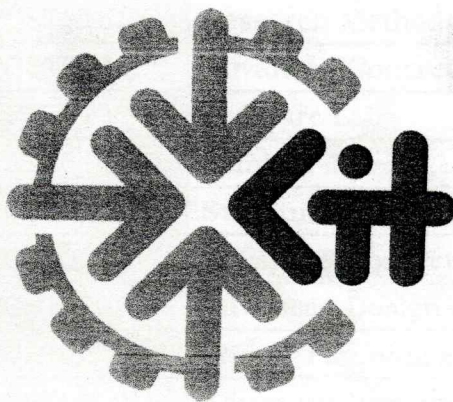


Kolhapur Institute of Technology's

# **COLLEGE OF ENGINEERING (AUTONOMOUS),**

Gokul Shirgaon, Kolhapur



KOLHAPUR INSTITUTE  
OF TECHNOLOGY'S  
**COLLEGE OF  
ENGINEERING  
(AUTONOMOUS),  
KOLHAPUR**

## **Curriculum Structure**

**For**

**M.Tech.**

**Civil and Structural Engineering**

**Post Graduate Programme**

*Approved in Academic Council (Date: 06.02.2021)*



*M.A. Chavan*  
9.02.2021  
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Teaching and Evaluation scheme for M.Tech. First Year Semester –I

Sr. No	Curriculum Component	Course Code	Course	Teaching Scheme				Evaluation Scheme			
				L	T	P	Credit	Component	Marks		
									Max	Min for Passing	
1	PC	PCST 0101	Advanced Solid Mechanics	3	1	0	4	ISE-I	10	20	40
								ISE-II	10		
								MSE	30		
								ESE	50		
2	PC	PCST 0102	Advanced Structural Analysis	3	1	0	4	ISE-I	10	20	40
								ISE-II	10		
								MSE	30		
								ESE	50		
3	PC	PCST 0103	Advanced Concrete Structures Design	3	0	0	3	ISE-I	10	20	40
								ISE-II	10		
								MSE	30		
								ESE	50		
4	PE	PCST 01**	Professional Elective I*	3	1	0	4	ISE-I	10	20	40
								ISE-II	10		
								MSE	30		
								ESE	50		
5	PE	PCST 01**	Professional Elective II*	3	1	0	4	ISE-I	10	20	40
								ISE-II	10		
								MSE	30		
								ESE	50		
6		PCST 0161	Research Methodology (Audit Course)	2	0	0	0	ESE	100		40
7	PC	PCST 0131	Advanced Concrete Structures Design Lab.	0	0	2	1	ISE	50		20
								ESE OE	50		20
8	PC	PCST 0132	Software Lab	0	0	4	2	ISE	50		20
								ESE OE	50		20
9	PW	PCST 0141	Seminar-I	0	0	2	1	ISE	100		40
			<b>Total</b>	<b>17</b>	<b>4</b>	<b>8</b>	<b>23</b>	<b>Total Contact Hrs</b>			<b>29</b>

**Teaching and Evaluation scheme for M.Tech. First Year Semester –II**

Sr. No	Curriculum Component	Course Code	Course	Teaching Scheme				Evaluation Scheme			
				L	T	P	Credit	Component	Marks		
									Max	Min for Passing	
1	PC	PCST 0201	Structural Dynamics and Earthquake Engineering	3	1	0	4	ISE-I	10		40
								ISE-II	10		
								MSE	30		
								ESE	50	20	
2	PC	PCST 0202	Advanced Concrete Technology	3	1	0	4	ISE-I	10		40
								ISE-II	10		
								MSE	30		
								ESE	50	20	
3	PC	PCST 0203	Advanced Design of Steel Structures	3	1	0	4	ISE-I	10		40
								ISE-II	10		
								MSE	30		
								ESE	50	20	
4	PE	PCST 02**	Professional Elective III*	3	1	0	4	ISE-I	10		40
								ISE-II	10		
								MSE	30		
								ESE	50	20	
5	PE	PCST 02**	Professional Elective IV*	3	1	0	4	ISE-I	10		40
								ISE-II	10		
								MSE	30		
								ESE	50	20	
6		PCST 0261	Cost Management (Audit Course)	2	0	0	0	ESE	100		40
7	PC	PCST 0231	Advanced Design of Steel Structures Lab.	0	0	4	2	ISE	50		20
								ESE OE	50		20
8	PW	PCST 0232	Mini Project	0	0	4	2	ISE	50		20
								ESE OE	50		20
9	PW	PCST 0241	Seminar-II	0	0	2	1	ISE	100		40
			<b>Total</b>	<b>17</b>	<b>5</b>	<b>10</b>	<b>25</b>	<b>Total Contact Hrs</b>			<b>32</b>

Teaching and Evaluation scheme for **M.Tech. First Year Semester –III**

Sr. No	Curriculum Component	Course Code	Course	Teaching Scheme				Evaluation Scheme		
				L	T	P	Credit	Component	Marks	
									Max	Min for Passing
1	PW	PCST 0341	Internship	0	0	0	2	ISE-1	50	20
2	PW	PCST 0351	Dissertation Phase-I	0	0	5	2	ISE-I	50	60
							4	ISE-II	100	
3	PW	PCST 0352	Dissertation Phase-II	0	0		4	ESE (OE)	100	40
			<b>Total</b>	<b>0</b>	<b>0</b>	<b>5</b>	<b>12</b>	<b>Total Contact Hrs/Week/Student</b>		<b>5</b>

**Important Note:**

Internship should be completed after Semester-II and before End Semester Examination of Semester-III. Minimum duration of internship should not be less than 16 weeks.



Teaching and Evaluation scheme for **M.Tech. First Year Semester –IV**

Sr. No	Curriculum Component	Course Code	Course	Teaching Scheme				Evaluation Scheme		
				L	T	P	Credit	Component	Marks	
									Max	Min for Passing
2	PW	PCST 0451	Dissertation Phase-III	0	0	6	4	ISE-I	100	80
							4	ISE-II	100	
3	PW	PCST 0452	Dissertation Phase-IV	0	0		8	ESE (OE)	200	80
			<b>Total</b>	<b>0</b>	<b>0</b>	<b>6</b>	<b>16</b>	<b>Total Contact Hrs/Week/Student</b>		<b>6</b>

## LIST OF PROFESSIONAL ELECTIVES

### Semester - I

Sr No	Course Code	Professional Elective I
1	PCST0121	Earth Retaining Structures And Soil Improvement
2	PCST0122	Advanced Construction Techniques
3	PCST0123	Repairs and Rehabilitation of Structures
Sr No	Course Code	Professional Elective II
1	PCST0126	Design of RCC Bridges
2	PCST0127	Theory of plates and Shells
3	PCST0128	Advanced Design of Foundation

### Semester - II

Sr No	Course Code	Professional Elective III
1	PCST0221	Project Planning and Scheduling
2	PCST0222	Advanced Numerical Methods
3	PCST0223	Digital Cartography, Remote Sensing And GNSS
Sr No	Course Code	Professional Elective IV
1	PCST0226	Advanced Prestressed Concrete
2	PCST0227	Tall Building Structures
3	PCST0228	Finite Element Method

### Program Credits Distribution

Curriculum Component	Credits
Professional Courses	27
Professional Electives	16
Seminar/Mini Project/Internship/Project	33
<b>Total</b>	<b>76</b>

