



# SAUNIT MANAGEMENT AND TECHNICAL COUNCIL

## ENGINEERING COURSES

### Diploma Program in Civil Engineering (DE)

Diploma in Civil Engineering is a diploma program which is of a total of 3 years duration, divided into six semesters. The candidates who have pursued a degree in 10th or 12th in PCM can pursue a course in Diploma in Civil Engineering. Through this course, the students are provided with a curriculum of the basic concept of Civil Engineering with in-depth theoretical and practical knowledge of Civil engineering and construction management concept. The various areas of Civil Engineering which are covered by Diploma in Civil Engineering course include structures, Construction Management, Building and Shaping of Materials, Construction of Satellites, Dams, Highways, etc.

Min. Qualification: 10th/ITI (With Exp.)

Duration: 3 years

Medium of Instruction: English

Fee Structure: Rs. 35,000/- for full program to be paid Year wise @Rs. 11,700/- per Year.

#### Subject covered

| 1 <sup>st</sup> Yrs          | 2 <sup>nd</sup> yrs          | 3 <sup>rd</sup> yrs               |
|------------------------------|------------------------------|-----------------------------------|
| 1. Civil Engineering Drawing | 6. Design To Steel Structure | 11. Strength of Materials         |
| 2. Engineering Mechanics     | 7. Surveying                 | 12. Steel Structure               |
| 3. Applied Mathematics       | 8. Foundation Design         | 13. Transportation                |
| 4. Building Construction     | 9. Irrigation Engineering    | 14. Environmental Studies         |
| 5. Construction Manager      | 10. Building Materials       | 15. Elements of Civil Engineering |





# SAUNIT MANAGEMENT AND TECHNICAL COUNCIL

## Diploma Program in Electrical Engineering (DE)

Diploma in Electrical Engineering is a three-year program where the students are taught about the application of electromagnetism, electronics, and electricity. It is a part of the Engineering field of study. A wide range of topics is taught to the students pursuing a diploma in electrical engineering such as telecommunications, signal processing, control systems, electronics, and power. Today the market is beaming with opportunities for an electrical engineer, as electricity has become an indispensable part of human lives.

Min. Qualification: 10th/ITI (With Exp.)

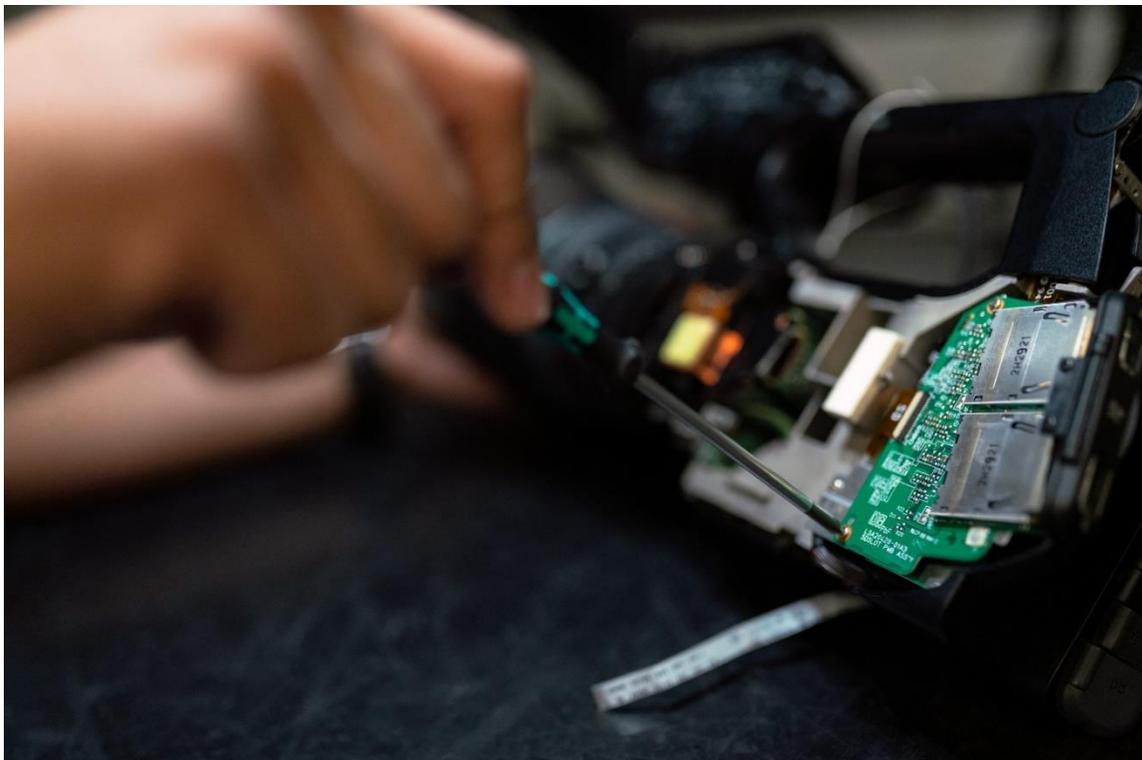
Duration: 3 years

Medium of Instruction: English

Fee Structure: Rs. 35,000/- for full program to be paid Year wise @Rs. 11,700/- per Year.

### Subject covered

| 1 <sup>st</sup> yrs                        | 2 <sup>nd</sup> yrs              | 3 <sup>rd</sup> yrs                              |
|--|----------------------------------|--|
| 1. Engineering Physics                     | 6. Engineering Chemistry         | 11. Testing & Maintenance of Electrical Machines |
| 2. Electrical Machines                     | 7. Electrical Technology         | 12. Electrical Circuits & Network                |
| 3. English Communication                   | 8. Applied & Digital Electronics | 13. Microprocessor                               |
| 4. Industrial Electrical Control of Device | 9. Instrumentation               | 14. Strength of Material                         |
| 5. Basic Electronics-II                    | 10. Computers                    | 15. Control System                               |





# SAUNIT MANAGEMENT AND TECHNICAL COUNCIL

## Diploma Program in Electronics and Communication (DE)

Diploma in Electronics and Communication Engineering is a Diploma level Electronics and Communication Engineering course. The focus in this discipline is on understanding electronic networks and devices, electric magnetic fields, computer fundamentals, communication and control systems. Electronics and Communication Engineering uses the scientific knowledge of the behaviour and effects of electronics to develop components, devices, systems and equipment. It deals with recent trends in communication technology via wire/wireless networks, circuits designs & Microcontrollers. After passing the course students have wide job opportunities in various fields including further study options.

Min. Qualification: 10th/ITI (With Exp.)

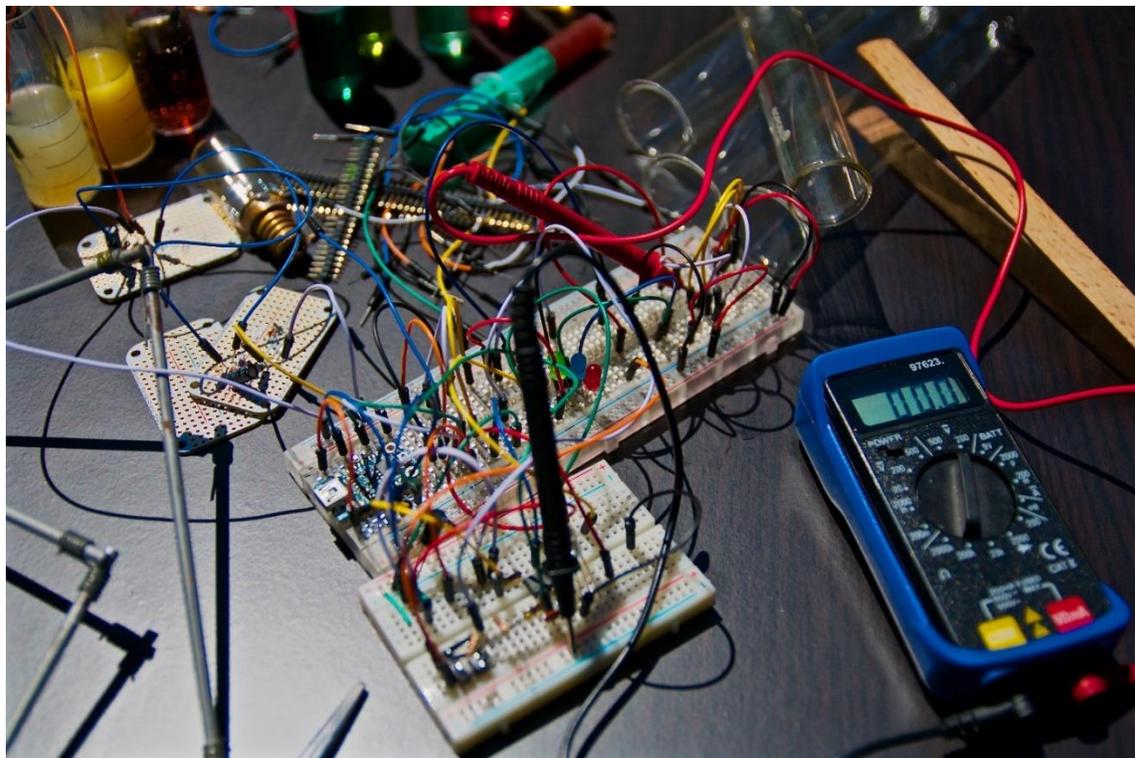
Duration: 3 years

Medium of Instruction: English

Fee Structure: Rs. 35,000/- for full program to be paid Year wise @Rs. 11,700/- per Year.

### Subject covered

| 1 <sup>st</sup> yrs      | 2 <sup>nd</sup> yrs       | 3 <sup>rd</sup> yrs                     |
|--------------------------|---------------------------|---|
| 1. Engineering Physics   | 6. Electrical Technology  | 11. Data Communication & Network System |
| 2. English Communication | 7. Industrial Electronics | 12. Digital Communication System        |
| 3. English Drawing       | 8. Medical Electronics    | 13. Analog Communication                |
| 4. Engineering Chemistry | 9. Measuring Instruments  | 14. Power Control Systems               |
| 5. Strength of Materials | 10. Microwave Engineering | 15. Electronic Instrumentation          |





# SAUNIT MANAGEMENT AND TECHNICAL COUNCIL

## Diploma Program in Mechanical Engineering (DE)

Diploma in Mechanical Engineering is a course that can be opted by students after Class 10th. It is also referred to as Polytechnic in Mechanical Engineering course. The course deals with the fundamental concepts of engineering under mechanical specialization. The minimum duration of the course is 3 years. Diploma in Mechanical Engineering is a discipline that deals with the application of the concepts of physics and science for designing, manufacturing and maintenance of mechanical equipment. The purpose of offering Diploma in Mechanical Engineering course is to provide education and training to students who can work as professionals in industries and production companies in future. The course prepares students with the application of techniques and technologies in the workplace. It is offered by many institutes in India

Min. Qualification: 10th/ITI (With Exp.)

Duration: 3 years

Medium of Instruction: English

Fee Structure: Rs. 35,000/- for full program to be paid Year wise @Rs. 11,700/- per Year.

### Subject covered

| 1 <sup>st</sup> yrs    | 2 <sup>nd</sup> yrs               | 3 <sup>rd</sup> yrs       |
|------------------------|-----------------------------------|---------------------------|
| 1. Mechanical Design   | 6. Production Technology          | 11. Applied Chemistry     |
| 2. Applied Mathematics | 7. Fluid Mechanics & Fluid Power  | 12. Plant Engineering     |
| 3. Theory of Machines  | 8. Refrigeration Air Conditioning | 13. Strength of Materials |
| 4. Hydraulic Mechanics | 9. Automobile Engineering         | 14. Computer Application  |
| 5. Instrumentation     | 10. Manufacturing Technology      | 15. Fluid Mechanics       |





# SAUNIT MANAGEMENT AND TECHNICAL COUNCIL

## Diploma Program in Computer Science (DE)

Diploma in Computer Science is a course that can be pursued by candidates who are more enthusiastic about computer science and programming. The development of Computer Science all started with the invention of the modern digital computer in the late 1930s. Diploma in Computer Science is 3 years course divided into 3 years. This course also can be pursued.

Min. Qualification: 10th/ITI (With Exp.)

Duration: 3 years

Medium of Instruction: English

Fee Structure: Rs. 35,000/- for full program to be paid Year wise @Rs. 11,700/- per Year.

### Subject covered

| 1 <sup>st</sup> yrs                 | 2 <sup>nd</sup> yrs              | 3 <sup>rd</sup> yrs                          |
|-------------------------------------|----------------------------------|--|
| 1. Computer Network                 | 6. JAVA                          | 11. Industrial Management & Entrepreneurship |
| 2. Materials Science                | 7. Programming with C            | 12. Software Engineering                     |
| 3. Fundamentals of Operating System | 8. Computer Graphics             | 13. Data communication Network               |
| 4. Communication Skills             | 9. Management Information System | 14. Object Oriented Programming C++          |
| 5. Multimedia Web                   | 10. Fundamentals of Algorithms   | 15. Project                                  |





# SAUNIT MANAGEMENT AND TECHNICAL COUNCIL

## Bachelor Program in Civil Engineering (BE)

Civil engineering is the professional practice of designing and developing infrastructure projects. This can be on a huge scale, such as the development of nationwide transport systems or water supply networks, or on a smaller scale, such as the development of individual roads or buildings. The great thing about civil engineering in the real world is that it's an industry that perpetually adapts to the demands and desires of society. In recent years civil engineering has adapted to consider many contemporary environmental concerns, helping to address issues of pollution and scarce water supplies, while considering the potential of sustainable energy within the industry.

Min. Qualification: 10th+2/Diploma (With Exp.)

Duration: 4 years

Medium of Instruction: English

Fee Structure: Rs. 40,000/- for full program to be paid Year wise @Rs. 10,000/- per Year.

### Subject covered

| 1 <sup>st</sup> yrs                                | 2 <sup>nd</sup> yrs              | 3 <sup>rd</sup> yrs          | 4 <sup>th</sup> yrs               |
|--|----------------------------------|------------------------------|-----------------------------------|
| 1. Engineering Mathematics                         | 5. Foundation Design             | 9. Strength of Materials     | 13. Engineering Metrology         |
| 2. Civil Engineering Drawing & House Town Planning | 6. Project & Planning Management | 10. Hydraulic Mechanics      | 14. Analysis of Structures        |
| 3. Building Construction                           | 7. Surveying                     | 11. Water Supply Engineering | 15. Design of Concrete Structures |
| 4. Design of Steel Structures                      | 8. Transportation Engineering    | 12. Highway Engineering      | 16. Soil Mechanics & Foundations  |





# SAUNIT MANAGEMENT AND TECHNICAL COUNCIL

## Bachelor Program in Mechanical Engineering (BE)

Mechanical engineering degrees usually last for three or four years at undergraduate level and one or two at master's level. Graduates receive a BEng or a MEng qualification upon completion of their studies. Teaching will typically consist of lectures and seminars, with compulsory introductory courses covered during the first part of the degree, followed by opportunities to select a specialization and undertake independent or group project work. Assessment is likely to be via a combination of written exams, presentations and research projects.

Min. Qualification: 10+2 Diploma (With Exp.)

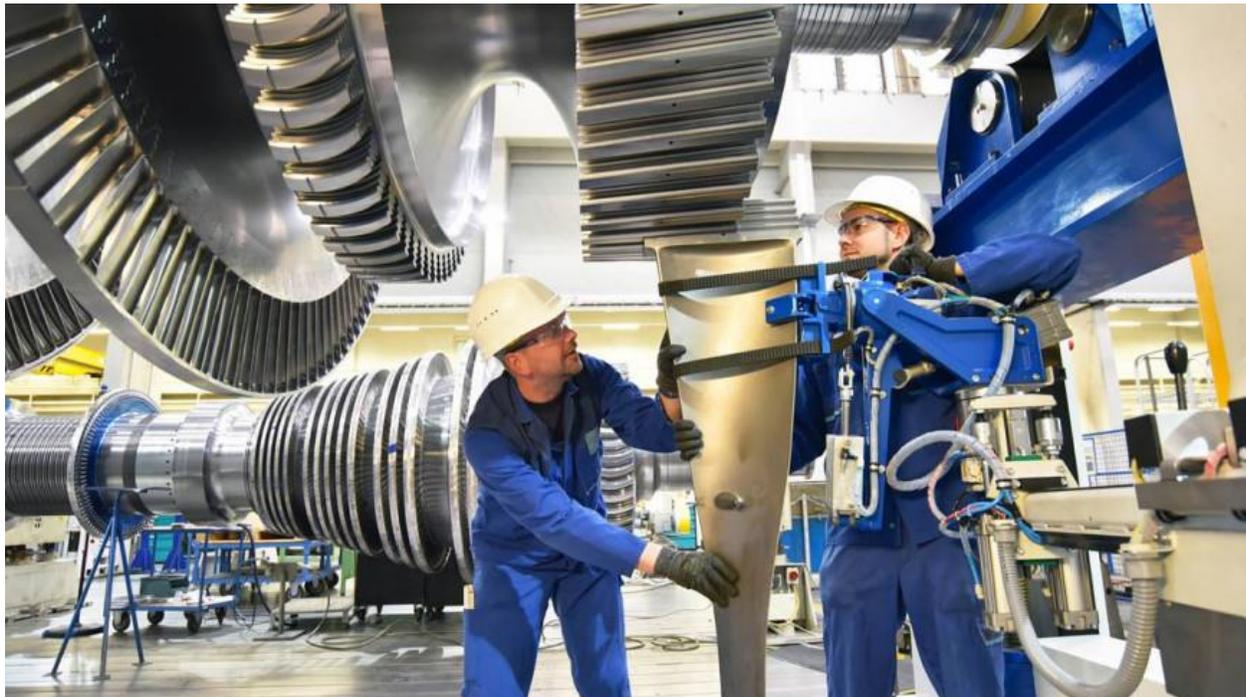
Duration: 4 years

Medium of Instruction: English

Fee Structure: Rs. 40,000/- for full program to be paid Year wise @Rs. 10,000/- per Year.

### Subject covered

| 1 <sup>st</sup> yrs    | 2 <sup>nd</sup> yrs                 | 3 <sup>rd</sup> yrs             | 4 <sup>th</sup> yrs                     |
|------------------------|-------------------------------------|---------------------------------|---|
| 1. Theory of Mechanics | 5. Engineering Mathematics          | 9. Automobile Mechanics         | 13. Advanced Engineering Thermodynamics |
| 2. Mechanical Design   | 6. Materials Science                | 10. Thermal Engineering         | 14. Advance Theory of Vibration         |
| 3. Heat Transfer       | 7. Refrigeration & Air Conditioning | 11. Hydraulic & Fluid Mechanics | 15. Instrumentation & Measuring System  |
| 4. Advanced Robotics   | 8. Quality control Technology       | 12. Production Technology       | 16. Machine Tool Design                 |





# SAUNIT MANAGEMENT AND TECHNICAL COUNCIL

## Bachelor Program in Electrical Engineering (BE)

There are many Bachelor Electrical Engineering programs located at top-notch academic institutions around the world. Bachelor Electrical Engineering graduates are employed in many industries such as design, teaching, sales, and management, as well as research and development. With a Bachelor in Electrical Engineering, there are many exciting professional and academic opportunities in areas across the globe.

Min. Qualification: 10+2 Diploma (With Exp.)

Duration: 4 years

Medium of Instruction: English

Fee Structure: Rs. 40,000/- for full program to be paid Year wise @Rs. 10,000/- per Year.

### Subject covered

| 1 <sup>st</sup> yrs        | 2 <sup>nd</sup> yrs                      | 3 <sup>rd</sup> yrs                   | 4 <sup>th</sup> yrs                   |
|----------------------------|--|---------------------------------------|---------------------------------------|
| 1. Electrical Mechanic     | 5. Database Management System            | 9. Electrical Circuit                 | 13. Microprocessor & its Applications |
| 2. Control System          | 6. Elements of Environmental Engineering | 10. Network Analysis (Circuit Theory) | 14. Solid & Fluid Mechanics           |
| 3. Engineering Mathematics | 7. Thermodynamics                        | 11. Electrical Energy Conservation    | 15. High Voltage Engineering          |
| 4. Power System Analysis   | 8. Power System Design                   | 12. Utilization of Electrical power   | 16. Digital Signal Processing         |





# SAUNIT MANAGEMENT AND TECHNICAL COUNCIL

## Bachelor Program in Electronics and Communication (BE)

The Bachelor degree program in Electronics & Communication Engineering Technology provides students with the technical and professional skills that enable them to assume careers as electronic engineering technologists in industries and other.

Min. Qualification: 10+2 Diploma (With Exp.)

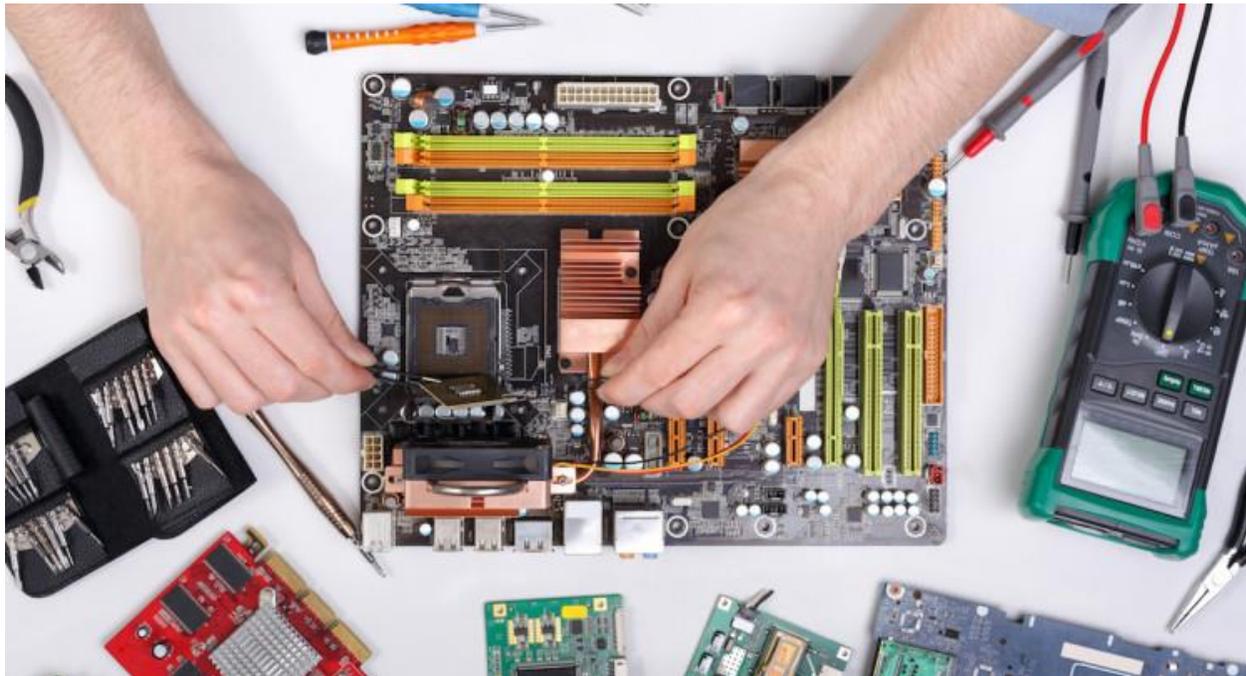
Duration: 4 years

Medium of Instruction: English

Fee Structure: Rs. 40,000/- for full program to be paid Year wise @Rs. 10,000/- per Year.

### Subject covered

| 1 <sup>st</sup> yrs            | 2 <sup>nd</sup> yrs                 | 3 <sup>rd</sup> yrs             | 4 <sup>th</sup> yrs                 |
|--------------------------------|-------------------------------------|---------------------------------|-------------------------------------|
| 1. Materials Science           | 5. Database Management System       | 9. Digital Signal Processing    | 13. Power Electronics               |
| 2. Electronic Devices Circuits | 6. Switching Theory & Logic Circuit | 10. Optical Fiber Communication | 14. Process Control Instrumentation |
| 3. Electronic Communication    | 7. Microwave Radar                  | 11. Mobile Communication        | 15. Digital Communication           |
| 4. Engineering Physics         | 8. Signals Systems                  | 12. Thermodynamics              | 16. Robotics                        |





# SAUNIT MANAGEMENT AND TECHNICAL COUNCIL

## Bachelor Program in Computer Science (BE)

Computer Science is the field of study that focuses on the application of information and computation to computer systems. There are several subfields of computer science that include computer graphics, language programming, computational problems, and computer programming.

Min. Qualification: 10+2 Diploma (With Exp.)

Duration: 4 years

Medium of Instruction: English

Fee Structure: Rs. 40,000/- for full program to be paid Year wise @Rs. 10,000/- per Year.

### Subject covered

| 1 <sup>st</sup> yrs        | 2 <sup>nd</sup> yrs           | 3 <sup>rd</sup> yrs            | 4 <sup>th</sup> yrs                         |
|----------------------------|-------------------------------|--------------------------------|---|
| 1. Engineering Mathematics | 5. Java Technology            | 9. Database Management System  | 13. Object Oriented Programming Through C++ |
| 2. Computer Network        | 6. Data Structure             | 10. Control System Engineering | 14. Visual Programming                      |
| 3. Operating System        | 7. System Analysis and Design | 11. Software Testing & Quality | 15. Computer Graphics & Multimedia System   |
| 4. Materials Science       | 8. Theory of Computation      | 12. Programs Through C         | 16. Design & Analysis of Algorithms         |

