

BITS Pilani Academic Structure: B.E. vs M.Sc. Dual Degree

An interactive, year-by-year breakdown of how the 4-year Bachelor of Engineering (B.E.) program differs from the 5-year Integrated Master of Science (M.Sc.) dual degree at BITS Pilani.

1. Year-by-Year Overview

Academic Year	B.E. (Single Degree) - 4 Years	M.Sc. Dual Degree (M.Sc. + B.E.) - 5 Years
Year 1	Common First Year: You study basic sciences (Physics, Chemistry, Bio), Mathematics, and introductory engineering courses.	Common First Year: Exactly the same as the B.E. students. The syllabus is identical. <i>(Your B.E. branch is allotted at the end of this year based on your CGPA.)</i>
Year 2	Engineering CDCs: You begin your Compulsory Disciplinary Courses (CDCs) specific to your B.E. branch.	Pure Science (M.Sc. CDCs): You focus only on your M.Sc. branch. You study the core courses for your science degree in detail.
Year 3	Advanced Engineering & Electives: You finish the remaining core engineering courses and start taking open or humanities electives.	M.Sc. + B.E. Combined: You officially start your engineering coursework. Your timetable will have a mix of your M.Sc. CDCs and your B.E. CDCs.

2. Deep Dive: Understanding the Summer Internships

Apart from the structured Practice School (PS) programs, students also participate in the highly competitive 2-month **Summer Internship (SI)** recruitment cycle. This is a crucial opportunity to gain corporate experience and secure Pre-Placement Offers (PPOs) from top companies.

Program	Timeline	Details
B.E. (Single Degree)	Summer After 3rd Year	Recruitment for this internship begins at the start of your 3rd year (August). You will complete the actual 2-month corporate internship during the summer break between your 3rd and 4th year.
M.Sc. (Dual Degree)	Summer After 4th Year	Recruitment begins at the start of your 4th year. You will complete the internship during the summer break between your 4th and 5th year. This gives you a massive advantage as you step into your 5th year with fresh industry experience.

3. Deep Dive: Understanding the 4th and 5th Years

The biggest differences between the two programs emerge in the final stages of the degree. Here is exactly what happens during these crucial years.

For 4-Year B.E. Students (The Final Stretch)

During your 4th year, your schedule is split into two distinct semesters:

- **Semester 1 (On-Campus Electives):** You will stay on campus to complete your

remaining Discipline Electives, Humanities courses, and Open Electives.

- **Semester 2 (Practice School-II or Thesis):** You leave campus for a 6-month period. You will either participate in **Practice School-II (PS-II)** (a graded, paid industry internship) OR opt to do a **Thesis** at a research institute.

Status: You graduate and enter the workforce or pursue higher education at the end of Year 4.

For 5-Year M.Sc. Dual Degree Students (The Culmination)

Because dualites are earning two full degrees, their 4th and 5th years are uniquely structured to balance intense academics with double the industry exposure.

- **The 4th Year (The Balancing Act):** Unlike single degree students, dualites spend their entire 4th year on campus. You will be taking the advanced CDCs for your B.E. degree, wrapping up your M.Sc. CDCs, and taking electives for both disciplines.
- **The 5th Year (Research & Industry Focus):** This year is focused on advanced practical application and scholarly research. The Thesis option is specifically tailored for students aiming for research-intensive careers or pursuing a Ph.D. abroad or in India. You will complete two major components:
 - **PS-II + PS-II (The Corporate Route):** Two separate 6-month industry internships.
 - **PS-II + Thesis (The Balanced Research Route):** A combination of a 6-month corporate internship and 6 months of dedicated academic research to bridge industry and academia.
 - **Thesis + Thesis (The Pure Research Route):** A full year of rigorous academic research, highly recommended for those targeting top-tier Ph.D. programs.

Status: You graduate at the end of Year 5 with a massive resume advantage and two full degrees.

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