



Rajgad Dnyanpeeth's

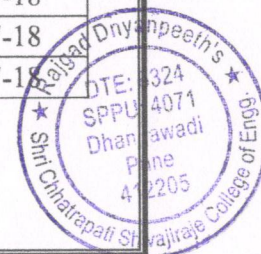
SHRI CHHATRAPATI SHIVAJIRAJE COLLEGE OF ENGINEERING
Gat. No. 237, Pune Bangalore Highway, Dhangawadi, Tal-Bhor, Dist-Pune (Maharashtra)

Criterion 1 – Curricular Aspects

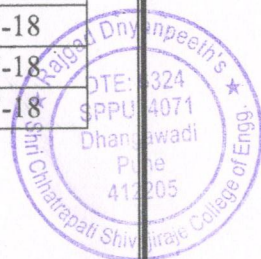
Key Indicator- 1.2 Academic Flexibility

1.2.1 Percentage of new courses introduced of the total number of courses across all programs offered during last five years.

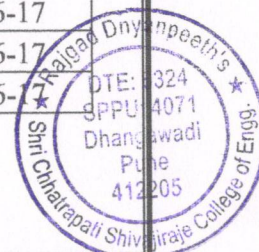
Name of the new course introduced in the last 5 years	Program Name	Program Code	Course Code	Year of Introduction
TE 2015 Pattern				
Hydrology and Water Resource Engineering	Civil Engineering	632411	301001	2017-18
Infrastructure Engineering and Construction Techniques	Civil Engineering	632411	301002	2017-18
Structural Design-I	Civil Engineering	632411	301003	2017-18
Structural Analysis-II	Civil Engineering	632411	301004	2017-18
Fluid Mechanics-II	Civil Engineering	632411	301005	2017-18
Employability Skills and Development	Civil Engineering	632411	301006	2017-18
Advanced Surveying	Civil Engineering	632411	301007	2017-18
Project Management and Engineering	Civil Engineering	632411	301008	2017-18
Foundation Engineering	Civil Engineering	632411	301009	2017-18
Structural Design-II	Civil Engineering	632411	301010	2017-18
Environmental Engineering-I	Civil Engineering	632411	301011	2017-18
Seminar	Civil Engineering	632411	301012	2017-18
Theory of Computation	Computer Engineering	632412	310241	2017-18
Datebase Management System (DBMS)	Computer Engineering	632412	310242	2017-18



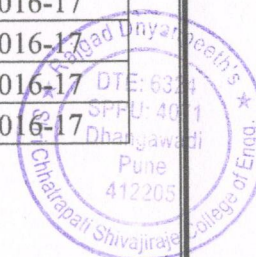
Software Engineering and Project Management	Computer Engineering	632412	310243	2017-18
Information Systems and Engineering Economics	Computer Engineering	632412	310244	2017-18
Computer Networks (CN)	Computer Engineering	632412	310245	2017-18
Skill Development Lab	Computer Engineering	632412	310246	2017-18
DBMS Lab	Computer Engineering	632412	310247	2017-18
CN Lab	Computer Engineering	632412	310248	2017-18
Audit Course-3	Computer Engineering	632412	310249	2017-18
Design and Analysis of Algorithms	Computer Engineering	632412	310250	2017-18
Systems Programming and Operating System (SP & OS)	Computer Engineering	632412	310251	2017-18
Embedded System and Internet of Things (ES & IoT)	Computer Engineering	632412	310252	2017-18
Software Modeling and Design	Computer Engineering	632412	310253	2017-18
Web Technology	Computer Engineering	632412	310254	2017-18
Seminar and Technical Communication	Computer Engineering	632412	310255	2017-18
Web Technology Lab	Computer Engineering	632412	310256	2017-18
SP & OS Lab	Computer Engineering	632412	310257	2017-18
ES & IoT Lab	Computer Engineering	632412	310258	2017-18
Audit Course-4	Computer Engineering	632412	310259	2017-18
Digital Communication	E&TC Engineering	632413	304181	2017-18
Digital Signal Processing	E&TC Engineering	632413	304182	2017-18
Electromagnets	E&TC Engineering	632413	304183	2017-18
Microcontrollers	E&TC Engineering	632413	304184	2017-18
Mechatronics	E&TC Engineering	632413	304185	2017-18
Signal Processing and Communications Lab (DC/DSP)	E&TC Engineering	632413	304191	2017-18
Microcontrollers and Mechatronics Lab	E&TC Engineering	632413	304192	2017-18
Electronics System Design	E&TC Engineering	632413	304193	2017-18
Power Electronics	E&TC Engineering	632413	304186	2017-18
Information Theory Coding and Communication Networks	E&TC Engineering	632413	304187	2017-18
Business Management	E&TC Engineering	632413	304188	2017-18
Advanced Processors	E&TC Engineering	632413	306189	2017-18
System Programming and Operating Systems	E&TC Engineering	632413	304190	2017-18



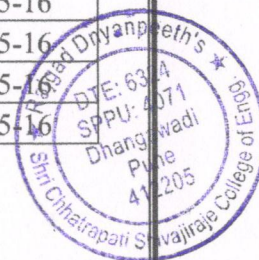
Power and ITCT Lab	E&TC Engineering	632413	304194	2017-18
Advanced Processors and System Programming Lab	E&TC Engineering	632413	307495	2017-18
Employability Skills and Mini Project	E&TC Engineering	632413	304196	2017-18
Design of Machine Elements-I	Mechanical Engineering	632414	302041	2017-18
Heat Transfer	Mechanical Engineering	632414	302042	2017-18
Theory of Machines-II	Mechanical Engineering	632414	302043	2017-18
Turbo Machines	Mechanical Engineering	632414	302044	2017-18
Metrology and Quality Control	Mechanical Engineering	632414	302045	2017-18
Skill Development	Mechanical Engineering	632414	302046	2017-18
Numerical Methods and Optimization	Mechanical Engineering	632414	302047	2017-18
Design of Machine Elements-II	Mechanical Engineering	632414	302048	2017-18
Refrigeration and Air Conditioning	Mechanical Engineering	632414	302049	2017-18
Mechatronics	Mechanical Engineering	632414	302050	2017-18
Manufacturing Process-II	Mechanical Engineering	632414	302051	2017-18
Machine Shop-II	Mechanical Engineering	632414	302052	2017-18
Seminar	Mechanical Engineering	632414	302053	2017-18
Audit Course	Mechanical Engineering	632414	302054	2017-18
SE 2015 Pattern				
Building Technology and Materials	Civil Engineering	632411	201001	2016-17
Engineering Mathematics-III	Civil Engineering	632411	207001	2016-17
Surveying	Civil Engineering	632411	201006	2016-17
Strength of Materials	Civil Engineering	632411	201002	2016-17
Geotechnical Engineering	Civil Engineering	632411	201003	2016-17
Audit Course-I Awareness of Civil Engineering Practices	Civil Engineering	632411	-	2016-17
Fluid Mechanics-I	Civil Engineering	632411	201004	2016-17
Architectural Planning and Design of Buildings	Civil Engineering	632411	201005	2016-17
Structural Analysis -I	Civil Engineering	632411	201008	2016-17
Engineering Geology	Civil Engineering	632411	207009	2016-17
Concrete Technology	Civil Engineering	632411	201007	2016-17
Soft Skill	Civil Engineering	632411	201010	2016-17



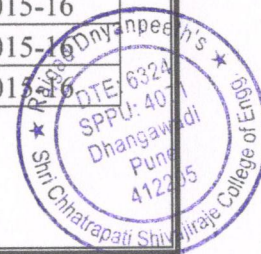
Audit Course-II Road Safety Management	Civil Engineering	632411	-	2016-17
Discrete Mathematics	Computer Engineering	632412	210241	2016-17
Digital Electronics and Logic Design	Computer Engineering	632412	210242	2016-17
Data Structures and Algorithms	Computer Engineering	632412	210243	2016-17
Computer Organization and Architecture	Computer Engineering	632412	210244	2016-17
Object Oriented Programming	Computer Engineering	632412	210245	2016-17
Digital Electronics Lab	Computer Engineering	632412	210246	2016-17
Data Structure Lab	Computer Engineering	632412	210247	2016-17
Object Oriented Programming Lab	Computer Engineering	632412	210248	2016-17
Soft Skills	Computer Engineering	632412	210249	2016-17
Audit Course-I	Computer Engineering	632412	210250	2016-17
Engineering Mathematics-III	Computer Engineering	632412	207003	2016-17
Computer Graphics	Computer Engineering	632412	210251	2016-17
Advanced Data Structures	Computer Engineering	632412	210252	2016-17
Microprocessor	Computer Engineering	632412	210253	2016-17
Principles of Programming Languages	Computer Engineering	632412	210254	2016-17
Computer Graphics Lab	Computer Engineering	632412	210255	2016-17
Advanced Data Structures Lab	Computer Engineering	632412	210256	2016-17
Microprocessor Lab	Computer Engineering	632412	210257	2016-17
Audit Course-2	Computer Engineering	632412	210258	2016-17
Signals and Systems	E&TC Engineering	632413	204181	2016-17
Electronics Devices and Circuits	E&TC Engineering	632413	204182	2016-17
Electrical Circuits and Machines	E&TC Engineering	632413	204183	2016-17
Data Structures and Algorithms	E&TC Engineering	632413	204184	2016-17
Digital Electronics	E&TC Engineering	632413	204185	2016-17
Electronic Measuring Instruments and Tools	E&TC Engineering	632413	204186	2016-17
Audit Course-1	E&TC Engineering	632413	204192	2016-17
Engineering Mathematics-III	E&TC Engineering	632413	207005	2016-17
Integrated Circuits	E&TC Engineering	632413	204187	2016-17
Control Systems	E&TC Engineering	632413	204188	2016-17



Analog Communication	E&TC Engineering	632413	204189	2016-17
Object Oriented Programming	E&TC Engineering	632413	204190	2016-17
Employability Skill Development	E&TC Engineering	632413	204191	2016-17
Audit Course-2	E&TC Engineering	632413	204193	2016-17
Engineering Mathematics-III	Mechanical Engineering	632414	207002	2016-17
Manufacturing Process-I	Mechanical Engineering	632414	202041	2016-17
Computer Aided Machine Drawing	Mechanical Engineering	632414	202042	2016-17
Thermodynamics	Mechanical Engineering	632414	202043	2016-17
Material Science	Mechanical Engineering	632414	202044	2016-17
Strength of Materials	Mechanical Engineering	632414	202051	2016-17
Audit Course	Mechanical Engineering	632414	202055	2016-17
Fluid Mechanics	Mechanical Engineering	632414	202045	2016-17
Soft Skills	Mechanical Engineering	632414	202047	2016-17
Theory of Machines-I	Mechanical Engineering	632414	202048	2016-17
Engineering Metallurgy	Mechanical Engineering	632414	202049	2016-17
Applied Thermodynamics	Mechanical Engineering	632414	202050	2016-17
Electrical and Electronics Engineering	Mechanical Engineering	632414	203152	2016-17
Machine Shop-I	Mechanical Engineering	632414	202053	2016-17
BE 2012 Pattern				
Environmental Engineering-II	Civil Engineering	632411	401001	2015-16
Transportation Engineering	Civil Engineering	632411	401002	2015-16
Structural Design and Drawing -III	Civil Engineering	632411	401003	2015-16
Elective-I	Civil Engineering	632411	401004	2015-16
Elective-II	Civil Engineering	632411	401005	2015-16
Project Phase I	Civil Engineering	632411	401006	2015-16
Dams and Hydraulics Structures	Civil Engineering	632411	401007	2015-16
Quality Surveying, Contracts and Tenders	Civil Engineering	632411	401008	2015-16
Elective-III	Civil Engineering	632411	401009	2015-16
Elective-IV	Civil Engineering	632411	401010	2015-16
Project	Civil Engineering	632411	401006	2015-16



Design and Analysis of Algorithms	Computer Engineering	632412	410441	2015-16
Principles of Modern Computer Design	Computer Engineering	632412	410442	2015-16
Smart System Design and Applications	Computer Engineering	632412	410443	2015-16
Elective-I	Computer Engineering	632412	410444	2015-16
Elective-II	Computer Engineering	632412	410445	2015-16
Computer Laboratory-I	Computer Engineering	632412	410446	2015-16
Computer Laboratory-II	Computer Engineering	632412	410447	2015-16
Project	Computer Engineering	632412	410448	2015-16
Software Design Methodologies and Testing	Computer Engineering	632412	410449	2015-16
High Performance Computing	Computer Engineering	632412	410450	2015-16
Elective-III	Computer Engineering	632412	410451	2015-16
Elective-IV Open Elective	Computer Engineering	632412	410452	2015-16
Computer Laboratory-III	Computer Engineering	632412	410453	2015-16
Computer Laboratory-IV	Computer Engineering	632412	410454	2015-16
Project	Computer Engineering	632412	410455	2015-16
VLSI Design & Technology	E&TC Engineering	632413	404181	2015-16
Computer Networks	E&TC Engineering	632413	404182	2015-16
Microwave Engineering	E&TC Engineering	632413	404183	2015-16
Elective-I	E&TC Engineering	632413	404184	2015-16
Elective-II	E&TC Engineering	632413	404185	2015-16
Lab Practices I (CN & MWE)	E&TC Engineering	632413	404186	2015-16
Lab Practice II (VLSI & Elective I)	E&TC Engineering	632413	404187	2015-16
Project Phase I	E&TC Engineering	632413	404188	2015-16
Mobile Communication	E&TC Engineering	632413	404189	2015-16
Broadband Communication Systems	E&TC Engineering	632413	404190	2015-16
Elective-III	E&TC Engineering	632413	404191	2015-16
Elective-IV	E&TC Engineering	632413	404192	2015-16
Lab Practice III (MC & BCS)	E&TC Engineering	632413	404193	2015-16
Lab Practice IV (Elective III)	E&TC Engineering	632413	404194	2015-16
Project Phase II	E&TC Engineering	632413	404195	2015-16



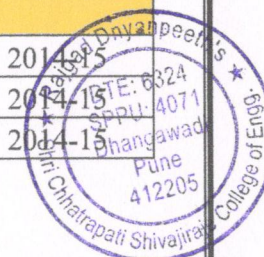
Refrigeration and Air Conditioning	Mechanical Engineering	632414	402041	2015-16
CAD/CAM Automation	Mechanical Engineering	632414	402042	2015-16
Dynamics of Machinery	Mechanical Engineering	632414	402043	2015-16
Elective-I	Mechanical Engineering	632414	402044	2015-16
Elective-II	Mechanical Engineering	632414	402045	2015-16
Project-I	Mechanical Engineering	632414	402046	2015-16
Power Plant Engineering	Mechanical Engineering	632414	402047	2015-16
Mechanical System Design	Mechanical Engineering	632414	402048	2015-16
Elective-III	Mechanical Engineering	632414	402049	2015-16
Elective-IV	Mechanical Engineering	632414	402050	2015-16
Project-II	Mechanical Engineering	632414	402051	2015-16

FE 2015 Pattern

Engineering Mathematics-I	FE Engineering	6324	107001	2015-16
Engineering Physics	FE Engineering	6324	107002	2015-16
Engineering Graphics-I	FE Engineering	6324	102006	2015-16
Basic Electrical Engineering	FE Engineering	6324	103004	2015-16
Basic Civil and Environmental Engineering	FE Engineering	6324	101005	2015-16
Fundamentals of Programming Languages-I	FE Engineering	6324	110003	2015-16
Workshop Practice	FE Engineering	6324	111007	2015-16
Engineering Mathematics-II	FE Engineering	6324	107008	2015-16
Engineering Chemistry	FE Engineering	6324	107009	2015-16
Basic Mechanical Engineering	FE Engineering	6324	102013	2015-16
Engineering Mechanics	FE Engineering	6324	101011	2015-16
Basic Electronics Engineering	FE Engineering	6324	104012	2015-16
Fundamentals of Programming Languages-II	FE Engineering	6324	110010	2015-16
Engineering Graphics-II	FE Engineering	6324	102014	2015-16

TE 2012 Pattern

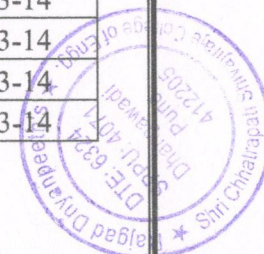
Hydrology and Water Resources Engineering	Civil Engineering	632411	301001	2014-15
Infrastructure Engineering	Civil Engineering	632411	301002	2014-15
Structural Design-I	Civil Engineering	632411	301003	2014-15



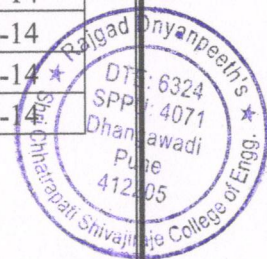
Structural Analysis-II	Civil Engineering	632411	301004	2014-15
Fluid Mechanics-II	Civil Engineering	632411	301005	2014-15
Employability Skill Development	Civil Engineering	632411	301006	2014-15
Advanced Surveying	Civil Engineering	632411	301007	2014-15
Project Management and Engineering Economics	Civil Engineering	632411	301008	2014-15
Foundation Engineering	Civil Engineering	632411	301009	2014-15
Structural Design-II	Civil Engineering	632411	301010	2014-15
Environmental Engineering-I	Civil Engineering	632411	301011	2014-15
Seminar & Technical Communication	Civil Engineering	632411	301012	2014-15
Theory of Computation	Computer Engineering	632412	310241	2014-15
Operating Systems Design	Computer Engineering	632412	310242	2014-15
Data Communication and Wireless Sensor Networks	Computer Engineering	632412	310243	2014-15
Database Management Systems Applications	Computer Engineering	632412	310244	2014-15
Computer Forensic and Cyber Applications	Computer Engineering	632412	310245	2014-15
Programming Lab-I	Computer Engineering	632412	310246	2014-15
Programming Lab-II	Computer Engineering	632412	310247	2014-15
Employability Skill Development Lab	Computer Engineering	632412	310248	2014-15
Principles of Concurrent and Distributed Programming	Computer Engineering	632412	310249	2014-15
Embedded Operating Systems	Computer Engineering	632412	310250	2014-15
Computer Networks	Computer Engineering	632412	310251	2014-15
Software Engineering	Computer Engineering	632412	310252	2014-15
Digital Signal Processing Applications	Computer Engineering	632412	310253	2014-15
Programming Laboratory-III	Computer Engineering	632412	310254	2014-15
Programming Laboratory-IV	Computer Engineering	632412	310255	2014-15
Seminar and Technical Communication Laboratory	Computer Engineering	632412	310256	2014-15
Digital Communication	E&TC Engineering	632413	304181	2014-15
Digital Signal Processing	E&TC Engineering	632413	304182	2014-15
Micro Controller and Applications	E&TC Engineering	632413	304183	2014-15
Electromagnetics and Transmission Lines	E&TC Engineering	632413	304184	2014-15
System Programming and Operating System	E&TC Engineering	632413	304185	2014-15



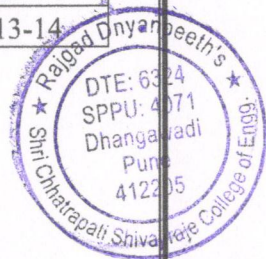
Digital Communication and Signal Processing Lab	E&TC Engineering	632413	304186	2014-15
System Programming and Microcontroller Application Lab	E&TC Engineering	632413	304187	2014-15
Employability Skills in Electronics Design	E&TC Engineering	632413	304188	2014-15
Information Theory and Coding Techniques	E&TC Engineering	632413	304189	2014-15
Antenna and Wave Propagation	E&TC Engineering	632413	304190	2014-15
Embedded Processors	E&TC Engineering	632413	304191	2014-15
Industrial Management	E&TC Engineering	632413	304192	2014-15
Power Electronics	E&TC Engineering	632413	304193	2014-15
Communication Lab	E&TC Engineering	632413	304194	2014-15
Power Electronics and Embedded Lab	E&TC Engineering	632413	304195	2014-15
Mini Project and Seminar	E&TC Engineering	632413	304196	2014-15
Design of Machine Elements-I	Mechanical Engineering	632414	302041	2014-15
Heat Transfer	Mechanical Engineering	632414	302042	2014-15
Theory of Machines-II	Mechanical Engineering	632414	302043	2014-15
Metrology and Quality Control	Mechanical Engineering	632414	302044	2014-15
Hydraulics and Pneumatics	Mechanical Engineering	632414	302045	2014-15
Skill Development	Mechanical Engineering	632414	302046	2014-15
Numerical Methods and Optimization	Mechanical Engineering	632414	302047	2014-15
Design of Machine Elements-II	Mechanical Engineering	632414	302048	2014-15
Turbo Machines	Mechanical Engineering	632414	302049	2014-15
Mechatronics	Mechanical Engineering	632414	302050	2014-15
Manufacturing Process-II	Mechanical Engineering	632414	302051	2014-15
Machine shop-II	Mechanical Engineering	632414	302052	2014-15
Seminar	Mechanical Engineering	632414	203053	2014-15
SE 2012 Pattern				
Building Technology and Materials	Civil Engineering	632411	201001	2013-14
Engg. Maths.-III	Civil Engineering	632411	207001	2013-14
Surveying	Civil Engineering	632411	201006	2013-14
Strength of Materials	Civil Engineering	632411	201002	2013-14
Geotechnical Engineering	Civil Engineering	632411	201003	2013-14



Soft Skills	Civil Engineering	632411	201010	2013-14
Fluid Mechanics-I	Civil Engineering	632411	201004	2013-14
Architectural Planning and Design of Buildings	Civil Engineering	632411	201005	2013-14
Structural Analysis-I	Civil Engineering	632411	201008	2013-14
Engineering Geology	Civil Engineering	632411	207009	2013-14
Concrete Technology	Civil Engineering	632411	201007	2013-14
Testing of Materials	Civil Engineering	632411	201009	2013-14
Discrete Structures	Computer Engineering	632412	210241	2013-14
Data Structures and Problem Solving	Computer Engineering	632412	210242	2013-14
Digital Electronics and Logic Design	Computer Engineering	632412	310243	2013-14
Operating Systems and Administration	Computer Engineering	632412	210244	2013-14
Microprocessor architecture	Computer Engineering	632412	210245	2013-14
Soft Skills	Computer Engineering	632412	210246	2013-14
Engineering Maths-III	Computer Engineering	632412	207003	2013-14
Object Oriented and Multicore Programming	Computer Engineering	632412	210247	2013-14
Microprocessors and Interfacing Techniques	Computer Engineering	632412	210248	2013-14
Computer Graphics and Gaming	Computer Engineering	632412	210249	2013-14
Computer Organization	Computer Engineering	632412	210250	2013-14
Programming Laboratory	Computer Engineering	632412	210251	2013-14
Signals and Systems	E&TC Engineering	632413	204181	2013-14
Electronics Devices and Circuits	E&TC Engineering	632413	204182	2013-14
Network Theory	E&TC Engineering	632413	204183	2013-14
Data Structure and Algorithms	E&TC Engineering	632413	204184	2013-14
Digital Electronics	E&TC Engineering	632413	204185	2013-14
Electronic Measuring Instruments and Tools	E&TC Engineering	632413	204186	2013-14
Engineering Maths-III	E&TC Engineering	632413	207005	2013-14
Integrated Circuits	E&TC Engineering	632413	204187	2013-14
Control Systems	E&TC Engineering	632413	204188	2013-14
Analog Communication	E&TC Engineering	632413	204189	2013-14
Computer Organization	E&TC Engineering	632413	204190	2013-14



Object Oriented Programming	E&TC Engineering	632413	204191	2013-14
Soft Skills	E&TC Engineering	632413	204192	2013-14
Engineering Mathematics-III	Mechanical Engineering	632414	207002	2013-14
Manufacturing Process-I	Mechanical Engineering	632414	202041	2013-14
Computer Aided Machine Drawing	Mechanical Engineering	632414	202042	2013-14
Thermodynamics	Mechanical Engineering	632414	202043	2013-14
Material Science	Mechanical Engineering	632414	202044	2013-14
Fluid Mechanics	Mechanical Engineering	632414	202045	2013-14
Workshop Practice-II	Mechanical Engineering	632414	202046	2013-14
Soft Skills	Mechanical Engineering	632414	202047	2013-14
Theory of Machines-I	Mechanical Engineering	632414	202048	2013-14
Engineering Metallurgy	Mechanical Engineering	632414	202049	2013-14
Applied Thermodynamics	Mechanical Engineering	632414	202050	2013-14
Strength of Materials	Mechanical Engineering	632414	202051	2013-14
Electronics and Electrical Engineering	Mechanical Engineering	632414	203152	2013-14
Machine Shop-I	Mechanical Engineering	632414	202053	2013-14



सावित्रीबाई फुले पुणे विद्यापीठ (पूर्वीचे पुणे विद्यापीठ)

दूरध्वनी क्रमांक :
०२०-२५६९१२३३
२५६०१२५८
२५६०१२५९



शैक्षणिक विभाग
गणेशखिंड, पुणे-४११ ००७
टेलिग्राफ : 'युनिपुणे'
फॅक्स : ०२०-२५६९१२३३
वेबसाइट : www.unipune.ac.in
ई-मेल : boards@pun.unipune.ac.in

संदर्भ क्र. : सी.बी./इंजि. / २२७

दिनांक : ०३/०४/२०१७

परिपत्रक क्रमांक. ६३ / २०१७

विषय :- अभियांत्रिकी विद्याशाखेतर्गत तृतीय वर्ष इंजिनिअरींग २०१५
पॅटर्न पदवी अभ्यासक्रमाचा सुधारित आराखडा व अभ्यासक्रम
शैक्षणिक वर्ष २०१७-१८ पासून लागू करण्याबाबत.....

विद्यापीठ अधिकार मंडळाने घेतलेल्या निर्णयानुसार सर्व संबंधितांस या परिपत्रकाद्वारे कळविण्यात येते की, अभियांत्रिकी विद्याशाखेतर्गत तृतीय वर्ष इंजिनिअरींग २०१५ पॅटर्न पदवी अभ्यासक्रमाचा सुधारित आराखडा व अभ्यासक्रमास शैक्षणिक वर्ष २०१७-१८ पासून मान्यता देण्यात येत आहे.

सदर अभ्यासक्रम सावित्रीबाई फुले पुणे विद्यापीठाच्या www.unipune.ac.in या वेबसाईटवर Syllabi- Engineering या शीर्षकाखाली उपलब्ध आहे.

सावित्रीबाई फुले पुणे विद्यापीठाच्या सर्व संलग्न अभियांत्रिकी महाविद्यालयांचे मा. प्राचार्य यांना विनंती की, सदर परिपत्रकाचा आशय सर्व संबंधित प्राध्यापक व विद्यार्थ्यांच्या निदर्शनास आणून द्यावा.

संचालकांकरिता

(म.वि.वि.मं)

कृ. मा. प.

प्रत माहितीसाठी व पुढील योग्य त्या कार्यवाहीसाठी:—

१. मा. समन्वयक, अभियांत्रिकी विद्याशाखा
२. मा. संचालक, म.वि.वि.मं
३. मा. प्राचार्य, सर्व अभियांत्रिकी महाविद्यालये
४. मा. संचालक, सर्व मान्यताप्राप्त संस्था
५. मा. परीक्षा नियंत्रक, सा. फु. पुणे विद्यापीठ
६. मा. संचालक, स्पर्धा परीक्षा केंद्र
७. मा. उपकुलसचिव, परीक्षा (१,२)
८. मा. सिस्टीम ऑनॅलिस्ट डेटा प्रोग्रेसिंग युनिट
९. मा. उपकुलसचिव, नियोजन व विकास
१०. मा. उपकुलसचिव, (पात्रता विभाग)
११. मा. उपकुलसचिव (सभा दफ्तर)
१२. मा. संचालक (प्रदेशी विद्यार्थी केंद्र) इतर शास्त्रीय केंद्र
१३. सहायक कुलसचिव, शैक्षणिक प्रवेश विभाग
१४. सहायक कुलसचिव (गोपनीय कक्ष)
१५. सहायक कुलसचिव (परीक्षा—एस.अॅण्ड टी. विभाग)
१६. सहायक कुलसचिव (परीक्षा समन्वय)
१७. वरिष्ठ कायदा अधिकारी
१८. जनसंपर्क अधिकारी
१९. कक्षाधिकारी (बहिःस्थ)
२०. प्रमुख, विद्यापीठ उपकेंद्र : अहमदनगर, नाशिक.

वि.प. ठराव क्र. ब ०५ पीए/०५/२०१६, दि. २९ नोव्हेंबर, २०१६

सावित्रीबाई फुले पुणे विद्यापीठ
(पूर्वीचे पुणे विद्यापीठ)

दूरध्वनी क्रमांक :
०२०-२५६९१२३३
२५६०१२५८
२५६०१२५९



शैक्षणिक विभाग
गणेशखिंड, पुणे-४११ ००७
टेलिग्राफ : 'युनिपुणे'
फॅक्स : ०२०-२५६९१२३३
वेबसाइट : www.unipune.ac.in
इ-मेल : boards@pun.unipune.ac.in
दिनांक : २४.०६.२०१६

संदर्भ क्र. :सी.बी./इंजि. /५४०

परिपत्रक क्रमांक. ९५ /२०१६

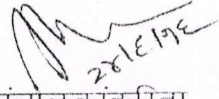
विषय:-

द्वितीय वर्ष अभियांत्रिकी श्रेयांक पध्दती (२०१५ पॅटर्न) अभ्यासक्रमांस
(सर्व शाखांसाठी) शैक्षणिक वर्ष २०१६-१७ पासून मान्यता
देण्याबाबत....

विद्यापीठ अधिकार मंडळाने घेतलेल्या निर्णयानुसार सर्व संबंधितांस या परिपत्रकाद्वारे कळविण्यात येते की, द्वितीय वर्ष अभियांत्रिकी श्रेयांक पध्दती (२०१५ पॅटर्न) अभ्यासक्रमांस (सर्व शाखांसाठी) शैक्षणिक वर्ष २०१६-१७ पासून मान्यता देण्यात येत आहे.

सदर अभ्यासक्रम सावित्रीबाई फुले पुणे विद्यापीठाच्या www.unipune.ac.in या वेबसाईटवर Syllabi- Engineering या शीर्षकाखाली उपलब्ध आहे.

सावित्रीबाई फुले पुणे विद्यापीठाच्या सर्व संलग्न अभियांत्रिकी महाविद्यालयांचे मा. प्राचार्य यांना विनंती की, सदर परिपत्रकाचा आशय सर्व संबंधित प्राध्यापक व विद्यार्थ्यांच्या निदर्शनास आणून द्यावा.


संचालकांकरिता
(म.वि.वि.मं)

वृ. मा. प.

प्रत माहितीसाठी व पुढील योग्य त्या कार्यवाहीसाठी:—

१. मा. समन्वयक, अभियांत्रिकी विद्याशाखा
२. मा. संचालक, म.वि.वि.मं
३. मा. प्राचार्य, सर्व अभियांत्रिकी महाविद्यालये
४. मा. संचालक, सर्व मान्यताप्राप्त संस्था
५. मा. परीक्षा नियंत्रक, सा. फु. पुणे विद्यापीठ
६. मा. संचालक, स्पर्धा परीक्षा केंद्र
७. मा. उपकुलसचिव, परीक्षा (१,२)
८. मा. सिस्टीम ऑनॅलिस्ट डेटा प्रोग्रेसिंग युनिट
९. मा. उपकुलसचिव, नियोजन व विकास
१०. मा. उपकुलसचिव, (पात्रता विभाग)
११. मा. उपकुलसचिव (सभा दफ्तर)
१२. मा. संचालक (परदेशी विद्यार्थी केंद्र)
१३. सहायक कुलसचिव, शैक्षणिक प्रवेश विभाग
१४. सहायक कुलसचिव (गोपनीय कक्ष)
१५. सहायक कुलसचिव (परीक्षा—एस.एँड टी. विभाग)
१६. सहायक कुलसचिव (परीक्षा समन्वय)
१७. वरिष्ठ कायदा अधिकारी
१८. जनसंपर्क अधिकारी
१९. कक्षाधिकारी (बहिःस्थ)
२०. प्रमुख, विद्यापीठ उपकेंद्र : अहमदनगर, नाशिक.

वि.प. ठराव क्र. ब १८ पीए/१८ /१६, दि. २७ मे, २०१६

सावित्रीबाई फुले पुणे विद्यापीठ

दूरध्वनी क्रमांक :
०२०-२५६९१२३३
२५६०१२५८
२५६०१२५९



शैक्षणिक विभाग
गणेशखिंड, पुणे-४११ ००७
टेलिग्राफ : 'युनिपुणे'
फॅक्स : ०२०-२५६९१२३३
वेबसाइट : www.unipune.ac.in
ई-मेल : boards@pun.unipune.ac.in

संदर्भ क्र. : सी.बी./इंजि / १८८

दिनांक : ०८/०२/२०१५

परिपत्रक क्र. १०/२०१५

विषय:-

अभियांत्रिकी विद्याशाखेअंतर्गत येणा-या बी.ई. (२०१२ अभ्यासक्रम)
(सर्व शाखांसाठी) अभ्यासक्रमांस व आराखडयास शैक्षणिक वर्ष २०१५-१६
पासून मान्यता देण्याबाबत.....

विद्यापीठ अधिकार मंडळाने घेतलेल्या निर्णयानुसार सर्व संबंधितांस
या परिपत्रकाद्वारे कळविण्यात येते की, अभियांत्रिकी विद्याशाखेअंतर्गत
येणा-या बी. ई. (२०१२ अभ्यासक्रम) (सर्व शाखांसाठी) अभ्यासक्रमांस व
आराखडयास शैक्षणिक वर्ष २०१५-१६ पासून मान्यता देण्यात येत आहे.

सदर अभ्यासक्रम व आराखडा पुणे विद्यापीठाच्या www.unipune.ac.in
या वेबसाईटवर Syllabi- Engineering या शीर्षकाखाली उपलब्ध आहे.

पुणे विद्यापीठाच्या सर्व संलग्न अभियांत्रिकी महाविद्यालयांचे
मा. प्राचार्य यांना विनंती की, सदर परिपत्रकाचा आशय सर्व संबंधित
प्राध्यापक व विद्यार्थ्यांच्या निदर्शनास आणून द्यावा.

संचालकांकरिता
(म.वि.वि.मं)

प्रत माहितीसाठी व पुढील योग्य त्या कार्यवाहीसाठी:-

१. मा. अधिष्ठाता, अभियांत्रिकी विद्याशाखा
२. मा. संचालक, बी.सी.यु.डी.

१. मा. प्राचार्य, सर्व अभियांत्रिकी महाविद्यालये
२. मा. संचालक, सर्व मान्यताप्राप्त संस्था
३. मा. परीक्षा नियंत्रक, पुणे विद्यापीठ
४. मा. संचालक, स्पर्धा परीक्षा केंद्र
५. मा. उपकुलसचिव, परीक्षा (१,२)
६. मा. सिस्टीम ऑनॅलिस्ट डेटा प्रोग्रेसिंग युनिट
७. मा. उपकुलसचिव, प्रवेश
८. मा. उपकुलसचिव, विकास
९. मा. उपकुलसचिव, पात्रता
१०. सहाय्यक कुलसचिव (परीक्षा समन्वय)
११. सहाय्यक कुलसचिव (परीक्षा—एस.अॅण्ड टी. विभाग)
१२. सहाय्यक कुलसचिव (गोपनीय कक्षा)
१३. सहाय्यक कुलसचिव (परदेशी विद्यार्थी केंद्र)
१४. सहाय्यक कुलसचिव (सभा दफ्तर)
१५. कायदा अधिकारी
१६. जनसंपर्क अधिकारी
१७. कक्षाधिकारी (बहिःस्थ)
१८. कक्षाधिकारी (पात्रता विभाग)
१९. प्रमुख, विद्यापीठ उपकेंद्र : अहमदनगर, नाशिक.

वि.प. ठराव क्र. ब ३५ पीए/३५ /१४, दि. ३० डिसेंबर, २०१४

सावित्रीबाई फुले पुणे विद्यापीठ

(पूर्वीचे पुणे विद्यापीठ)

दूरध्वनी क्रमांक :
०२०-२५६९१२३३
२५६०१२५८
२५६०१२५९



शैक्षणिक विभाग
गणेशखिंड, पुणे-४११ ००७
टेलिग्राफ : 'युनिपुणे'
फॅक्स : ०२०-२५६९१२३३
वेबसाइट : www.unipune.ac.in
ई-मेल : boards@pun.unipune.ac.in

संदर्भ क्र. सी.बी./डीज / ६६०

दिनांक : २४/०८/२०१५

परिपत्रक क्र. १११/२०१५

विषय:-

प्रथम वर्ष अभियांत्रिकी (२०१५ पॅटर्न) श्रेयांक पध्दतीप्रमाणे
अभ्यासक्रमाबाबत...

विद्यापीठ अधिकार मंडळाने घेतलेल्या निर्णयानुसार सर्व संबंधितांस या परिपत्रकाद्वारे कळविण्यात येते की, शैक्षणिक वर्ष २०१५-१६ पासून प्रथम वर्ष अभियांत्रिकी (२०१५ पॅटर्न) श्रेयांक पध्दतीप्रमाणे अभ्यासक्रमास मान्यता देण्यात येत आहे.

सदर अभ्यासक्रम सा. फु. पुणे विद्यापीठाच्या www.unipune.ac.in या वेबसाईटवर Syllabi-Engineering या शीर्षकाखाली उपलब्ध आहे.

सा. फु. पुणे विद्यापीठाच्या सर्व संलग्न अभियांत्रिकी महाविद्यालयांचे मा. प्राचार्य यांना विनंती की, सदर परिपत्रकाचा आशय सर्व संबंधित प्राध्यापक व विद्यार्थ्यांच्या निदर्शनास आणून द्यावा.

संचालकांकरिता
(म.वि.वि.मं)

श्री माहितीसाठी व गुढील योग्य त्या कार्यवाहीसाठी:—

- २ मा. अधिष्ठाता, अभियांत्रिकी विद्याशाखा
- २ मा. संचालक, बी.सी.यु.डी.
- ३ मा. प्राचार्य, सर्व अभियांत्रिकी महाविद्यालये
- ४ मा. संचालक, सर्व मान्यताप्राप्त संस्था
- ५ मा. परीक्षा नियंत्रक, सा. फु. पुणे विद्यापीठ
- ६ मा. संचालक, स्पर्धा परीक्षा केंद्र
- ७ मा. उपकुलसचिव, परीक्षा (१,२)
- ८ मा. सिस्टीम ऑनॅलिस्ट डेटा प्रोग्रेसिंग युनिट
- ९ मा. उपकुलसचिव, प्रवेश
- १० मा. उपकुलसचिव, विकास
- ११ मा. उपकुलसचिव, पात्रता
१२. सहाय्यक कुलसचिव (परीक्षा समन्वय)
१३. सहाय्यक कुलसचिव (परीक्षा—एस.अॅण्ड टी. विभाग)
१४. सहाय्यक कुलसचिव (गोपनीय कक्ष)
१५. सहाय्यक कुलसचिव (परदेशी विद्यार्थी केंद्र)
१६. सहाय्यक कुलसचिव (सभा दफ्तर)
१७. कायदा अधिकारी
१८. जनसंपर्क अधिकारी
१९. कक्षाधिकारी (बहिःस्थ)
२०. कक्षाधिकारी (पात्रता विभाग)
२१. प्रमुख, विद्यापीठ उपकेंद्र : अहमदनगर, नाशिक.

वि.प. ठराव क्र. ब ५९पीए/५९/१५, दि. ०९ जून, २०१५

पुणे विद्यापीठ

दूरध्वनी क्रमांक :
०२०-२५६९१२३३
२५६०१२५८
२५६०१२५९



शैक्षणिक विभाग
गणेशखिंड, पुणे-४११ ००७
टेलिग्राफ : 'युनिपुणे'
फॅक्स : ०२०-२५६९१२३३
वेबसाइट : www.unipune.ac.in
ई-मेल : boards@unipune.ac.in
दिनांक : २८.०७.२०१४

संदर्भ क्र. :सी.बी./इंजि / १२८

परिपत्रक क्र. ०८/२०१४

विषय:- अभियांत्रिकी विद्याशाखेअंतर्गत तृतीय वर्ष अभियांत्रिकी (२०१२ कोर्स) च्या आराखडयाबाबत.....

विद्यापीठ अधिकार मंडळाने घेतलेल्या निर्णयानुसार सर्व संबंधितांस या परिपत्रकाद्वारे कळविण्यात येते की, अभियांत्रिकी विद्याशाखेअंतर्गत तृतीय वर्ष अभियांत्रिकी (२०१२ कोर्स) च्या आराखडयास शैक्षणिक वर्ष २०१४-१५पासून मान्यता देण्यात येत आहे.

सदर आराखडा पुणे विद्यापीठाच्या www.unipune.ac.in या वेबसाईटवर Syllabi- Engineering या शीर्षकाखाली उपलब्ध आहे.

पुणे विद्यापीठाच्या सर्व संलग्न अभियांत्रिकी महाविद्यालयांचे मा. प्राचार्य यांना विनंती की, सदर परिपत्रकाचा आशय सर्व संबंधित प्राध्यापक व विद्यार्थ्यांच्या निदर्शनास आणून द्यावा.

संचालकाकरिता
(म.वि.वि.मं)

प्रत माहितीसाठी व पुढील योग्य त्या कार्यवाहीसाठी:—

१. मा. अधिष्ठाता, अभियांत्रिकी विद्याशाखा
२. मा. संचालक, बी.सी.यु.डी.
३. मा. प्राचार्य, सर्व अभियांत्रिकी महाविद्यालये
४. मा. संचालक, सर्व मान्यताप्राप्त संस्था
५. मा. परीक्षा नियंत्रक, पुणे विद्यापीठ
६. मा. संचालक, स्पर्धा परीक्षा केंद्र
७. मा. उपकुलसचिव, परीक्षा (१,२)
८. मा. सिस्टीम ऑनॅलिस्ट डेटा प्रोग्रेसिंग युनिट
९. मा. उपकुलसचिव, प्रवेश
१०. मा. उपकुलसचिव, विकास
११. मा. उपकुलसचिव, पात्रता
१२. सहाय्यक कुलसचिव (परीक्षा समन्वय)
१३. सहाय्यक कुलसचिव (परीक्षा—एस.अॅण्ड टी. विभाग)
१४. सहाय्यक कुलसचिव (गोपनीय कक्ष)
१५. सहाय्यक कुलसचिव (परदेशी विद्यार्थी केंद्र)
१६. सहाय्यक कुलसचिव (सभा दफ्तर)
१७. कायदा अधिकारी
१८. जनसंपर्क अधिकारी
१९. कक्षाधिकारी (बहिःस्थ)
२०. कक्षाधिकारी (पात्रता विभाग)
२१. प्रमुख, विद्यापीठ उपकेंद्र : अहमदनगर, नाशिक.

वि. प. क्र ब ४९ पीए/४९/१३, दि. ०५ डिसेंबर, २०१३

दूरध्वनी क्रमांक :
०२०-२५६९१२३३
२५६०१२५८
२५६०१२५९



शैक्षणिक विभाग
गणेशखिंड, पुणे-४११ ००७
टेलिग्राफ : 'युनिपुणे'
फॅक्स : ०२०-२५६९१२३३
वेबसाइट : www.unipune.ac.in
ई-मेल : boards@unipune.ac.in
दिनांक : १४.०६.२०१३

संदर्भ क्र. : सी.बी. १५९१ ७९३

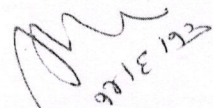
परिपत्रक क्र. १७००/२०१३

विषय:- अभियांत्रिकी विद्याशाखेअंतर्गत असणा-या द्वितीय वर्ष अभियांत्रिकी आराखडा शैक्षणिक वर्ष २०१३-१४ पासून लागू करण्याबाबत.....

विद्यापीठ अधिकार मंडळाने घेतलेल्या निर्णयानुसार सर्व संबंधितांस या परिपत्रकाद्वारे कळविण्यात येते की, अभियांत्रिकी विद्याशाखेअंतर्गत असणा-या द्वितीय वर्ष अभियांत्रिकी २०१२ अभ्यासक्रम (सर्व अभ्यास मंडळांसाठी) आराखड्यास शैक्षणिक वर्ष २०१३-१४ पासून लागू करण्यास मान्यता देण्यात येत आहे.

सदर आराखडा पुणे विद्यापीठाच्या www.unipune.ac.in या वेबसाईटवर Syllabi- Engineering या शीर्षकाखाली उपलब्ध आहे.

पुणे विद्यापीठाच्या सर्व संलग्न अभियांत्रिकी महाविद्यालयांचे मा. प्राचार्य यांना विनंती की, सदर परिपत्रकाचा आशय सर्व संबंधित प्राध्यापक व विद्यार्थ्यांच्या निदर्शनास आणून द्यावा.


संचालकांकरिता
(म.वि.वि.मं)

प्रत माहितीसाठी व पुढील योग्य त्या कार्यवाहीसाठी:—

१. मा. अधिष्ठाता, अभियांत्रिकी विद्याशाखा
२. मा. संचालक, बी.सी.यु.डी.
३. मा. प्राचार्य, सर्व अभियांत्रिकी महाविद्यालये
४. मा. संचालक, सर्व मान्यताप्राप्त संस्था
५. मा. परीक्षा नियंत्रक, पुणे विद्यापीठ
६. मा. संचालक, स्पर्धा परीक्षा केंद्र
७. मा. उपकुलसचिव, परीक्षा (१,२)
८. मा. सिस्टीम ॲनालिस्ट डेटा प्रोग्रेसिंग युनिट
९. मा. उपकुलसचिव, प्रवेश
१०. मा. उपकुलसचिव, विकास
११. मा. उपकुलसचिव, पात्रता
१२. मा. सहाय्यक कुलसचिव (परीक्षा समन्वय)
१३. मा. सहाय्यक कुलसचिव (परीक्षा—एस.ॲण्ड टी. विभाग)
१४. मा. सहाय्यक कुलसचिव (गोपनीय कक्ष)
१५. मा. सहाय्यक कुलसचिव (परदेशी विद्यार्थी केंद्र)
१६. मा. सहाय्यक कुलसचिव (सभा दफ्तर)
१७. मा. कायदा अधिकारी
१८. मा. जनसंपर्क अधिकारी
१९. कक्षाधिकारी (बहिःस्थ)
२०. कक्षाधिकारी (पात्रता विभाग)
२१. प्रमुख, विद्यापीठ उपकेंद्र : अहमदनगर, नाशिक.

वि. प क्र. ब ५८ पीए/२०९/१३, दि १५ मे, २०१३

Savitribai Phule University of Pune

**Third Year Civil Engineering
(2015 Course)**

Semester I

Course Code	Course	Teaching Scheme hour/week			Semester Examination Scheme of marks						Credit	
		Theory	Tutorial	Practical	In-Sem	End-Sem	T W	OR	PR	Total	TH/TUT	PR/OR/TW
301001	Hydrology and water resource engineering.	03	--	02	30	70	--	50	--	150	03	01
301002	Infrastructure Engineering and Construction Techniques	03	--	--	30	70	--	--	--	100	04	--
301003	Structural Design-I	04	--	04	30	70	50	50	--	200	04	02
301004	Structural Analysis-II	04	--	--	30	70	--	--	--	100	03	--
301005	Fluid Mechanics-II	04	--	02	30	70	--	50	--	150	04	01
301006	Employability Skills development	--	--	02	--	--	50	--	--	50	--	01
Total		18	--	10	150	350	100	150		750	18	05

Semester II

Course Code	Course	Teaching Scheme hour/week			Semester Examination Scheme of marks						Credit	
		Theory	Tutorial	Practical	In-Sem	End-Sem	T W	OR	PR	Total	TH/TUT	PR/OR/TW
301007	Advanced Surveying	03	--	02	30	70	50	--	--	150	03	01
301008	Project Management and Engineering Economics	04	--	--	30	70	--	--	--	100	04	--
301009	Foundation Engineering	03	--	--	30	70	--	--	--	100	03	--
301010	Structural Design-II	04	--	04	30	70	50	50	--	200	04	02
301011	Environmental Engineering-I	04	--	02	30	70	--	--	50	150	04	01
301012	Seminar	--	--	01	--	--	--	50	--	50	--	01
Total		18	--	09	150	350	100	100	50	750	18	05

Savitribai Phule University of Pune
Third Year Computer Engineering (2015 Course)
(with effect from 2017-18)

Semester I

Course Code	Course	Teaching Scheme Hours / Week			Examination Scheme and Marks						Credit	
		Theory	Tutorial	Practical	In-Sem	End-Sem	TW	PR	OR	Total	TH/ TUT	PR
310241	<u>Theory of Computation</u>	03	--	--	30	70	--	--	--	100	03	--
310242	<u>Database Management Systems (DBMS)</u>	03	--	--	30	70	--	--	--	100	03	--
310243	<u>Software Engineering & Project Management</u>	03	--	--	30	70	--	--	--	100	03	--
310244	<u>Information Systems & Engineering Economics</u>	03	--	--	30	70	--	--	--	100	03	--
310245	<u>Computer Networks (CN)</u>	04	--	--	30	70	--	--	--	100	04	--
310246	<u>Skills Development Lab</u>	--	02	04	--	--	50	--	50	100	02	02
310247	<u>DBMS Lab</u>	--	--	04	--	--	25	50	--	75	--	02
310248	<u>CN Lab</u>	--	--	02	--	--	25	50	--	75	--	01
Total Credit											18	05
Total		16	02	10	150	350	100	100	50	750	23	
310249	<u>Audit Course 3</u>											Grade

310249-Audit Course 3 (AC3) Options:

AC3-I: Cyber Security

AC3-II: Professional Ethics and Etiquettes

AC3-III: Emotional Intelligence

AC3-IV: MOOC- Learn New Skills

AC3-V: Foreign Language (Japanese- Module 3)

Abbreviations:

TW: Term Work **TH:** Theory **OR:** Oral **TUT:** Tutorial **PR:** Practical **Sem:** Semester

Savitribai Phule University of Pune
Third Year Computer Engineering (2015 Course)
(with effect from 2017-18)

Semester II

Course Code	Course	Teaching Scheme Hours / Week			Examination Scheme and Marks						Credit	
		Theory	Tutorial	Practical	In-Sem	End-Sem	TW	PR	OR	Total	TH/ TUT	PR
310250	<u>Design & Analysis of Algorithms</u>	04	--	--	30	70	--	--	--	100	04	
310251	<u>Systems Programming & Operating System (SP & OS)</u>	04	--	--	30	70	--	--	--	100	04	--
310252	<u>Embedded Systems & Internet of Things (ES & IoT)</u>	04	--	--	30	70	--	--	--	100	04	--
310253	<u>Software Modeling and Design</u>	03	--	--	30	70	--	--	--	100	03	--
310254	<u>Web Technology</u>	03	--	--	30	70	--	--	--	100	03	--
310255	<u>Seminar & Technical Communication</u>	--	01	--	--	--	50	--	--	50	01	--
310256	<u>Web Technology Lab</u>	--	--	02	--	--	25	50	--	75	--	01
310257	<u>SP & OS Lab</u>	--	--	04	--	--	25	50	--	75	--	02
310258	<u>ES & IoT Lab</u>	--	--	02	--	--	50	--	--	50	--	01
Total Credit											19	04
Total		18	01	08	150	350	150	100	--	750	23	
310259	<u>Audit Course 4</u>										Grade	

310259-Audit Course 4(AC4) Options:

AC4-I: Digital and Social Media Marketing

AC4-II: Green Computing

AC4-III: Sustainable Energy Systems

AC4-IV: Leadership and Personality Development

AC4-V: Foreign Language (Japanese- Module 4)

Abbreviations:

TW: Term Work **TH:** Theory **OR:** Oral **TUT:** Tutorial **PR:** Practical **Sem:** Semester

Savitribai Phule University of Pune, Pune
Third Year E&TC Engineering (2015 Course)

(With effect from Academic Year 2017-18)

Semester I												
Course Code	Course	Teaching Scheme			Semester Examination Scheme of						Credits	
		Hours / Week			Marks							
		Theory	Tuto rials	Practi cals	In- Sem	End- Sem	TW	PR	OR	Total	Th+Tut	PR/OR/ TW
304181	Digital Communication	3	--	--	30	70	--	--	--	100	3	--
304182	Digital Signal Processing	3	--	--	30	70	--	--	--	100	3	--
304183	Electromagnetics	3	1	--	30	70	--	--	--	100	4	--
304184	Microcontrollers	3	--	--	30	70	--	--	--	100	3	--
304185	Mechatronics	3	--	--	30	70	--	--	--	100	3	--
304191	Signal Processing and Communications Lab (DC/DSP)	--	--	4	--	--	50	50		100	--	2
304192	Microcontrollers and Mechatronics Lab	--	--	4	--	--	50	50		100	-	2
304193	Electronics System Design	2	--	2	--	--	-	--	50	50	2	1
	Audit Course 3	--	--	--	--	--	--	--	--	--	----	
Total		17	01	10	150	350	100	100	50	750	18	5
Total Credits											23	

Third Year E&TC Engineering (2015 Course)**(With effect from Academic Year 2017-18)**

Semester II												
Course Code	Course	Teaching Scheme Hours / Week			Semester Examination Scheme of Marks						Credit	
		Theory	Tutorials	Practicals	In-Sem	End-Sem	TW	PR	OR	Total	Th+Tut	PR/OR/TW
304186	Power Electronics	3	--	--	30	70	--	--	--	100	3	--
304187	Information Theory, Coding and Communication Networks	4	--	--	30	70	--	--	--	100	4	--
304188	Business Management	3	--	--	30	70	--	--	--	100	3	--
306189	Advanced Processors	3	--	--	30	70	--	--	--	100	3	--
304190	System Programming and Operating Systems	3	--	--	30	70	--	--	--	100	3	--
304194	Power and ITCT Lab	--	--	4	--	--	50	50	--	100	--	2
304195	Advanced Processors and System Programming Lab	--	--	4	--	--	50	50	--	100	--	2
304196	Employability Skills and Mini Project	2	--	2	--	--	--	--	50	50	2	1
	Audit Course 4	--	--	--	--	--	--	--	--	--		
Total		18	---	10	150	350	100	100	50	750	18	5
Total Credits											23	

Savitribai Phule Pune University
T.E. Mechanical Engineering 2015 – Course
T. E. (Mechanical) (2015 Course) Semester – I

Code	Subject	Teaching Scheme Hrs / week			Examination Scheme					Total Marks	Credits	
		Lecture	Tut	Pract	In-Sem	ESE	TW	PR	OR		Th	TW / PR / OR
302041	Design of Machine Elements-I	4	-	2	30@	70@	50	-		150	4	1
302042	Heat Transfer*	4	-	2	30	70		50	-	150	4	1
302043	Theory of Machines-II ^s	3	1		30	70	25	-	25	150	3	1
302044	Turbo Machines	3	-	2	30	70	-	-	25	125	3	1
302045	Metrology and Quality Control ^s	3	-	2	30	70	-	-	25	125	3	1
302046	Skill Development	-	-	2	-	-	25	25	-	50	-	1
Total		17	1	10	150	350	100	75	75	750	17	6
											23	

T. E. (Mechanical) (2015 Course) Semester – II

Code	Subject	Teaching Scheme Hrs / week			Examination Scheme					Total Marks	Credits	
		Lecture	Tut	Pract	In-Sem	ESE	TW	PR	OR		Th	TW / PR / OR
302047	Numerical Methods and Optimization*	4	-	2	30	70	-	50	-	150	4	1
302048	Design of Machine Elements-II	4	-	2	30@	70@	25	-	25	150	4	1
302049	Refrigeration and Air Conditioning	3	-	2	30	70	-	-	25	125	3	1
302050	Mechatronics%	3	1		30	70	-	-	25	125	3	1
302051	Manufacturing - Process-II ^s	3	-	-	30	70	-	-	-	100	3	-
302052	Machine Shop-II ^s	-	-	2	-	-	50	-	-	50	-	1
302053	Seminar ^s	-	-	2	-	-	25	-	25#	50	-	1
302054	Audit Course*	--	--	--	--	--	-	-	-	-	-	-
Total		17	1	10	150	350	100	50	100	750	17	6
											23	

Though it is under Oral head Internal Panel to be appointed by Principal and HOD.

Examination schedule will not be prepared at University level.

* Marked subjects are common with TE (Auto. Engg.) and TE Mech. Sandwich

^s Marked subjects are common with TE (Auto. Engg.) only

% Marked subjects are common with TE Mech. Sandwich only

@ Examination time for Insem examination 1 Hr 30 Min. and Endsem examination 3Hrs.

Savitribai Phule Pune University
S.E. (Civil Engineering) 2015 Course

Semester I												
Course Code	Course	Teaching Scheme Hours / Week			Semester Examination Scheme of Marks						Credit	
		Theory (TH)	Tutorials (TUT)	Practical (PR)	In-Sem	End-Sem	TW	PR	OR	Total	TH / TUT	PR/OR TW
201001	Building Technology and Materials	04	--	02	50	50	50	--	--	150	04	01
207001	Engineering Mathematics III	04	01	--	50	50	50	--	--	150	05	
201006	Surveying	04	--	02	50	50	--	50	--	150	04	01
201002	Strength of Materials	04	--	02	50	50	--	--	50	150	04	01
201003	Geotechnical Engineering	04	--	02	50	50	--	--	50	150	04	01
	Audit Course 1 Awareness to Civil Engineering Practices	--	--	--	--	--	--	--	--	--	Grade	
	Total	20	01	08	250	250	100	50	100	750	25	

Note: For audit courses students are given certificate by the institutes based on the assignment submitted by them.

Abbreviations: **TW:** Term Work, **OR:** Oral, **PP:** Passed (Only for non credit courses), **NP:** Not Passed (Only for non credit courses).

Savitribai Phule Pune University
S.E. (Civil Engineering) 2015 Course

Semester II												
Course Code	Course	Teaching Scheme Hours / Week			Semester Examination Scheme of Marks						Credit	
		Theory (TH)	Tutorials (TUT)	Practical (PR)	In-Sem	End-Sem	TW	PR	OR	Total	TH / TUT	PR/OR/ TW
201004	Fluid Mechanics I	04	--	02	50	50	--	--	50	150	04	01
201005	Architectural Planning and Design of Buildings	04	--	02	50	50	--	50	--	150	04	01
201008	Structural Analysis I	03	01	--	50	50	--	--	--	100	04	--
207009	Engineering Geology	04	--	02	50	50	50	--	--	150	04	01
201007	Concrete Technology	04	--	02	50	50	--	--	50	150	04	01
201010	Soft Skill	--	--	02	--	--	50	--	--	50	--	01
	Audit Course 2 Road Safety Management	--	--	--	--	--	--	--	--	--	Grade	
		19	01	10	250	250	100	50	100	750	25	

Note: For audit courses students are given certificate by the institutes based on the assignment submitted by them.

Abbreviations: **TW:** Term Work, **OR:** Oral, **PP:** Passed (Only for non credit courses), **NP:** Not Passed (Only for non credit courses).

Savitribai Phule Pune University
Second Year of Computer Engineering (2015 Course)
 (With effect from Academic Year 2016-17)

Semester I

Course Code	Course Name	Teaching Scheme Hours / Week			Examination Scheme & Marks						Credit	
		Theory	Tutorial	Practical	In-Sem	End-Sem	TW	PR	OR	Total	TH + TUT	PR
210241	<u>Discrete Mathematics</u>	04	--	--	50	50	--	--	--	100	04	--
210242	<u>Digital Electronics and Logic Design</u>	04	--	--	50	50	--	--	--	100	04	--
210243	<u>Data Structures and Algorithms</u>	04	--	--	50	50	--	--	--	100	04	--
210244	<u>Computer Organization and Architecture</u>	04	--	--	50	50	--	--	--	100	04	--
210245	<u>Object Oriented Programming</u>	04	--	--	50	50	--	--	--	100	04	--
210246	<u>Digital Electronics Lab</u>	--	--	02	--	--	25	50	--	75	--	01
210247	<u>Data Structures Lab</u>	--	--	04	--	--	25	50	--	75	--	02
210248	<u>Object Oriented Programming Lab</u>	--	--	02	--	--	25	50	--	75	--	01
210249	<u>Soft Skills</u>	--	--	02	--	--	25	--	--	25	--	01
Total											20	05
210250	<u>Audit Course 1</u>	--	--	--	--	--	--	--	--	--	Grade	
Total		20	--	10	250	250	100	150	--	750	25	

Abbreviations:

TW: Term Work
 OR: Oral
 PR: Practical

TH: Theory
 TUT: Tutorial
 Sem: Semester

Savitribai Phule Pune University
Second Year of Computer Engineering (2015 Course)
 (With effect from Academic Year 2016-17)
Semester II

Course Code	Course Name	Teaching Scheme Hours / Week			Examination Scheme & Marks						Credits	
		Theory	Tutorial	Practical	In-Sem	End-Sem	TW	PR	OR	Total	TH+TUT	PR
207003	<u>Engineering Mathematics III</u>	04	01	--	50	50	25	--	--	125	05	--
210251	<u>Computer Graphics</u>	04	--	--	50	50	--	--	--	100	04	--
210252	<u>Advanced Data Structures</u>	04	--	--	50	50	--	--	--	100	04	--
210253	<u>Microprocessor</u>	04	--	--	50	50	--	--	--	100	04	--
210254	<u>Principles of Programming Languages</u>	03	--	--	50	50	--	--	--	100	03	--
210255	<u>Computer Graphics Lab</u>	--	--	02	--	--	25	50	--	75	--	01
210256	<u>Advanced Data Structures Lab</u>	--	--	04	--	--	25	50	--	75	--	02
210257	<u>Microprocessor Lab</u>	--	--	04	--	--	25	50	--	75	--	02
Total											20	05
210258	<u>Audit Course 2</u>		--	--	--	--	--	--	--	--	Grade	
Total		19	01	10	250	250	100	150	--	750	25	

Abbreviations:

TW: Term Work
 OR: Oral
 PR: Practical

TH: Theory
 TUT: Tutorial
 Sem: Semester

Savitribai Phule Pune University, Pune
SE(E&TC/Electronics Engineering) 2015 Course

(With effect from Academic Year 2016-17)

Semester I												
Course Code	Course	Teaching Scheme Hours / Week			Semester Examination Scheme of Marks						Credit	
		Theory	Tutorials	Practicals	In-Sem (On line)	End-Sem (Theory)	TW	PR	OR	Total	TH/TUT	PR+OR
204181	Signals & Systems	3	1	-	50	50	25	-	-	125	4	-
204182	Electronic Devices & Circuits	4	-	2	50	50	-	50	-	150	4	1
204183	Electrical Circuits and Machines	3	-	2	50	50	25	-	-	125	3	1
204184	Data Structures and Algorithms	4	-	2	50	50	-	-	50	150	4	1
204185	Digital Electronics	4	-	2	50	50	-	50	-	150	4	1
204186	Electronic Measuring Instruments & Tools	1	-	2	-	-	50	-	-	50	1	1
204192	Audit Course 1	--	--	--	--	--	--	--	--	--		
Total		19	1	10	250	250	100	100	50	750	20	05
Total Credits											25	

Abbreviations:

Th : Theory

TW: Term Work

OR: Oral

TUT : Tutorial

PR : Practical

Note: Interested students of S.E. (Electronics/E&TC) can opt any one of the audit course from the audit courses prescribed by BoS (Electronics/Computer/IT/Electrical/Instrumentation)

SE(E&TC/Electronics Engineering) 2015 Course**(With effect from Academic Year 2016-17)**

Semester II												
Course Code	Course	Teaching Scheme Hours / Week			Semester Examination Scheme of Marks						Credit	
		Theory	Tutorials	Practicals	In-Sem (on line)	End-Sem (Theory)	TW	PR	OR	Total	TH/TUT	PR+OR
207005	Engineering Mathematics III	4	1	-	50	50	25	-	-	125	5	-
204187	Integrated Circuits	4	-	2	50	50	25	50	-	175	4	1
204188	Control Systems	3	-	-	50	50	-	-	-	100	3	-
204189	Analog Communication	3	-	2	50	50	-	50	-	150	3	1
204190	Object Oriented Programming	3	-	4	50	50	-	-	50	150	3	2
204191	Employability Skill Development	2	-	2	-	-	50	-	-	50	2	1
204193	Audit Course 2	--	--	--	--	--	--	--	--	--		
Total		19	1	10	250	250	100	100	50	750	20	05
Total Credits											25	

Abbreviations:

TH: Theory
 TW: Term Work
 OR: Oral

TUT: Tutorial
 PR: Practical

Note: Interested students of S.E (Electronics/E&TC) can opt any one of the audit course from the audit courses prescribed by BoS (Electronics/Computer/IT/Electrical/Instrumentation)

**Structure of S.E. (Mechanical Engineering/ Automobile Engineering)
2015 Course**

Semester-I

Subject Code	Subject	Teaching Scheme			Examination Scheme					Total Marks	Credits	
		Hours/Week			In-Sem (online)	End-Sem	TW	PR.	Oral		Lect/Tut	PR/OR
		L	Tut.	PR								
207002	Engineering Mathematics – III	04	01	-	50	50	25	-	-	125	05	-
202041	Manufacturing Process-I	03	-	02	50	50	50	-	-	150	03	01
202042	Computer Aided Machine Drawing	01	-	02	--	--		50	-	50	01	01
202043	Thermodynamics	04	-	02	50	50	-	-	50	150	04	01
202044	Material Science	03	01	-	50	50	25	-	-	125	03	01
202051	Strength of Materials	04	-	02	50	50	-	-	50	150	04	01
202055	Audit course											
					--	--						
	Total	19	02	08	250	250	100	50	100	750	20	05
	Total of Part-I	29 Hrs				750					25	

Note: Material Science and Engineering Mathematics-III practical may be carried out fortnightly for two hours, so that the tutorial hours may be used as practical.

Semester-II

Subject Code	Subject	Teaching Scheme			Examination Scheme					Total Marks	Credits	
		Hours/Week			In-Sem (online)	End-Sem	TW	PR.	Oral		Lect/Tut	PR/OR
		L	Tut.	PR								
202045	Fluid Mechanics	04	-	02	50	50	-	50	-	150	04	01
202047	Soft Skills	-	-	02	--	--	25	-	-	25	-	01
202048	Theory of Machines – I	04	01	-	50	50	25	-	25	150	04	01
202049	Engineering Metallurgy	03	01	-	50	50	-	-	25	125	03	01
202050	Applied Thermodynamics	04	-	02	50	50	-	50	-	150	04	01
203152	Electrical and Electronics Engineering	03	-	02	50	50	25	-	-	125	03	01
202053	Machine Shop – I	-	-	02	--	--	25	-	-	25	-	01
	Total	18	02	10	250	250	100	100	50	750	18	07
	Total of Part-II	30 Hrs			750					25		

Note: Theory of Machine-I and Engineering Metallurgy practical may be carried out fortnightly for two hours, so that the tutorial hours may be used as practical.

Savitribai Phule Pune University

Board of Studies in Civil Engineering

Structure for B.E. Civil 2012 Course (w.e.f. June 2015)

Subject code	Subject	Semester – I							
		Teaching Scheme Hrs/Week			Examination Scheme				
		Lect	Tu	Pr	In-Semester Assessment	TW	Or	End - Semester Exam	Total
401 001	Environmental Engineering II	3		2	30	--	50	70	150
401 002	Transportation Engineering	3		2	30	50	--	70	150
401 003	Structural Design and Drawing III	4		2	30	--	50	70	150
401 004	Elective I	3		2	30	50		70	150
401 005	Elective II	3			30			70	100
401 006	Project Phase I	--	2			50			50
	Total →	16	2	8	150	150	100	350	750

Subject code	Subject	Semester – II							
		Teaching Scheme Hrs/Week			Examination Scheme				
		Lect	Tu	Pr	In-Semester Assessment	TW	Or	End - Semester Exam	Total
401 007	Dams and Hydraulic Structures	3	--	2	30	---	50	70	150
401 008	Quantity Surveying, Contracts and Tenders	3	--	2	30	--	50	70	150
401 009	Elective III	3	--	2	30	50	--	70	150
401 010	Elective IV	3	--	2	30	50	--	70	150
401 006	Project	--	6		--	50	100	--	150
	Total →	12	6	8	120	150	200	280	750

Following will be the list of electives..

Semester I

Elective-I 401 004 1. Structural Design of Bridges 2. Systems Approach in Civil Engineering 3.. Advanced Concrete Technology 4. Architecture and Town Planning 5. Advanced Engineering Geology with Rock Mechanics	Elective-II 401 005 1. Matrix Methods of Structural Analysis 2. Integrated Water Resources and Planning 3. TQM & MIS in Civil Engineering 4. Earthquake Engineering 5. Advanced Geotechnical Engineering
--	--

Semester II

Elective-III 401 009 1. Advanced Structural Design 2. Advanced Foundation Engineering 3. Hydropower Engineering 4. Air Pollution and control 5. Finite Element Method in Civil Engineering	Elective-IV 401 010 1 Construction Management 2. Advanced Transportation Engineering 3. Statistical Analysis and Computational Methods in Civil Engineering 4. Open Elective a). Plumbing Engineering b) Green Building Technology c) Ferrocement Technology d) Sub sea Engineering e) Wave Mechanics
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SAVITRIBAI PHULE PUNE UNIVERSITY
BE (COMPUTER ENGINEERING)- 2012 COURSE STRUCTURE
Term-I

Subject Code	Subject	Teaching Scheme			Examination Scheme				Total Marks
		Lect	Tut	Pract	In Sem Asmnt	PR/TW	OR/TW	End Sem Asmnt	
410441	Design & Analysis of Algorithms	03	—	—	30	—	—	70	100
410442	Principles of Modern Compiler Design	04	—	—	30	—	—	70	100
410443	Smart System Design and Applications	03	—	—	30	—	—	70	100
410444	Elective-I	03	—	—	30	—	—	70	100
410445	Elective-II	03	—	—	30	—	—	70	100
410446	Computer laboratory-I	—	—	04	—	50	50	—	100
410447	Computer Laboratory-II	—	—	04	—	50	50	—	100
410448	Project	—	02	—	—	50	—	—	50
	Total	16	02	08	150	150	100	350	750
	Term-II								
410449	Software Design Methodologies & Testing	03	—	—	30	—	—	70	100
410450	High Performance Computing	03	—	—	30	—	—	70	100
410451	Elective-III	03	—	—	30	—	—	70	100
410452	Elective-IV Open Elective	03	—	—	30	—	—	70	100
410453	Computer laboratory-III	—	—	04	—	50	50	—	100
410454	Computer Laboratory-IV	—	—	04	—	50	50	—	100
410455	Project	—	06	—	—	50	100	—	150
	Total	12	06	08	120	150	200	280	750

Electives:

Semester-I		Semester-II	
ELECTIVE-I		ELECTIVE-III	
1.	Image Processing	1.	Mobile Computing
2.	Computer Network Design and Modeling	2.	Web Technology
3.	Advanced Computer Programming	3.	Cloud Computing
4.	Data Mining Techniques and Applications	4.	Cyber Security
ELECTIVE-II		ELECTIVE-IV (Open Elective)	
1.	Problem Solving with Gamification	1.	Business Analytic and Intelligence
2.	Pervasive Computing	2.	Operations Research for Algorithms in Scientific Applications
3.	Embedded Security	3.	Mobile Applications
4.	Multidisciplinary NLP	4.	Open Elective

Open Elective: The listed open electives or any other Elective that is being taught in the current semester (semester-II) under the faculty of engineering or individual college and Industry can define new elective with complete (6 units) syllabus using defined framework of Elective IV and GET IT APPROVED FROM THE BOARD OF STUDIES (COMPUTER ENGINEERING) AND OTHER NECESSARY STATUTORY SYSTEMS IN THE SAVITRIBAI PHULE PUNE UNIVERSITY BEFORE 30th DECEMBER.

BE (E & TC) Structure
2012 Course w.e.f. June 2015
Semester-I

Subject Code	Subject	Teaching Scheme			Examination Scheme					Marks
		LECT	TUT	PR	In Semester Assessment	PR	OR	TW	End Semester Examination	Total
					Phase I				Phase II	
404181	VLSI Design & Technology	3			30				70	100
404182	Computer Networks	3			30				70	100
404183	Microwave Engineering	4			30				70	100
404184	Elective I	3			30				70	100
404185	Elective II	3			30				70	100
404186	Lab Practice I (CN & MWE)			4			50	50		100
404187	Lab Practice II (VLSI & Elective I)			4		50		50		100
404188	Project Phase I		2				50			50
	Total	16	2	8	150	50	100	100	350	750

Elective I

1. Digital Image Processing
2. Embedded Systems & RTOS
3. Software Defined Radio
4. Industrial Drives and Control

Elective II

1. Multi rate & Adaptive Signal Processing
2. Electronic Product Design
3. PLCs and Automation
4. Artificial Intelligence

Semester-II

Subject Code	Subject	Teaching Scheme			Examination Scheme					Marks
		LECT	TUT	PR	In Semester Assessment	PR	OR	TW	End Semester Examination	Total
					Phase I				Phase II	
404189	Mobile Communication	4			30				70	100
404190	Broadband Communication Systems	4			30				70	100
404191	Elective III	3			30				70	100
404192	Elective IV	3			30				70	100
404193	Lab Practice III(MC & BCS)			4			50	50		100
404194	Lab Practice IV(Elective III)			2		50		50		100
404195	Project Phase II		6			50		100		150
	Total	14	6	6	120	100	50	200	280	750

Elective III

1. Speech & Audio Signal Processing
2. RF Circuit Design
3. Audio Video Engineering
4. Soft Computing

Elective IV

1. Biomedical Signal Processing
2. Nano Electronics & MEMS
3. Detection & Estimation Theory
4. Wireless Networks
5. Open Elective*

***Any one subject from the list of Elective IV of computer/IT/Electrical/Instrumentation or Institute can offer elective IV based on any industry need with prior approval from BoS(Electronics). Repetition of subjects or topics is to be avoided.**

Dr. D. S. Bormane
Chairman, BOS(Electronics)

Savitribai Phule Pune University, Pune 2012 Course

B. E. (Mechanical) Semester – I

(w. e. f. Academic year 2015 - 16)

Code	Subject	Teaching Scheme (Weekly Load in hrs)			Examination Scheme(Marks)					
		Lect.	Tut	Practical	In-Sem	End-Sem	TW	PR ⁺	OR ⁺	Total
402041	Refrigeration and Air Conditioning	3	--	2	30	70	25	--	50	175
402042	CAD/ CAM Automation	3	--	2	30	70	--	50	--	150
402043	Dynamics of Machinery	4	--	2	30	70	25	--	50	175
402044	Elective – I	3	--	--	30	70	--	--	--	100
402045	Elective –II	3	--	--	30	70	--	--	--	100
402046	Project –I	--	2	--	--	--	50*	--	--	50
Total of Semester – I		16	2	6	150	350	100	50	100	750

B. E. (Mechanical) Semester – II

Code	Subject	Teaching Scheme (Weekly Load in hrs)			Examination Scheme(Marks)					
		Lect.	Tut	Practical	In-Sem	End-Sem	TW	PR ⁺	OR ⁺	Total
402047	Power Plant Engineering	4	--	2	30	70	25	--	50	175
402048	Mechanical System Design	4	--	2	30	70	--	--	50	150
402049	Elective-III	4	--	--	30	70	--	--	--	100
402050	Elective- IV	4	--	2	30	70	25	--	--	125
402051	Project – II	--	6	--	--	--	150	--	50	200
Total of Semester – II		16	6	6	120	280	200	--	150	750

+ . For all Oral/Practical heads: Examination will be based on term work and Theory Subject

* Assessment should be carried out by panel of examiners from same Institute

Elective-I		Elective-II	
Code	Subject	Code	Subject
402044 A	Energy Audit Management	402045 A	Gas Turbine Propulsion
402044 B	Tribology	402045 B	Product Design and Development
402044 C	Reliability Engineering	402045 C	Operation Research
402044 D	Machine Tool Design	402045 D	Advanced Manufacturing Processes
Elective-III		Elective-IV	
Code	Subject	Code	Subject
402049 A	Refrigeration and Air Conditioning Equipment Design	402050 A	Computational Fluid Dynamics
402049 B	Robotics	402050 B	Finite Element Analysis
402049 C	Industrial Engineering	402050 C	Design of Pumps, Blowers and Compressors
402049 D	Open Elective **		

** : Open Elective – Board of studies (BoS) - Mechanical will declare the list of subjects which can be taken under open electives or any other Electives that are being taught in the current semester, to the same level, as Elective – III under engineering faculty or individual college and Industry can define new elective with proper syllabus using defined framework of Elective III and GET IT APPROVED FROM BOARD OF STUDIES AND OTHER NECESSARY STATUTORY SYSTEMS IN THE SAVITRIBAI PHULE PUNE UNIVERSITY, PUNE, BEFORE 30th NOVEMBER. Without approval from University statutory system, no one can introduce the open elective in curriculum.

\$: Mandatory subjects of first, second and third semester must include at least 40 credits for Engineering Physics, Engineering Chemistry, Engineering Mathematics, social science and soft skills
In addition to above credits, there should be audit courses in semester five, six and seven to develop the various skills.

The detail structure is given in Tables

TABLE - 2 Structure for Semester-1

Code	Subjects	Short Name	Weekly Work Load (in Hrs)			Semester Examination Scheme of Marks						Credits
			Lectures	Tutorials	PR/DRG	Theory		TW	PR	OR	Max. Marks	
						In-Semester Exam	End-Semester Exam					
107001	Engineering Mathematics I		4	1	–	50	50	25	–	–	125	5
107002 / 107009.	Engineering Physics OR Engineering Chemistry		4	–	2	50	50	25	–	–	125	5
102006	Engineering Graphics I		3	–	2	50	50	–	–	–	100	4
103004 / 104012	Basic Electrical Engineering OR Basic Electronics Engineering		3	–	2	50	50	25	–	–	125	4
101005	Basic Civil and Environmental Engineering		3	–	2	50	50	25	–	–	125	4
110003	Fundamentals of Programming Languages I		1	–	2	–	–	–	50*	–	50	2
111007	Workshop Practice		–	–	2	–	–	50	–	–	50	1
Total of Semester I			18	1	12	250	250	150	50	–	700	25

TABLE - 3 Structure for Semester-2

Code	Subjects	Short Name	Weekly Work Load (in Hrs)			Semester Examination Scheme of Marks						Credits
			Lectures	Tutorials	PR/DRG	Theory		TW	PR	OR	Max. Marks	
						In-Semester Exam	End-Semester Exam					
107008	Engineering Mathematics II		4	–	–	50	50	–	–	–	100	4
107009 / 107002	Engineering Chemistry OR Engineering Physics		4	–	2	50	50	25	–	–	125	5
102013	Basic Mechanical Engineering		3	–	2	50	50	25	–	–	125	4
101011	Engineering Mechanics		4	–	2	50	50	25	–	–	125	5
104012 / 103004	Basic Electronics Engineering OR Basic Electrical Engineering		3	–	2	50	50	25	–	–	125	4
110010	Fundamentals of Programming Languages II		1	–	2	–	–	–	50*	–	50	2
102014	Engineering Graphics II		–	–	2	–	–	50	–	–	50	1
Total of Semester II			19	–	12	250	250	150	50	–	700	25

Instructions:

1. PR/Tutorial must be conducted in minimum three batches (batch size 22 maximum) per division
2. Minimum number of required Experiments/Assignments in PR/DRG/Tutorial be carried out as mentioned in the syllabi of related subjects.
3. * for FPL-I and FPL-II: S.P. Pune University Online Practical Examination shall be conducted at the semester end.
4. # Every student should appear for Engineering Physics, Engineering Chemistry, Basic Electronics Engineering and Basic Electrical Engineering during the year.
5. # College is allowed to distribute Teaching Workload of subjects Physics, Chemistry, BEE, BXE in semester I and II by dividing number of FE divisions appropriately in two groups.

University of Pune
Board of Studies(Civill Engineering)
TE Civil (2012 Course) w.e.f.June ,2014

Subject code	Subject	Semester – I						
		Teaching Scheme Hrs/Week			Examination Scheme			
		Lect	Pr	In-Semester Assessment	Pr/ TW	Or	End - Semester Exam	Total
301 001	Hydrology and Water Resources Engineering	3	-	30			70	100
301 002	Infrastructure Engineering	3	-	30			70	100
301 003	Structural Design I	4	4	30	50	50	70	200
301 004	Structural Analysis II	4	-	30			70	100
301 005	Fluid Mechanics II	4	4	30	50	50	70	200
301 006	Employable Skill Development		2		50			50
	Total →	18	10	150	150	100	350	750

Subject code	Subject	Semester – II						
		Teaching Scheme Hrs/Week			Examination Scheme			
		Lect	Pr	In-Semester Assessment	Pr/ TW	Or	End - Semester Exam	Total
301 007	Advance Surveying	4	2	30		50	70	150
301 008	Project Management and Engineering Economics	4	-	30		-	70	100
301 009	Foundation Engineering	4	-	30		-	70	100
301 010	Structural design II	4	4	30	50	50	70	200
301 011	Environmental Engineering I	4	2	30	50		70	150
301 012	Seminar & Technical Communication		2	30	50			50
	Total →	20	10	150	150	100	350	750

University of Pune

Course Structure for TE Computer Engineering

2012 Course (w.e.f. June 2014)

2012 Course (w.e.f. June 2014)										
Subject Code	Subject	Teaching Scheme Hrs/Week			Examination Scheme					Mark
		Lect.	Tutorials	Pract	In-Semester Assessment	Tw	Pr	OR	End Semester Exam	Total
SEM – I										
310241	Theory of Computation	4	—	—	30	—	—	—	70	100
310242	Operating Systems Design	4	—	—	30	—	—	—	70	100
310243	Data Communication and Wireless Sensor Networks	4	—	—	30	—	—	—	70	100
310244	Database Management Systems Applications	3	—	—	30	—	—	—	70	100
310245	Computer Forensic and Cyber Applications	3	—	—	30	—	—	—	70	100
310246	Programming Lab-I	—	—	4	—		50	50	—	100
310247	Programming Lab-II	—	—	4	—	50	—	50	—	100
310248	Employability Skills Development Lab	—	—	2	—	50	—	—	—	50
	Total of Semester – I	18	—	10	150	100	50	100	350	750

Course Structure for TE Computer Engineering

2012 Course (w.e.f. June 2014)

SEM – II

Subject Code	Subject	Teaching Scheme Hrs/Week			Examination Scheme					Mark
		Lect.	Tutorials	Pract	In-Semester Assessment	Tw	Pr	Or	End Semester Assessment	
310249	Principles of Concurrent and Distributed Programming	4	—	—	30	—	—	—	70	100
310250	Embedded Operating Systems	4	—	—	30	—	—	—	70	100
310251	Computer Networks	4	—	—	30	—	—	—	70	100
310252	Software Engineering	3	—	—	30	—	—	—	70	100
310253	Digital Signal Processing Applications	3	—	—	30	—	—	—	70	100
310254	Programming Laboratory-III	—	—	4	—	—	50	50	—	100
310255	Programming Laboratory-IV	—	—	4	—	50	—	50	—	100
310256	Seminar and Technical Communication Laboratory	—	—	2	—	50	—	—	—	50
Total of Semester – II		18	—	10	150	100	50	100	350	750

TE (E & TC) Structure

2012 Course w.e.f. June 2014

SEMESTER I

Subject Code	Subject	Teaching Scheme			Examination Scheme					Marks
		Lect	Tut	Pr	Pr	Oral	TW	In Semester Assessment	End Semester Examination	Total
								Phase I	Phase II	
304181	Digital Communication	4						30	70	100
304182	Digital Signal Processing	4						30	70	100
304183	Micro Controller and Applications	3						30	70	100
304184	Electromagnetics and Transmission Lines	3	1					30	70	100
304185	System Programming and Operating System	3						30	70	100
304186	Digital Communication and Signal Processing Lab			4	50		50			100
304187	System Programming and Microcontroller Applications Lab			4	50		50			100
304188	Employability Skills in Electronics Design	2		2		50				50
	Total	19	1	10	100	50	100	150	350	750

TE (E & TC) Structure

2012 Course w.e.f. June 2014

SEMESTER II

Subject Code	Subject	Teaching Scheme			Examination Scheme					Marks
		Lect	Tut	Pr	Pr	Oral	TW	In Semester Assessment	End Semester Examination	Total
								Phase I	Phase II	
304189	Information Theory and Coding Techniques	4						30	70	100
304190	Antenna and Wave Propagation	4						30	70	100
304191	Embedded Processors	4						30	70	100
304192	Industrial Management	3						30	70	100
304193	Power Electronics	3						30	70	100
304194	Communication Lab			4	50		50			100
304195	Power Electronics and Embedded Lab			4	50		50			100
304196	Mini project and Seminar			4		50				50
	Total	18		12	100	50	100	150	350	750

Dr. D. S. Bormane
BOS Chairman

University of Pune

T. E. (Mechanical) Semester – I (w.e.f. Academic year 2014-15)

Code	Subject	Teaching Scheme (Weekly Load in hrs)			Examination Scheme (Marks)					
		Lect.	Tut	Pract.	Theory		TW	PR	OR	Total
					In Sem.	End Sem.				
302041	Design of Machine Elements – I	4	--	2	30 [#]	70 [@]	25**	--	--	125
302042	Heat Transfer	4	--	2	30	70	--	50*	--	150
302043	Theory of Machines-II	4	--	2	30	70	--	--	50 ^{\$}	150
302044	Metrology and Quality Control	3	--	2	30	70	--	--	50	150
302045	Hydraulics and Pneumatics	3	--	2	30	70	25	--	--	125
302046	Skill Development	--	--	2	--	--	50	--	--	50
Total of Semester – I		18	--	12	150	350	100	50	100	750

* Evaluation should be on performance in practical examination and oral based on Term Work
\$Common Oral will be based on both TOM-I and TOM-II term work at end of First Semester of T.E.

T. E. (Mechanical) Semester – II

Code	Subject	Teaching Scheme (Weekly Load in hrs)			Examination Scheme (Marks)					
		Lect.	Tut	Pract.	Theory		TW	PR	OR	Total
					In Sem.	End Sem.				
302047	Numerical Methods and Optimization	4	--	2	30	70	--	50	--	150
302048	Design of Machine Elements -II	4	--	2	30 [#]	70 [@]	25	--	50**	175
302049	Turbo Machines	4	--	2	30	70	25	--	--	125
302050	Mechatronics	3	--	2	30	70	25	--	--	125
302051	Manufacturing Process-II	3	--	--	30	70	--	--	--	100
302052	Machine Shop -II	--	--	2	--	--	25	--	--	25
302053	Seminar	--	--	2	--	--	--	--	50	50
Total of Semester – II		18		12	150	350	100	50	100	750

Important Notes

1. In-Sem Theory examination will be conducted, approximately one and half month after the commencement of each semester
2. In-Sem Theory examination will be based on first three units from Syllabus and will be conducted by the University of Pune
3. Total time allotted for In-Sem Theory examination will be 1 hr
4. (#) Total time allotted for In-Sem Theory examination (DME-I and DME-II) will be 1 hr 30 min.
5. Total time allotted for End-Sem Theory examination will be 2 hrs 30 min
6. (@) Total time allotted for End-Sem Theory examination (DME-I and DME-II) will be 3 hrs
7. ** Common oral based on both DME-I and DME-II term work

University of Pune
Structure of S.E. Civil Engineering (2012 Course)
With effect from A.Y:2013-2014
Semester I

Code	Subject	Teaching Scheme (in Hrs/week)			Examination Scheme of Marks					
		Lect	Tutorials	Pr/Drg.			Tw	Pr	Or	Max.Marks
					Theory Paper	Online Paper				
201001	Building Technology and Materials	3	-	4	50	50	25		50	175
207001	Engg.Maths III	4	1	-	50	50	25	-	-	125
201006	Surveying	4	-	2	50	50	25	50	-	175
201002	Strength of Materials	4	-	-	50	50	-	-	-	100
201003	Geotechnical Engineering	4	-	2	50	50	-	-	50	150
201010	Soft Skills	-	-	2	-	-	25	-	-	25
	Total	19	1	10	250	250	100	150		750

Semester II

Code	Subjects	Teaching Scheme (in Hrs/week)			Examination Scheme of Marks					
		Lect.	Tutorials	Pr/Drg.			Tw	Pr	Or	Max.Marks
					Theory Paper	Online Paper				
201004	Fluid Mechanics I	4	-	2	50	50	25	-	50	175
201005	Architectural Planning and Design of Buildings	4	-	4	50	50	25	50		175
201008	Structural Analysis-I	4	-	-	50	50	-	-	-	100
207009	Engineering Geology	4	-	2	50	50	25	-	-	125
201007	Concrete Technology	4	-	-	50	50	-	-	-	100
201009	Testing of Materials	-	-	2	-	-	25		50	75
		20		10	250	250	100	150		750

Course Structure for SE Computer Engineering

2012 Course (w.e.f. June 2013)

Subject Code	Subject	Teaching Scheme Hrs/Week			Examination Scheme					Mark
		Lect.	Tutorials	Pract	Paper	Tw	Pr	OR	Online	Total
SEM – I										
210241	Discrete Structures	4	—	—	50	—	—	—	50	100
210242	Data Structures and Problem Solving	4	—	4	50	—	50	—	50	150
210243	Digital Electronics and Logic Design	3	—	2	50	25	—	—	50	125
210244	Operating System and Administration	3	—	2	50	25	50	—	50	175
210245	Microprocessor Architecture	3	—	2	50	25	—	50	50	175
210246	Soft Skills	1	—	2	—	25	—	—	—	025
	Total of Semester – I	18	—	12	250	100	100	50	250	750
SEM – II										
Subject Code	Subject	Teaching Scheme Hrs/Week			Examination Scheme					Mark
		Lect.	Tutorials	Pract	Paper	Tw	Pr	Or	Online	Total
207003	Engineering Maths - III	4	1	—	50	25	—	—	50	125
210247	Object Oriented and multi-core Programming	4	—	4	50	25	50	—	50	175
210248	Microprocessors and Interfacing Techniques	3	—	4	50	—	50	—	50	150
210249	Computer Graphics and Gaming	3	—	—	50	—	—	—	50	100
210250	Computer Organization	3	—	—	50	—	—	—	50	100
210251	Programming Laboratory	—	—	4	—	50	—	50	—	100
	Total of Semester – II	17	1	12	250	100	100	50	250	750

Course Structure for S.E. (Electronics/Electronics & Telecommunication Engineering)

2012 Course (w.e.f. June-2013)

SEMESTER-I										
Subject Code	Subject	Teaching Scheme Hrs/Week			Examination Scheme					Marks
		Lect	Tut	Pr	Theory Online	Tw	Pr	Or	Theory Paper	Total
204181	Signals & Systems	4	1	-	50	25	-	-	50	125
204182	Electronic Devices & Circuits	4	-	2	50	-	50	-	50	150
204183	Network Theory	3	1	-	50	25	-	-	50	125
204184	Data structures & Algorithms	4	-	2	50	-	-	50	50	150
204185	Digital Electronics	4	-	2	50	-	50	-	50	150
204186	Electronic Measuring Instruments & Tools	1	-	2	-	50	-	-	-	50
	Total	20	2	8	250	100	100	50	250	750
SEMESTER-II										
Subject Code	Subject	Teaching Scheme Hrs/Week			Examination Scheme					Marks
		Lect	Tut	Pr	Theory Online	Tw	Pr	Or	Theory Paper	Total
207005	Engineering Maths-III	4	1	-	50	25	-	-	50	125
204187	Integrated Circuits	3	-	2	50	-	50	-	50	150
204188	Control Systems	3	1	-	50	25	-	-	50	125
204189	Analog Communication	4	-	2	50	-	50	-	50	150
204190	Computer Organization	3	-	-	50	-	-	-	50	100
204191	Object Oriented Programming	2	-	2	-	25	-	50	-	75
204192	Soft Skills	1	-	2	-	25	-	-	-	25
	Total	20	2	8	250	100	100	50	250	750

Dr. D S Bormane
Chairman, BOS(Electronics)
University of Pune, Pune

University of Pune

Structure for Mechanical Engineering with effect from academic year 2013 – 14

S. E. (Mechanical) and S. E. (Automobile) Semester – I

Code	Subject	Teaching Scheme (Weekly Load in hrs)			Examination Scheme (Marks)					
		Lect.	Tut	Practical	Theory		TW	PR	OR ⁺	Total
					Paper	Online				
207002	Engineering Mathematics – III*	4	1	--	50	50	25 ⁺⁺	--	--	125
202041	Manufacturing Process-I	3	--	--	50	50	--	--	--	100
202042	Computer Aided Machine Drawing*	1	--	2	--	--	--	50	--	50
202043	Thermodynamics*	4	--	2	50	50	--	--	50	150
202044	Material Science	3	1	--	50	50	25 ⁺⁺	--	--	125
202045	Fluid Mechanics	3	--	2	50	50	--	--	50	150
202046	Workshop Practice II	--	--	2	--	--	25	--	--	25
202047	Soft Skills			2	--	--	25	--	--	25
Total of Semester – I		18	2	10	250	250	100	50	100	750

+ Under Oral head, examination should be based on term work completed during practical and theory syllabus

++ Term work marks should be based on term work completed in tutorial sessions

S. E. (Mechanical) and S. E. (Automobile) Semester – II

Code	Subject	Teaching Scheme (Weekly Load in hrs)			Examination Scheme (Marks)					
		Lect.	Tut	Practical	Theory		TW	PR	OR ⁺	Total
					Paper	Online				
202048	Theory of Machines-I*	4	--	2	50	50	25 ^{\$}	--	--	125
202049	Engineering Metallurgy	3	--	2	50	50	--	--	50	150
202050	Applied Thermodynamics	4	--	2	50	50	25	--	50	175
202051	Strength of Materials*	3	--	2	50	50	--	--	50	150
203152	Electronics and Electrical Engineering*	4	--	2	50	50	25	--	--	125
202053	Machine Shop-I	--	--	2	--	--	25	--	--	25
Total of Semester – II		18	--	12	250	250	100	--	150	750

+ Under Oral head, examination should be based on term work completed during practical and theory syllabus

\$ Common Oral will be based on both TOM-I and TOM-II term work at end of First Semester of T.E.

* Subjects Common with Mechanical Sandwich