

Dual Degree Academic Regulations

(For 5 year B.Tech and MS by Research)

Rules and Regulations specifically relating to Dual Degree programmes are given below:

1. Graduation Requirements for the following Dual Degree Programs

- 1.1 Dual Degree in CSE
- 1.2 Dual Degree in ECE
- 1.3 Dual Degree in Computational Linguistics
- 1.4 Dual Degree in Computational Natural Sciences
- 1.5 Dual Degree in Exact Humanities
- 1.6 Dual Degree in Building Science and Engineering

2. Monitoring of academic performance and termination of registration

- 2.1 Identification of students for monitoring
- 2.2 Monitoring of academic performance of students
- 2.3 Registration of students on Academic Probation
- 2.4 Special Termination

1. Graduation Requirements

1.1 Dual Degree in Computer Science and Engineering

In order to graduate with B.Tech Honours and MS by Research in Computer Science and Engineering, a student must successfully complete 187 course credits and 24 Thesis credits, with minimum CGPA of 7.00 and meet the following requirements.

- (i) Must successfully complete the Institute Core.
- (ii) Must successfully complete at least three Foundation Bouquet Courses
- (iii) Must successfully complete at least three Systems Bouquet Courses
- (iv) Must successfully complete at least one Maths Elective course in years III & IV
- (v) Must successfully complete at least one Engineering Elective course in years III & IV
- (vi) Must successfully complete at least two Science Elective courses in years III & IV
- (vii) Must successfully complete at least three Humanities Elective courses in years III&IV
- (viii) Must successfully complete at least two CS elective courses in years III & IV
- (ix) Must successfully complete at least 10 credits of Free/CS elective courses in years III & IV
- (x) (these can be used to do courses of level 3xx or above in any area: CS/ECE/Science/Maths/Humanities/Engg).
- (xi) Must successfully complete 4 credits from Physical Activity (Non academic credit – Excluding 187 – to be completed in first 2 years).
- (xii) Must successfully complete FOUR Honours Projects in semesters V to VIII and obtain a GPA greater than 8 in these projects.
- (xiii) Must successfully complete two 4 credit research stream courses in semesters VI and VII.
- (xiv) Must successfully complete at least three electives in the chosen honours stream (These courses will count towards Bouquet courses and CS/Free Electives also).

1.2 Dual Degree in Electronics and Communication Engineering

In order to graduate with B.Tech Honours and MS by Research in Electronics and Communication Engineering, a student must successfully complete 191 course credits and 24 Thesis credits with CGPA of 7.00 and meet the following requirements.

- (i) Must successfully complete the Institute Core.
- (ii) Must successfully complete ECE core course requirements.
- (iii) Must successfully complete 7 ECE electives as per given prescriptions in the curriculum
- (iv) Must successfully complete two electives from Maths or Science courses in years III & IV
- (v) Must successfully complete at least one Engineering Elective course in years III & IV
- (vi) Must successfully complete at least three Humanities Elective courses in year IV
- (vii) Must successfully complete at least two (of the 7) ECE elective courses in year IV
- (viii) Must successfully complete 4 credits in any of the streams (HSS/Maths/Engineering/CSE/ECE).
- (ix) Must successfully complete 4 credits from Physical Activity (Non academic credit – Excluding 191 – to be completed in first 2 years).
- (x) Must successfully complete FOUR Honours Projects in semesters V to VIII and obtain a GPA greater than 8 in these projects..
- (xi) Must successfully complete the level 2 courses from one stream and successfully complete two 4 credit research stream courses in semesters VI and VII.

1.3 Dual Degree in Computational Linguistics

In order to graduate with B.Tech Honours in Computer Science and MS by Research in Computational Linguistics, a student must successfully complete 190 course credits and 24 Thesis credits, with minimum CGPA of 7.00 and meet the following requirements.

- (i) Must successfully complete the Institute core courses.
- (ii) Must successfully complete Programme core courses.
- (iii) Must successfully complete three Bouquet core courses.
- (iv) Must successfully complete three Humanities electives.
- (v) Must successfully complete three CL electives.
- (vi) Must successfully complete two Honours projects.
- (vii) Must successfully complete two CS electives.
- (viii) Must successfully complete two 4 credit projects.
- (ix) Must successfully complete two free electives any of the streams (HSS, Maths, Engineering, CSE/ECE).
- (x) Must successfully complete 4 credits from Physical Activity (Non academic credit – Excluding 190 – to be completed in first 2 years).
- (xi) Must successfully complete the TWO 4 credit Honours Projects in semesters VII & VIII and obtain a GPA greater than 8 in these 2 projects.

1.4 Dual Degree in Computational Natural Sciences

In order to graduate with B.Tech (Honours) in Computer Science and MS by Research in Computational Natural Science, a student must successfully complete 190 course credits and 24 Thesis credits, with minimum CGPA of 7.00 and meet the following requirements.

- (i) Must successfully complete the Institute core courses.
- (ii) Must successfully complete Programme core courses.
- (iii) Must successfully complete five Bouquet core courses.
- (iv) Must successfully complete one Engg Elective course.
- (v) Must successfully complete four CNS electives.
- (vi) Must successfully complete two CS electives.
- (vii) Must successfully complete one Honours project (CS).
- (viii) Must successfully complete three Honours projects (CNS).
- (ix) Must successfully complete two electives any of the streams (HSS, Maths, Engineering, CSE/ECE).
- (x) Must successfully complete 4 credits from Physical Activity (Non academic credit – Excluding 190 – to be completed in first 2 years).
- (xi) Must successfully complete the four 4 credit Honours Projects in semesters V, VI, VII & VIII and obtain a GPA greater than 8 in these projects.

1.5 Dual Degree in Exact Humanities

In order to graduate with B.Tech Honours in Computer Science and MS by Research in Exact Humanities, a student must successfully complete 192 course credits and 24 Thesis credits, with minimum CGPA of 7.00 and meet the following requirements.

- (i) Must successfully complete the Institute core courses.
- (ii) Must successfully complete Programme core courses.
- (iii) Must successfully complete four Bouquet core courses.
- (iv) Must successfully complete one Science Elective course.
- (v) Must successfully complete four Humanities electives.
- (vi) Must successfully complete four CS electives.
- (vii) Must successfully complete four CEH electives.
- (viii) Must successfully complete three Confluence projects.
- (ix) Must successfully complete two Independent Study courses.
- (x) Must successfully complete 4 credits from Physical Activity (Non academic credit – Excluding 192 – to be completed in first 2 years).
- (xi) Must successfully complete the THREE 4 credit Confluence Honours Projects in semesters VI, VII & VIII and obtain a GPA greater than 8 in these 3 projects.

1.6 Dual Degree in Building Science and Engineering

In order to graduate with B.Tech (Honours) in Civil Engineering and MS by Research in Building Science & Engineering, a student must successfully complete 191 course credits and 24 Thesis credits, with minimum CGPA of 7.00 and meet the following requirements.

- (i) Must successfully complete the Institute core courses.
- (ii) Must successfully complete Programme core courses.
- (iii) Must successfully complete five BS electives.
- (iv) Must successfully complete one Maths Elective course.
- (v) Must successfully complete three stream electives.
- (vi) Must successfully complete two CS electives.
- (vii) Must successfully complete four Honours projects.
- (viii) Must successfully complete two electives from any of the streams (HSS, Maths, Engineering, CSE/ECE).
- (ix) Must successfully complete 4 credits from Physical Activity (Non academic credit – Excluding 191 – to be completed in first 2 years).
- (x) Must successfully complete the FOUR 4 credit Honours Projects in semesters V to VIII and obtain a GPA greater than 8 in these 4 projects.

2. Monitoring of Academic Performance and Termination of Registration

2.1 Identification of Students for Monitoring

For UG-I:

- If the CGPA of a student is < 4.0 after 1st year, the student will be terminated from the programme;
- If the CGPA of the student is in between 4 to 5.5 after 1st year, the student will be given only one chance to repeat the first year with a condition to achieve at least CGPA of 5.5 at the end of 1st year, failing which the student will be terminated from the programme;

Students of UG-II and beyond:

- Students will have maximum of 12 semesters to complete all graduation requirements, failing which they will be terminated from the programme.

Residency Requirements:

Maximum number of years to complete the B.Tech degree is 6 years.

Students can stay in the hostel for Maximum of 8 semesters, and repeaters can stay upto 10 semesters. After this period, students can stay in the hostel with approval of the Dean (Academic), on case by case basis.

2.2 Monitoring of Academic Performance of Students

At the end of each semester all the students who come under criteria 2.1 will be given a written warning regarding their poor performance in terms of minimum credit requirements, poor CGPA/SGPA and the maximum duration of stay at the Institute, as applicable.

The performance of all these would be monitored by the Dean, Academics who would try to assess the causes for poor performance of each student, and advise him/her accordingly for improving the performance in subsequent semester. In addition, he would refer their cases to the respective teachers and faculty advisors for close observation/monitoring. Faculty advisors would be asked to advise these students regarding choice of courses, number of courses to be taken, and total credits to be registered by them as well as observe their performance closely.

In case any student fails to satisfy the criteria in 2.1 and also fails to satisfy any other condition(s) as given to him in writing shall forfeit his/her registration and his/her programme shall be terminated.

2.3 Registration of students on Academic Probation

- a) If the student has failed any core course, he/she must take the course/ equivalent course as deemed fit by the Institute in its next offering.
- b) The student cannot overload and has to drop one of the regular semester courses for each course repeated in the semester.
- c) The student should be advised to take fewer than 5 courses to further reduce the workload till the CGPA improves.
- d) The SGPA of the student does not change, but the CGPA uses the highest grade got among all repetitions of a course.

2.4 Special Termination

UG1 student might not take and complete requisite number of course credits. If a student completes less than 25 credits in first year he/she is automatically terminated.

If a student withdraws from one or more semesters in first year, the institute will decide status of that student case-by-case basis.