





ವಿಶ್ವೇಶ್ವರಯ್ಯ ತಾಂತ್ರಿಕ ವಿಶ್ವವಿದ್ಯಾಲಯ

VISVESVARAYA TECHNOLOGICAL UNIVERSITY

State University of Government of Karnataka Established as per the VTU Act, 1994" JnanaSangama" Belagavi-590018, Karnataka, India

Prof. B. E. Rangaswamy, Ph.D.

Phone: (0831) 2498100 Fax: (0831) 2405467

REGISTRAR

Date: 14-10-2025

VTU/MYS/VTU-COE/HMCS/63/2025-26 36 U 9

CIRCULAR

Sub: Registration for Professional Elective Courses (PEC) and Open Elective Courses (OEC) for VII Semester (Swappable with VIII Semester) of B.E./B.Tech - reg.

This is to inform about the Registration for Professional Elective Courses (PEC) and Open Elective Courses (OEC) are open in the https://online.vtu.ac.in/ portal. This Registration applies to students with USN XXX22XXXXX (Regular), USN XXX23XX4XX (Diploma Lateral Entry) and USN XXX23XX6XX (B.Sc. Lateral Entry).

Students who have opted the Internship in this semester, only these students shall take up the Professional Elective Courses (PEC with Code Bxx801x) and Open Elective Courses (OEC with Code Bxx802x) Courses other students are required to take up this PEC and OEC Courses in next upcoming semester. Students without opting the internship, if they complete the PEC and OEC Courses, it will not be considered in this semester those students should take up the PEC and OEC Courses in the next semester along with the Internship.

The students have to register online through https://online.vtu.ac.in. The procedure for registration is attached with the circular and also has uploaded in the portal https://online.vtu.ac.in.

All the Principals of Engineering Colleges are hereby informed to bring the content of this circular to the notice of all the students, Department Head's and faculties.

For any further clarification regarding the registration process, reach out to VTU COE through vtucoe.online@gmail.com or onlineprograms@vtu.ac.in.

By Order,

To,

 The Principals of all Constituent, Affiliated, and Affiliated Autonomous Engineering Colleges and School of Architecture of VTU, Belagavi.

2. The Chairpersons/ program coordinators of all the Departments, Center's for Muddenahall, Belagavi, Kalaburagi and Mysuru - for information and needful.

Copy to:

- 1. The Hon'ble Vice- Chancellor through the secretary to VC, VTU Belagavi for kind information.
- 2. The PS to Registrar, VTU, Belagavi.
- 3. The Registrar (evaluation), VTU Belagavi for information.
- 4. The Finance Officer, VTU Belagavi for information.
- 5. The Regional Directors (I/c) of all the regional offices of VTU for circulation to all the principals of your region.
- 6. The Director ITI SMU, VTU Belagavi to upload the Circular on the VTU Web portal.
- All the concerned Special Officer/s and caseworkers/s of the academic section, VTU, Belagavi.
- 8. The Special Officer, Centre for Online Education [HMCS], VTU, Mysuru.
- 9. Office file.

DISCLAIMER

• Professional Elective Course (PEC):

A PEC refers to a course chosen from within the student's **own branch/discipline**. Students are advised to carefully verify the correct categorization of their elective choices during registration and seek guidance from the faculty coordinator/teacher while selecting a PEC. The selected course should **not overlap** with subjects already studied in the previous semesters of the 2024 scheme. Specifically, neither the course title should match, nor should the syllabus have more than 50% similarity with previously studied subjects.

• Open Elective Course (OEC):

An OEC refers to a course chosen from **branches/disciplines other than** the student's own and is multidisciplinary in nature. Students are advised to ensure the proper categorization of their elective choices during registration and take guidance from the faculty coordinator/teacher while selecting an OEC. In particular, if courses are chosen from the Management category or Environmental Sciences, they should not overlap (more than 50%) with the courses already studied in the 1st and 2nd semesters.

- **Selection of course:** Students must select courses from the approved PEC/OEC course list, **other than what they** studied in their previous semesters.
- Exams for these courses will be conducted by **VTU** and it will be **online proctored mode**.

Below are the steps to complete PEC/OEC courses

- A. Account Creation
- B. Application Registration
- C. Course enrollment

A. Student Account Creation

- 1. Go to **online.vtu.ac.in** link
- 2. Click on the **Sign In** button on the top right corner.
- 3. If you are a new user, click on Create an account.
- 4. Fill your email, Phone number, Name and create a new password.
- 5. Click **Sign Up**, enter OTP.
- 6. Login by entering your email ID and password.
- 7. You will be taken to the Student dashboard.

B. Application Registration Procedure

- 1. **Login** by entering your email ID and password.
- 2. You will be taken to the Student dashboard, click on Academics on the top right corner then click on **Register For PEC and OEC**.
- 3. Fill out the basic and academic information.
- 4. Then, select one 3-credit course or a combination of courses adding up to exactly 3 credits from the **PEC and OEC** dropdowns.
- 5. Click on Save and Continue.

C. Course Enrollment Procedure

Note: Students must enroll in the exact same PEC and OEC courses that are selected in the previous dropdown menus (Registration application).

- 1. Click on the Course link provided next to each course in the below mentioned department wise eligible course list
- 2. You will be taken to the Course Overview page directly, Click on Enroll the Course button.
- 3. Now you are enrolled in the Course, Click on Profile Picture then Click My Learning.
- 4. All the Courses and programs that you are enrolled in will be in **My Learning**. You can start accessing the Course content by clicking on the **Start** button in front of the Course.

Note:

Instructions for quizzes, exam registration, and online exam will be informed in upcoming circular.

CIVIL ENGINEERING COURSES

Eligible Branches to take the Courses Civil Engineering

Sl. No	Course Name	Weeks	Credits	Course Link
1	Finite Element Method And Computational Structural Dynamics	12 Weeks	3	https://online.vtu.ac.in/course-details/Finite-Element-Method-And- Computational-Structural-Dynamics
2	Mechanics Of Materials	12 Weeks	3	https://online.vtu.ac.in/course-details/Mechanics-Of-Materials
3	Municipal Solid Waste Management	12 Weeks	3	https://online.vtu.ac.in/course-details/Municipal-Solid-Waste-Management
4	Introduction to Multimodal Urban Transportation Systems (MUTS)	12 Weeks	3	https://online.vtu.ac.in/course-details/Introduction-to-Multimodal- Urban-Transportation-Systems-MUTS
5	Bridge Engineering	12 Weeks	3	https://online.vtu.ac.in/course-details/Bridge-Engineering
6	Wastewater Treatment And Recycling	12 Weeks	3	https://online.vtu.ac.in/course-details/Wastewater-Treatment-And- Recycling
7	Integrated Waste Management For A Smart City	12 Weeks	3	https://online.vtu.ac.in/course-details/Integrated-Waste-Manageme nt-For-A-Smart-City
8	Sustainable Transportation Systems	12 Weeks	3	https://online.vtu.ac.in/course-details/Sustainable-Transportation-S
9	Advanced Foundation Engineering	12 Weeks	3	https://online.vtu.ac.in/course-details/Advanced-Foundation-Engineering
10	Applied Seismology for Engineers	12 Weeks	3	https://online.vtu.ac.in/course-details/applied-seismology-for-engineers

11	Environmental Remediation of	12 Weeks	3	https://online.vtu.ac.in/course-details/Environmental-Remediation-
	Contaminated Sites			of-Contaminated-Sites
12	Geology and Soil Mechanics	12 Weeks	3	https://online.vtu.ac.in/course-details/geology-and-soil-mechanics
13	Hydraulic Engineering	12 Weeks	3	https://online.vtu.ac.in/course-details/Hydraulic-Engineering-3009 35
14	Industrial Wastewater Treatment	12 Weeks	3	https://online.vtu.ac.in/course-details/Industrial-Wastewater-Treatment
15	Maintenance and Repair of Concrete Structures	12 Weeks	3	https://online.vtu.ac.in/course-details/Maintenance-and-Repair-of- Concrete-Structures
16	Modern Construction Materials	12 Weeks	3	https://online.vtu.ac.in/course-details/Modern-Construction-materials
17	Soil Structure Interaction	12 Weeks	3	https://online.vtu.ac.in/course-details/Soil-Structure-Interaction
18	Unsaturated Soil Mechanics	12 Weeks	3	https://online.vtu.ac.in/course-details/unsaturated-soil-mechanics
19	Geosynthetics And Reinforced Soil Structures	12 Weeks	3	https://online.vtu.ac.in/course-details/Geosynthetics-and-Reinforce d-Soil-Structures
20	Ground Improvement	12 Weeks	3	https://online.vtu.ac.in/course-details/Ground-Improvement
21	Pavement Materials (Under Pavement Engineering)	12 Weeks	3	https://online.vtu.ac.in/course-details/PAVEMENT-MATERIALS- UNDER-PAVEMENT-ENGINEERING
22	Integrated Waste Management For A Smart City	12 Weeks	3	https://online.vtu.ac.in/course-details/Integrated-Waste-Manageme nt-For-A-Smart-City
23	Environmental Geomechanics	12 Weeks	3	https://online.vtu.ac.in/course-details/Environmental-Geomechanic <u>s</u>
24	Analysis and Design of Bituminous Pavements	12 Weeks	3	https://online.vtu.ac.in/course-details/analysis-and-design-of-bitum inous-pavements
25	Industrial Wastewater Treatment	12 Weeks	3	https://online.vtu.ac.in/course-details/Industrial-Wastewater-Treatment
26	Project Planning & Control	8 Weeks	2	https://online.vtu.ac.in/course-details/Project-Planning-Control

27	Principles Of Construction	0.117. 1	2	https://online.vtu.ac.in/course-details/Principles-Of-Construction-
27	Management	8 Weeks	2	<u>Management</u>
28	Matrix Method Of Structural	8 Weeks	2	https://online.vtu.ac.in/course-details/Matrix-Method-Of-Structural
28	Analysis	8 Weeks	<i></i>	<u>-Analysis</u>
29	Sustainable Engineering Concepts	8 Weeks	2	https://online.vtu.ac.in/course-details/Sustainable-Engineering-Con
29	And Life Cycle Analysis	o weeks	2	cepts-And-Life-Cycle-Analysis
30	Digital Land Surveying and Mapping	8 Weeks	2	https://online.vtu.ac.in/course-details/digital-land-surveying-and-m
30	(DLS&M)		apping-dlsm-744688	
31	Earthquake Resistant Design of	8 Weeks	2	https://online.vtu.ac.in/course-details/Earthquake-Resistant-Design
31	Foundations	o weeks		<u>-of-Foundations</u>
32	Expansive Soil	8 Weeks	2	https://online.vtu.ac.in/course-details/Expansive-Soil-190512
33	Geomorphic Processes: Landforms	8 Weeks	2	https://online.vtu.ac.in/course-details/geomorphic-processes-landfo
33	and Landscapes			<u>rms-and-landscapes</u>
34	Introduction to Accounting and	8 Weeks	2	https://online.vtu.ac.in/course-details/Introduction-to-Accounting-a
34	Finance for Civil Engineers	o weeks		nd-Finance-for-Civil-Engineers
35	Introduction to Civil Engineering	8 Weeks	2	https://online.vtu.ac.in/course-details/introduction-to-civil-engineer
	Profession	o weeks	2	<u>ing-profession</u>
36	Subsurface Exploration : Importance	8 Weeks	2	https://online.vtu.ac.in/course-details/Subsurface-Exploration-Impo
	And Techniques Involved	o weeks	2	rtance-And-Techniques-Involved
37	Earthquake Resistant Design of	8 Weeks	2	https://online.vtu.ac.in/course-details/Earthquake-Resistant-Design
37	Foundations	O WCCKS	s weeks 2	<u>-of-Foundations</u>
38	Plastic Waste Management	8 Weeks	2	https://online.vtu.ac.in/course-details/Plastic-Waste-Management
39	GPS Surveying	4 Weeks	1	https://online.vtu.ac.in/course-details/gps-surveying
40	Structural Dynamics for Civil	4 Weeks	1	https://online.vtu.ac.in/course-details/structural-dynamics-for-civil-
40	Engineers - SDOF Systems	T WCCKS	1	engineers-sdof-systems

EI-BM-ML

Eligible Branches to take the Courses

Computer Science and Engineering/ Electrical, Electronics and Communications Engineering/ Machine Learning

Sl. No	Course Name	Weeks	Credits	Course Link
1	Fundamentals Of Micro And Nanofabrication	12 Weeks	3	https://online.vtu.ac.in/course-details/Fundamentals-Of- Micro-And-Nanofabrication
2	Getting Started With Competitive Programming	12 Weeks	3	https://online.vtu.ac.in/course-details/Getting-Started-with-Competitive-Programming
3	Social Network Analysis	12 Weeks	3	https://online.vtu.ac.in/course-details/Social-Network-A nalysis
4	Design & Implementation Of Human-Computer Interfaces	12 Weeks	3	https://online.vtu.ac.in/course-details/Design-Implement ation-Of-Human-Computer-Interfaces
5	Ethical Hacking	12 Weeks	3	https://online.vtu.ac.in/course-details/Ethical-Hacking
6	Programming In Modern C++	12 Weeks	3	https://online.vtu.ac.in/course-details/Programming-In- Modern-C
7	Data Structure And Algorithms Using Java	12 Weeks	3	https://online.vtu.ac.in/course-details/Data-Structure-And-Algorithms-Using-Java
8	Introduction To Algorithms And Analysis	12 Weeks	3	https://online.vtu.ac.in/course-details/Introduction-To-Algorithms-And-Analysis
9	Artificial Intelligence : Search Methods For Problem Solving	12 Weeks	3	https://online.vtu.ac.in/course-details/Artificial-Intellige nce-Search-Methods-For-Problem-Solving-IIT-Madras

10	Fiber Optic Communication Technology	12 Weeks	3	https://online.vtu.ac.in/course-details/Fiber-Optic-Com munication-Technology
11	Applied Optimization For Wireless, Machine Learning, Big Data	12 Weeks	3	https://online.vtu.ac.in/course-details/Applied-Optimizat ion-For-Wireless-Machine-Learning-Big-Data-720742
12	Block Chain and its Applications	12 Weeks	3	https://online.vtu.ac.in/course-details/Blockchain-and-its -Applications
13	GPU Architectures and Programming	12 Weeks	3	https://online.vtu.ac.in/course-details/GPU-Architecture s-And-Programming
14	Cloud Computing	12 Weeks	3	https://online.vtu.ac.in/course-details/Cloud-Computing
15	Computational Systems Biology	12 Weeks	3	https://online.vtu.ac.in/course-details/Computational-Systems-Biology
16	Data Analytics with Python	12 Weeks	3	https://online.vtu.ac.in/course-details/Data-Analytics-wi th-Python
17	Data Mining	8 Weeks	2	https://online.vtu.ac.in/course-details/Data-Mining
18	User-centric Computing For Human-Computer Interaction	8 Weeks	2	https://online.vtu.ac.in/course-details/user-centric-comp uting-for-human-computer-interaction
19	Google Cloud Computing Foundations	8 Weeks	2	https://online.vtu.ac.in/course-details/Google-Cloud-Co mputing-Foundations
20	Discrete Time Signal Processing	8 Weeks	2	https://online.vtu.ac.in/course-details/Discrete-Time-Signal-Processing
21	Python For Data Science	4 Weeks	1	https://online.vtu.ac.in/course-details/Python-for-Data-S cience

ELECTRONICS AND COMMUNICATION ENGINEERING

Eligible Branches to take the Courses

Electronics & Instrumentation Engineering/ Electronics & Telecommunication Engg/ Telecommunication
Engineering/ Industrial IoT/ Medical Electronics Engineering/ Electronics Engg (VLSI Design and Technology)/
Electronics Communication (Advanced Communication Technology)/ Electronics and Computer Engineering/
Electronics and Communication Engineering

Sl. No	Course Name	Weeks	Credits	Course Link
1	Artificial Intelligence : Search methods for problem solving Prof.Deepak Khemani	12 Weeks	3	https://online.vtu.ac.in/course-details/Artificial-Intellige nce-Search-Methods-For-Problem-Solving-IIT-Madras
2	Understanding Incubation and Enterprenurship Prof. B K Chakravarthy	12 Weeks	3	https://online.vtu.ac.in/course-details/Understanding-Incubation-and-Entrepreneurship
3	Learning Anlystics Tools Prof. Rajkumar Rajendram	12 Weeks	3	https://online.vtu.ac.in/course-details/Learning-Analytic s-Tools
4	Modern Digital Communication Techniques	12 Weeks	3	https://online.vtu.ac.in/course-details/Modern-digital-co mmunication-techniques
5	Applied Linear Algebra For Signal Processing, Data Analytics And Machine Learning	12 Weeks	3	https://online.vtu.ac.in/course-details/Applied-Linear-Algebra-For-Signal-Processing-Data-Analytics-And-Machine-Learning
6	Stochastic Control And Communication	12 Weeks	3	https://online.vtu.ac.in/course-details/Stochastic-Control -And-Communication
7	Principles And Techniques Of Modern Radar Systems	12 Weeks	3	https://online.vtu.ac.in/course-details/Principles-And-Techniques-Of-Modern-Radar-Systems

8	Fiber Optic Communication Technology	12 Weeks	3	https://online.vtu.ac.in/course-details/Fiber-Optic-Com munication-Technology
9	Probability Foundations For Electrical Engineers	12 Weeks	3	https://online.vtu.ac.in/course-details/Probability-Found ations-For-Electrical-Engineers
10	Mathematical Aspects Of Biomedical Electronic System Design	12 Weeks	3	https://online.vtu.ac.in/course-details/Mathematical-Asp ects-of-Biomedical-Electronic-System-Design
11	Applied Optimization For Wireless, Machine Learning, Big Data	12 Weeks	3	https://online.vtu.ac.in/course-details/Applied-Optimiza tion-For-Wireless-Machine-Learning-Big-Data-720742
12	Microelectronics: Devices To Circuits	12 Weeks	3	https://online.vtu.ac.in/course-details/Microelectronics- Devices-To-Circuits
13	Photonic integrated circuit	12 Weeks	3	https://online.vtu.ac.in/course-details/Photonic-integrate d-circuit
14	Analog Ic Design	12 Weeks	3	https://online.vtu.ac.in/course-details/Analog-Ic-Design
15	Computer Vision And Image Processing - Fundamentals And Applications	12 Weeks	3	https://online.vtu.ac.in/course-details/computer-vision-a nd-image-processing-fundamentals-and-applications-97 3141
16	Physics of Nanoscale Devices	12 Weeks	3	https://online.vtu.ac.in/course-details/Physics-of-Nanos cale-Devices
17	Power Management Integrated Circuits	12 Weeks	3	https://online.vtu.ac.in/course-details/Power-Manageme nt-Integrated-Circuits
18	Semiconductor device modeling and Simulation	12 Weeks	3	https://online.vtu.ac.in/course-details/Semiconductor-de vice-modeling-and-Simulation
19	Advanced Computer Networks	12 Weeks	3	https://online.vtu.ac.in/course-details/Advanced-Computer-Networks
20	Parallel Computer Architecture	12 Weeks	3	https://online.vtu.ac.in/course-details/parallel-computer- architecture

21	Data Analytics with Python	12 Weeks	3	https://online.vtu.ac.in/course-details/Data-Analytics-wi th-Python
22	Programming In Java	12 Weeks	3	https://online.vtu.ac.in/course-details/Programming-In-Java
23	Data Structure And Algorithms Using Java	12 Weeks	3	https://online.vtu.ac.in/course-details/Data-Structure-And-Algorithms-Using-Java
24	Fuzzy Sets, Logic and Systems & Applications	12 Weeks	3	https://online.vtu.ac.in/course-details/Fuzzy-Sets-Logic- and-Systems-Applications
25	Optical Wireless Communications for Beyond 5G Networks and IoT	12 Weeks	3	https://online.vtu.ac.in/course-details/Optical-Wireless- Communications-for-Beyond-5G-Networks-and-IoT
26	Operations Research	8 Weeks	2	https://online.vtu.ac.in/course-details/Operations-Resear ch
27	Intellactual Property Rigths and Competition Law	8 Weeks	2	https://online.vtu.ac.in/course-details/Intellectual-Proper ty-Rights-and-Competition-Law
28	Big Data Computing	8 Weeks	2	https://online.vtu.ac.in/course-details/BIG-DATA-COM PUTING
29	Advanced Linear Continuous Control Systems: Applications With Matlab Programming And Simulink	8 Weeks	2	https://online.vtu.ac.in/course-details/Advanced-Linear- Continuous-Control-Systems-Applications-With-Matlab -Programming-And-Simulink
30	Analog Circuits	8 Weeks	2	https://online.vtu.ac.in/course-details/Analog-Circuits
31	CMOS Digital VLSI Design	8 Weeks	2	https://online.vtu.ac.in/course-details/CMOS-Digital-V <u>LSI-Design</u>
32	Electronics Enclosures Thermal issues	8 Weeks	2	https://online.vtu.ac.in/course-details/electronics-enclos ures-thermal-issues
33	Microwave Integrated Circuits	8 Weeks	2	https://online.vtu.ac.in/course-details/microwave-integr ated-circuits

34	Design Of Power Electronic Converters	8 Weeks	2	https://online.vtu.ac.in/course-details/Design-of-Power- Electronic-Converters
35	VLSI Interconnects	8 Weeks	2	https://online.vtu.ac.in/course-details/VLSI-Interconnec <u>ts</u>
36	System Design Through Verilog	8 Weeks	2	https://online.vtu.ac.in/course-details/System-Design-T hrough-Verilog
37	Fundamentals Of MIMO Wireless Communication	8 Weeks	2	https://online.vtu.ac.in/course-details/Fundamentals-Of-MIMO-Wireless-Communication-537713
38	Foundations of Wavelets and Multirate Digital Signal Processing	4 Weeks	1	https://online.vtu.ac.in/course-details/Foundations-of-Wavelets-and-Multirate-Digital-Signal-Processing
39	Medical Image Analysis	4 Weeks	1	https://online.vtu.ac.in/course-details/Medical-Image-A nalysis
40	Recent Advances in Transmission Insulators	4 Weeks	1	https://online.vtu.ac.in/course-details/Recent-Advances- in-Transmission-Insulators-368065

BIOTECHNOLOGY AND BIOENGINEERING

Eligible Branches to take the Courses

Agriculture Engineering/ Biomedical Engineering/ Biotechnology and Bioengineering

Sl. No	Course Name	Weeks	Credits	Course Link
1	Medical Image Analysis	12 Weeks	3	https://online.vtu.ac.in/course-details/Medical-Image-Ana lysis
2	Introduction To Biomedical Imaging Systems	12 Weeks	3	https://online.vtu.ac.in/course-details/Introduction-To-Bio medical-Imaging-Systems
3	Genome Editing And Engineering	12 Weeks	3	https://online.vtu.ac.in/course-details/Genome-Editing-A nd-Engineering
4	Conservation Geography	12 Weeks	3	https://online.vtu.ac.in/course-details/Conservation-Geog raphy
5	Experimental Biotechnology	12 Weeks	3	https://online.vtu.ac.in/course-details/Experimental-Biotechnology
6	Industrial Biotechnology	12 Weeks	3	https://online.vtu.ac.in/course-details/Industrial-Biotechn ology
7	Environmental Chemistry and Microbiology	12 Weeks	3	https://online.vtu.ac.in/course-details/Environmental-Che mistry-and-Microbiology
9	Maternal Infant Young Child Nutrition	12 Weeks	3	https://online.vtu.ac.in/course-details/Maternal-Infant-Young-Child-Nutrition
10	Thermodynamics for Biological Systems : Classical and Statistical Aspect	12 Weeks	3	https://online.vtu.ac.in/course-details/Thermodynamics-f or-Biological-Systems-Classical-and-Statistical-Aspect
11	Maternal Infant Young Child Nutrition	12 Weeks	3	https://online.vtu.ac.in/course-details/Maternal-Infant-Young-Child-Nutrition

12	RNA Biology	12 Weeks	3	https://online.vtu.ac.in/course-details/RNA-Biology
13	Biomechanics	12 Weeks	3	https://online.vtu.ac.in/course-details/Biomechanics
14	Bio Informatics: Algorithms and Applications	12 Weeks	3	https://online.vtu.ac.in/course-details/Bio-Informatics-Algorithms-and-Applications
15	Computational Systems Biology	12 Weeks	3	https://online.vtu.ac.in/course-details/Computational-Systems-Biology
16	Conservation Economics	12 Weeks	3	https://online.vtu.ac.in/course-details/conservation-econo mics-423872
17	Host-Pathogen Interaction (Immunology)	12 Weeks	3	https://online.vtu.ac.in/course-details/Host-Pathogen-Interaction-Immunology
18	Interactomics : Basics & Applications	12 Weeks	3	https://online.vtu.ac.in/course-details/Interactomics-Basic s-Applications
19	Optical Spectroscopy and Microscopy: Fundamentals of optical measurements and instrumentation	12 Weeks	3	https://online.vtu.ac.in/course-details/Optical-Spectrosco py-and-Microscopy-Fundamentals-of-optical-measureme nts-and-instrumentation
20	Modern Food Packaging Technologies: Regulatory Aspects and Global Trends	12 Weeks	3	https://online.vtu.ac.in/course-details/Modern-Food-Pack aging-Technologies-Regulatory-Aspects-and-Global-Tren ds
21	Novel Technologies For Food Processing And Shelf Life Extension	12 Weeks	3	https://online.vtu.ac.in/course-details/novel-technologies- for-food-processing-and-shelf-life-extension
22	Cooling Technology: Why and How utilized in Food Processing and allied Industries	12 Weeks	3	https://online.vtu.ac.in/course-details/Cooling-Technolog y-Why-and-How-utilized-in-Food-Processing-and-allied- Industries
23	Introductory Mathematical Methods for Biologists	8 Weeks	2	https://online.vtu.ac.in/course-details/Introductory-Mathe matical-Methods-for-Biologists

24	Medical Biomaterials	8 Weeks	2	https://online.vtu.ac.in/course-details/Medical-Biomateria ls
25	Nanotechnology in Agriculture	8 Weeks	2	https://online.vtu.ac.in/course-details/Nanotechnology-In- Agriculture
26	Organ Printing	8 Weeks	2	https://online.vtu.ac.in/course-details/Organ-Printing
27	Introduction To Mechanobiology	8 Weeks	2	https://online.vtu.ac.in/course-details/Introduction-To-Mechanobiology
28	Bioengineering: An Interface with Biology and Medicine	8 Weeks	2	https://online.vtu.ac.in/course-details/Bioengineering-An- Interface-with-Biology-and-Medicine
29	Biostatistics and Design of experiments	8 Weeks	2	https://online.vtu.ac.in/course-details/Biostatistics-and-D esign-of-experiments
30	Data Analysis for Biologists	8 Weeks	2	https://online.vtu.ac.in/course-details/Data-Analysis-for- Biologists
31	Cellular Biophysics: A Framework For Quantitative Biology	8 Weeks	2	https://online.vtu.ac.in/course-details/Cellular-biophysics -a-framework-for-quantitative-biology
32	Computer Aided Drug Design	8 Weeks	2	https://online.vtu.ac.in/course-details/Computer-Aided-D rug-Design
33	Plant Cell Bioprocessing	8 Weeks	2	https://online.vtu.ac.in/course-details/Plant-Cell-Bioprocessing
34	Data Analysis For Biologists	8 Weeks	2	https://online.vtu.ac.in/course-details/Data-Analysis-for- Biologists
35	Biointerface Engineering	8 Weeks	2	https://online.vtu.ac.in/course-details/Biointerface-Engineering
36	Demystifying The Brain	4 Weeks	1	https://online.vtu.ac.in/course-details/Demystifying-The- Brain

COMPUTER SCIENCE ENGINEERING COURSES

Eligible Branches to take the Courses

Artificial Intelligence & Data Science/ Artificial Intelligence and Machine Learning/ Computer & Communication Engineering/ Computer Science & Business System/ Computer Science & Design/ Computer Science & Engineering (IoT)/ CSE (Artificial Intelligence)/ CSE (Cyber Security)/ CSE (Data Science)/ CSE (IoT & Cyber Security including Block Chain Technology)/ Data Science/ Information Science & Engineering/ Computer Science and Engineering.

Sl. No	Course Name	Weeks	Credits	Course Link
1	Advanced Computer Networks	12 Weeks	3	https://online.vtu.ac.in/course-details/advanced-computer -networks
2	Circuit Complexity Theory	12 Weeks	3	https://online.vtu.ac.in/course-details/circuit-complexity-t heory
3	Computational Number Theory and Algebra	12 Weeks	3	https://online.vtu.ac.in/course-details/computational-num ber-theory-and-algebra
4	Parallel Computer Architecture	12 Weeks	3	https://online.vtu.ac.in/course-details/parallel-computer-architecture
5	Quantum Algorithms and Cryptography	12 Weeks	3	https://online.vtu.ac.in/course-details/quantum-algorithms -and-cryptography
6	Switching Circuits and Logic Design	12 Weeks	3	https://online.vtu.ac.in/course-details/switching-circuits-a nd-logic-design
7	Affective Computing	12 Weeks	3	https://online.vtu.ac.in/course-details/Affective-Computing

	1			
8	Foundations of Cyber Physical Systems	12 Weeks	3	https://online.vtu.ac.in/course-details/Foundations-of-Cyber-Physical-Systems
_			_	https://online.vtu.ac.in/course-details/GPU-Architectures-
9	GPU Architectures and Programming	12 Weeks	3	And-Programming
				https://online.vtu.ac.in/course-details/Reinforcement-Lear
10	Reinforcement Learning	12 Weeks	3	ning
11	Coorne Commutation, Port I	12 Weels	3	https://online.vtu.ac.in/course-details/Secure-Computatio
11	Secure Computation: Part I	12 Weeks	3	<u>n-Part-I</u>
12	Social Networks	12 Weeks	3	https://online.vtu.ac.in/course-details/Social-Networks
1.2	Introduction To Industry 4.0 And	10 11 1	2	https://online.vtu.ac.in/course-details/Introduction-To-Ind
13	Industrial Internet of Things	12 Weeks	3	ustry-40-And-Industrial-Internet-Of-Things
1.4	D : C	10 11/ 1	2	https://online.vtu.ac.in/course-details/Reinforcement-Lear
14	Reinforcement Learning	12 Weeks	3	ning
1.5	5			https://online.vtu.ac.in/course-details/Parameterized-Algo
15	Parameterized Algorithms	12 Weeks	3	rithms
1.6	Applied Accelerated Artificial	10 11/ 1		https://online.vtu.ac.in/course-details/Applied-Accelerate
16	Intelligence	12 Weeks	3	d-Artificial-Intelligence
17	Social Networks	12 Weeks	3	https://online.vtu.ac.in/course-details/Social-Networks
1.0		10 11/ 1	2	https://online.vtu.ac.in/course-details/Computational-Co
18	Computational Complexity	12 Weeks	3	mplexity
10	Introduction To Game Theory And	10 777 1	2	https://online.vtu.ac.in/course-details/Introduction-To-Ga
19	Mechanism Design	12 Weeks	3	me-Theory-And-Mechanism-Design
20				https://online.vtu.ac.in/course-details/Advanced-Distribut
20	Advanced Distributed Systems	12 Weeks	3	ed-Systems
21	Privacy And Security In Online Social	10 11/ 1	2	https://online.vtu.ac.in/course-details/Privacy-and-Securit
21	Media	12 Weeks	3	y-in-Online-Social-Media
22	Ethical Hacking	12 Weeks	3	https://online.vtu.ac.in/course-details/Ethical-Hacking
	<u> </u>			

23	Introduction To Haskell Programming	8 Weeks	2	https://online.vtu.ac.in/course-details/Introduction-To-Haskell-Programming
24	Data Science For Engineers	8 Weeks	2	https://online.vtu.ac.in/course-details/Data-Science-for-Engineers-356533
25	Google Cloud Computing Foundations	8 Weeks	2	https://online.vtu.ac.in/course-details/Google-Cloud-Computing-Foundations
26	Edge Computing	8 Weeks	2	https://online.vtu.ac.in/course-details/edge-computing
27	Embedded System Design with ARM	8 Weeks	2	https://online.vtu.ac.in/course-details/embedded-system-design-with-arm
28	Optimisation for Machine Learning: Theory and Implementation(Hindi)	8 Weeks	2	https://online.vtu.ac.in/course-details/optimisation-for-machine-learning-theory-and-implementation-hindi
29	User-centric Computing For Human-Computer Interaction	8 Weeks	2	https://online.vtu.ac.in/course-details/user-centric-comput ing-for-human-computer-interaction
30	AI: Constraint Satisfaction	8 Weeks	2	https://online.vtu.ac.in/course-details/AI-Constraint-Satis faction-545118
31	Introduction To Soft Computing	8 Weeks	2	https://online.vtu.ac.in/course-details/Introduction-To-Sof t-Computing
32	Foundation of Cloud IoT Edge ML	8 Weeks	2	https://online.vtu.ac.in/course-details/Foundation-of-Cloud-IOT-Edge-ML-431040
33	Hardware Modeling Using Verilog	8 Weeks	2	https://online.vtu.ac.in/course-details/Hardware-Modelin g-Using-Verilog
34	Machine Learning For Earth System Sciences	8 Weeks	2	https://online.vtu.ac.in/course-details/Machine-Learning- For-Earth-System-Sciences
35	Software Testing (IITKGP)	4 Weeks	1	https://online.vtu.ac.in/course-details/Software-Testing-II TKGP
36	Systems and Usable Security	4 Weeks	1	https://online.vtu.ac.in/course-details/systems-and-usable -security-979026

ELECTRICAL AND ELECTRONICS ENGINEERING

Eligible Branches to take the Courses

Electronics & Instrumentation Engineering/ Electronics & Telecommunication Engg/ Telecommunication
Engineering/ Industrial IoT/ Medical Electronics Engineering/ Electronics Engg (VLSI Design and Technology)/
Electronics Communication (Advanced Communication Technology)/ Electronics and Computer Engineering/
Electronics and Communication Engineering/Electrical & Electronics Engineering (EE)

Sl. No	Course Name	Weeks	Credits	Course Link
1	Design of Photovoltaic Systems	12 Weeks	3	https://online.vtu.ac.in/course-details/design-of-photovol taic-systems
2	Smart Grid: Basics To Advanced Technologies	12 Weeks	3	https://online.vtu.ac.in/course-details/Smart-Grid-Basics -To-Advanced-Technologies
3	Enclosure Design Of Electronics Equipment	12 Weeks	3	https://online.vtu.ac.in/course-details/enclosure-design-o f-electronics-equipment
4	Microelectronics: Devices To Circuits	12 Weeks	3	https://online.vtu.ac.in/course-details/Microelectronics- Devices-To-Circuits

5	Digital Control in Switched Mode Power Converters and FPGA-based Prototyping	12 Weeks	3	https://online.vtu.ac.in/course-details/digital-control-in-s witched-mode-power-converters-and-fpga-based-prototy ping
6	Applied Electromagnetics For Engineers	12 Weeks	3	https://online.vtu.ac.in/course-details/Applied-Electroma gnetic-For-Engineers
7	Analog Ic Design	12 Weeks	3	https://online.vtu.ac.in/course-details/Analog-Ic-Design
8	Computer Vision and Image Processing - Fundamentals And Applications	12 Weeks	3	https://online.vtu.ac.in/course-details/computer-vision-a nd-image-processing-fundamentals-and-applications-97 3141
9	Optical Wireless Communications for Beyond 5G Networks and IoT	12 Weeks	3	https://online.vtu.ac.in/course-details/Optical-Wireless-C ommunications-for-Beyond-5G-Networks-and-IoT
10	Physics of Nanoscale Devices	12 Weeks	3	https://online.vtu.ac.in/course-details/Physics-of-Nanosc ale-Devices
11	Power Management Integrated Circuits	12 Weeks	3	https://online.vtu.ac.in/course-details/Power-Manageme nt-Integrated-Circuits
12	Power System Dynamics, Control and Monitoring	12 Weeks	3	https://online.vtu.ac.in/course-details/power-system-dyn amics-control-and-monitoring
13	Semiconductor device modeling and Simulation	12 Weeks	3	https://online.vtu.ac.in/course-details/Semiconductor-de vice-modeling-and-Simulation
14	Microelectronics: Devices To Circuits	12 Weeks	3	https://online.vtu.ac.in/course-details/Microelectronics- Devices-To-Circuits
15	Fuzzy Sets, Logic and Systems & Applications Programming And Simulink	12 Weeks	3	https://online.vtu.ac.in/course-details/Fuzzy-Sets-Logic- and-Systems-Applications
16	Advances In Uhv Transmission And Distribution	8 Weeks	2	https://online.vtu.ac.in/course-details/Advances-In-Uhv- Transmission-And-Distribution

17	Advanced Linear Continuous Control Systems: Applications With Matlab	8 Weeks	2	https://online.vtu.ac.in/course-details/Advanced-Linear- Continuous-Control-Systems-Applications-With-Matlab -Programming-And-Simulink
18	Dc Microgrid And Control Systems	8 Weeks	2	https://online.vtu.ac.in/course-details/Dc-Microgrid-and- Control-Systems
19	Electrical Distribution System Analysis	8 Weeks	2	https://online.vtu.ac.in/course-details/Electrical-Distribut ion-System-Analysis
20	VLSI Interconnects	8 Weeks	2	https://online.vtu.ac.in/course-details/VLSI-Interconnect <u>s</u>
21	System Design Through Verilog	8 Weeks	2	https://online.vtu.ac.in/course-details/System-Design-Th rough-Verilog
22	Analog Circuits	8 Weeks	2	https://online.vtu.ac.in/course-details/Analog-Circuits
23	CMOS Digital VLSI Design	8 Weeks	2	https://online.vtu.ac.in/course-details/CMOS-Digital-VL SI-Design
24	Electronics Enclosures Thermal issues	8 Weeks	2	https://online.vtu.ac.in/course-details/electronics-enclosures-thermal-issues
25	Microwave Integrated Circuits	8 Weeks	2	https://online.vtu.ac.in/course-details/microwave-integra ted-circuits
26	Design Of Power Electronic Converters	8 Weeks	2	https://online.vtu.ac.in/course-details/Design-of-Power- Electronic-Converters
27	Foundations of Wavelets and Multirate Digital Signal Processing	8 Weeks	2	https://online.vtu.ac.in/course-details/Foundations-of-Wavelets-and-Multirate-Digital-Signal-Processing
28	Medical Image Analysis	8 Weeks	2	https://online.vtu.ac.in/course-details/Medical-Image-Analysis
29	Recent Advances in Transmission Insulators	8 Weeks	2	https://online.vtu.ac.in/course-details/Recent-Advances-i n-Transmission-Insulators-368065

30	An Introduction To Coding Theory	8 Weeks	2	https://online.vtu.ac.in/course-details/an-introduction-to- coding-theory
31	Analysis And Design Principles Of Microwave Antennas	8 Weeks	2	https://online.vtu.ac.in/course-details/analysis-and-desig n-principles-of-microwave-antennas
32	Design Of Power Electronic Converters	8 Weeks	2	https://online.vtu.ac.in/course-details/Design-of-Power- Electronic-Converters
33	Fundamentals Of MIMO Wireless Communication	8 Weeks	2	https://online.vtu.ac.in/course-details/Fundamentals-Of-MIMO-Wireless-Communication-537713
34	Solar Energy Engineering and Technology	8 Weeks	2	https://online.vtu.ac.in/course-details/solar-energy-engin eering-and-technology

AEROSPACE ENGINEERING

Eligible Branches to take the Courses Aeronautical Engineering/ Aerospace Engineering

Sl. No	Course Name	Weeks	Credits	Course Link
1	Aircraft Design	12 Weeks	3	https://online.vtu.ac.in/course-details/Aircraft-Design-437894
2	Computational Science in Engineering	8 Weeks	2	https://online.vtu.ac.in/course-details/Computational-Science-in -Engineering-538206
3	Fundamentals of Supersonic and Hypersonic Flow	12 Weeks	3	https://online.vtu.ac.in/course-details/Fundamentals-of-Superso nic-and-Hypersonic-Flow
4	Introduction to Aircraft Control System	12 Weeks	3	https://online.vtu.ac.in/course-details/Introduction-to-Aircraft-Control-System
5	Introduction to Ancient Indian Technology	12 Weeks	3	https://online.vtu.ac.in/course-details/Introduction-to-Ancient-Indian-Technology
6	Introduction to Experiments in Flight	12 Weeks	3	https://online.vtu.ac.in/course-details/Introduction-to-Experime nts-in-Flight
7	Lighter than Air Systems	8 Weeks	2	https://online.vtu.ac.in/course-details/Lighter-than-Air-Systems- 458044
8	Wind Energy	4 Weeks	1	https://online.vtu.ac.in/course-details/Wind-Energy
9	Combustion of Solid Fuels and Propellants	12 Weeks	3	https://online.vtu.ac.in/course-details/Combustion-of-Solid-Fuel s-and-Propellants
10	Introduction to Launch Vehicle Analysis and Design	12 Weeks	3	https://online.vtu.ac.in/course-details/introduction-to-launch-ve hicle-analysis-and-design-iit-bombay-253636

MECHANICAL ENGINEERING

Eligible Branches to take the Courses

Industrial & Production Engineering/ Mechatronics/ Robotics & Automation/ Robotics and Artificial Intelligence/ Mechanical Engineering

Sl. No	Course Name	Weeks	Credits	Course Link
1	Advanced Dynamics	12 Weeks	3	https://online.vtu.ac.in/course-details/Advanced-Dynamics
2	Advanced Robotics	12 Weeks	3	https://online.vtu.ac.in/course-details/Advanced-Robotics
3	Advanced Thermodynamics And Combustion	12 Weeks	3	https://online.vtu.ac.in/course-details/Advanced-Thermodynamics-And-Combustion
4	Aircraft Propulsion	12 Weeks	3	https://online.vtu.ac.in/course-details/Aircraft-Propulsion
5	Applied Ergonomics	12 Weeks	3	https://online.vtu.ac.in/course-details/applied-ergonomics
6	Computational Fluid Dynamics For Incompressible Flows	12 Weeks	3	https://online.vtu.ac.in/course-details/Computational-Fluid-Dyn amics-for-Incompressible-Flows
7	Data-Enabled Tribological Engineering: From Experiments to Predictive Models	12 Weeks	3	https://online.vtu.ac.in/course-details/data-enabled-tribological-engineering-from-experiments-to-predictive-models
8	Design Of Mechatronic Systems	12 Weeks	3	https://online.vtu.ac.in/course-details/design-of-mechatronic-systems
9	Dynamic Behaviour Of Materials	12 Weeks	3	https://online.vtu.ac.in/course-details/Dynamic-Behaviour-of-Materials-503187

10	Experimental Stress Analysis	12 Weeks	3	https://online.vtu.ac.in/course-details/Experimental-Stress-Analysis
11	Explosions and Safety	12 Weeks	3	https://online.vtu.ac.in/course-details/Explosions-and-Safety
12	Functional And Conceptual Design	12 Weeks	3	https://online.vtu.ac.in/course-details/Functional-And-Conceptual-Design
13	Fundamentals of Combustion	12 Weeks	3	https://online.vtu.ac.in/course-details/Fundamentals-of-Combust ion
14	Fundamentals Of Convective Heat Transfer	12 Weeks	3	https://online.vtu.ac.in/course-details/fundamentals-of-convective-e-heat-transfer
15	Fundamentals Of Nuclear Power Generation	12 Weeks	3	https://online.vtu.ac.in/course-details/Fundamentals-Of-Nuclear- Power-Generation
16	Mathematical Modeling Of Manufacturing Processes	12 Weeks	3	https://online.vtu.ac.in/course-details/mathematical-modeling-of -manufacturing-processes
17	Metal Additive Manufacturing	12 Weeks	3	https://online.vtu.ac.in/course-details/Metal-Additive-Manufacturing
18	Nonlinear Adaptive Control	12 Weeks	3	https://online.vtu.ac.in/course-details/Nonlinear-Adaptive-Control
19	Phase Transformation in Materials	12 Weeks	3	https://online.vtu.ac.in/course-details/Phase-Transformation-in- Materials
20	Product Design and Manufacturing	12 Weeks	3	https://online.vtu.ac.in/course-details/Product-Design-and-Manu facturing
21	Robotics: Basics and Selected Advanced Concepts	12 Weeks	3	https://online.vtu.ac.in/course-details/Robotics-Basics-and-Selec ted-Advanced-Concepts
22	Surface Mining Technology	12 Weeks	3	https://online.vtu.ac.in/course-details/Surface-Mining-Technology
23	X-Ray Crystallography & Diffraction	12 Weeks	3	https://online.vtu.ac.in/course-details/X-Ray-Crystallography-Diffraction

24	Automatic Control	8 Weeks	2	https://online.vtu.ac.in/course-details/automatic-control
25	Electronic Packaging and Manufacturing	8 Weeks	2	https://online.vtu.ac.in/course-details/electronic-packaging-and-manufacturing-482020
26	Electronic Properties Of The Materials: Computational Approach	8 Weeks	2	https://online.vtu.ac.in/course-details/Electronic-Properties-Of-T he-Materials-Computational-Approach
27	Heat Transfer and Combustion in Multiphase Systems	8 Weeks	2	https://online.vtu.ac.in/course-details/heat-transfer-and-combustion-in-multiphase-systems
28	Introduction To Mechanical Vibration	8 Weeks	2	https://online.vtu.ac.in/course-details/Introduction-To-Mechanic al-Vibration
29	Laser Based Manufacturing	8 Weeks	2	https://online.vtu.ac.in/course-details/Laser-Based-Manufacturin
30	Manufacturing Guidelines For Product Design	8 Weeks	2	https://online.vtu.ac.in/course-details/Manufacturing-Guidelines -For-Product-Design-942801
31	Mechanical Measurement Systems	8 Weeks	2	https://online.vtu.ac.in/course-details/mechanical-measurement- systems
32	Mechanics And Control Of Robotic Manipulators	8 Weeks	2	https://online.vtu.ac.in/course-details/Mechanics-And-Control-O f-Robotic-Manipulators
33	Mechanism And Robot Kinematics	8 Weeks	2	https://online.vtu.ac.in/course-details/Mechanism-And-Robot-Kinematics
34	Power Plant Engineering	8 Weeks	2	https://online.vtu.ac.in/course-details/Power-Plant-Engineering
35	Processing of Polymers and Polymer Composites	8 Weeks	2	https://online.vtu.ac.in/course-details/Processing-of-Polymers-a nd-Polymer-Composites
36	Product Engineering and Design Thinking	8 Weeks	2	https://online.vtu.ac.in/course-details/Product-Engineering-and- Design-Thinking
37	Robotics	8 Weeks	2	https://online.vtu.ac.in/course-details/Robotics
38	Theory Of Composite Shells	8 Weeks	2	https://online.vtu.ac.in/course-details/Theory-of-Composite-Shellls-779750

39	Welding Application Technology	8 Weeks	2	https://online.vtu.ac.in/course-details/Welding-Application-Tech nology
40	Inspection And Quality Control In Manufacturing	4 Weeks	1	https://online.vtu.ac.in/course-details/inspection-and-quality-control-in-manufacturing
41	Manufacturing Automation	4 Weeks	1	https://online.vtu.ac.in/course-details/manufacturing-automation
42	Product Design And Development	4 Weeks	1	https://online.vtu.ac.in/course-details/Product-Design-And-Deve
43	Selection Of Nanomaterials For Energy Harvesting And Storage Application	4 Weeks	1	https://online.vtu.ac.in/course-details/Selection-Of-Nanomaterials-For-Energy-Harvesting-And-Storage-Application
44	Smart Materials and Intelligent System Design	4 Weeks	1	https://online.vtu.ac.in/course-details/Smart-Materials-and-Intelligent-System-Design-608823
45	Structural Analysis Of Nanomaterials	4 Weeks	1	https://online.vtu.ac.in/course-details/structural-analysis-of-nano materials

CHEMICAL ENGINEERING

Eligible Branches to take the Courses Chemical Engineering

Sl. No	Course Name	Weeks	Credits	Course Link
1	Chemical Process Intensification	12 Weeks	3	https://online.vtu.ac.in/course-details/Chemical-Process-Intensification
2	Aspen Plus® Simulation Software - A Basic Course For Beginners	12 Weeks	3	https://online.vtu.ac.in/course-details/Aspen-Plus%C2%AE-Simulation-Software-A-Basic-Course-For-Beginners
3	Chemical Process Safety	12 Weeks	3	https://online.vtu.ac.in/course-details/chemical-process-safety
4	Hydrogen Energy: Production, Storage, Transportation And Safety	12 Weeks	3	https://online.vtu.ac.in/course-details/hydrogen-energy-producti on-storage-transportation-and-safety
5	Colloids And Surfaces	8 Weeks	2	https://online.vtu.ac.in/course-details/Colloids-And-Surfaces
6	Natural Gas Engineering	8 Weeks	2	https://online.vtu.ac.in/course-details/Natural-Gas-Engineering
7	Trace And Ultra-Trace Analysis Of Metals Using Atomic Absorption Spectrometry	8 Weeks	2	https://online.vtu.ac.in/course-details/Trace-And-Ultra-Trace-Analysis-Of-Metals-Using-Atomic-Absorption-Spectrometry
8	Technologies For Clean And Renewable Energy Production	8 Weeks	2	https://online.vtu.ac.in/course-details/Technologies-For-Clean-A nd-Renewable-Energy-Production
9	Mechanical Operations	4 Weeks	1	https://online.vtu.ac.in/course-details/Mechanical-Operations
10	Equipment Design: Mechanical Aspects	4 Weeks	1	https://online.vtu.ac.in/course-details/Equipment-Design-Mechanical-Aspects

MANAGEMENT

Eligible Branches to take the Courses Management

Sl. No	Course Name	Weeks	Credits	Course Link
1	Strategy And Technology: A Practical Primer	12 Weeks	3	https://online.vtu.ac.in/course-details/Strategy-And-Technology- A-Practical-Primer
2	Strategic Management For Competitive Advantage	12 Weeks	3	https://online.vtu.ac.in/course-details/Strategic-Management-For -Competitive-Advantage
3	Industrial Safety Engineering	12 Weeks	3	https://online.vtu.ac.in/course-details/Industrial-Safety-Engineer ing
4	Entrepreneurship	12 Weeks	3	https://online.vtu.ac.in/course-details/Entrepreneurship
5	Automation In Production Systems And Management	12 Weeks	3	https://online.vtu.ac.in/course-details/Automation-in-Production -Systems-and-Management
6	Toyota Production System	8 Weeks	2	https://online.vtu.ac.in/course-details/Toyota-Production-System
7	Yoga And Positive Psychology For Managing Career And Life	8 Weeks	2	https://online.vtu.ac.in/course-details/Yoga-And-Positive-Psych ology-For-Managing-Career-And-Life
8	Marketing Management - I	8 Weeks	2	https://online.vtu.ac.in/course-details/Marketing-Management-I
9	Game Theory	8 Weeks	2	https://online.vtu.ac.in/course-details/Game-Theory
10	Managing change in organizations	8 Weeks	2	https://online.vtu.ac.in/course-details/managing-change-in-organ izations-448977
11	Simulation of Business Systems: An Applied Approach	8 Weeks	2	https://online.vtu.ac.in/course-details/simulation-of-business-sys tems-an-applied-approach

12	Systems Engineering: Theory & Practice	8 Weeks	2	https://online.vtu.ac.in/course-details/systems-engineering-theory-practice-277240
13	Business Forecasting	8 Weeks	2	https://online.vtu.ac.in/course-details/business-forecasting
14	Design Thinking - A Primer	4 Weeks	1	https://online.vtu.ac.in/course-details/Design-Thinking-A-Prime <u>r</u>

TEXTILE TECHNOLOGY

Eligible Branches to take the Courses Textile Engineering

Sl. No	Course Name	Weeks	Credits	Course Link
1	Textile Finishing	12 Weeks	3	https://online.vtu.ac.in/course-details/textile-finishing
2	Science And Technology Of Weft And Warp Knitting	12 Weeks	3	https://online.vtu.ac.in/course-details/science-and-technology-of -weft-and-warp-knitting
3	Textured Yarn Technology	12 Weeks	3	https://online.vtu.ac.in/course-details/Textured-Yarn-Technology
4	Testing of Functional and Technical Textiles	8 Weeks	2	https://online.vtu.ac.in/course-details/testing-of-functional-and-t echnical-textiles
5	Advanced Textile Printing Technology	8 Weeks	2	https://online.vtu.ac.in/course-details/advanced-textile-printing-t echnology-933620