

**SARDAR PATEL UNIVERSITY**  
**Programme & Subject: M.Sc (Physics)**  
**Semester: III**  
**Syllabus with Effect from: June - 2014**

Course Type	Course Code	Name Of Course	Theory/Practical	Credit	Contact Hrs/Week	Exam Duration in hrs	Component of Marks		
							Internal Total/Passing	External Total/Passing	Total Total/Passing
Core Course	PS03CPHY01	Quantum Mechanics - II	Theory	4	4	3	30/10	70/28	100/40
	PS03CPHY02	Nano-Science & Thin-Film Physics	Theory	4	4	3	30/10	70/28	100/40
Elective Course (Any One) (Specialization)									
Condensed Matter Physics (CMP)	PS03EPHY01	Crystallography & Materials Science	Theory	4	4	3	30/10	70/28	100/40
	PS03EPHY02	Magnetic & Optical Properties in Condensed Matter	Theory	4	4	3	30/10	70/28	100/40
	PS03EPHY09	Practical & Project Work – I	Practical	4	12 Hrs	3	30/10	70/28	100/40
	PS03EPHY10	Practical & Project Work – II	Practical	4	12 Hrs	3	30/10	70/28	100/40
	PS03EPHY17	Viva-Voce (CMP)		1	1	--	--	50/20	50/20
Electronics & Communication (E & C)	PS03EPHY03	Microwave Communication; Electronics & Technology	Theory	4	4	3	30/10	70/28	100/40
	PS03EPHY04	Microprocessors; Programming, Interfacing & App.	Theory	4	4	3	30/10	70/28	100/40
	PS03EPHY11	Practical & Project Work – I	Practical	4	12 Hrs	3	30/10	70/28	100/40
	PS03EPHY12	Practical & Project Work – II	Practical	4	12 Hrs	3	30/10	70/28	100/40
	PS03EPHY18	Viva-Voce (E & C)		1	1	--	--	50/20	50/20
Theoretical & Computational Physics (TCP)	PS03EPHY05	Theoretical Physics – I	Theory	4	4	3	30/10	70/28	100/40
	PS03EPHY06	Computational Physics - I	Theory	4	4	3	30/10	70/28	100/40
	PS03EPHY13	Practical & Project Work – I	Practical	4	12 Hrs	3	30/10	70/28	100/40
	PS03EPHY14	Practical & Project Work – II	Practical	4	12 Hrs	3	30/10	70/28	100/40
	PS03EPHY19	Viva-Voce (TCP)		1	1	--	--	50/20	50/20
Energy Science & Technology (EST)	PS03EPHY07	Solar Energy & Geothermal Energy	Theory	4	4	3	30/10	70/28	100/40
	PS03EPHY08	Wind Energy & Ocean Energy	Theory	4	4	3	30/10	70/28	100/40
	PS03EPHY15	Practical & Project Work – I	Practical	4	12 Hrs	3	30/10	70/28	100/40
	PS03EPHY16	Practical & Project Work – II	Practical	4	12 Hrs	3	30/10	70/28	100/40
	PS03EPHY20	Viva-Voce (EST)		1	1	--	--	50/20	50/20

