

*Progressive Education Society's*  
**Modern College of Arts, Science and  
Commerce,**  
Shivajinagar, Pune 5  
(An Autonomous College Affiliated to Savitribai Phule Pune University)

## **Framework of Syllabus**

**For M.Sc. Electronic Science**

**(2019-20 Course)**

**(with effect from 2019-20 )**

**CIA:** Continuous Internal Evaluation

**Semester 1 (Part 1)**

Course Type	Course Code	Course / Paper Title	Hours / Week	Credit	CIA	End Sem Exam	Total
CCT-1	19ScEleP101	Analog Circuit Design and Analysis	04	04	50	50	100
CCT-2	19ScEleP102	Mathematical Methods and Network analysis.	04	04	50	50	100
CCT-3	19ScEleP103	Foundation of Semiconductor Devices and Circuits	04	04	50	50	100
CCT-4	19ScEleP104	Advanced 'C' Programming	04	04	50	50	100
CCP-1	19ScEleP105	Hardware Practical	04	04	50	50	100
AECCT-1	19CpCysP101	Cyber Security-I	1	1	-	-	25
AECCT-2	19CpHrtP102	Human Rights-I	1	1	-	-	25
<b>Total Credits</b>			-	<b>22</b>			

**Semester 2 (Part 1)**

Course Type	Course Code	Course / Paper Title	Hours / Week	Credit	CIA	End Sem Exam	Total
CCT-5	19ScEleP201	Digital System Design	04	04	50	50	100
CCT-6	19ScEleP202	RF & Microwave Technology	04	04	50	50	100
CCT-7	19ScEleP203	Instrumentation and Measurement Techniques	04	04	50	50	100
CCT-8	19ScEleP204	Hardware Practical	04	04	50	50	100
CCP-3	19ScEleP205	Software Practical	04	04	50	50	100
AECCT-3	19CpCysP201	Cyber Security-I	1	1	-	-	25
AECCT-4	19CpHrtP202	Human Rights-I	1	1	-	-	25
<b>Total Credits</b>			-	<b>22</b>			

**Semester 3 (Part 2)**

Course Type	Course Code	Course / Paper Title	Hours / Week	Credit	CIA	End Sem Exam	Total
CCT-9	19ScEleP301	PIC Microcontroller	04	04	50	50	100

CCP-4	19ScEleP302	Electronic Science Practical 4	04	04	50	50	100
CCP-5	19ScEleP303	Electronic Science Practical 5	04	04	50	50	100
DSET-1	19ScEleP304	ARM and RTOS	04	04	50	50	100
DSET-2	19ScEleP305	Digital Signal Processing	04	04	50	50	100
DSET-3	19ScEleP306	Digital Image and Video Processing	04	04	50	50	100
DSET-4	19ScEleP307	Electronics and Computer Architecture	04	04	50	50	100
AECCT-	19CpCysP301	Cyber Security-III	1	1	-	-	25
AECCT-	19CpSkdP302	Skill Development-I	2	2	-	-	50
<b>Total Credits</b>			-	<b>31</b>			

#### Semester 4 (Part 2)

Course Type	Course Code	Course / Paper Title	Hours / Week	Credit	CIA	End Sem Exam	Total
CCT-9	19ScEleP401	Automatic Control Systems	04	04	50	50	100
CCP-6	19ScEleP402	Electronic Science Project	04	04	50	50	100
DSET-5	19ScEleP403	Industry 4.0	04	04	50	50	100
DSET-6	19ScEleP404	Communication English	04	04	50	50	100
DSET-7	19ScEleP405	Robotics	04	04	50	50	100
DSET-8	19ScEleP406	Automotive Electronics	04	04	50	50	100
DSET-9	19ScEleP407	Industrial Applications and Machine Learning					
AECCT-	19CpCysP401	Cyber Security-III	1	1	-	-	25
AECCT-	19CpSkdP402	Skill Development-I	2	2	-	-	50
<b>Total Credits</b>			-	<b>27</b>			