with good academic record throughout. i. Experience – Not Applicable	i. One publication in an SCI Journal.	
3	Asst. Professor	Pay Band – PB/3 (15,600 – 39,100) Pay in PB – 30,000/- AGP – 8,000/- Initial Basic Pay – 38,000/-	iv. Qualification – Ph. D. from a reputed Institute/University in one of the appropriate branch with specialization as mentioned in <a href="#">Anx-II</a> with good academic record throughout. i. Experience - At least 3 years industrial/ research/ teaching experience excluding however, the experience gained while pursuing Ph.D or 6 years total (not counting Ph.D enrolment period) after obtaining Post Graduate degree.  Note - Assistant Professors on completion of 3 years of service shall move to Pay Band - 4 (37,400-67,000) with an AGP of 9,000/- and will, however, continue to be designated as Assistant Professor.	i. Two publications in SCI journal or one patent (may be based on Ph.D work)	

Sl. No.	Name of the Post	Pay Scale	Basic Educational Qualification & Experience	Additional Academic/Research Requirement
4	Associate Professor	Pay Band – PB/4 (37,400 – 67,000) Minimum Pay in PB – 42,800/- AGP – 9,500/-	<p>i. Qualification - Ph. D. with first class at the preceding degree or equivalent in the appropriate branch as mentioned in <a href="#">Anx-II</a> with a very good academic record throughout.</p> <p>ii. Experience - At least 6 years (post Ph.D.) or 9 years total (not counting Ph.D. enrolment period) of Teaching / Industry / Research experience, out of which at least 3 years should be at the level of Assistant Professor with AGP 8,000/- or equivalent. (GP – 7,600/- will be treated as equivalent to AGP – 8,000/-)</p>	<p>i. Four papers in SCI Journal outside Ph. D work.</p> <p>ii. One Ph.D. guided as sole or principal supervisor plus one continuing.</p> <p>iii. Two projects ongoing or one ongoing and one completed.</p> <p>iv. Two experiments or computational projects added to teaching laboratories where appropriate.</p> <p>v. One or more patents</p> <p>vi. Strong liaison with industry.</p> <p>vii. Academic outreach activity equivalent to two self financed short term courses.</p> <p>viii. Offering courses through application of ICT.</p>
5	Professor	Pay Band – PB/4 (37,400 – 67,000) Pay in PB – 48,000/- AGP – 10,500/- Initial Basic Pay – 58,500/-	<p>i. Qualification - Ph. D. with first class at the preceding degree or equivalent in the appropriate branch as mentioned in <a href="#">Anx-II</a> with a very good academic record throughout.</p> <p>ii. Experience - At least 10 years (post Ph.D.) or 13 years total (not counting Ph.D. enrolment period) of Teaching / Industry / Research experience, out of which at least 4 years should be at the level of Assistant Professor with AGP 9,500/- or equivalent. (GP – 8,900/- will be treated as equivalent to AGP – 9,500/-)</p>	<p><u>Till Date</u></p> <p>i. Three Ph.D. degrees guided in career as sole or principal supervisor.</p> <p>ii. One or more patents.</p> <p>iii. Preparing E-Learning material.</p> <p>iv. Strong liaison with industry. High value sponsored or consultancy projects.</p> <p>v. Offering significant support to Institute management.</p> <p><u>Last Four Years</u></p> <p>i. Three papers in SCI Journal.</p> <p>ii. One high value sponsored or consultancy project.</p> <p>iii. Two experiments or computational projects added to teaching laboratories where appropriate.</p> <p>iv. Academic outreach activity equivalent to two self-financed short-term course offered as the co-ordinator and main teacher.</p>

**Appropriate Branch**

**The following points provide some exceptions or clarifications to “appropriate branch”**

- a. **Computer science & Engineering:** B. Tech. in Computer Science/ Information Technology or M. Sc. in Computer Sc. followed by M. Tech. and Ph. D. in Computer Science.
- b. **Electronics & Communication Engineering:** Candidates having B.Tech.in Electronics Engineering/ Communication Engineering/ Instrumentation engineering/ Electrical Engineering or any combination of these disciplines will be considered. Candidates M Tech and PhD work should match any of the research activities of the department.
- c. **Humanities & Social Sciences:** Post Graduate degree in Economics/ English/ Psychology/ Sociology/ Anthropology/ English/ Hindi/ Odia/ Sanskrit
- d. **Biotechnology:** PhD in Biotechnology with B. Tech. in any branch of engineering. Candidates with M.Sc. degree in Biotechnology followed by M. Tech. and PhD in Biotechnology will be considered on the basis of subjects studied at M. Sc. and M. Tech. level, PhD research topic (relevance to industry) and post PhD experience.
- e. **Medical Engineering:** PhD or M. Tech. in Biomedical Engineering, Electronics Engineering, Electrical Engineering, Mechanical Engineering, Metallurgical Engineering, Materials Engineering, Instrumentation Engineering, or Chemical Engineering or B. Tech. in any branch of engineering with PhD and post PhD work in the area of Medical Engineering. B Tech, M Tech, Ph. D. in any branch(es) of Engineering with research focus on Medical Engineering; candidates possessing degrees in Biomedical Engineering, Electronics, Instrumentation, Chemical Engineering, Mechanical Engineering and Biotechnology will be given preference.

**SPECIALIZATION (Following is the list of academic groups in each department. Vacancy exist in almost all field.)**

**Biotechnology & Medical Engineering:** i) Cell and Molecular Engineering; ii) Bioprocess Engineering; iii) Environmental & Plant Biotechnology; iv) Biomechanics & Biotransport Engineering v)Tissue Engineering and Biomaterials; vi) Medical Electronics and Instrumentation

**Ceramic Engineering:** i) Structural & Advanced Ceramics ii) Nano and Bio-ceramics Group iii) Electro ceramics iv) Industrial Ceramics;

**Chemical Engineering:** i)Modelling, Simulation & Control ii)Material Research iii)Separation & Purification iv)Energy and Environmental Engineering v)Transport Processes

**Chemistry:-** i)Organic Chemistry, ii)Physical and computational Chemistry

**Civil Engineering Groups:-** i)Structural Mechanics; ii)Earthquake Structural Engineering; iii)Concrete Materials & Structural Integrity; iv) Transportation Engineering; v)Geotechnical Engineering; vi)Water Resource Engineering; vii) Environmental Engineering

**Computer Science & Engineering:-** i)Software Engg.; ii)Network and Secured Computing iii)Intelligent Computing and Computer Vision; iv)Communication and computing

**Electrical Engineering:-** i)Power Electronics & Drives; ii)Power System; iii)Control & Automation; iv)Electronics System & Communication

**Electronics & Communication Engineering:** i) Communication; ii)VLSI & Embedded Systems; iii)Signal Processing; iv)Instrumentation

**Humanities & Social Sciences:** i) Language and Literature; ii) Applied Economics and Development; iii) Behavioural and Allied Sciences; (iv) Socio - Anthropological

**Industrial Design:** i) Product Modelling , Design and Analysis ii) Innovative Product Design iii) Rapid Product Development and Reverse Engineering iv) Industrial Automation

**Life Sciences:-** i) Biochemistry and Molecular Biology; ii) Cell and Developmental Biology; iii) Immunology and Molecular Medicine; (iv) Microbiology and Ecology (v) Bioinformatics Group; vi) Biophysical Sciences

**Mathematics:** i) Analysis, Algebra and Topology; ii) Statistics and Optimization and Discrete iii) Applied Mathematics

**Mechanical Engineering:** i) Refrigeration and Cryogenics; ii) Fluid Flow and Heat Transfer; iii) Robotics and Mechatronics; iv) Machine Dynamics and Vibration; v) Manufacturing Science; vi) Industrial Engineering; vii) Composite Materials and Surface Engineering

**Metallurgical & Materials Engineering:** i) Physical Metallurgy; ii) Mechanical Metallurgy; iii) Process Metallurgy; iv) Computational Metallurgy ; v) Composites Materials; vi) Thin Film and Surface Coating

**Mining Engineering:** i) Mine Environment ii) Geomechanics

**Physics:** i) Theoretical ii) Experimental

**Planning & Architecture:** Architecture

**School of Management:** (i) Human Resource; ii) Marketing; iii) Operations; iv) Systems; v) Decision Science; vi) General Management;

**Food Process Engineering:** i) Post Harvest Operations; ii) Food Quality Control and Safety; iii) Food Process, Modelling and Simulation; iv) Product Development and Ingredients Innovation

**Earth and Atmospheric Science:** i) Applied Geology ii) Atmospheric Sciences