RAJASTHAN TECHNICAL UNIVERSITY, KOTA



ORDINANCES & REGULATIONS Ph.D. PROGRAMME

ORDINANCES AND REGULATIONS (Ph.D. Programme)

	CONTENTS	Page
	Preamble	3
	Definitions	4
	Ordinances	6
	Regulations	7
R.1	Classifications	7
R.2	Admission Eligibility	8
R.3	Reservation / Relaxation	11
R.4	Short Listing	11
R.5	Registration	12
R.6	Thesis Supervisor(s)	12
R.7	Pattern of Courses and Credits	14
R.8	Course Credit Requirements and Registration for Courses	15
R.9	Comprehensive Examination	16
R.10	Eligibility of the Candidates for the Degree	17
R.11	Performance Monitoring	17
R.12	Seminar/ Synopsis/ Panel of Examiners	18
R.13	Board of Examiners	18
R.14	Thesis Submission	19
R.15	Thesis Evaluation	19
R.16	Resubmission	21
R.17	Viva-Voce Examination	21
R.18	Award of Ph.D. Degree	22
R.19	Financial Assistance	22
R.20	Tuition fee waiver to Ph.D. students	23
R.21	Leave and Attendance	23
R.22	Withdrawal from Semester/ Courses	24
R.23	Cancellation of Registration	25
R.24	General	25
R.25	Interpretation	25
	Appendix - A1 (Format Of Application For Admission To Ph.D.Programme)	26
	Appendix - A2 (Format of Supervisor's Registration for Ph.D.Programme)	27
	Appendix - A3 (Format of Approval of Supervisor's for a Candidate)	28
	Appendix - B (General Guidelines For Award Of Grades)	29
	Appendix - B1 (Award Of Grades Based On Absolute Marks)	29
	Appendix - B2 (Statistical Method For The Award Of Grades)	30
	Appendix - B3 (Award Of 'I' Grade)	30
	Appendix - B4 (Award Of 'X' Grade)	31
	Appendix - C (Table Showing Procedure For Awarding Marks On Research Related Activities)	32

ORDINANACES AND REGULATIONS FOR THE DEGREE OF DOCTOR OF PHILOSOPHY

PREAMBLE

Rajasthan Technical University (RTU) offers postgraduate programmes leading to the award of Ph.D. degree through its Departments / Research Centres. The award of Ph.D. degree is in recognition of high academic achievements, independent research and application of knowledge to the solution of technical and scientific problems in Applied Sciences, Engineering, Technology, Computer Applications and Management or in recognition of high academic achievements, independent research in Humanities or English. Creative and productive inquiry is the basic concept underlying the research work.

The academic programme leading to the Ph.D. degree is broad-based and involves a minimum course credit requirement and a research thesis. The University also encourages interdisciplinary areas through a system of co-supervision through its academic departments and research centres and provides excellent opportunities for such programmes. The University undertakes sponsored research and development projects from industrial and other organizations in the public as well as private sector.

The degree of Doctor of Philosophy shall be abbreviated as Ph.D. The degree of Doctor of Philosophy is granted for research work in areas recognized by the Academic Departments/bodies of the University, subject to the conditions and regulations contained hereinafter.

The research work shall be an original work characterized either by the discovery of facts, or by a fresh approach towards the interpretation and application of facts, or development of equipment making a distinct advance in instrument technology. It shall evince the candidate's capacity for critical examination and sound judgment and shall represent original contribution to the existing knowledge.

The degree of Doctor of Philosophy (Ph.D.) of the Rajasthan Technical University, Kota shall be conferred on a candidate who fulfills all the requirements specified in these Ordinances and Regulations. The degree of Doctor of Philosophy will be awarded on the research work carried out by the candidate.

DEFINITIONS

- i. "Applicant" shall mean an individual who applies for admission to the Ph.D. programme of the Rajasthan Technical University, Kota on a prescribed Application Form.
- ii. "Candidate" shall mean a person registered for the Ph.D. degree and who has successfully completed the course requirement or equivalence, the comprehensive examination and submitted an approved research plan as per R.10 of the Regulations.
- iii. "Caretaker Supervisor" shall mean a member of the academic staff appointed to look after the candidate's research interests in the absence of the Supervisor and after the submission of the thesis.
- iv. "Centre" shall mean Research Centre approved / recognized by the University, where research work is permitted to be pursued.
- v. **"Co-supervisor"** shall mean an additional supervisor approved by the Dean (Research) on the recommendation of DRC / CRC to help in the accomplishment of the research work of the student/candidate, as per R.6 of the Regulations.
- vi. "Course Advisor" shall mean a faculty member nominated by the Department / Research Centre to chalk-out the programme of study of a student registered for the Ph.D. and to advise him on the courses to be taken by him. If a supervisor(s) has already been appointed, he shall be the Course Advisor for that student.
- vii. "Course Work" shall mean courses of study prescribed in the Department / Research Centre through the Course Advisor to be undertaken by a student registered for the Ph.D. Degree.
- viii. "CRC" shall mean Research Committee of the Research Centre.
- ix. "Dean (Research)" shall mean the Dean Research to be appointed by the Vice Chancellor. All the matters related to Ph. D. degree shall be routed through Dean (Research)
- x. "Degree" shall mean the Degree of Doctor of Philosophy (Ph.D.) of the Rajasthan Technical University, Kota.
- xi. "DRC" shall mean Research Committee of the Department.
- xii. **"Educational Institution"** shall mean those colleges which offer Bachelor's or higher Degree.
- xiii. **"Full-time Research Student/Candidate"** shall mean a person registered for the Ph.D. Degree devoting full time for completing the degree requirements.

- xiv. "Minimum Registration Period" shall mean the minimum period for which a candidate must be registered, including the time spent as student before becoming a candidate, prior to submission of the thesis.
- xv. "ODC" shall mean Oral Defense Committee.
- xvi. "Part Time Research Student / Candidate" a person who is registered for the Ph.D. degree and will devote part of his time towards this pursuit and devote part of time towards the discharge of his official obligations.
- xvii. "Registration Period" shall mean the length of time span commencing with the date of initial registration at the University / Research Centre on full-time basis.
- xviii. "Research Board" shall mean the Research Board of the Rajasthan Technical University, Kota
- xix. "Residency" shall mean the minimum period for which a student/ candidate must attend the University / Research Centre on full-time basis.
- xx. "Sponsored Research Student / Candidate" shall mean a full time research student/ candidate except that he (she) receives complete financial support from the sponsoring organization his (her) employer.
- xxi. **"Student"** shall mean person registered for the Ph.D. degree prior to becoming a candidate.
- xxii. "Supervisor" shall mean a member of the academic staff of the University / affiliated Institute / College or any other person fulfilling R. 6 of the Regulations and approved by the Vice-Chancellor on the recommendation of Department of the University / Research Centre to guide / supervise the research / academic work of the student / candidate.
- xxiii. "University" shall mean the Rajasthan Technical University, Kota.

Note: 'He' & 'His' imply 'he'/ 'she' and 'his'/ 'her', respectively hereinafter.

ORDINANCES

- **O.1**The minimum entry qualification for admission to the Ph.D. programme shall be
- (a) a Master's degree in Engineering / Technology / Science / Computer Applications / Management or any other discipline of any recognized University / Institute.

Or

(b) a Bachelor's degree in Engineering / Technology from any University / Institute. He must also have atleast 75 % marks in B.E./B. Tech. and have minimum five years teaching experience of undergraduate courses as Lecturer/equivalent or higher cadre in the relevant discipline.

The minimum cumulative grade point average (CGPA) / percent marks in each category are laid down in Regulations (R.2).

- **O.2** A candidate registered for the Ph.D. programme shall be required to satisfy a minimum registration period requirement, as laid down in the Regulations (R.5).
- **O.3** A student / candidate shall be required to earn prescribed minimum credits through courses and carry out his research work at the University / Research Centre, under the guidance of approved supervisor(s). In special circumstances, a full-time student / candidate may be permitted by the Vice-Chancellor to carry out his research outside the state of Rajasthan. In such cases, first of all, the work place shall be approved by the University and one co-supervisor is a must from the same work place.
- **O.4** A candidate will be required to complete all the requirements for the award of the degree within a period specified in the regulations.
- **O.5** The date of initial registration shall normally be the date on which the student formally registers for the first time in the beginning of a Semester for the Ph.D. program, which shall also be the date of his joining the programme for all intents and purposes.
- **O.6** For a student to become a candidate for degree, he shall have to satisfy the requirements as laid down in the Regulations and be accepted by the DRC / CRC. However, for the purpose of minimum residential requirement in the case of change of status from full-time to part time, the time spent as full time will be taken into account.
- **O.7** If a student / candidate withdraw from his Ph.D. programme or his registration is terminated, his student / candidate status ceases. If such a candidate is re-admitted within a period of six years, he/she may be given weightage to the credits acquired during the previous registration on the recommendation of DRC / CRC, except in the case of termination on disciplinary grounds.
- **O.8** The award of the Ph.D. to an eligible candidate shall be made in accordance with the Regulations of the University.

REGULATIONS

The following Regulations shall apply to all categories of students/ candidates pursuing courses of study and research leading to the Ph.D. degree:

R.1 CLASSIFICATIONS

R.1.1 The applicant shall be classified under any one of the following categories, which will be recommended by DRC/CRC.

(i) Full-time Research Student/ Candidate:

a) University Research Student/Candidate

University Research Student/ Candidate getting/not getting the University Fellowship.

b) Government/Semi Government Fellowship Awardees

These research scholars receive their fellowship and contingency grants from supporting organisations such as Council for Scientific and Industrial Research (CSIR), University Grants Commission (UGC), Quality Improvement Programme (QIP), Department of Atomic Energy (DAE), Department of Science and Technology (DST), Department of Biotechnology (DBT), Indian Council of Medical Research (ICMR), DRDO, AICTE, ICCR and other similar organisations.

c) Sponsored Students/ Candidates

An employee of a Public Sector Undertaking, a Government Department, a Research & Development organisation, or a private industry (approved by the concerned faculty) or an Educational Institution, with a minimum relevant working experience of two years or a Defence Sponsored Officer may be considered for admission as a sponsored (full-time/ part-time) Research Scholar. Sponsored applicants will be eligible for admission provided that they are treated, by their employers, on duty with their normal salary and allowances and are fully relieved for the period of study. He shall produce sponsorship certificate from the parent organisation along with the application for the admission.

d) Self-financed (Indian/Foreign)/ Study Leave/ College Teacher

- Indian: This category refers to persons with experience and with good track record to join the doctoral programme. They will be admitted along with the regular research students through the usual admission procedure.
- Foreign: These students are admitted through Embassy/ High Commission of the respective Government after getting approval from the Ministry of External affairs and no objection certificate from the Ministry of Human Resources Development, Department of Education, Government of India or admitted under MOU.
- Study Leave: This category refers to persons who are relieved from governmental or educational institutions on study leave for a period not less than two years for pursuing Ph.D. programme.

• QIP: This category refers to persons who are relieved from government or educational institutions under QIP scheme for a period not less than three years for pursuing Ph.D. programme.

e) ICCR Awardees (Foreign Students)

These students are sponsored by the Governments of their country and awarded scholarship by ICCR, Government of India. They should apply for admission through Indian Embassy/ High Commission in their country.

ii) Part time Research Student/ Candidate:

f) University Faculty/ Staff

This category refers to persons who are permanent employees of the University with more than 5 years of service and are admitted to the Ph.D. programme.

They are expected to work for their Ph.D. programme after fulfilling their normal duties. A faculty member who has opted for supervisor(s) outside his department shall have an option to register in either the main supervisor's department or his own department subject to the recommendation of his supervisor(s).

g) Project Staff

This category refers to persons who are working on various Projects undertaken by the University/Research Centre where Ph.D. registration is not a requirement but are admitted to Ph.D. programme. They are expected to work for their Ph.D. Programme after fulfilling their normal duties.

h) External Candidate (Sponsored)

After completion of comprehensive examination, the DRC/CRC may examine to allow him to register for Ph.D. with a supervisor from the University (internal) and other (External) from the parent organisation (already recognized by RTU) where he will be carrying out the research work. He shall produce sponsorship certificate from the parent organisation along with the application for admission.

R.2 ADMISSION ELIGIBLITY

- **R.2.1** An applicant possessing either of the following qualifications in appropriate areas shall be eligible to apply for admission to Ph.D. programme of the University.
- (a) Masters degree in Engineering / Technology/ Sciences/ Computer Applications and Management or any other discipline of any recognized University / Institute with a minimum Cumulative Grade Point Average (CGPA) of 5.5 on a 10 point scale or equivalent as determined by the University wherever latter grades are awarded; or 55% marks in aggregate (of all the years/ semesters) where marks are awarded.
- (b) Applicants seeking admission for full-time research who do not possess M.Tech. / M. E. degree or equivalent in the relevant field but with a valid GATE score of at least **95 percentile** for Engineering/ Technology and Science disciplines or qualified national level fellowship

examinations such as NET (research) conducted by UGC/CSIR for Science and related disciplines.

- (c) Applicants from affiliated Institutions having B. Tech./ B. E. or equivalent degree with a minimum of 75 % marks and five years teaching experience of under graduate course at the level not below of lecturer or higher /research /field experience in the relevant discipline at appropriate level.
- (d) Applicants already registered for Ph.D. in IITs/NITs/other premier national Institutions of Government/Central Universities with live registration in such Universities/Deemed Universities and wishing to continue their further research in RTU with transfer of course credits and submission of migration certificate, in case of admission.

R.2.2 Admission of Faculty/Staff of University

- a) A regular member of non-academic staff of the affiliated Institute/ the University who satisfies eligibility qualifications may be considered for admission to the Ph.D. programme as a part time student provided he has been given administrative clearance by the competent authority of the concerned affiliated Institution and the University or the Principal/ Director in the case of the constituent college/s of the University or the Dean of the Faculty in the case of the University teaching Department, independent of the constituent college, if any.
- b) Regular academic staff of the University with at least five years of teaching experience may be given administrative clearance by the Director of the constituent college or the concerned Dean, in case of University teaching Department, to seek registration on part-time basis subject to the recommendation of the concerned Head of the Department. Such candidates need not clear GATE or NET or equivalent examination even if they do not have an M Tech./ M. E. degree, but must have atleast 75 % marks in the B. Tech./ B.E./Master's degree in Sciences/ Computer Applications/ Management.

R.2.3 Eligibility for Part-time Research Student/Candidate

- a) The applicant should possess the minimum entry qualifications for the degree as given in R.2.1;
- b) The applicant proves to the satisfaction of the DRC/CRC that his official duties permit him to devote sufficient time to research through written endorsement from his employer;
- c) Facilities for pursuing research are available at the applicant's parent organization / place of work in the chosen field of research.
- d) He will be required to fulfill the requirement of contact days with supervisor, at the place of his supervisor/s; which is specified as minimum of 90 days per year and a minimum of total 270 days in consecutive three years.
- e) The facility of part time registration will be available only to candidates serving in, Academic Institutions, R&D organisations and public sector units for at least two years prior to their date of application.

R.2.4 Eligibility for University Fellowships to teachers of Engineering/Science Colleges

In case, the University fellowships are available;

The faculty of Engineering/Science/ Management/ Computer Applications Colleges may be considered for the award for the University Fellowship for pursuing Ph.D. programme at the University, subject to the following terms and conditions:

- (a) The concerned faculty member must be sponsored by their respective Institutions to pursue the Ph.D. Programme at Rajasthan Technical University, Kota.
- (b) The sponsored faculty member of the Engineering /Science colleges should either hold an M.Tech./M.E. degree and should satisfy the eligibility as per R.2.1 (a).

Applicants who do not possess M.Tech./M.E. must have a valid GATE score (minimum 95 percentile) or UGC NET or must have been in service with the sponsoring organisation for at least five years at the time of admission.

- (c) The number of Fellowship should be within the sanctioned limit of a particular Department.
- (d) The DRC should examine each case on merit before making recommendations to the Dean, Res. for the award of University Fellowship.
- **R.2.5** The candidate/student is permitted to pursue his research/credit requirement only at the University premises/ approved centres for the purpose.
- **R.2.6** The teaching Department of an affiliated college may seek recognition as an approved centre to facilitate research leading to Ph.D. degree at its premises. Such applications shall be sent to Dean (Res.) and will be considered only for further consideration if satisfies all the following minimum requirements:
 - 1. At least two Ph.D. faculty members or one Professor in the Department as full time faculty on the date of consideration/renewal and actively engaged in research (with at least five publications in International Journals/Ten publications in International Conferences in last five years).
 - 2. A score of atleast thirty and fifty by the Department (of the centre proposed) as a whole in last five/ ten years respectively when determined in accordance by the provisions provided in Appendix C

The affiliated college seeking status as a research centre must have a full time Principal at the time of application, who shall be Ex- officio incharge of the Research centre, if approved.

On preliminary scrutiny of the applications received by a committee appointed by Dean (Res.) for assessing the application for such centre, the matter shall be referred to Vice Chancellor for appointing an inspection team for ascertaining the ground situation. The inspection report shall include videography of the infrastructural facilities including the laboratories, computational facilities, library and software details etc. Such inspection report shall be evaluated by

appropriate authority such as Board of Inspection or Academic Council before granting the approval by Vice Chancellor.

R.2.6 Such centres once recognized shall be only for five years, the suitability shall be assessed after each four years on the lines provided in R2.6, if they do not satisfy the infrastructure and academic requirements, no further admission of Ph.D. student shall be permitted at the centre for atleast next three years, after which a fresh application may be entertained for grant of approval of the centre.

R.3 RESERVATION / RELAXATION

- **R.3.1** Fifteen percent (15%) fellowships (of the total sanctioned university fellowships, whenever available) shall be reserved for Scheduled Caste applicants and 7.5% for Scheduled Tribe applicants in each of the categories of Research Students /Candidates. A total of 3% fellowships, over and above the sanctioned strength, will be reserved for physically handicapped applicants, in all the Ph.D. programmes of the University, put together.
- **R 3.2** Reservation of fellowships for students belonging to Other Backward Class (O.B.C.) and other classes of the society shall be as announced by the University from time to time based upon the treservation of such classes as specified by the State Government from time to time for the purpose.
- **R.3.3** For the SC/ST applicants and for others holding Master's Degree (e.g., M.A.) with English seeking admission to Ph.D. English in the Department of Humanities, with eligibility requirement of CGPA may be relaxed to 5.5 on a 10 point scale or equivalent, or to 55% marks.
- **R.3.4** The SC/ST applicants holding B.Tech. /B.E. Degree or equivalent may be allowed 5% relaxation in marks or equivalent relaxation in CGPA.
- **R.3.5** Physically handicapped applicants may be allowed relaxation in eligibility requirement of CGPA to 5.0 on a 10 point scale or equivalent, or to 50% marks. They will not be allowed any other relaxation beyond this limit even if they belong to SC/ST category and / holders of the Degree of M.A. in English, etc.
- **R.3.6** For the SC/ST applicants minimum GATE score requirement will be 60 percentile.
- **R 3.7** For other recognized categories of reservation as may be announced from time to time; relaxation in marks or equivalent relaxation in CGPA may also be determined by the University in accordance with the relaxation provisions for SC/ST and other relevant rules prevalent from time to time.

R.4 SHORTLISTING

- R.4.1 (a) The short listing of applications for the purpose of admission test/interview will be done by the DRC/CRC of concerned department/ Research Centre.
- (b) The DRC/ CRC of the concerned department may set the short-listing criteria, if considered necessary, higher than the minimum eligibility defined above.

(c) The basic guidelines / instructions for short listing will be issued by the Dean (Research) with the approval of the Vice Chancellor.

R.5 REGISTRATION

R.5.1 Every student/candidate will be required to renew the registration every semester till the submission of the thesis. The renewal of registration every semester shall be subject to completion of specified number of credits / courses and /or satisfactory progress in his research work as recommended by DRC/CRC.

R 5.2 Application Submission:

(a) Application for admission for Ph.D. programme can be submitted in both the academic semesters, academic calendar dates to be announced by the University from time to time. Application format given in Appendix A-1, or as amended from time to time by the University will be completed and submitted to the office of the Dean (Res.) through Head of the Department, in case of University Teaching Department or through Head of Institution in the case of affiliated colleges/approved centres for the purpose.

R.5.3 Time Period Requirement for Submission

- (a) A candidate who possess a Bachelor's degree shall be required to be registered for the degree for a period of not less than three calendar years (36 months) from the date of his initial registration. For a candidate who possess post graduate degree, the minimum period of registration shall be two calendar years (24 months). For part time candidates, the minimum period of registration will be three calendar years, irrespective of the degree they possesses.
- (b) The candidates of all categories shall normally submit their thesis within a period of six years from the date of their initial registration for the Ph.D. Programme. However, reregistration is also allowed.

R.6 THESIS SUPERVISOR(s)

- **R.6.1** Every admitted student shall be assigned a Research Supervisor(s) by the Department / Research Centre, subject to approval of Dean (Research). For this purpose, a form given in Appendix A-2 and/or A-3 will be completed and processed during first semester of the student's joining.
- **R.6.2** A Supervisor(s) can be any full-time faculty member of the University/ Research Centre/ affiliated Institutions with a Ph.D. Degree and fulfilling either of the following conditions:
 - (i) Professor/ Associate Professor in the University
 - (ii) Professor/Reader/Lecturer in an affiliated Institute with a total of ten years teaching experience.
 - (iii) Talented teachers who have obtained Ph.D. from IITs/NITS/other National Institutes and are actively engaged in research, subject to the condition that they have five publications in International Journals / Ten in International Conferences in last five years.

If a teacher/scientist has been recognized as research supervisor and has continued for more than eighteen months for award of Ph.D. by any other University, he shall continue to be recognized as supervisor, ipso facto, to be a supervisor recognized by the University. However, he needs to inform in writing to the Dean (Research) about his involvement as research supervisor in other University/ies. After retirement /superannuation, the status of his continuance shall be in accordance with R6.4 II.

No person will be normally allowed to guide his close relations. If somebody wants to do so, prior permission of the Academic Council will be necessary. If such permission is granted, the supervisor will not act as one of the examiners, when the thesis is submitted. All the three examiners will be external. The supervisor will also not suggest names of the examiners to evaluate the thesis. The term close relation includes wife, husband, son, daughter, sister, brother, nephew, niece, grand niece, grand nephew, uncle, aunt, first cousin, son- in law, daughter-in law and nephew, niece, grand niece and nephew of supervisor's spouse.

The Dean (Research) shall receive and scrutiny the applications received for registration of research supervisor and recommend the eligible names for approval of the Vice Chancellor. The Dean (Res.) shall issue the letter of recognition to the approved names of the research supervisor thereof.

R.6.3 The Dean (Research) may appoint more than one Supervisor(s) not exceeding a total of three to supervise the student/candidate. These may be from inside or outside the Institution/ University and normally, there should not be more than two supervisors from within any one of the affiliated Institution/ any one faculty of the University. In special cases, candidate may be permitted to work under the supervision of two persons belonging to different faculties/subjects and one belonging to the University and one from outside the territorial jurisdiction of the University.

Appointment of any other Supervisor(s) would not be made after the lapse of 18 calendar months from the date of initial registration of the student/ candidate. However, if appointed, he will be designated as co-supervisor.

R.6.4 Appointment of Supervisors and Caretaker Supervisor for Ph.D. students.

A faculty member appointed as a Ph.D. supervisor is normally expected to be available to a research student/candidate in the Institution/ University till the thesis is submitted. 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 student/scholar. In such special cases, appointment of supervisor(s) will be regulated as under:

I A Supervisor proceeding on long leave of more than 12 months

- (a) (i) Where more than one supervisor exists, the supervisor proceeding on long leave for more than 12 months can continue to be a supervisor, provided the supervisor existed for more than 18 months.
- (ii) Where only one supervisor exists, another supervisor may be recommended to be appointed by the DRC/CRC in cases where a student has not yet submitted his synopsis.
- (b) (i) If the synopsis of the thesis has been submitted before the supervisor proceeds on leave, he will continue to be the supervisor and only a caretaker supervisor will be appointed.

- (ii) If the thesis has been submitted before the supervisor proceeds on leave, he will continue to be the supervisor and only a caretaker supervisor will be appointed.
- (iii) Further, if a major revision becomes necessary, and the sole supervisor is on leave, he should be asked to specifically state whether he would effectively help the student carrying out the major revisions within a reasonable period. In case the sole supervisor expresses his inability due to one reason or the other, the caretaker supervisor, if he provides the required help in carrying out the major revision, will automatically be treated as a supervisor of that candidate.
- (c) If a supervisor proceeds on leave for a period less than 12 months initially, but later extends his leave beyond 12 months, the above procedure will be followed. The extension granting authority will inform the Dean, Research accordingly.

II. A Supervisor retires

A faculty member who is due to retire within the next three years can be appointed as a cosupervisor and can continue to be the co-supervisor even after his retirement provided the DRC/CRC is convinced of his availability / continued guidance to the student.

In other cases, a faculty member on retirement may continue as a supervisor/co-supervisor, if re-employed or appointed as Emeritus Fellow or Honorary Professor; or, if the synopsis of the thesis has been submitted. Appointment of another Supervisor, if necessary, will be as per I(a); and that of a caretaker supervisor as per I(b) above.

III. A Supervisor resigns

A new Supervisor will be appointed, if necessary, as per I (a), and a caretaker supervisor as per I (b).

IV. A Supervisor dies

A new Supervisor will be appointed, if necessary, on the recommendation of DRC/CRC.

R.6.5 The maximum number of students, which can be supervised by a Professor at any time, can be eight. For other cadres of faculty, the maximum number shall be five. A candidate if supervised by two or more than two supervisors shall be counted as 0.5 for each supervisor. The maximum number of students, which can be supervised by any teacher may however be relaxed by Vice Chancellor in exceptional cases on the recommendation of DRC/CRC/ Dean (Res.)

R.7 PATTERN OF COURSES AND CREDITS

The courses offered for the Ph.D. Programmes may be Lecture Course, Laboratory Courses, Design Courses, Self-Study Courses, Mini Project and Seminars.

R.7.1 The credits for the courses will be decided by Dean (Res.) from time to time taking into consideration the recommendations of DRC/CRC.

R.7.2 Self-study Courses shall satisfy the following conditions:

- (a) A self-study course should be preferably outside the ongoing post graduate courses.
- (b) A course not offered in a semester due to lack of sufficient number of students registering for it, may be offered as a self-study course in that semester with the prior approval of Dean (Res.) on the recommendation of DRC/CRC.
- (c) A post graduate course already running in a semester shall not be offered as a self- study course, except with prior approval of the Dean (Res.) to a candidate with more than ten years teaching experience.
- (d) Each self-study course shall carry a maximum of three credits.
- (f) A student shall not take more than two self-study courses per semester and not more than two during the entire Ph.D. programme.
- (g) The credits for a non-available self-study course shall be determined by the DRC /CRC, and shall be sent for approval to Dean (Res.).

R.7.3 Seminars shall be characterized by the following conditions:

- (a) Seminar shall be treated as a self study course for the purpose of registration and evaluation.
- (b) Each seminar shall carry two credits.
- (c) Seminar co-ordinators shall be appointed by the DRC/CRC. They shall arrange the seminar and forward the grades awarded by the panels of examiners to the Chairman, DRC/CRC.by the end of the semester.
- (d) A student shall not take more than two Seminars during the entire Ph.D. programme.
- **R.7.4** DRC/CRC may recommend additional courses/credits, if required, in a particular case.
- **R.7.5** A candidate shall earn credits for a course only if he obtains a minimum of B grade.

R.8 COURSE CREDIT REQUIREMENTS AND REGISTRATION FOR COURSES

- **R.8.1** All students registered for Ph.D. Programme are required to earn prescribed credits by taking courses as prescribed by the Supervisor(s), and approved by DRC/CRC. Normally every student shall be required to earn a minimum of eight credits for being in the programme. For those, who are registered with Bachelor's degree only, this requirement shall be a minimum of twelve credits. :
- **R.8.2** Comprehensive examination shall be conducted after completion of the course requirements.

R.9 COMPREHENSIVE EXAMINATION

- **R.9.1** Each student will be required to take a comprehensive examination which will test students comprehension and knowledge of his broad field of research and his academic preparation and potential to carry out the proposed research plan. The comprehensive examination shall consist of a written examination followed by an oral examination and should be separately conducted before evaluation of the research proposal. The examination will be conducted by DRC/CRC, , which will be constituted as follows by the Dean (Res.) with nomination of the experts considering the panel proposed by the Head of the Department for each category:
- (a) Head of the Department in the case of University or its Constituent college, or Incharge Research Centre,: Chairman
- (b) One expert in the field from the Department/approved centre- Member
- (c) One external faculty expert, in the concerned area to be nominated by University Member (in the case of CRC only)
- (d) One University nominee from outside the Department to which the student belongs-Member; and:
- (e) Supervisor(s): Member (s)

The quorum of the DRC/CRC will be three, with chairman's presence and University expert as mandatory.

Each member of the DRC/CRC should qualify the minimum eligibility requirements to a supervisor as outlined in R6.

In case, where teaching departments of the University are available in the subject area, the Chairman of DRC/CRC shall be the Head of the Department of the University Department irrespective whether the research is carried out at the University or at the affiliated Institutions; in that case member as mentioned in (c) in R 9.1 shall not be required.

Main Supervisor shall act as the member secretary of DRC/ CRC.

Experts at (b) and (d) above will be nominated by Head of the department in the case of student working in the University campus and by Dean (Res.), along with (c), in the case of approved centres. The experts shall be normally from amongst those proposed by Supervisor(s).

- **R.9.2** (i) The following procedures are to be uniformly followed by all the Departments/ Research Centres in conducting the comprehensive examination for Ph.D. Scholars:
- (a) The written examination, should be conducted by the DRC/CRC of the student after completion of the requisite credits within the guidelines laid down by the DRC. The examination will consist of one paper with two parts, one on core subject and one on the specific area chosen by the candidate. The written examination will be of three hours duration.
- (c) The result of the written and oral examinations should be forwarded within two weeks to the Dean (Res.).

- (d) This should be followed by evaluation of the research proposal by DRC/CRC and recommendation of final registration by it to the Dean (Res.).
- **R.9.3** The DRC/CRC on the basis of the performance of student in the examination; will make appropriate recommendations to the Dean (Res.) out of the following:
- (a) (i) Clear
- (ii) If not clear, to reappear in the examination after a defined period of time specified by the DRC/CRC and after taking additional courses, if any.
- (b) Research Plan along with the title of thesis
- (i) Approved
- (ii) Approved subject to partial modifications
- (ii) Not approved
- **R.9.4** Full-time and part-time students must clear the comprehensive examination within a maximum of 24 and 36 months, respectively from the date of joining the programme, failing which their registration will be cancelled.

R.10 ELIGIBLITY FOR THE CANDIDACY FOR THE DEGREE

- **R.10.1** The students are advised to make application for the candidature for the Ph.D. Degree through DRC/CRC to the Dean, Research on the approved form soon after clearing the comprehensive examination.
- **R.10.2** A student shall be finally registered as a candidate for the Ph.D. Degree after he has complied with the following:
- (i) Successful completion of his course work;
- (ii) Submission of a research plan recommended and duly approved by Dean (Res.) on the recommendation of DRC/CRC; and
- (iii) Clearing the comprehensive examination.

R.11 PERFORMANCE MONITORING

- **R.11.1** The academic/research progress of each student/candidate will be monitored by DRC/CRC. For this purpose, each candidate will be asked to submit a progress report at the end of each semester latest by 15the Dec./15th June and progress seminar at the end of every year till synopsis is submitted to Chairman-DRC through supervisor(s).
- **R.11.2** The Chairman-DRC/CRC in the Department/centre shall be coordinating collection of progress reports written and signed by the student/candidate duly forwarded by the Supervisor(s) every semester.
- **R.11.3** The Supervisor(s) and DRC/CRC will evaluate the progress report and the annual seminar of the student. The evaluation and the progress report shall be submitted to the Dean (Res.). If at any stage, the student wishes to modify the research plan and/or change the title of the thesis approved earlier, supervisor shall arrange the proposal to be put before DRC/CRC and the student shall make a presentation before it the details of the proposed modifications

and its justifications. The DRC/CRC shall make appropriate recommendations to the Dean (Res.) for approval.

- **R.11.4** 'S' grade is to be awarded during that semester if the progress is 'satisfactory'.
- **R.11.5** If the progress is 'unsatisfactory', 'U' grade is to be awarded. For the first appearance of 'U' grade, a warning shall be issued to the candidate. Subsequently, the fellowship, if being received by the candidate (in case of regular scholar) of the candidate would be withheld.
- **R.11.6** If there are two consecutive 'U's, the registration term shall be extended to the same extent. However, the total duration condition shall be operative.

R.11.7 Semester Duration for the Research work.

The semester duration terms for the research work shall be as follows:

Odd Semester: July to December: Even Semester: January to June

R.12 SEMINAR/SYNOPSIS/PANEL OF EXAMINERS

R.12.1 Pre- Synopsis Seminar

- (a) DRC/CRC shall assess the work through a pre-synopsis seminar. The student can submit the synopsis only if the DRC/CRC is satisfied about the quality of work for submission as a Ph.D. thesis.
- (b) The pre-synopsis seminar shall be adequately notified so as to enable interested staff members and students to attend the same.

R.12.2 Final Synopsis

- (a) The eight copies of final synopsis should be submitted normally within two months after the presentation of pre-synopsis seminar. In case the final synopsis is not submitted in the specified period, the reasons may be assigned.
- (b) The students shall submit the synopsis of his work normally at least a month prior to submission of the thesis.

R.12.3 Panel of Examiners

A panel of six experts in the area of the Ph.D. thesis shall be suggested by the Supervisor(s) and recommended by the DRC/CRC while forwarding the title and final synopsis of the thesis. The panel so recommended should include at least 50% of the examiners from abroad /premier Institutions like IITs/CSIR Labs./Central Universities/DRDO Labs./ IIMs/IIITMs/IIITs. In case, the panel is not approved by DRC/CRC, the same shall be referred back to the supervisor for revision.

R.13 BOARD OF EXAMINERS

R.13.1 On receipt of the title and final synopsis of the thesis, the Dean (Research) shall appoint a Board of Examiners for each candidate with the approval of the Vice Chancellor. The Board

will consist of internal examiner(s), normally the Supervisor(s), and two external examiners, from the approved panel. A person working in the same laboratory(ies)/ Institution(s)/ University, where Research Candidate is employed cannot, be appointed as External Examiner for evaluating the Thesis of that Research Candidate.

R.14 THESIS SUBMISSION

The thesis should bear evidence of the candidate's capacity for analysis and judgement as well as his ability to carry out independent investigation, design or development. No part of the thesis or supplementary published work shall have been submitted for the award of any other degree or diploma.

- **R.14.1** The thesis shall be written in English in the specific format, and shall contain a critical account of the candidate's research. It should be characterized by discovery of facts or fresh approach towards interpretation of facts and theories or significant contribution to knowledge or development or a combination of these. Its format, front page/ cover format and colour codes of the binding etc. shall be as specified by the University from time to time
- **R.14.2** The Ph.D. thesis must contain the following copyright certification in the beginning of the thesis, on a separate page on the left side.

© RAJASTHAN TECHNICAL UNIVERSITY, KOTA, 200.--.

ALL RIGHTS RESERVED

R.14.3 The candidate for the degree shall submit five copies of the thesis with a soft cover. In case of co-supervision, four/five copies of thesis shall have to be submitted by the candidate.

R.15 THESIS EVALUATION

- **R.15.1** Each examiner will be requested to submit to the DEAN Res.a detailed assessment report and his recommendations on the prescribed proforma, as fixed/revised by Dean (Res.) from time to time, within six weeks of the date of receiving the thesis.
- **R.15.2** In the event of the thesis report not being received from an examiner within a period of two months, the DEAN Res.may appoint another examiner with approval of the Vice Chancellor in his place for evaluating the thesis.
- **R.15.3** (i) Examiners will examine the thesis individually with a view to judge whether the thesis is a piece of research work characterized by;
- (a) the discovery of facts, and/or
- (b) a fresh approach towards interpretation and application of facts or theories, and/or
- (c) a distinct advancement in instrument technology.
- (ii) The examiner will be required to give his opinion about candidate's capacity for critical examination and sound judgement. The internal examiners shall be submitting one report. All examiners will submit the reports on the prescribed form clearly stating that:

- (a) The thesis is recommended for the award of Ph.D., or
- (b) The thesis is recommended for the award of Ph.D. Degree subject to the candidate giving satisfactory answers to queries, specifically mentioned in the report, at the time of Viva-voce examination, or
- (c) The candidate be allowed to resubmit his thesis in the revised form, or
- (d) The thesis be rejected.
- (iii) (a) If all the three examiners recommend acceptance of the thesis, their recommendations shall be accepted.
- (b) If two of the three examiners recommend rejection, their decisions would be accepted. The candidate may, however, be allowed to submit the thesis normally after one year, provided the title of the thesis remains unchanged. Normal procedure will be followed for the evaluation of the thesis
- (c) If one of the examiners recommends rejection, the candidate's replies to the comments made by the examiners shall be sent to the examiner and his clear verdict shall be sought. The examiner may then recommend acceptance, rejection or revision of the thesis.

In case the thesis is accepted, sub-clause (a) above will be applicable. In case of recommendation for revision, sub-clause (d) below will apply. However, if the examiner still recommends rejection, a fourth examiner would be appointed from the panel of the examiners already approved. In such cases sub-clause (e) will apply. (d) In case one examiner recommends revision of the thesis, the thesis would be revised normally within one year, if the candidate so desires. The revised version of the thesis would be sent to all the examiners for their recommendations. If the candidate does not agree for revision, he may ask for appointment of the fourth examiner under sub-clause (e) below:

(e)The reports of all the examiners will be sent to him without disclosing the identity of the examiners, along with the response of the candidate, if any, to these. The thesis shall be deemed to be acceptable, if three out of four examiners recommend acceptance.

If the fourth examiner recommends revision, the thesis would be suitably revised, if the candidate wishes to do so; and resubmitted normally after three months and sent for examination to all the examiners except to the one in whose place the fourth examiner was appointed.

In case the fourth examiner recommends rejection or his recommendations for revision is not accepted by the candidate, the thesis would be rejected. The candidate may then avail the benefit of sub-clause (b) above.

- (f) If two of the three examiners recommend revision of the thesis, the candidate may revise the thesis accordingly and resubmit it normally within a period of one year for the evaluation by the same set of examiners, if he wishes to do so.
- (g) The correspondence regarding (c), (d) and (e) above will be done by the Dean (Res.).
- (h) If one examiner recommends rejection and other examiner recommends revision of the thesis the candidate may revise the thesis and resubmit it normally within a period of one year, for evaluation by the same set of examiners.

- (iv) Any doubt, arising out of following the procedure laid down in R.15.3 (iii) above, shall be referred to the competent authority for a decision.
- (v) In case of ambiguous recommendations by the examiner, Dean (Res.) will approach the examiner for a clear recommendation. In case clear recommendation is not forthcoming, the matter may be referred to the competent authority for his decision.

R.16 RESUBMISSION

- (a) In case of resubmission of the thesis, a fresh fee for the examination shall be paid by the candidate.
- (b) The revised thesis may be submitted normally in 2 years from the date of such intimation.
- (c) No candidate shall be allowed to resubmit the same thesis more than once.

R.17 VIVA-VOCE EXAMINATION

- **R.17.1** If the thesis is recommended for the award of degree, the candidate shall be required to defend his work/thesis orally (viva-voce examination) before a duly constituted committee, hereinafter referred to as the Oral Defence Committee (ODC). Details of the viva-voce shall be adequately notified so as to enable interested staff members and students to attend it.
- **R.17.2** The ODC shall consist of Supervisor(s) (internal examiners), and one external examiner. The internal examiner shall arrange the viva-voce examination of the candidate.
- **R.17.3** (i) In case of non-availability of the External Examiner(s) in conducting the viva-voce examination, the Vice Chancellor may appoint another examiner to conduct the viva-voce examination from the existing panel.

If needed, the DRC/CRC may suggest a fresh panel of examiners.

- (ii) The viva-voce examiners shall be provided with the comments made by the examiners before the viva-voce examination.
- (iii) If there is a difference of opinion among the viva-voce examiners, the recommendations of the Viva-voce Board will be put up to the competent authority
- (iv) Internal examiner(s) shall arrange for the viva-voce examination of the candidate as early as possible and normally within two months from the date of communication to the Internal Examiner for holding the viva-voce examination.
- (v) In case of the inability of the internal examiner(s) to have the viva-voce examination conducted due to any reason whatsoever, the Vice Chancellor may appoint another Internal Examiner(s) from amongst the faculty of the department concerned who belongs to the particular field in consultation with Dean(Research), and Head of the Department concerned to conduct the viva-voce examination. In such cases also, the Ph.D. work will be deemed to have been carried out under the guidance of the supervisor(s) only.
- (vi) Any other matter not explicitly provided herein or of an exceptional nature, may be referred to the Vice Chancellor for his decision.

R.18 AWARD OF Ph.D. DEGREE

- **R.18.1** On the completion of all stages of the examination, the Oral Defence Committee shall recommend to the DEAN Res., one of the following courses of action:
- (a) that the degree be awarded;
- (b) that the candidate be re-examined at a later specified time in a specified manner;
- (c) that the degree shall not be awarded. The thesis will be rejected on the conclusion that the thesis is not genuinely the work of the candidate.

In case of (a) and (b), the Oral Defence Committee shall also provide to the candidate a list of all corrections and modifications in the thesis (if required), including suggestions made by the examiners during the thesis evaluation.

The second viva-voce examination may be held normally after a period of three months.

- **R.18.2** The Degree shall be awarded by the University, provided that:
- (a) The Oral Defence Committee recommends so;
- (b) The candidate produces a 'No Dues Certificate' in the prescribed form in the case of students who undertook research at the University headquarters .
- (c) The candidate has submitted two hard cover copies of the thesis; one for the Departmental Library and one for the Central Library. The thesis should incorporate all necessary /corrections / modifications.

R.19 FINANCIAL ASSISTANCE (University Fellowship)

- **R.19.1** If University fellowships are available; those students who are admitted on full-time basis are considered on request, for the award of University Fellowship of the amount as decided by the University and directed by the Government from time to time. The student getting University Fellowship will provide eight hrs of teaching assistance per week or as modified from time to time by the University.
- **R.19.2** In addition, the students may be given contingency grant in accordance with the rules of the University. The maximum duration for which fellowship can be awarded to any Ph.D. student is 5 years or till the end of the Semester in which the thesis is submitted, whichever is earlier

Continuation of the fellowship is contingent on satisfactory academic and research performance and satisfactory performance in the discharge of responsibilities assigned under the scheme.

It is to be noted that admissions to the Programmes and award of fellowship are not linked. Admission to any programme does not guarantee the award of fellowship. Those who are not awarded fellowship can continue with the programmes as a self financing student.

R.20 TUITION FEE WAIVER TO Ph.D. STUDENTS/CANDIDATES

The following categories of research students/candidates may be awarded 50% tuition fee waivers:

- (i) All full-time University research students/candidates including QIP. The University research students/candidates include those who obtain scholarship through MHRD, CSIR & UGC, provided they are getting scholarship of the same values as that of MHRD, etc.
- (ii) Research students/candidates admitted to Ph.D. programme from DST, CSIR and other government Organisation, involved in research/development activities /Institutions.

Additional 25% fee waiver can also be given on case by case basis, the maximum number of such waivers being restricted to 50% of the University research students/candidates on roll. For grant of additional 25% fee waiver to the full-time University research students/candidates, the respective DRC/CRC will assess the performance and consider the cases of the deserving scholars on case by case basis and recommend the name(s) of the concerned students/candidate(s) to the Dean,(Research) for approval.

(iii) For the University staff pursuing Ph.D. at the University including those getting assistantship from projects, the tuition fee is waived up to 75%.

R.21 LEAVE AND ATTENDANCE

A student/candidate will be entitled to avail leave as per Leave Rules/Attendance Rules formulated and amended from time to time by the University.

(a) During Course Work: A full-time Ph.D. student, during his stay at the University/ Centre will be entitled to leave for 30 days including leave on medical grounds, per academic year. He will not be entitled to mid-semester breaks, summer and winter vacation at the end of the first semester

Leave beyond 30 days in an academic year may be granted to a Research scholar in exceptional case, by the Head of the Department concerned, subject to the following conditions:

- (i) the leave beyond 30 will be without Assistantship/Scholarship; and
- (ii) such an extension of leave upto additional 30 days or a part thereof will be granted only once during the programme of the scholar.
- (iii) the leave may be subject to the approval of the Head of Department concerned on the recommendation of the Supervisor; and a proper leave account of each student/candidate shall be maintained by the Department concerned.

(b) After Completing the Course Work

A full-time Ph.D. student/candidate during his stay at the University/ Centre will be entitled to leave for 30 days per academic year. He will not be entitled to mid-semester breaks, if any, summer and winter vacations. In additions, a Ph.D. student/ candidate who has completed his course work may be granted leave on medical ground up to 10 days per academic year.

The women research student/candidate will be eligible for Maternity Leave with fellowship for a period not exceeding four months once during the tenure of the award.

ATTENDANCE

A Ph.D. student irrespective of the source of research assistantship including self financing student not drawing any fellowship and sponsored student, while pursuing course work, must have at least 75% attendance in each course in which he is registered. In case his attendance falls below 75% in any course during a month he will not be paid fellowship for that month.

Further if his attendance again falls short of 75% in any course in any subsequent month in that semester his studentship and fellowship will be terminated. A student falling short of 75% attendance in a course shall not be permitted to appear in the examination of that course.

A research student/candidate after having completed the course work must attend to his research work on all the working days and mark attendance except when he is on duty /sanctioned leave. The requirement of 75% attendance will apply as above on daily attendance except in the cases where longer leave have been duly sanctioned within the leave entitlement of the student.

For the above purpose, if 75% works out to be a number which is not a whole number, the immediate lower whole number will be treated as the required 75% attendance.

R.22 WITHDRAWAL FROM SEMESTER/COURSES

R.22.1 A student/candidate may be permitted by the Dean, Res. to withdraw from all the courses registered by him or the entire semester, on medical grounds supported by a medical certificate from the University Medical Officer or any other genuine reasons. The medical certificate issued by a registered Medical Practitioner will also be acceptable in those cases where the

student/candidate has valid reasons for his absence from the University/Institute/ Centre.

Withdrawal may also be granted by the Dean, Res. provided he is convinced that the student/candidate cannot pursue his studies for the reasons beyond his control.

- **R.22.2** Under no circumstances will a request for withdrawal be entertained after the major tests have begun. Student/Candidate should present the medical certificate in support of his absence on health reasons within two days of his rejoining the Institute, if not produced already. Withdrawal will not be granted retrospectively.
- **R.22.3** The period of authorized absence in the semester should not be less than eight weeks of contact period for Semester withdrawal to be granted. Regularity in attending the classes and satisfactory performance in the mid-term examinations, if any, held prior to the date of application for withdrawal are the factors which would be taken into account while recommending/granting withdrawal.
- **R.22.4** Any semester withdrawal will count towards the maximum limit of **seven years** as stipulated above.

R.23 CANCELLATION OF REGISTRATION

- **R.23.1** Registration of a student/candidate shall be cancelled in any one of the following eventualities, after due approval of DEAN Res.
- (i) if he absents himself for a continuous period of four weeks without prior intimation/sanction of leave.
- (ii) if he resigns from the Ph.D. Programme and the resignation is duly recommended by the Supervisor.
- (iii) if he fails to renew his registration in any semester subject to the provision contained in these Ordinances & Regulations.
- (iv) if his academic progress is found unsatisfactory.
- (v) if he does not clear the comprehensive examination as stipulated.
- (vi) if he is found involved in an act of misconduct and/or indiscipline and termination has been recommended by a competent authority.

R.24 GENERAL

R.24.1 Notwithstanding anything contained in these Ordinances, Regulations and Rules all categories of the students/candidates shall be governed by the rules and procedures framed by the Academic Concil in this behalf, and in force from time to time.

R.25 INTERPRETATION

- **R.25.1** Any doubt or dispute about the interpretation of these Ordinances and Regulations shall be referred to the Chairman, Academic Council whose decisions shall be final and acceptable to all
- **R.26** Eligibility for admission to Ph.D. programmes may be reviewed from time to time by the concerning faculty and approved by the Academic Council.

APPENDIX -A-1

Format of Application For Admission to Ph.D.Programme

1. Nai	me of student	:		Photo		
2. Fat	her's name	:				
3. Mo	ther's name	Ţ				
4. Dat	e of Birth	:				
5. Edu	5. Educational Qualifications (starting from Secondary school exam/high school)					
CNI	Even pegad/	Doord/I Iniversity	Year	Division/Grade	7	
S.N.	Exam passed/ Degree obtained	Board/University	i eai	Division/Grade		
	Degree obtained				-	
					-	
6. Date of application : 7. Broad Area : 8. Sub area : 9. Research plan to be annexed- including identification of gaps and methodology (limited to 250 words) 6. If employed, place of work: 7. Address, Phone Nos. E- Mail: 8. Name, designation, official address, contact Nos and E- Mail of Proposed Supervisor/s 11. Application fee details 12. Enrolment in RTU/ Migration certificate details, whichever applicable						
Signature of student						
Declaration by Employer of the candidate						
Application of Sh./Smt./Miss , who is working as in our Institution for registration of Ph.D. in Rajasthan Technical University, Kota is forwarded. In case, he/she is selected for admission by the University in the programme; he shall be allowed to pursue the Ph.D. as a full time/ part time candidate. Our Institution shall allow him/her to complete the essential residential and other requirements of the programme as per the rules of the University. For full time study, he shall be relieved/sponsored by our Institution for three/two years.						
Date:	Date: Head of the Institution with Seal					
Counter signature						

Head of Department/ Incharge of Research Centre (of the Institution, where the student is proposed to be registered)

APPENDIX -A-2

Format of Supervisor's Registration for Ph.D.Programme

Photo

1. Name of Faculty

	her's name	:					
	te of Birth	: addragg agntagt Nag	and E. Mail				
4. De	signation, official	address, contact Nos	and E- Man				
5. Co	ntact address, conta	act No.s, E- mail					
6. Edi	ucational Qualifica	tions (starting from B	achelor's degree)				
CNI							
S.N.	Degree obtained	University	Year	Division/Grade			
			<u> </u>	<u> </u>			
	te of application	:					
	oad Area	:					
	o area	: n lost fixe years:					
10. K	esearch activities in	ii iast live years.					
11. D	etails of patents/pu	blications etc. and sel	lf assessment as pe	er Appendix C			
	1 1		1	11			
Signa	ture						
Coun	Counter signature						
Head of Department/ Incharge of Research Centre/ Distinguished person recognized by University (For use in University)							
(For use in oniversity)							
Mark	s as per Regulation	is:	(2)	2 27 1 4			
	(Signature of official)						
			Date	e:			
Reco	mmendation of Do	ean (Res.)					
		(====)					
(a) To be Approved for 5/10 years / Need review after 5/10 years							
(h) T	n he Recommende	d to get further details	about the person				
(b) To be Recommended to get further details about the person							
(c) T	o Be Not approved	d					
•	Signature						

Date

Approved as (a)/ (b)/(c) above with					
Vice Chancellor					
Date					
Supervisor's No. E/S/M/C/H (Faculty) (year- two digits) (three digit no.)					
APPENDIX –A-3 Format of Approval of Supervisor's for a Candidate					
1. Name of student : 2. Father's name : 3. Mother's name : 4. Date of Birth : 5. Broad area and Sub area of research plan : 5. Supervisor's name/s with No.(s) : 6. Broad Area and Sub area of Specialisation of Supervisor(s): :					
Signature of Supervisor(s) Chairman DRC/CRC Member (s) DRC/CRC Date					
(For use in Dean (Res.) office in University)					
Approved / Queries to be furnished					
Dean (Reserch) Date					

APPENDIX-B GENERAL GUIDELINES FOR AWARD OF GRADES

The following are the general guidelines for the award of grades:-

- (i) All evaluations of different components of a course shall be done in marks assigned for the course for each student.
- (ii) The marks of various components shall be reduced to approved weightage (as decided by the DRC/CRC) and/or indicated in the scheme of Teaching and Examination and added to get total marks secured on a 100-points scale. The rounding off shall be done on the higher side.
- (iii) For less than 15 students in a course, the grades shall be awarded on the basis of natural cutoff in the absolute marks (Appendix B-l).
- (iv) For more than 30 students in a course, the statistical method shall be used for the award of grades with or without marginal adjustment for natural cut-off. The salient features of statistical method are given in Appendix B-2.
- (v) The overall distribution of different grades shall be as indicated in the statistical distribution to the extent possible. (Appendix B-2)
- (vi) For the strength of students in any course between 15 to 30, any of the above methods (Appendix B-1/B-2) may be used for the award of grade.
- (vii) A+ (A Plus) grade shall not be awarded for percentage of marks less than 80 under any circumstance. There will not be more than 10 % (rounded off to integer value) A+ grade in any course.
- (viii) D grade shall not be awarded for percentage of marks less than 35 in any case. Further no student having 40% or more marks would be awarded failing grade E or F.
- (ix) Marks awarded by the colleges may be normalized based upon the marks secured in the university Examination at the university level. Then the grades shall be listed by the examination section/ Dean (Res.) for the total (150 marks) and may be forwarded to Grade moderation Committee. The Grade Moderation Committee shall be as decided by the University.
- (xi) The procedure for evaluation and award of grades for Self Study Course/ Seminar /Comprehensive viva-voce shall be such as may be decided by the Dean (Res.) on recommendation by respective Faculties.

APPENDIX-B1

AWARD OF GRADES BASED ON ABSOLUTE MARKS

The award of grades based on absolute marks out of 100 shall be made as follows: Marks Grade Marks

 $91 \le A + \le 100$

 $82 \le A \le 90$

 $73 \le B + \le 81$

 $64 \le B \le 72$

 $55 \le C + \le 63$

46 ≤ C ≤ 54

40 ≤ D ≤ 45

Note:-

- (1) The grade boundaries as indicated above may be marginally adjusted.
- (2) The upper and lower limits are subject to limitations of percentage of marks.

APPENDIX-B2

STATISTICAL METHOD FOR THE AWARD OF GRADES

For the award of grades in a course, all component-wise evaluation shall be done in marks. The marks of different components would be reduced to relative weightage of each component as approved by the concerned faculty and added. Marks so obtained shall be out of 100 and the same would be converted to grades following the guidelines given below:

For 30 or more number of students in a course, the statistical method shall invariably be used with marginal adjustment for natural cut-off. The mean (x) and the standard deviation (σ) of marks obtained by all the students in a course shall be calculated and the grades shall be awarded to a student depending upon the marks and the mean and the standard deviation as per Table given below.

AWARDS OF GRADE USING STATISTICAL METHOD

Lower Range of Marks	Grade	Upper Range of Mar	
	A +	$> x + 1.5 \sigma$	
$x + 1.0 \sigma <$	A	$\leq x + 1.5 \sigma$	
$x + 0.5 \sigma <$	B+	$\leq x + 1.0 \sigma$	
<i>x</i> <	В	$\leq x + 0.5 \sigma$	
x -0.5 σ <	C+	$\leq x$	
$x - 1.0 \sigma <$	C	$\leq x$ -0.5 σ	
$x - 1.5 \sigma <$	D	$\leq x$ -1.0 σ	
<i>x</i> -2.0 σ <	E	$\leq x$ -1.5 σ	
	F	$\leq x$ -2.0 σ	

APPENDIX-B3

AWARD OF 'I' GRADE

(a) If a student is absent during University Examination of a course due to medical reasons or other special circumstances, he/she may apply for the award of 'I' grade to the chairman, DRC through the supervisor, provided that he/she has attended 75% of the classes held.

The concerned supervisor shall have to be convinced about the extraordinary circumstances and shall have to certify the attendance record before this rarely used option to award 'I' grade is recommended. The Chairman DRC may award 'I' grade.

- (b) The T grade so awarded shall be notified by the Department to which the student belongs and a copy of the notification will be endorsed to the Dean (Research) office and to the concerned supervisor and Course Coordinator (e.g., the notification for T grade of a Chemical Engineering student will be notified by the Department of Chemical Engineering on the recommendation of the concerned Course Coordinator, even if the course pertains to another Department).
- (c) The 'I' grade shall be converted into a proper letter grade not exceeding 'B' and shall be sent to the University's appropriate section within 10 days from the date on which the End-Term Examination is over and the requirements of the course are completed by the student.
- (d) In extraordinary circumstances, the period of conversion of T grade may be extended to the next semester, with the approval of the Dean (Research) on his own or on the recommendation of the Course Coordinator and the Head of the Department to which the student belongs.
- (e) In extra-ordinary circumstances, on the recommendation of the Dean (Research), the Hon'ble V.C may order the award of 'I' grade to a student/class or a batch of students taking a particular course. The conversion of 'I' grade into a regular grade or any other action shall be as per direction of the Hon'ble V.C.

APPENDIX-B4

AWARD OF 'X' GRADE

A student who is unable to complete his/her Project/Dissertation may be awarded an 'X' grade on the recommendation of an Evaluation Committee consisting of (i) The Head of the Department or his/her nominee; (ii) Nominee of the D.R.C. and (iii) The Supervisor(s) of the Project/Dissertation. The student concerned shall have to present his/her work to the Evaluation Committee for the Project/Dissertation, 4 to 6 weeks before the date of registration to the next semester.

A student who has been awarded an 'X' grade shall be required to formally register for the next Semester and pay the requisite fees.

The following guidelines shall be used for the award of the 'X' grade:

(i) Number of times 'X' grade may be awarded shall be as under:

For Full-time students : One For Part - time students : Two

(ii) Grounds for award of 'X' Grade:

'X' grade will be awarded in exceptional circumstances beyond student's/supervisor's control. Normally, the following grounds may be considered for the award of 'X' grade:

- (a) Medical grounds to the satisfaction of the University Medical Officer and the approval of the Dean, (Research).
- (b) Technical reasons/grounds such as the Supervisor/Equipment not being available.
- (c) For Part-time Students only: For long period assignment, on the written request of the employer of the student concerned, 'X' grade on this ground will be awarded once during the entire period of the study of the student. If the valid period of absence is more than half of the duration of a semester, the student will apply for withdrawal.

APPENDIX C

TABLE SHOWING PROCEDURE FOR AWARDING MARKS ON RESEARCH RELATED ACTIVITIES

S. N.	Nature of Work	Category	Description		Max. limit on marks for each category
1.	Patents	Abroad/India	04 marks for each patent awarded, 01 marks for each patent filed.		15
2.	Paper Published	Journal	International National	03 marks for each paper 02 marks for each paper	20
		Conference	International	02 marks for each paper	10
			National	01 marks for each paper	
3.	Papers Reviewed/ Discussion/ Reply to	Journal	International	01 marks for each	10
	discussion/point of view/editorial published		National	0.5 marks for each	
4.	Poster paper/ only oral presentation	Conference	International	01 marks for each	10
5.	Projects / Ph.D. Guided	M. Tech.	01 marks for each project guided		15