Stakeholder Feedback Report on Electronics and Telecommunication Engineering Curriculum AY 2022-23

The Electronics and Telecommunication Engineering curriculum strives to provide students with a comprehensive education that aligns with industry demands and equips them for successful careers. To assess the effectiveness of the curriculum, feedback was collected from stakeholders, including employers, parents, faculty, alumni, and students. The survey focused on ten key points, each integral to students' educational experience and future employability.

Survey Points:

1. **Bridge the Gap between Industry and Academia.**
2. **Potential for Employability**
3. **Coverage of Latest State-of-the-Art Topics**
4. **Availability of Reference Material and Books**
5. **Blended Learning and Futuristic Pedagogy**
6. **Evaluation Methods for Assessment**
7. **Satisfactory Hands-on Component**
8. **Inclusion of Socially Relevant Issues**
9. **Inputs for Business Acumen and Ethical Practices**
10. **Knowledge gain through project-based learning / project centric learning.**

The average points scored in the survey is listed in the below table.

Sr. No	Stake Holder	Count	1	2	3	4	5	6	7	8	9	10
1	Students	30	8.88	8.9	8.87	8.98	8.95	8.84	8.65	9.08	9.1	8.92
2	Teachers	13	8.88	8.73	8.53	8.71	8.77	8.95	8.74	8.71	9.07	9.14
3	Employers	13	8.8	8.51	8.86	8.74	8.93	8.65	8.83	8.82	9.1	9.13
4	Alumni	20	8.54	8.54	8.63	9.07	8.93	8.69	8.7	8.58	9.02	8.61
5	Parent	18	8.6	8.89	8.69	8.82	9.09	8.95	8.98	8.51	8.53	9.1
	Average	94	8.74	8.714	8.716	8.864	8.934	8.816	8.78	8.74	8.964	8.98

Head, Department of Electronics &
Telecommunication Engineering
Vishwakarma Institute of Technology,
Pune-411037.

Descriptive Feedback Analysis:

The curriculum is designed and aligned with industry trends and the syllabus of reputed research institutes. The curriculum was developed and amended after taking stakeholders' feedback.

The Stakeholders include employers, alumni, students, parents, and faculty.

Following are the observations from the students' and parent's feedback. Students and parents appreciated the following things in the curriculum.

1. Students appreciated the relevance of the curriculum.
2. Appreciated the industry relevance of the curriculum.
3. Appreciated the technical content delivery.
4. Appreciated the pedagogical methods used for content delivery.
5. Appreciated the involvement of undergraduate students in research.
6. Appreciated the participation of faculty in assisting the student to solve their queries in the subject and also in the project work
7. Appreciated the hands-on practice with a practical emphasis on experimental and coding-related courses.
8. Appreciated one-year internship.
9. Transparent and rigorous assessment
10. availability of department faculty outside a working hour

Suggestion:

1. Parent requested to share the attendance and all the notices related to their ward using WhatsApp, email, and telephone.
2. requested monthly parent-teacher meetings.
3. Students asked to issue hardware and all major equipment to be taken outside the lab for the project work.
4. Students asked for the VLSI toolchain to be available from the home.
5. Students asked to increase the number of students per group for group activities such as project work.
6. Parents and students asked to conduct department-level project competitions.
7. Parent asked to help their ward to get placement in reputed PSU, government organizations and fortune 50 companies.
8. Students asked for year-long internship.
9. Students and parents suggested more collaboration with foreign universities to allow students to go to foreign universities as exchange students.

Head, Department of Electronics &
Telecommunication Engineering
Vishwakarma Institute of Technology,
Pune-411037.

Alumni and Employers

Appreciated:

1. The curriculum is aligned with the industry and researches the latest trends.
2. equal weightage and appropriate weightage are given to the core, inter-disciplinary, and multi-disciplinary tracks.
3. appreciated semester-long internship / one-year internship.
4. appreciated 6 months major project with appropriate credits 12 credits.
5. appreciated the number of research papers and patents filed by the department in last one year
6. appreciated faculty competency and their involvement in the assessment of the student.

Suggestion:

1. number of students in major project must be 3 or less than 3 per group.
2. Students must select social and current industrial trends for their project work.
3. project should contain both hardware and software.
4. Students should design project till product level, and they should not stop at prototype level.

Head, Department of Electronics &
Telecommunication Engineering
Vishwakarma Institute of Technology,
Pune-411037.

Summary of Action based on stake holders' feedback of AY 2022-23

a. New Assessment for the programming-based subjects (ET2270: Advanced Data structures in SY and ET3272: Design and Analysis of Algorithm in TY). More weightage is given to the ESE programming exams.

b. A new subject called Design Thinking is introduced for SY and TY. Objective is to write and publish technical paper on the project/research work done in the previous semester under EDI Course.

c. For non-programming courses one assessment component is reduced by giving a choice between PPT presentation(seminar) and Group Discussion.

d. The NPTEL Swayam courses Modern Digital Communication Technique and Applied Electromagnetics for Engineers are offered to the Final year students for practicing the NEP.

e. Two additional courses, namely Network Theory and Signal Systems were introduced at second year level based on the Employer's feedback collected from the Training and Placement office of the college.

f. Linkedin course module "Generative AI and its applications" containing 5 small courses namely, Processing Text with Python Essential Training, Advanced NLP with Python for Machine Learning, Deep Learning Foundations: Natural Language Processing with TensorFlow, Recurrent Neural Networks and Generative AI: Working with Large Language Models are offered as an open elective for the Final year students.

g. Additional two Linkedin Learning courses namely, Data modeling and forecasting and Critical Thinking are offered as an audit courses to the TY Advanced and Weak learners.

h. Additional two Linkedin Learning courses namely, Simple statistics for user experience projects and Communication foundations are offered as an audit courses to the SY Advanced and Weak learners.

Prof. (Dr.) Shripad Bhatlawande
HOD(Electronics & Telecommunication)

Head, Department of Electronics &
Telecommunication Engineering
Vishwakarma Institute of Technology,
Pune-411037.