

SCHOOL OF ENGINEERING AND TECHNOLOGY SRI PADMAVATI MAHILA VISVAVIDYALAYAM TIRUPATI – 517 502

B. Tech Degree Programme (CBCS) Regulations-2020

(For Regular and Lateral Entry Students)

(To come into effect from the batch admitted in academic year 2020-2021)

CHOICE-BASED CREDIT SYSTEM (CBCS)

(In accordance with AICTE Model Curriculum)

1. PREAMBLE

B.Tech Degree Programme offered by the School of Engineering and Technology has duration of four academic years with each academic year being divided into two consecutive semesters. The academic year starts usually in June/July of every year with an odd semester followed by an even semester in December/January. Choice-Based Credit System (CBCS) is a flexible system of learning and enables students choose elective courses from a large pool of prescribed elective courses. The electives prescribed may be from the Department offering the Programme or from other Departments. Provision also exists for choosing open electives. For every course, learning objectives and learning outcomes are defined following a systematic procedure. A course comprises of lectures/tutorials/laboratory work/field work/project work/viva/seminars/ assignments /presentations/self-study, etc. or a combination of some of these. Under the CBCS, every course has certain weight defined in terms of the number of credits. The requirement for awarding a degree is prescribed in terms of number of credits to be completed by the students.

2. MINIMUM QUALIFICATION FOR ADMISSION INTO B.TECH PROGRAMME

A pass in intermediate examination conducted by the Board of intermediate examination of Andhra Pradesh with Mathematics, Physics and Chemistry as compulsory subjects or any equivalent examination recognized by AICTE/Sri Padmavati Mahila Visvavidyalayam and obtained at least 45% marks (40% in case of SC/ST Students) in the above subjects taken together. Students with Diploma Qualification from an AICTE approved institution with at least 45% (40% in case of SC/ST Students) can also be admitted into II Year B.Tech in respective branches and are referred as Lateral Entry Students (LES).

3. BRANCHES OF STUDY

The branches of study in B.Tech degree programme currently offered are:

- Computer Science and Engineering (Code: 71)
- Electronics and Communication Engineering (Code: 72)
- Electrical and Electronics Engineering (Code: 75)
- Mechanical Engineering (Code: 76)

4. SEMESTER

Generally, each semester shall consist of 18 weeks with a typical academic work of 30 hours/week, equivalent to 90 actual instruction days. However, instructional days may be reduced up to 72 per semester with increased instructional hours per week, if required.

5. CREDIT DEFINITION

It is a unit by which the course work is measured. It determines the number of hours of instructions required per week per semester. The following definitions are adopted:

Lecture/Tutorial - 1 hour/week = 1 Credit Practical - 2 hours/week = 1 Credit

A Course comprises of one or more credits depending on the quantum of syllabus to be covered in the course. A B.Tech programme comprises of basic courses (basic sciences and engineering sciences), core courses and elective courses (professional electives and open electives), skill oriented courses, mandatory courses and internships.

6. COURSE REGISTRATION

Every student has to register for the set of Courses offered by the Department in that Semester including those of Open Elective course offered by other Departments and MOOC courses with the total number of their Credits being limited by considering the permissible weekly contact hours (typically:30/Week). Audit/Mandatory courses are over and above these courses/credits.

7. CREDITS REQUIRED FOR THE AWARD OF DEGREE

A student shall become eligible for the award of B.Tech degree, if the student earns a minimum of 163 (123 credits for lateral entry students) credits by passing all the basic, core and elective courses, skill oriented courses, internships, mandatory courses along with practical courses prescribed for the B. Tech programme.

- 7.1. A student can do more than 163 credits and the best 163 credits will be considered for CGPA (If a student gets more than 163 credits, reduction of any course reduces the number of credits to less than 163, then CGPA calculation is based on the credits (greater than 163) obtained).
- **7.2.** There shall be mandatory induction program for freshers, with 3 weeks duration before commencement of the first semester. Physical activity, creative arts, universal human values, literary, proficiency modules, lectures by eminent people, visits to the local areas, familiarization to the department, branch and life-skill education shall be included.
- **7.3.** All undergraduate students shall register for NCC/NSS activities. A student is required to participate in an activity for 2 hours in a week during 2nd and 3rd semesters. Grade shall be awarded as satisfactory/unsatisfactory in the marks sheet on the basis of participation, attendance and performance. If a student gets unsatisfactory grade, she shall repeat the above activity in the subsequent years in-order to fulfil the degree requirements.
- **7.4.** It is mandatory for a student to complete successfully all the basic and core courses pertaining to her branch of study.

- **7.5.** A student shall choose elective courses from the list of elective courses prescribed by the department pertaining to her branch of study. Further, she may choose elective courses offered by other engineering departments or on MOOCs platform. For every programme, the list of elective courses may be divided into the following types:
 - **7.5.1. Professional Electives** prescribed by the department The courses being prescribed as electives by the department or the courses on MOOCs platform.
 - **7.5.2.Open Electives** The courses offered by other departments or the courses on MOOCs platform.
- **7.6.** Every student is required to take certain prescribed minimum number of professional electives and open electives.
- **7.7.** In addition to the above, a student is required to complete the prescribed mandatory courses. There are no credits assigned for the mandatory courses.
- **7.8.** A student may audit a course of her interest with the permission of the teacher concerned. However, such credits are not considered as a part of the mandatory credits.
- **7.9.** There are **five skill-oriented courses** each of 2 credits starting from 2nd year. The student should earn 10 skill credits.
- **7.10.** Student shall undergo **two summer internships** for a minimum of 6 weeks duration each at the end of the 2^{nd} and 3^{rd} year of the programme.
- **7.11.** In the **final semester**, the student should undergo **internship** and in parallel she should work on the project with well-defined objectives.

8. CURRICULUM FRAMEWORK FOR SKILL ORIENTED COURSES

- **8.1.** B.Tech curriculum will have 10 credits for skill Oriented Courses and 153 credits for other courses totalling 163 credits.
- **8.2.** There are five skill-oriented courses each of 2 credits starting from 2nd year.
- **8.3.** Out of the five skill courses two shall be skill-oriented courses from the same domain and shall be completed in second year. Of the remaining 3 skill courses, one shall necessarily be a soft skill course and the remaining 2 shall be skill-advanced courses either from the same domain or Job oriented skill courses, which can be of inter disciplinary nature.
- **8.4.** The skill oriented/skill advanced course can be either theory or practical or both as per the decision of concerned BoS.
- **8.5.** A pool of interdisciplinary job-oriented skill courses shall be designed by a common Board of studies by the participating departments/disciplines and the syllabus along with the prerequisites shall be prepared for each of the laboratory infrastructure requirements. The list of such courses shall be included in the curriculum structure of each branch of Engineering, so as to enable the student to choose from the list.
- **8.6.** The student shall be given an option to choose either the skill courses being offered by the college or to choose a certificate course of a minimum of 8 weeks or 30 hours duration being offered by industries/Professional bodies/APSSDC or any other accredited bodies as approved by the concerned department.
- **8.7.** The Board of studies of the concerned discipline of Engineering shall review the skill advanced courses being offered by eligible external agencies and prepare a fresh list every year incorporating latest courses based on industrial demand.
- **8.8.** If a student chooses to take a Certificate Course offered by industries/Professional bodies/APSSDC or any other accredited bodies, in lieu of the skill advanced course offered by the Department, the credits shall be awarded to the student upon producing the Course

- Completion Certificate along with grade or marks obtained from the agency/professional bodies as approved by the concerned department.
- **8.9.** If a student prefers to take a certificate course offered by external agency, the department shall mark attendance of the student for the remaining courses in that semester excluding the skill course in all the calculations of mandatory attendance requirements upon producing a valid certificate as approved by the concerned Board of Studies, the student is deemed to have fulfilled the attendance requirement of the course and acquire the credits assigned to the course.
- **8.10.** A committee shall be formed at the level of the college to evaluate the grades/marks given for a course by external agencies and convert to the equivalent marks/grades. The recommended conversions and appropriate grades/marks are to be approved by the concerned head of the department.

9. HONORS/MINOR PROGRAMME (20 CREDITS)

- **9.1.** These programmes are purely optional.
- **9.2.** Students can choose either Honors or Minor Programme in addition to the major programme, but not both.
- **9.3.** Students of a Department/Discipline are eligible to opt for Honors Programme offered by the same Department/Discipline (Refer Appendix -1).
- **9.4.** Students of a Department/Discipline are eligible to opt for Minor Programme offered by the other Department/Discipline (Refer Appendix 2).

10. SCHEME OF INSTRUCTION

The various courses to be studied semester wise and the corresponding syllabus along with the credits are indicated in the scheme of instruction.

- **10.1.** The Joint-Board of Studies (JBoS) shall formulate the scheme of instruction and examinations, and detailed syllabi for the first and second semesters for all the branches of study.
- **10.2.** The Board of Studies (BoS) of each Department shall formulate the scheme of instruction and examinations, and detailed syllabi for the subsequent six semesters of B.Tech Programme taking into account of the credits offered in the first and second semesters. The detailed syllabus of each theory course shall be organized into five units of equal weight.

11. COURSE CODING SCHEME

Each course code is denoted by seven alpha-numerals.

First two digits indicates the year of	20
introduction of Regulations	
Code of the department offering the	CS: Computer Science and Engineering
Course	EC: Electronics and Communication Engineering
	EE: Electrical and Electronics Engineering
	ME: Mechanical Engineering
	BS: Basic Sciences and Humanities
Nature of course	T: Theory

	P: Practical	
	J: Project Work	
	I: Internship	
	S: Skill Oriented	
	M: MOOCs/Online	
Course Number	01, 02,	

12. STRUCTURE OF CURRICULUM

Curriculum should consist of a good mix of Basic, Core and Elective courses. The break-up of various types of courses and percentage of credits offered are shown in below table.

Practicals include Laboratory/Drawing/Workshop practice/Seminars/Project Work

S.No	Broad Course Classification	Course Group/Category	Course Description	Range of Credits	
1		BS-Basic	Include-Mathematics, Physics,	10% - 15%	
		Sciences	Chemistry courses		
2		ES-Engineering	Include Fundamental	15% - 20%	
	Basic Courses	Sciences	engineering courses	1070 2070	
		HS-Humanities,	Include courses related to		
3		Social Sciences	Humanities, Social Sciences and	8% - 10%	
		and Management	Management		
		DG D G : 1	Include core courses related to		
4	Core Courses	PC-Professional	the concerned Department	25% - 35%	
		Core	/Branch of Engineering.		
			Include Elective courses related		
5		PE-Professional Electives	to the concerned Department	10% - 15%	
	Elective		/Branch of Engineering.	1070 1270	
	Courses		Elective courses include courses		
6	Courses	OE-Open Electives	OE-Open from other technical and /or		5% - 10%
0				3/0 - 10/0	
			Emerging Subject Areas		
7	Project Work	Project Work	Project Work	5% - 10%	
8	Skill Oriented	SC	Skill Oriented Courses	5% - 10%	
	Courses	~ ~		270 1070	
9	Mandatory	MAN	Mandatory Courses	Non-Credit	
	Courses	1417.71.4	ivialidatory Courses	Non-Credit	
10	Additional	ONLINE Courses	Offered by IITs/MOOCS	Optional	
10	Courses	ONLINE COURSES		Ориона	
Total	Total Credits for UG (B.Tech) Programme				

Theory Courses	70% – 75%
Practical Courses	25% - 30%

13. DURATION OF THE PROGRAMME

Minimum duration for the completion of the programme is 4 years and the maximum duration is 8 years, while it is 3 years and 6 years for lateral entry students respectively.

14. ATTENDANCE REQUIREMENTS

- **14.1.** A student is required to complete the study of B.Tech Programme satisfying the attendance requirements in all the semesters within a period of eight (six for lateral entry) academic years from the year of admission to become eligible for the award of B.Tech degree failing which she forfeits her seat.
- **14.2.** Normally a student should put in 100% of attendance. However, relaxation may be given up to 25% for attending to personal needs/co-curricular activities (Seminars/Conferences/workshops/hackathon, etc.) and extra-curricular activities (Sports/games/NCC/NSS, etc.)
- **14.3.** A student shall be detained in a semester if she fails to satisfy the attendance requirements as given below.
 - **14.3.1.** A student shall attend at least 75 percent of the hours of instruction taken for all the courses put together in that Semester.
 - **14.3.2.** A student shall attend at least 50 percent of the hours of instruction for each course.
- **14.4.** The principal shall condone the shortage of attendance (for reasons beyond the control of the student, Example: Health reasons) provided she satisfies the clause 14.3.2 and obtains at least 65% of overall attendance for all the courses put together in that semester.
- **14.5.** A student who fails to satisfy the attendance requirements specified in clauses 14.3 and 15.4 will be detained and she shall repeat that semester in the subsequent academic years with the written Permission of the Principal subject to the clause 14.1. A Student will not be promoted to the next semester /Year if she is detained in a semester. This clause is not applicable for mandatory courses.
- **14.6.** A student shall not be permitted to study any semester more than three times during the entire programme of study.
- **14.7.** A student who satisfies the attendance requirements specified in either of the clauses 14.3 and 14.4 in any semester may be permitted to repeat that semester by cancelling the previous attendance and sessional marks of that semester with the written permission of the Principal. However, this facility shall not be extended to any student more than twice during the entire programme of study as specified in clause 14.1.
- **14.8.** Gap year(s) shall be over and above maximum period of eight (six for lateral entry students) academic years (see clause 22).
- **14.9.** Maternity leave shall be granted only once during the entire programme. Such candidates have to put-up a minimum of 45% attendance course-wise and a minimum aggregate of 45%.

15. EVALUATION

15.1. Evaluation for theory courses shall be done on a continuous basis i.e. through Continuous Internal Evaluation (CIE) in the Semester and Semester End Examination (SEE).

- **15.1.1.** Continuous internal evaluation comprises two sessional tests of two hours duration each and at least two assignments. It is mandatory for a student to attend both the sessional tests in each theory course.
 - **15.1.1.1.** Sessional Test I shall be held in the middle of the semester i.e. after the completion of 50% of actual instruction days and generally after completing 50% of the syllabus. Sessional Test I will be for 25 marks and 5 marks for first assignment.
 - **15.1.1.2.** Sessional Test II shall be held immediately after the completion of instructional days. Sessional Test II will be for 25 marks and 5 marks for second assignment.
- **15.1.2.** Sessional marks for a maximum of 30 shall be awarded based on the performance of the two sessional tests and two assignments. If a student is absent for any of the internal test/assignment for whatsoever reason, the marks for that test/assignment shall be zero. The sessional marks calculation procedure is shown in Table 1.

Table 1: Sessional marks calculation procedure

Sessional – I	ssional – I (30 Marks) Sessional		II (30 Marks)	Internals (30 Marks)
Test	Assignment	Test	Assignment	0.8*(max(Sessional – I, Sessional – II)) +
(25 Marks)	(5 Marks)	(25 Marks)	(5 Marks)	0.2*(min(Sessional – I, Sessional – II))

- 15.1.3. The Semester end examination shall be conducted by the controller of Examinations. The Semester End Examination will be for 3 hours duration carrying 70 marks which will be conducted by the university. Each external theory paper will have a maximum of 70 marks. A student has to obtain a minimum of 35% i.e., 25 marks out of 70 marks to pass that examination. Also, the student has to obtain a minimum of 40 marks out of 100 (University examination + sessional marks put together) to pass in the corresponding paper.
- **15.2.** For each practical course except project work, the sessional marks for a maximum of 40 shall be awarded by the teacher concerned based on the continuous assessment of practical work followed by an internal practical examination. The continuous assessment will be for 20 marks and internal practical examination will be for 20 marks.
- **15.3.** A Semester End Examination in each Practical course shall be conducted after the last working day of the semester covering the entire syllabus prescribed for that course.
 - **15.3.1.** A Semester End Examination of 3 hours duration carrying 60 marks will be conducted by the university.
 - **15.3.2.** The examination shall be held by two teachers: one external examiner and one internal examiner appointed by the Principal. The principal shall appoint the internal examiner nominated by the Head of the Department (HoD) concerned. The Principal shall appoint the external examiner from among the panel of examiners recommended by the BoS, Chairman concerned. The panel of examiners shall be approved by the university.
 - **15.3.3.** A student has to obtain a minimum of 35% i.e., 21 marks out of 60 marks to pass that examination. Also, the student has to obtain a minimum of 40 Marks out of 100 (**University examination + sessional marks** put together) to pass in the corresponding paper.
- **15.4.** The evaluation of the project work is carried out as shown in Table 2.

Table 2: Evaluation process for the project work

S.No	Course Title	de Semester	Credits	Internal Evaluation		External Evaluation	Total						
5.110	Course Title		Semester	Semester	Semester	Semester Cre	Semester	Semester	Schiester	Credits	Guide	Internal	External
					Committee	committee							
1	Project Work	8	13	20	20	60	100						

The internal committee consists of HoD and two faculty from the corresponding department. The external committee consists of one external examiner and two internal examiners from the corresponding department. The internal examiners shall be the head of the department and the senior faculty. The HoD shall be the chairman and convener of the committee. The principal shall appoint the external examiner from the panel of examiners recommended by the BoS, Chairman concerned. The panel of examiners shall be approved by the university. The student shall get a minimum of 35% in external evaluation and should get at least 40% marks in both internal and external marks put together.

- 15.5. Student shall undergo two summer internships for a minimum of 6 weeks duration each at the end of the 2nd and 3rd year of the programme. A student has to submit Internship completion report along with the certificate issued by the industry/appropriate body. Summer Internship evaluation shall be done by the internal committee of the respective department for 100 marks during the subsequent semester. HoD and two senior faculty nominated by HoD comprises the internal committee. A student should get a minimum of 40 marks out of 100 to pass.
- 15.6. In the final semester, the student should undergo internship and in parallel she should work on the project with well-defined objectives. At the end of the semester, the student shall submit an internship completion certificate and a project report. A student shall also be permitted to submit the project work report on the work carried out during the internship. The project work shall be evaluated in accordance with clause 15.4. Completion of internship is mandatory. If any student fails to complete the internship, she will not be eligible for the award of the degree. In such cases, the student shall repeat and complete the internship.
- **15.7.** Evaluation of the mandatory courses shall be done by the internal faculty who is teaching the course for 30 marks and 70 marks as attendance percentage. The result shall be given as satisfactory (Minimum pass grade, P)/unsatisfactory (Fail, F) in marks memo. If the student obtains unsatisfactory grade, she should repeat the course.
- **15.8.** The students shall be permitted to verify the evaluated answer scripts of Sessional tests only.
- **15.9.** The evaluation and verification of answer scripts of Sessional Tests shall be completed within a week after the conduct of the Sessional Tests.
- **15.10.** The evaluation of Semester End Examination answer scripts shall be arranged by the Controller of Examinations as per the University procedures in vogue.

16. MASSIVE OPEN ONLINE COURSE (MOOCS)

- **16.1.** A student has to do at least one MOOC course
- **16.2.** MOOC course need to be approved by the corresponding department

- **16.3.** If any student fails in MOOCs, the same course can be repeated or any another MOOC can be taken
- 16.4. Only courses in Swayam or NPTEL are permitted
- **16.5.** MOOC Course should not be a repetition course from B. Tech curriculum
- **16.6.** The duration of 3 Credit course carried out under MOOC platform need to be 8 to 12 weeks.
- **16.7.** The duration of 2 Credit course carried out under MOOC platform need to be mandatorily 8 weeks.
- **16.8.** The marks obtained in MOOC course will be mapped to corresponding SPMVV marks and grades.
- **16.9.** Additionally, if required, one credit may be awarded for the courses carried out under MOOC platform if the duration is at least 8 weeks.

17. QUESTION PAPER SETTING

- **17.1.** All the question papers setting, both for sessional tests and semester end examination shall be generally based on Bloom's Taxonomy.
- **17.2.** Model Question Paper for each theory course shall be prepared by the teacher within 30 days from the commencement of the Semester and the same shall be forwarded to the Controller of Examinations through the Head of the department concerned.
- 17.3. For each theory course, the question paper shall be set by an external paper setter. The head of the department shall recommend a panel comprising at least six external paper setters for each theory course to the University. The University shall arrange for setting the question paper by appointing external paper setter from that panel.

18. GRADING AND GRADE POINTS

- **18.1.** Grade Point: It is a numerical weight allotted to each letter grade on a 10-point scale
- **18.2.** Letter Grade: It is an index of the performance of students in a said course. Grades are denoted by letters O, A, B, C, D, P and F.
- **18.3. Semester Grade Point Average (SGPA)**: It is a measure of performance of work done in a semester. It is the ratio of total credit points secured by a student in various courses registered in a semester and the total course credits taken during that semester. It shall be expressed up to two decimal places.
- **18.4.** Cumulative Grade Point Average (CGPA): It is a measure of overall cumulative performance of a student over all semesters. The CGPA is the ratio of total credit points secured by a student in various courses in all semesters and the cumulative sum of the credits of all courses in all the semesters. It is expressed up to two decimal places.
- **18.5.** Letter Grades and Grade Points: A 10-point grading system with the following letter grades are to be followed. A Student obtaining Grade F shall be considered failed and will be required to reappear in the examination. For non-credit courses 'Satisfactory' or 'Unsatisfactory' shall be indicated instead of the letter grade and this will not be counted for the computation of SGPA/CGPA.
- **18.6.** To pass course in B.Tech Programme, a student has to secure a minimum Grade of P in End-Semester Examination. A student obtaining Grade F shall be considered failed and will be required to reappear in the examination. A student cannot reappear for the End-Semester Examination in a course in which she has passed to improve the score. Grade, Grade points and equivalent % marks is shown in Table 3.

Table 3: Grades and Grade Points

Equivalent % marks	Letter Grade	Grade Point
90-100	O (Outstanding)	10
80-89	A (VERY Good)	9
70-79	B (Good)	8
60-69	C (Above Average)	7
50-59	D(Average)	6
40-49	P (Pass)	5
Below 40	F(Fail)	0
0	AB (Absent)	0

18.7. A student who has failed in a course can reappear for the End Semester Examination as and when it is held in the normal course. The Sessional Marks obtained by the student will be carried over for declaring the result. The class attained based on the CGPA is shown in Table 4. Equivalent pass percentage is calculated as (CGPA - 0.5) × 10

Table 4: Class attained with respect to CGPA

CLASS	CGPA	
First Class with Distinction	7.5 and Above	
First Class	Below 7.5 but not less than 6.5	
Second Class	Below 6.5 but not less than 5.5	
Pass Class	Below 5.5 but not less than 5.0	

19. COMPUTATION OF SGPA AND CGPA

19.1. Average (SGPA) and Cumulative Grade Point Average (CGPA): The SGPA is the ratio of sum of the product of the number of credits with the grade points scored by a student in all the courses taken by a student.

Sum of the number of credits of all courses undergone by a student in that semester, i.e.

$$SGPA(S_i) = \frac{\sum (C_i \times G_i)}{\sum C_i}$$

where C_i is the number of credits of the ith course and G_i is the grade point scored by the student in the ith course.

The CGPA is also calculated in the same manner considering all the courses undergone by a student over all the semesters of a programme, i.e.

$$CGPA\left(C_{i}\right) = \frac{\sum (C_{i} \times S_{i})}{\sum C_{i}}$$

Where S_i is the SGPA of the i^{th} semester and C_i is the total number of credits in that semester. The SGPA and CGPA shall be rounded off to two decimal points and reported in the transcripts.

19.2. ILLUSTRATION OF COMPUTATION OF SGPA and CGPA 19.2.1. ILLUSTRATION FOR SGPA

Course	Credit (Ci)	Grade Letter	Grade Point (Gi)	Credit Point (C _i × G _i)
Course 1	3	A	9	$3\times 9=27$
Course 2	4	В	8	$4 \times 3 = 32$
Course 3	3	В	8	$3 \times 8 = 24$
Course 4	3	О	10	$3 \times 10 = 30$
Course 5	3	С	7	$3 \times 7 = 21$
Course 6	4	С	7	$4\times7=28$
	20			162

SGPA = 162 / 20 = 8.10

19.2.2. Illustration for CGPA

Semester	Credit, Ci	SGPA, Si	(Credit, C _i) × (SGPA, S _i)
Semester 1	21	6.94	145.74
Semester 2	20	7.60	152.00
Semester 3	21	7.20	151.20
Semester 4	21	6.85	143.85
Semester 5	23	7.12	163.76
Semester 6	20	7.42	148.40
Semester 7	20	7.36	147.72
Semester 8	17	7.90	134.30
	160		1186.97

CGPA = 1186.97/163 = 7.28

20. RANKING AND AWARD OF PRIZES/MEDALS

- **20.1.** Ranks shall be awarded in each branch of study on the basis of **Cumulative Grade Point Average (CGPA)** for top ten percent of the students or top three students whichever is higher.
- **20.2.** The students who have become eligible for the award of B.Tech degree by passing regularly all the eight (six for lateral entry students) Semesters shall only be considered for the award of ranks.
- **20.3.** Award of prizes, scholarships and other honours shall be according to the rank (CGPA) secured by the student as said above and in conformity with the desire of the Donor.

21. CONDITIONS OF PROMOTION

A student shall be eligible for promotion to the next semester of B.Tech Programme provided she satisfies the attendance requirements in the immediately preceding semester as Specified in clause 14.

22. GAP YEAR

The concept of Student Entrepreneur in Residence i.e. Gap Year shall be introduced and outstanding students who wish to pursue entrepreneurship are allowed to take a break of one year at any time after completing II year of study and at any time of an academic year to pursue full time entrepreneurship. A committee shall be constituted to evaluate the proposal submitted by the student and the committee shall decide on permitting the student for having the Gap Year. Students will be permitted to rejoin into the succeeding year/ from the date of commencement of class work and will be under the academic regulations in force at that time. Gap year may be extended by another year (i.e. a total of two years) and will not be counted for the maximum period of eight (six for lateral entry students) academic years.

23. TRANSITORY REGULATIONS

- **23.1.** A student who has been detained in any semester of previous regulations for not satisfying the attendance requirements shall be permitted to join in the corresponding semester of this regulation provided the clauses 14.1 and 14.6 hold good.
- 23.2. End-semester Examinations in each course under the regulations that precede immediately these regulations shall be conducted three times after the conduct of last regular examination under those regulations. Thereafter, the failed students, if any, shall take examination in the equivalent papers of these regulations as suggested by the Chairman, BoS concerned.

24. AMENDMENT TO REGULATIONS

Sri Padmavati Mahila Visvavidyalayam reserves the right to amend these regulations at any time in future without any notice. Further, the interpretation of any of the clause of these regulations entirely rests with university.

APPENDIX – I (R20)



SCHOOL OF ENGINEERING AND TECHNOLOGY SRI PADMAVATI MAHILA VISVAVIDYALAYAM TIRUPATI – 517 502

HONORS DEGREE Regulations (2020)

(For Regular and Lateral Entry Students)
(To come into effect from the batch admitted in academic year 2020-2021)

HONORS DEGREE IN A DISCIPLINE

The main objective of Honors degree in a discipline is to provide additional and deep learning opportunities for academically motivated and bright students. Further, Honors degree is in the same discipline in which the candidate is studying for the major degree.

In order to earn an Honors degree, a student has to obtain at least 20 additional credits than the regular major degree, i.e., 163+20=183 credits. This concept of Honors Degree is an optional feature. Honors degree will be awarded if the candidate qualifies for the award of the major degree in first class with distinction and she passes the additional 20 credits with minimum CGPA of 7.0. The list of courses of the Honors degree can be studied through MOOC courses available under SWAYAM Platform or by conventional method as prescribed by the Department.

- **A1.1.** Students having a CGPA of 7.5 or above up to II year I Semester (in II year-I Semester for Lateral entry students) and without any history of backlog courses will only be permitted to register for the Honors degree.
- **A1.2.** A student registered for Honors degree should maintain a minimum CGPA of 7.5 without any backlog in each of the subsequent semesters in the major degree. Further, the student should pass the major degree in first class with distinction in order to become eligible for the award of Honors degree.
- **A1.3.** A student will not be allowed to register for more than 2 courses in any semester over and above the courses offered for major degree.
- **A1.4.** The evaluation pattern of theory and practical courses will be the same as that of the regular major degree programme.
- **A1.5.** The courses to be taken and the specialization possible for the Honors degree together with scheme and syllabus will be specified by the respective Department.
- **A1.6.** Student may enlist their choice of Honors degree from among the specializations offered for Honors degree by the Department, in order of preference. It will not be permissible to alter the choices after the application has been submitted. However, students are allowed to opt for only one specialization of the Honors degree programme in the order of preference given by them. Ultimately a student can do only one Honors degree programme.
- **A1.7.** Credits obtained in major degree cannot be transferred/counted to Honors degree and viceversa.
- **A1.8.** Minimum strength required for offering a Honors degree in a discipline is considered as 10% of the class size or 10 students, whichever is minimum.

- **A1.9.** Completion of Honors degree requires no additional time to the regular four years Bachelor's Programme. That is the Honors degree should be completed by the end of final year B. Tech programme along with the major discipline.
- **A1.10.** Students should pass the courses under Honors degree in the same semester. No supplementary examinations will be conducted for the courses in Honors Degree.
- **A1.11.** The concerned principal of the College shall arrange separate course work, time table, etc. The Regulations for major degree programme are applicable for Honors degree also with respect to attendance, examination, evaluation, results, etc.
- **A1.12.** A student has to obtain the major degree without any history of backlogs and with a minimum CGPA of 7.5 in order to earn the Honors degree.
- **A1.13.** A student registered for Honors degree in a discipline shall pass in all subjects that constitute the requirement for the Honors degree programme. No class/division shall be awarded for Honors degree programme. She should get a minimum CGPA of 7.0 for the additional 20 credits.
- **A1.14.** The Honors degree in a discipline will be mentioned in the degree certificate as Bachelor of Technology in XXX in First Class with distinction with Honors in XXX(YY). For example, Bachelor of Technology in Computer Science & Engineering in First Class with distinction with Honors in Computer Science and Engineering (Data Science). This will also be reflected in the transcripts, along with the list of courses taken for Honors degree programme with CGPA mentioned separately.
- **A1.15.** If a student discontinues the Honor degree programme or do not satisfy the CGPA criteria of Major and Honors degrees, respectively, the courses already passed under the additional 20 credits of the Honors programme will be mentioned as add-on courses in the transcripts.

APPENDIX - II (R20)



SCHOOL OF ENGINEERING AND TECHNOLOGY SRI PADMAVATI MAHILA VISVAVIDYALAYAM TIRUPATI – 517 502

MINOR DEGREE Regulations (2020) (For Regular and Lateral Entry Students)

(To come into effect from the batch admitted in academic year 2020-2021)

MINOR DEGREE IN A DISCIPLINE

Minor Degree is a concept wherein a student enrolled for a specific program (called as Major Degree) is given an additional opportunity to learn and earn a minor Degree. In order to earn a Minor degree, a student has to obtain 20 additional credits than the regular major degree, i.e., 163+20=183 credits. This concept of Minor Degree is an optional feature. The course structure of the minor Degree for the additional 20 credits will be specified by the Department offering the Minor Degree. Students can enrol for a minor Degree in a discipline other than the one in which they are pursuing the Major Degree or industry oriented minor degree in the same discipline. The list of courses of the minor Degree can be studied through MOOC courses available under SWAYAM Platform or by conventional method as prescribed by the Department.

- **A2.1.** Students having a CGPA of 6.5 or above up to II year-I semester (in II year-I Semester for Lateral entry students) and without any backlog courses will be permitted to register for Minor Degree programme.
- **A2.2.** Students should get a minimum SGPA of 6.5 in major degree semester wise in all subsequent semesters in order to continue minor degree.
- **A2.3.** Students can opt for minor degree either in the discipline other than the one in which they are pursuing the major Degree or industry oriented minor degree in the same discipline.
- **A2.4.** Students aspiring for a Minor degree must register in the IV semester.
- **A2.5.** Students will not be allowed to register and pursue more than two courses in any semester for the minor degree.
- **A2.6.** The Evaluation pattern of theory and practical courses will be similar to the major degree programme evaluation.
- **A2.7.** The courses to be taken in minor degree together with scheme and syllabus will be specified by the respective Department.
- **A2.8.** Students may enlist their choice of Minor degree programmes, in order of preference, for which they wish to register. It will not be permissible to alter the choices after the application has been submitted. However, students are allowed to opt for only one Minor degree programme in the order of preference given by them. Ultimately a student can do only one minor degree programme.
- **A2.9.** Credits obtained in major degree cannot be transferred/counted to Minor Degree and viceversa.
- **A2.10.** Minimum strength required for offering a Minor degree in a discipline is considered as 20% of the class size or 10 students, whichever is minimum.
- A2.11. Completion of a Minor degree programme requires no additional time to the regular Four-

- year Bachelors' programme. That is, Minor degree programme should be completed by the end of final year B. Tech. programme along with the major degree.
- **A2.12.** Students should pass the courses under Minor degree in the same semester. No supplementary examinations will be conducted for the courses in Minor Degree.
- **A2.13.** The concerned principal of the College shall arrange separate course work, time table, etc. The Regulations for major degree programme are applicable for minor degree also with respect to attendance, examination, evaluation, results, etc.
- **A2.14.** A student has to obtain the major degree in order to earn the minor degree.
- **A2.15.** A student registered for Minor degree in a discipline shall pass in all subjects that constitute the requirement for the Minor degree programme. No class/division shall be awarded for Minor degree programme.
- **A2.16.** The Minor degree in a discipline will be mentioned in the degree certificate as Bachelor of Technology in XXX in ZZZ Class with Minor in YYY. For example, Bachelor of Technology in **Computer Science & Engineering** in First Class with Minor in **Electronics & Communication Engineering**. This fact will also be reflected in the transcripts, along with the list of courses taken for Minor degree programme with CGPA mentioned separately.
- **A2.17.** If a student discontinues the minor degree programme, the courses already passed under the additional 20 credits of the minor programme will be mentioned as add-on courses in the transcripts.