

6.5.2 - The institution reviews its teaching learning process, structures & methodologies of operations and learning outcomes at periodic intervals through IQAC set up as per norms and recorded the incremental improvement in various activities

The IQAC keep monitoring the institute involvement in preparing responsible engineers for future by providing a highly conducive teaching-learning environment. While implementation the course instructor maps the Course outcomes (CO) & Programme Outcomes (PO), Programme Specific Outcomes (PSO) for each course, prepares the lesson plan and delivers the contents accordingly. All the class rooms are digitalized and equipped with ICT facilities. Contents will be delivered through chalk & talk, power point presentations, model display, roleplay, experimentation, video play, industrial visits, internships, projects, technical & cultural fests, seminars and assignments are practiced for improving the teaching learning process. An initial feedback will be obtained from the students to assess the level of teaching and learning. The feedback is used to make the necessary changes in the curriculum delivery.

1.Implementation of Pedagogical Initiatives and Various Instructional Methods.

The IQAC takes initiative by monitoring the teaching learning process continuously and Head of the department's report the information to the Principal along with the regular class room lectures by the faculty members the students are exposed to the guest lecture from industrial experts, industrial visit, internship, NPTEL, Group discussion, Q &A session and seminars. The submission of the assignment by the students, discussing content beyond syllabus, conduction of international conference/college fest, institution - industry interaction and collaborative learning motivates the students to understand the concept properly. The contents of workshops conducted are identified with the contents further than the syllabus content which is industry related and this helps in fulfilling the requirements of the students. These discussions carried out by the students helps in identifying the knowledge based on the outcome based education and the industrial requirements; it also further helps in enhancing the skills and making them ready as per the industry needs. The resource persons were experts from the industries and expertise in their domain knowledge such that the knowledge transfer helps in filling the gap between the industry and the academia. The Placement training through online tests helps the students for better placement in various reputed organization. All these outcomes proposed by the IQAC are supported by the management.

2. Execution of mini projects, videos, online certification and encouraging bright/ weak students.

The IQAC has introduced mini projects which are done beyond the syllabus of the university. The students do online certification to enhance their knowledge in their interesting domains and

they are very much interactive. Apart from the lectures carried out in class rooms, we also follow a innovative methods for interactive teaching in which we discuss the real time real world problems related to the subject matter by using videos and animations apart from the curriculum content in order to enhance the knowledge in the advanced technologies. As the students see the videos they can visually analyses and this further helps enhancing their thinking capabilities, such that the students can carry out the certification courses of their choice and this further motivate and encourage them to carry out their project work as well. This is well supported by the management and good move from the department's staff members to motivate the students supported and forward by IQAC. The departments encourage the student in their strengths and skills by motivating them to attend GATE and present papers. Low performing students are identified and nurtured by conducting remedial classes and counseling, high performing students are motivated to do still better. Midterm feedback & semester end feedback are obtained through online. These feedback mechanisms are used to further improve the teaching-learning process which is closely monitored by IQAC.

IQAC has contributed significantly in the following areas

- NBA Accreditation.
- Expert Committee Visit.
- Ranking.
- Patents and Funding Projects.
- MOU with Industries and Institutes.
- Publication of research articles.
- Up gradation of faculty qualification.
- Fresher's induction programme
- Sponsored Seminar, Workshop, Faculty development programme and Conferences.
- Training and Placement Activities.
- Development and auditing of course file.
- Training programs to the faculty.
- Participation in smart and clean survey by AICTE.

Incremental improvements made for the preceding five years

1. Accreditation by NBA IQAC has set a platform for the improvements in the standards of various departments by guiding them the need of improvements required.
2. Tracing of projects and research carried out. The sponsored research and the research projects with publications in the research field is tracked properly and ensure that funds flow for sponsored research projects are monitored. The IQAC has played a major role in bringing out three Ph.D. graduates over these years and around 36 research scholars are encouraged to pursue their doctoral program.
3. Infrastructure facilities. The growth in the field of infrastructure facilities has been upward for expanding the research requirements.

4. Funded projects. IQAC has contributed in motivating students and faculties to get funded projects from DST, AICTE.
5. Organization and participation of Hackathon. Students are encouraged to participate in Hackathon conducted by MHRD and the institute has organized Hackathon
6. Analysis of faculty feedback Proper feedback formats has been maintained and the analysis is done by IQAC to evaluate the teaching learning process.
7. Getting digitalized in more number of academic operations. The institute mainly does all the correspondence through digitized format.
8. Conduction of sponsored conferences, workshops, seminar and faculty development programme. The institute gives more attention in organizing sponsored and funded events from various other organizations.
9. Mentor books for students counseling. Each student has a mentor and they will be monitored regularly.
10. Canteen. An excellent canteen facility is provided with many choices in food.
11. Alumni collaboration. Every year alumni interaction is carried out and frequently alumni used to visit the campus and discuss with the students and faculties.
12. NSS activities. The institute takes special interest in conduction of social events every year such as blood donation and so on.
13. Skill Development and Certification courses. The institute has an excellent structure in the skill development and motivates students to take up online courses and other certification program.
14. Industrial Visit. The IQAC motivates all the students to interact with the industry and update their knowledge as per the industrial standards.
15. MoU. The IQAC has helped in establishing Incubation Centre and building up the relationship with various industries and academic organization by signing MOU for better research activities.
16. Internship activities. The initiatives taken by IQAC motivated many students to take up their Internship at various esteemed universities in which students gained global exposure

The IQAC identifies the best practice and implements the same, year after year at various levels of management and makes sure that the system is well placed to have a better progress in the future.