Ph.D. Rules & Regulations

(Applicable from Academic Session 2024-25 Onwards)





National Institute of Technical Teachers Training and Research (Deemed to be University under Distinct Category) Sector - 26, Chandigarh - 160 019

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National Institute of Technical Teachers Training & Research, Chandigarh (Deemed to be University under Distinct Category)

Ph.D. Rules & Regulations - 2024

The following Rules and Regulations have been made by National Institute of Technical Teachers Training & Research (NITTTR), Chandigarh, Deemed to be University under Distinct Category (DTBU)), taking into consideration the U.G.C. Minimum Standards and Procedure for the award of Ph.D. Degree Regulations, 2022, published on 7th November, 2022 namely:

1. Short Title, Application and Commencement

These Rules and Regulations may be called NITTTR Chandigarh (DTBU) (Minimum Standards and Procedure for Award of Ph.D. Degree) Regulations, 2024.

2. Definitions

In these Regulations, unless the context otherwise requires:

- a) "Act" means the University Grants Commission Act, 1956 (3 of 1956);
- **b)** "Adjunct Faculty" means a part-time or contingent instructor, but not full-time faculty member hired to teach by a Higher Educational institution;
- c) "Cumulative Grade Point Average (CGPA)" means a measure of the overall cumulative performance of a student over all semesters. The CGPA is the ratio of total credit points secured by a student in various courses in all semesters and the sum of the total credits of all courses in all semesters. It is expressed up to two decimal places;
- d) "Credit" means the number of hours of instruction required per week over the duration of a semester. A four-credit course in a semester means four one-hour lectures per week, with each one-hour lecture counted as one credit;
- e) "Commission" means the University Grants Commission established under Section 4 of the UGC Actl956;
- f) "Course" means one of the specified units which go to comprise a programme of study;
- **g**) "Course Work" means courses of study prescribed by the School/Department/ Centre to be undertaken by a student registered for the Ph.D. Degree;

- h) "Degree" means a degree awarded by a Higher Educational institution in accordance with the provisions of section 22 (3) of the Act;
- i) "External examiner" means an academician/researcher with published research work who is not part of the Higher Educational institution where the Ph.D. scholar has registered for the Ph.D. programme;
- i) "Grade Point" means a numerical weight allotted to each letter grade on a 10-point scale;
- k) "Guide/Research Supervisor" means an academician/researcher recognized by Higher Educational institution to supervise the Ph.D. scholar for his/her research;
- "Interdisciplinary Research" means research conducted by a Ph.D. scholar in two or more academic disciplines;
- m) "Online Mode" shall have the same meaning as defined under the UGC (Open and Distance Learning Programmes and Online Programmes) Regulations 2020;
- n) "Plagiarism" means the practice of taking someone else's work or idea and passing them as one's own;
- o) "Programme" means a higher education programme pursued for a degree specified by the Commission under sub-section(3) of section 22 of the Act;
- p) "Information Brochure" means any document, whether in print or otherwise, issued for providing fair and transparent information relating to a Higher Educational institution and programmes, to the general public (including to those seeking admission in such Higher Educational institutions) by the Higher Educational institutions;
- **q)** "Research Proposal" means a brief write-up giving an outline of the proposed research work which the Ph.D. scholar shall submit along with the application for registration for Ph.D. programme;
- r) "University" means a Higher Educational institution established or incorporated by or under a Central Act, a Provincial Act, or a State Act, and shall include any institution for higher education deemed to be a University under Section 3 of the Act.

3. Eligibility Criteria for Ph.D. Admission

In-service Teachers/ Working Professionals and Master's Degree holders aspiring to be teachers are eligible to apply for admission in Ph.D. programmes subject to the following minimum eligibility criteria:

- **3.1** Ph.D. under QIP Scheme of AICTE: Please refer the eligibility criteria prescribed as per the AICTE-QIP scheme information brochure available at https://qip.aicte-india.org/assets/manuals/QIP_Admission_Brochure_21_05_2024.pdf.
- **3.2** Ph.D. under Sponsored (by Institute/ Industry/Other Organizations/ Self) Scheme (Regular/Full-time or Modular/Part-time):
 - Relevant Master's Degree or Equivalent in Engineering/ Applied Sciences/ Management with a minimum CGPA of 6.00 on a 10-point scale or 60% (55% in case of SC/ ST/ PWD/ OBC/ EWS) marks in aggregate where marks are awarded.

AND

ii. Qualified GATE/ NET/ other such national fellowship test or Ph.D. Entrance Test of NITTTR, Chandigarh (DTBU) in the respective discipline.

Note: For the candidates opting for Modular/Part-time Ph.D., an experience of minimum two years is essential.

Any other additional eligibility criteria as per sponsoring/ funding agency's requirement will also be applicable.

4. **Programme Duration**

- 4.1 Ph.D. Programme shall be for a minimum duration of three (03) years for Regular/Full-time and four (4) years for Modular/Part-time candidates from the date of admission.
- **4.2** The maximum permissible duration is eight (08) years from the date of registration to the Ph.D. programme provided timely justification and extension (on a yearly basis) is submitted through supervisor and RDC.
- **4.3** A candidate does not require to seek any extension for submission of thesis upto 6 years from the date of admission. After 6 years, a maximum of two years extension (one year at a time) may be granted by the Director, on the recommendation of the concerned Supervisor and Dean (Academics and Students) on the basis of valid justifiable grounds. The total period for completion of Ph.D. programme should not exceed 8 (eight) years from the date of admission in such cases.
- **4.4** The female candidates and Persons with Disability (more than 40% disability) may be allowed a further relaxation of two (02) years beyond 08 years. The total period for completion of Ph.D. programme should not exceed 10 (ten) years from the date of registration in such cases.

- **4.5** The women candidates may be provided Maternity Leave/ Child Care Leave in the entire duration of Ph.D. up to 240 days. These 240 days shall be inclusive of the maximum stipulated period of 10 years.
- **4.6** If a candidate fails to submit the thesis within the stipulated period of 8 years (10 years for females and Persons with Disability) as per the above-mentioned clauses, his/her registration will automatically stand cancelled.

5. Admission Procedure

- **5.1** A valid GATE/NET/other such national fellowship test or Ph.D. Entrance Test of NITTTR Chandigarh (DTBU) in the respective discipline.
- **5.2** The Ph.D. Entrance Test conducted by NITTTR Chandigarh (DTBU) will have a validity of 2 (two) years from the date of test.
 - **a.** For engineering branches, the syllabus of the test will be that of the latest GATE examination for the corresponding branch.
 - b. For Management related branches, the syllabus of the entrance test will be that of latest UGC-NET examination for Management (including Business Admn. Mgt./Marketing/ Marketing Mgt./Industrial Relations and Personnel Mgt./ Personnel Mgt./Financial Mgt./Co-operative Management).
 - **c.** For Physics and Mathematics, the syllabus of the entrance test will be that of latest CSIR-UGC NET examination for Physical Sciences and Mathematical Sciences respectively.
 - **d.** For any other discipline or subject area for which national level examination is not conducted, NITTTR Chandigarh will provide the syllabi for the entrance test.
 - e. The entrance test will consist of 50 Multi-Choice Questions (MCQs) and the duration of the test will be 1 hour. The test will comprise of 25 questions from the relevant discipline and the remaining 25 questions related to basics of research methodology.
- **5.3** Awardees of JRF/National/ International fellowship for pursuing Ph.D. may seek admission in the Ph.D. Programmes throughout the year.
- **5.4** Candidates who secure 50 % marks in the entrance test are eligible to be called for the interview.
- **5.5** For regular employees of NITTTR Chandigarh, Regulatory Bodies like AICTE/UGC etc., National Laboratories, Public Sector Undertakings and Limited Industry/Company having a minimum of 10 years of total work experience and fulfilling conditions as

mentioned in the clause 3.2 (i), the Director may waive off the condition of a written test as mentioned in clause 3.2 (ii), on the recommendation of a five-members committee comprising of Dean – Academics & Students, Dean – Research & Innovation and three professors from the relevant field – two from NITTTR Chandigarh and one from outside organization. Such candidates will be considered for admission to Ph.D. program in Modular/Part-time mode only without any financial support.

- **5.6** The institute may decide the number of eligible candidates to be called for an interview based on the number of Ph.D. seats available in the respective department.
- **5.7** The institute may decide the number of eligible candidates to be called for an interview based on the number of Ph.D. seats available in the respective department.
- 5.8 Eligible candidates will be called for an interview to assess the following aspects:
 - **a.** the candidate's competence for the proposed research;
 - **b.** the feasibility of conducting the proposed research work at the institution;
 - **c.** the likely contribution of the proposed area of research to new/additional knowledge as per the mandate of NITTTR Chandigarh (DTBU).
- **5.9** The candidate must score at-least 50% marks in the interview to be eligible for admission in the Ph.D. Programmes.
- **5.10** For the final selection of all eligible candidates to the Ph.D. Programmes, the merit list shall have a weightage of 70% for the Entrance Test and 30% for the performance in the interview.
- **5.11** The reservation policy of the Government of India as applicable from time to time will be followed in admission.

6. Allocation of Research Supervisor

- **6.1** Eligibility for being supervisors: The following may be considered for acting as a supervisor for a Ph.D. scholar:
 - **a.** All faculty members of the institute with a doctoral degree: Permanent faculty members working as Professor/Associate Professor with a Ph.D., and at least five research publications in peer-reviewed or refereed journals and permanent faculty members working as Assistant Professors with a Ph.D., and at least three research publications in peer-reviewed or refereed journals may be recognized as a supervisor. Such recognized supervisors cannot supervise research scholars in other institutions, where they can only act as co-supervisors.

- **b.** Scientific / Research / Design staff of the institute with a doctoral degree can act as a co-supervisor.
- **c.** Ph.D. holders working in Central government/ State government research institutions whose degrees are given by Higher Educational institutions: the scientists in such research institutions who are equivalent to Professor/Associate Professor/Assistant Professor can be recognized as co-supervisors if they fulfil the above requirements as mentioned in 6.1(a).
- **d.** Faculty members with less than three years of service before superannuation shall not be allowed to take new research scholars under their supervision. However, such faculty members can continue to supervise Ph.D. scholars who are already registered until superannuation and as a co-supervisor after superannuation, but not after attaining the age of 70 years.
- e. Co-supervisors from within the same department or other departments of the same institution or other institutions may be permitted with the approval of the competent authority. However, to encourage interdisciplinary/multidisciplinary research aimed at providing solutions to industrial/societal problems, it is recommended that the co-supervisors be from other departments/organizations/industry/field.
- **f.** Adjunct Faculty members shall not act as supervisors and can only act as cosupervisors.
- g. In case of interdisciplinary/multidisciplinary research work, if required, a cosupervisor from outside the Department/School/Centre/College/University may be appointed.
- **h.** A research scholar may have up to two co-supervisors in total, with no more than one from the institute and one from outside.
- i. Faculty or staff members supervising a Ph.D. scholar shall not enroll any candidate under their supervision who has immediate relations, i.e., spouse, parents, brothers, sisters, or other close relatives.
- **j.** A seat with supervisor will be considered vacant immediately on the submission of the Ph.D. thesis of the candidate.
- 6.2 An eligible Professor/Associate Professor/Assistant Professor can guide up to eight (08) / six (06) / four (04) Ph.D. scholars, respectively, at any given time. The total number of candidates under a faculty member at NITTTR Chandigarh (DTBU) shall not exceed the number as prescribed above including the candidates under co-supervision. The

above number includes those under guidance at NITTTR Chandigarh (DTBU), and also outside NITTTR Chandigarh (DTBU). As a special case, an Assistant Professor approved for guiding Ph.D. scholars may be allowed to supervise 06 scholars for Ph.D. after completion of 12 years of service. Similarly, an Associate Professor after three years of service be allowed to enroll 08 scholars for Ph.D. program. A candidate registered for Ph.D. under the Institute faculty will be counted as 'one' whether or not the concerned faculty is sole supervisor/co-supervisor.

- **6.3** As per the UGC orders No. F.9-1/2020(PS/Misc.) dated March 6th, 2023, eligible permanent/regular faculty members as per 6.1 can guide Ph.D. scholars during their probation period.
- **6.4** In case of relocation of a female Ph.D. scholar due to marriage or otherwise, the research data shall be allowed to be transferred to the Higher Educational institution to which the scholar intends to relocate, provided all the other conditions in these regulations are followed, and the research work does not pertain to a project sanctioned to the parent institution/supervisor by any funding agency. Such scholar shall, however, give due credit to the parent institution and the supervisor for the part of research already undertaken.

6.5 Change/Addition of Supervisor

A faculty member appointed as a Ph.D. supervisor is normally expected to be available to a research scholar in the institute till the thesis viva-voce examination. However, under unavoidable circumstances, such as: long leave of more than 12 months; resignation; retirement; or death; a supervisor may not be available to the scholar. In such special cases, appointment of supervisor(s) will be regulated as under:

A supervisor proceeding on long leave of more than 12 months: If a joint supervisor exists, the supervisor going on leave for more than 12 months can continue as a joint supervisor. If a joint supervisor does not exist, one may be appointed if the research scholar has not yet submitted the synopsis. If the synopsis or thesis is submitted before the supervisor goes on leave, the supervisor will remain in that role, and only a caretaker supervisor will be appointed.

To process the request for change of supervisor, in case all the seats in the department are full, the RDC of NITTTR Chandigarh (DTBU) would be authorized to allocate that particular Ph.D. scholar to any of the faculty members as a supernumerary seat in the department following standard procedure as per the NITTTR Chandigarh (DTBU) rules and regulations.

The Research Advisory Committee (RAC) of a research scholar may recommend change of supervisor or appointment of a co-supervisor for valid reasons.

7. Supernumerary Seats in Ph.D. Programme

Supernumerary seats in exceptional situation be created under any of the following categories: -

- **a.** An overseas international/Foreign candidate interested in Ph.D. having fellowship/financial support for at least 3 years and fulfilling the Ph.D. enrolment criteria.
- **b.** A supervisor having a national/international research project with minimum financial support for stipend for at least 3 years and fulfilling the Ph.D. enrolment criteria by the candidate.
- c. Candidate with the award of any national fellowship funded by Government of India like PM Fellowship, National Fellowship for Scheduled Caste candidates (NFSC)/Maulana Azad National Fellowship/National Fellowship for Persons with Disabilities/INSPIRE etc.
- **d.** A supervisor having a project with adequate funds to support research scholar for at-least 3 years, may be allowed to have more research scholars than the prescribed limit.

NOTE: For decision on supernumerary seats, the concerned Dean (Academics and Students) be authorized to constitute a High-Level Standing Committee consisting of three senior faculty members from the University and two from outside the University, of the level of Professor or above to decide the number of research scholars on case-to-case basis.

8. Course Work (Credit Requirements, Duration, Syllabus, Minimum Standards for Completion)

8.1 The credit requirement for Ph.D. coursework is minimum of 12 credits, including a course on 'Research and Publication Ethics' and a course on 'Research Methodology', which could cover areas such as quantitative methods, computer-based tools, research ethics and methods to review published research in the relevant field, training, field work, etc. One course of advanced level relevant to the research area chosen for the

Ph.D. degree will be allocated to the scholar by the concerned Research Advisory Committee (RAC). The RAC can also recommend UGC recognized online courses as part of the credit requirements for the Ph.D. Programme.

- **8.2** All courses prescribed for Ph.D. course work shall be in conformity with the credit hour instructional requirement and shall specify content, instructional and assessment methods. These will be duly approved by the authorized academic bodies. It is clarified that the course work will spread over a minimum of one semester/spell and will comprise of at least 12 hours per week of teaching/contact hours.
- **8.3** All candidates admitted to the Ph.D. programmes shall be required to complete the Course Work prescribed by the department within one year of the registration. The departments having course work of one semester/spell may conduct the same in any (even or odd) of the two semesters/spells. To facilitate the requirement of Pre-Ph.D. course work, the departments may run one semester/spell course work in both semesters/spells independently. However, in the departments having course work of one year, these departments shall commence the course work strictly following the regular schedule of the academic calendar.
- **8.4** Grades in the course work shall be finalized after an assessment by the RDC and the final grades shall be communicated to the Academic Cell.
- **8.5** A Ph.D. scholar has to obtain a minimum of 55% marks (or its equivalent grade in the UGC 10-point scale whenever the grading system is followed to evaluate Pre-Ph.D. coursework under New Education Policy-2020) in the course work in order to be eligible to continue in the programme and submit the thesis. The candidate will have to qualify in each subject with aforementioned minimum pass percentage of 55% marks or its equivalent grade for passing this. The minimum pass percentage in each paper is to be satisfied by adding both 'examination-based evaluation' and 'internal evaluation' (if any).
- **8.6** The RAC may recommend waiver of pre-PhD course work if the candidate has already completed the pre-PhD course work successfully from a UGC recognized university/deemed-University.

9. Research Advisory Committee (RAC), Research Degree Committee (RDC) and Institute Research Board (IRB)

9.1 Research Advisory Committee

A Research Advisory Committee (RAC) shall be constituted for each research scholar by the Head of the Department in consultation with the concerned supervisor and approved by the Head of the Institute. The RAC shall have the following composition:

- a. Head of the Department (Chairperson)
- b. Supervisor
- c. Director Nominee
- d. One Ph.D. faculty from another Department

In case the Head of the Department is also the supervisor, another faculty possessing Ph.D. degree from the department or from the same discipline from the Institute will be nominated as a member of the RAC by the Head of the Department. The Research Advisory Committee shall have the following responsibilities:

- **a.** To review the research proposal and finalize the topic of research.
- **b.** To guide the research scholar in developing the study design and methodology of research, and to identify any courses that may need to be studied.
- c. To recommend the synopsis of the research scholar for approval of candidacy.
- **d.** To recommend any co-supervisor(s) as per the proposed area of research of the scholar.
- e. To periodically review and assist in the progress of the research work of the research scholar.
- **f.** To decide the fitness of the research work to be submitted in the form of Ph.D. thesis.

A research scholar shall appear before the RAC once every six months to present the progress of their work for evaluation and further guidance. The six-monthly progress reports shall be submitted by the RAC to the Academic Cell, with a copy to the research scholar. In case the progress of the research scholar is unsatisfactory, the RAC shall record the reasons for the same and suggest corrective measures. If the research scholar fails to implement these corrective measures within a specified period, the RAC may recommend to the Academic Cell with specific reasons for cancellation of the registration of such research scholar.

9.2 <u>Research Degree Committee</u>

The Research Degree Committee (RDC) will consist of the following:

- **a.** Director Nominee (Chairperson)
- **b.** Head of the Department
- **c.** Supervisor(s)
- d. Faculty members of the School/Centre of Excellence with Ph.D.
- e. Two outside experts (at-least one should be available during RDC Meetings)
- Within 1½ years of the registration, the candidate shall apply through the Academic Cell for Approval of Candidacy. The candidate will be required to submit the synopsis (soft as well as hard copy) to the Academic Cell, which shall send the copy of the synopsis to all the members of the RDC. The research proposal of the scholar, recommended and forwarded by the RAC, will be considered by the RDC. The candidate shall be required to make a presentation on the topic of the proposed research. The research proposal should outline the broad objectives, scope, and approach of the proposed investigation, facilities required for successful implementation, and the significant contribution or advancement likely to be made. The RDC will review the proposal and assess its viability. The exact title, objectives, and scope of the research work can be finalized by the RDC at the time of the Pre-Ph.D. presentation and before final submission of the synopsis.
- A candidate must complete the Ph.D. coursework before applying for approval of candidacy. The synopsis and the name of the supervisor/co-supervisor, recommended and forwarded by the RDC, will then be considered and approved by the Institute Research Board (IRB) of NITTTR Chandigarh (DTBU).
- To cut short delay in approving the synopsis for Ph.D. and the name of the supervisor(s), the meetings of the RDC and IRB be held at least quarterly.
- If a research scholar (whether Regular/Full-time or Modular/Part-time) fails to obtain approval of candidacy within 24 months of admission to the Ph.D. program, his/her registration to the Ph.D. program, will automatically stand cancelled.
- 9.3 Institute Research Board (IRB)

The Institute Research Board (IRB) will consist of the following:

- **a.** Director of the Institute (Chairperson)
- **b.** All Professors of the institute

- c. Dean Academics and Students
- d. Dean Research and Innovation (Convener)
- The IRB shall have the following responsibilities:
- a. Approval of Candidacy
- **b.** Evaluation of Thesis and recommendations for the award of Ph.D. degree.

10. Evaluation and Assessment Methods, Minimum Standards/Credits for Award of the Degree

- **10.1** Prior to the submission of the thesis, the candidate will have to give a presubmission seminar before the members of RDC. The minutes of RDC shall be attached with other documents for submission of thesis while submission of thesis to Academic Cell. After the pre-submission seminar, the candidate will submit four copies of executive summary (about 1000 words) to Academic Cell within a period of maximum three months from the date of pre-submission seminar provided that the actual date of submission of the thesis is not over. If any minor changes and other corrections in the topic at the time of pre-submission seminar are recommended, these minor changes and other corrections (if any) to be made with the approval of the concerned Dean(Academics and Students).
- 10.2 Ph.D. scholars must publish at least one research paper in SCI/SCIE/WoS/PubMed/SSCI/ABDC/Scopus (Q1/Q2) Journals and at least one research paper in Scopus-indexed International Conference OR should have been granted a patent before the submission of the thesis for adjudication and produce evidence for the same. The submission of Ph.D. thesis be allowed on the basis of the submitted documentary proofs.
- **10.3** A mechanism using well developed software (prescribed by the institute) and their gadgets to detect plagiarism and other forms of academic dishonesty, shall be followed by all the departments. While submitting for evaluation, the thesis shall have an undertaking from the research scholar and a certificate from the supervisor attesting to the originality of the work, vouching that there is no plagiarism (plagiarism less than 10% with 8 consecutive words is acceptable, excluding bibliography and self-citation) and that the work has not been submitted for the award of any other degree/diploma of NITTTR Chandigarh (DTBU) where the work was carried out, or to any other institution.

- **10.4** The candidate shall submit the thesis to the Institute Research Board (IRB) through the Academic Cell. The candidate is expected to work on the thesis at the institute, except for visits to other labs or organizations with the approval of the supervisor(s) and the concerned Head of the Department.
- 10.5 The RDC shall submit a panel of minimum of eight examiners consisting of four examiners from India and four from abroad (indicating full particulars about their designation, area of specialization etc.) to the Director through IRB for the evaluation of thesis. The experts from within India must be from Professor cadre and must be affiliated with a government institution or a top 100 NIRF institution. It should be ensured by the Head of the Department and Academic Cell that the entire panel of examiners for evaluating Ph.D. thesis shall not be repeated within a period of six months. However, 50% of the examiners from a panel may be repeated individually within six months (but not collectively) in different panels in case the number of experts is limited in certain research areas. Academic Cell will make database of the examiners that may be appointed by various departments. Not more than two experts from the same institute may be suggested in the panel of examiners for evaluation of a Ph.D. thesis.
- **10.6** The Director will appoint four examiners out of the panel for thesis evaluation. The Academic Cell (within a period of one week) shall forward (through an email) the thesis summary submitted by candidate to the four approved examiners to seek their consent to evaluate the Ph.D. thesis as an external examiner. All affirmative responses of experts shall be noted and two (02) experts out of four affirmative responses shall be selected as external examiners on first-come first-serve basis. In case the affirmative responses are below the desired number (i.e., two) upto a period of 30 days from the date of asking the consent may be sent to expert so that he/she may respond within a stipulated period of 30 days. In exceptional circumstances, if the number of affirmative responses remain below the desired number after exhausting the entire panel, the RDC may be asked to revise the entire panel.
- 10.7 Each examiner shall state in his/her report in the prescribed proforma:
 - **a.** The thesis is satisfactory for the award of Ph.D. Degree.
 - **b.** The thesis is approved for the award of Ph.D. Degree subject to the clarification sought thereafter.

- **c.** The candidate is allowed to resubmit the thesis in a revised form, as per suggestions made.
- **d.** The thesis is rejected.
- **10.8** In case, reports of two examiners are positive, Academic Cell shall prepare a gist of the reports of the examiners for the consideration of the Director in order to take further decision regarding the conduct of viva-voce. There shall be an open/ public viva-voce which will be conducted at the institute.
- 10.9 The IRB shall give final recommendations for the award of Ph.D. degree on the basis of examiners' reports along with the gist of reports. The Academic Cell shall publish the result and issue provisional degree in accordance with the decision of the Chairperson, IRB.

11. Cancellation of Registration

Registration of a candidate shall be cancelled in any one of the following eventualities, after due approval of concerned Dean - Academics and Students:

- **a.** If a Ph.D. Regular/Full-time candidate abstains for a continuous period of more than one week without prior written intimation or sanction of leave by the Head of the Department.
- **b.** If academic and research progress of the candidate is not satisfactory for two consecutive semesters.
- **c.** If the candidate is found involved in an act of misconduct and/ or indiscipline and termination has been recommended by a competent authority.

12. Research Scholar Taking up a Job/ Assignment

A Full-time candidate cannot take up any job or assignment during the Ph.D. program. If a job or assignment is undertaken, the candidate's status may be converted from Fulltime to Modular/Part-time, but this change is allowed only after a minimum period of one year after having been granted candidacy for the Ph.D. program. If the requirements are not fulfilled and a job or assignment is undertaken during the Ph.D. program without prior written permission, admission to the program will be cancelled.

13. Leave Rules

A full-time candidate, during their stay at the institute, will be entitled to 30 days of leave per academic year, including leave on medical grounds, in addition to public holidays. The candidate will not be entitled to mid-semester breaks, summer, or winter vacation. Leave beyond 30 days in an academic year may be granted in exceptional circumstances, based on the recommendation of the supervisor, by the Head of the Department concerned, subject to the following conditions:

- **a.** The female scholars may be provided Maternity Leave/ Child Care Leave once in the entire duration of Ph.D. up to 240 days. The application for maternity leave should be supported by medical certificate.
- **b.** Male scholars are entitled for 15 days paternity leave once during the tenure of their Ph.D. The application for paternity leave should be supported by medical certificate.
- **c.** Special leave may be granted with the permission of Head of the Department to attend Seminars/ Conferences in India/ abroad for presenting a paper and for carrying out research work in other institutes/ laboratories as approved by the supervisor.

14. Interpretation and Amendment of Rules

For any interpretation of these rules, the matter shall be referred to Director of the institute.

These rules are subject to amendment by the institute from time to time.

ANNEXURE-I PH.D. REGISTRATION FORM

Application form for Registration as a candidate for the degree of Doctor of Philosophy in the Department of _______. *Mode:* Regular/Full-time ______. Note: The applicant must carefully read the Regulations/Rules and Instructions before filling up this form. Please fill in all the columns and clearly indicate 'NOT APPLICABLE' wherever not relevant.

| 1. | Name (Block Letters): | | |
|-----|-----------------------------|-------------|------------|
| 2. | Marital Status (Please Tick | Married | |
| | the appropriate box): | | AFFIX |
| | | Unmarried | RECENT |
| | | | PASSPORT |
| 3. | Gender (Please Tick the | Male | SIZE |
| | appropriate box): | Female | PHOTOGRAPH |
| | | Transgender | |
| 4. | Father's Name: | | |
| 5. | Mother's Name: | | |
| 6. | Aadhaar Number: | | |
| 7. | Date of Birth: | | |
| 8. | Address for Correspondence | | |
| | (including Pin Code): | | |
| | | | |
| | | | |
| | | | |
| 9. | Permanent Address | | |
| | (including Pin Code): | | |
| | | | |
| | | | |
| | | | |
| 10. | Mobile Number: | | |
| 11. | Email: | | |

12. M. Tech./ ME/ M.Sc./ MBA/ Relevant Master's Degree Details

| University/Board | Year | Division | Max. Marks | Marks Obtained | CGPA/ Percentage |
|------------------|------|----------|---------------|-------------------|---------------------|
| | | | | | |

13. Whether employed?

| If | yes, | name | and | address | of | the | Employer |
|--------|---------------|----------------|--------------|--------------|----|------|----------|
| | | | | | | | |
| (NOC | from the en | mployer be en | closed, See | Annexure II) | | | |
| Post h | eld | | | | S | ince | |
| Perma | anent /Temp | orary /Adhoc | | | | | |
| 14. | Whether ree | ceiving any sc | holarship /f | ellowship? | | | |
| If yes | , its nature, | amount, tenur | e and sourc | e | | | |

DECLARATION BY CANDIDATE

I declare that I shall abide by the regulations, rules and instructions for the degree of Doctor of Philosophy of NITTTR Chandigarh (DTBU), which I have read.

The relevant information given is correct to the best of my knowledge. I understand that if the information given is subsequently found incorrect at any stage, my candidature for registration to the Ph.D. course shall stand cancelled.

I declare that I am not related with any of my supervisor(s) through blood or any other close relations.

Signature with Date and Name of the Candidate:

DECLARATION / CONSENT OF THE PROPOSED SUPERVISOR

I, _____, have _____ candidates for

Ph.D. under my supervision whose details (Name and registration)are given below:

| 1 | 5 | |
|---|---|--|
| 2 | 6 | |
| 3 | 7 | |
| 4 | 8 | |

I declare that I am not related with the candidate through blood or any other close relations.

Signature, with complete Designation

DECLARATION / CONSENT OF THE PROPOSED CO-SUPERVISOR (01)

| I, | , have | candidates | for |
|----|--------|------------|-----|
| | | | |

Ph.D. under my supervision whose details (Name and registration)are given below:

| 1 | 5 | |
|---|---|--|
| 2 | 6 | |
| 3 | 7 | |
| 4 | 8 | |

I declare that I am not related with the candidate through blood or any other close relations.

Signature, with complete Designation

DECLARATION / CONSENT OF THE PROPOSED CO-SUPERVISOR (02)

I, _____, have _____ candidates for

Ph.D. under my supervision whose details (Name and registration)are given below:

| 1 | 5 | |
|---|---|--|
| 2 | 6 | |
| 3 | 7 | |
| 4 | 8 | |

I declare that I am not related with the candidate through blood or any other close relations.

Signature, with complete Designation

RECOMMENDATION OF THE HEAD OF THE DEPARTMENT

| I forw | vard the a | pplication of | | | | | f | or Regis | tration |
|--------|-------------|---------------|-----------|-----------------|-----------|--------------|----------|-----------|---------|
| for | the | degree | of | Doctor | of | Philoso | ophy | in | the |
| | | | | | De | partment | with | effect | from |
| | | provided | he/she i | s found eligi | ole. I fu | rther certif | fy that | the cons | ent of |
| and | | | | h | as been c | btained to | act as s | superviso | r(s) of |
| the ca | ndidate. ' | The proposed | l supervi | sor(s) fulfils/ | fulfil th | e condition | ns for a | appointm | ent as |
| superv | visor and t | he Research I | Degree C | ommittee exis | ts in the | Subject. | | | |

Head of the Department

ANNEXURE-II

NO-OBJECTION CERTIFICATE FROM EMPLOYER/SPONSORING ORGANIZATIONON LETTER HEAD (IF APPLICABLE)

Certified that the particulars given by Mr./Ms._____ S/o / W/o / D/o ______ are correct to the best of my knowledge. The institute/organization has no objection for him/her seeking admission to Ph.D. Programme in

Date:

Signature

•

Place:

Name:

Designation: Address of Organization (with Seal/Office Stamp):

ANNEXURE-III

APPROVAL OF CANDIDACY

Application form for the degree of Doctor of Philosophy in the Department of

Mode: Regular/Full-time _____

Modular/Part-Time _____

| 1. | Name (Block Letters): | |
|----|---|--|
| 2. | Father's Name: | |
| 3. | Mother's Name: | |
| 4. | Registration Number: | |
| 5. | Registration Date: | |
| 6. | Mobile Number: | |
| 7. | Email: | |
| 8. | Address for Correspondence (including Pin Code): | |
| 9. | Tentative title of thesis/broad area of work | |

I am appending herewith 5 copies of the tentative design/synopsis of my proposed research project, through the Head of the Department. I further certify that I have thoroughly checked all words and spellings of the tentative title of the proposed thesis/broad area of work/synopsis and found the same as correct.

| Signature | with | Date | and | Name | of | the | Candidate: |
|-----------|------|------|-----|------|----|-----|------------|
|-----------|------|------|-----|------|----|-----|------------|

APPROVAL OF THE CHAIRPERSON OF THE IRB FOR RESEARCH WORK LEADING TO PH.D. DEGREE

| , | | that | recommend | Ι | 2. |
|--------------|--|-----------|------------------|------|----|
| and | | | | | |
| be appointed | be | | | | |
| ng. | hose consent has already been obtained in writing. | or(s), wh | his/her supervis | as l | |

- 3. I recommend that the proposed title/broad area of work/synopsis as mentioned above be approved.
- 4. It is further certified that the appointment of supervisor(s) and tentative title of Ph.D. thesis/broad area of work have been duly recommended by the IRB in their meeting held on ______.

Recommended By:

Signatures, designation and address of Supervisor(s)

| 1. | |
|----|-----------|
| | |
| | |
| 2. | · |
| | |
| | |
| 3. | |
| | |
| | |
| | <u></u> _ |

Dean (Academics and Students)

Director (Chairperson, IRB)

ANNEXURE-IV CANDIDATE'S DECLARATION

| | ch is being presented in the thesis entitled |
|--|--|
| ··· | " |
| in partial fulfilment of the requirements fo | r the award of the Degree of Doctor of Philosophy |
| and submitted in the | Department is |
| | arch work carried out during a period from |
| to | under the supervision of |
| of | Department. The matter presented |
| in this thesis has not been submitted by m | e for the award of any other degree of this or any |
| other institute and there is no plagiarism. | |
| | |
| Signature with Date, Name of the Candida | te: |
| Registration No.: | |
| Mode: Regular/Full-time | Modular/Part-Time |

This is to certify that the above statement made by the candidate is correct to the best of my knowledge.

Signature(s) with date (Name(s)of the Supervisor(s))

ANNEXURE-V PH.D. VIVA VOCE RECORD

| The | e Ph.D. Viva-Voce | | <i>v</i> oce | Examination | | of | |
|----------|-------------------|---------------|--------------|---------------|------|------|------|
| <u> </u> | | | _,Research | Scholar | in | | the |
| | | | Dep | partment, has | been | held | on |
| | | successfully, | with | thesis | | ti | tled |
| " | | | | | | | |
| | | | | | | | |
| | | | | | | | |
| | | | | | | | |

Signature(s) with date (Name(s)of the Supervisor(s))

External Examiner

Dean (Academics and Students)

Director

ANNEXURE-VI

ANTI-PLAGIARISM CERTIFICATE

Registration No.:

Signature(s) with date (Name(s) of the Supervisor(s))

Dean(Academics and Students)

Director

ANNEXURE-VII THESIS FORMAT

- 1. Paper
 - a. The size of the paper shall be standard A4 (height 297 mm, width 210 mm), 90 GSM.
 - b. The thesis must be printed on both sides of white paper.
- 2. Font Size and Margins:
 - a. The standard font of the text shall be Times New Roman of 12 or Arial 11 pts with
 1.5 line spacing.
 - b. Font size of chapter, heading/ subheading will be on the author's discretion.
 - c. The top, bottom and right-side margins should be 25 mm, whereas the left side margin should be 35 mm for both textual and non-textual (e.g., figures, tables) pages, with mirror margin on even pages.
- 3. Pagination:
 - a. Pagination for pages before the introduction chapter shall be in lower case Roman numerals, e.g., "iv".
 - b. Page numbering in the text of the thesis shall be Hindu-Arabic numerals at the centre of the footer.
- 4. Paragraph Format:
 - a. Vertical space between paragraphs shall be 2.5 line spacing.
 - b. The first line of each paragraph should normally be indented by five characters or12mm.
- 5. Bibliography

Should be given preferably alphabetically or in the order of citations in the thesis.

- 6. Binding:
 - a. The evaluation copies of the thesis may be spiral bound or soft bound.
 - b. The final hard bound copies to be submitted after the viva voce examination will be accepted during the submission of thesis with the Brown colour with golden colour letters.

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THESIS TITLE IN 3 LINES

A THESIS

Submitted in partial fulfilment of the requirements for the award of degree

of

DOCTOR OF PHILOSOPHY

by

CANDIDATE NAME

(Registration Number)



YEAR

NATIONAL INSTITUTE OF TECHNICAL TEACHERSTRAINING AND RESEARCH (Deemed to be University under Distinct Category) CHANDIGARH (INDIA)

ANNEXURE-VIII

CITATION FOR THESIS

(100 Words)

DETAILS

Thesis Title:

Candidate Name: Registration Number: Department:

Countersigned by the Director:

Name & Signature of the Supervisors:

i)

ii)

ANNEXURE-IX

NITTTR, CHANDIGARH (DTBU)

Certificate to be Submitted at the Time of Submission of Ph.D. Thesis

It is certified that minimum one research papers related to area/topic of my Ph.D. has been published in a referred journal and minimum one research paper related to area/topic of my Ph.D. has been presented in an International Conference after my date of registration i.e., ______ to Ph.D. The detail of my research papers published is given below:

| Sr. No. | Date of Publication / Date of Conference | Name of the Journal/Conference | Title of the Research Paper | Remarks / Status |
|------------|---|-----------------------------------|--------------------------------|------------------|
| 1 | | | | |
| 2 | | | | |
| 3 | | | | |

Attached copies of the Papers with this proforma.

(Signature of the Candidate)

Verified:

Name & Signature of the Supervisors:

i)

ii)

iii)

Countersigned by Dean (Academics and Students)