



# **INSTITUTE POLICIES**

**SWAMI KESHVANAND INSTITUTE OF TECHNOLOGY,  
MANAGEMENT & GRAMOTHAN**

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## 1. Admission Policy

SKIT offers career oriented courses at UG, PG and Ph.D. levels in different engineering disciplines and PG course in management. The Institute is approved by AICTE and its engineering branches are accredited by NBA and IE (I) and affiliated with Rajasthan Technical University, Kota.

- Admissions to B. Tech courses are done through REAP (Rajasthan Engineering Admission Process) on the basis of JEE (Main). The eligibility criterion for admission to B. Tech course is that the candidate must have passed class 10+2 or equivalent examinations with at least 45% aggregate marks in each subject (Physics, Math and Chemistry/ Biology) from any recognized board.
- Students are also admitted through LEEP (Lateral Entry in Engineering Program). Board of Technical Education Rajasthan conducts centralized counseling for admission in 2<sup>nd</sup> year of B. Tech program on the basis of Polytechnic diploma marks or B. Sc Degree marks.
- Admission to M. Tech courses are done by Rajasthan Technical University, Kota on the basis of B.Tech and or valid GATE score.
- Admission to MBA course is done centralized on the basis of bachelor degree and / or valid CMAT score.
- Admission to Ph.D. is done in a centralized manner by Rajasthan Technical University, Kota on the basis of written test and interview.

## 2. Inspiring Academic Policy

The main objective of academic policy pursued at SKIT is to inspire students to explore innovative ideas and develop a habit for lifelong learning so as to make them successful professionals. Our curriculum has been prepared by Rajasthan Technical University to which our institute is affiliated. It has been framed on the basis of model curriculum prepared by AICTE. The curriculum has been designed to focus on higher order learning and professional skills required for the students to become innovators and successful technocrats.

The curriculum encompasses the following distinctive components-

- Compulsory Core Courses (CCCs).
- Flexible Choice Based Courses (FCBCs).

- Open Elective Courses (OECs)
- Laboratory and Project Based Courses (LPBCs)
- Internship and Industrial Tour Based Training (IITBT)

### **2.1 Efficient Teaching-learning**

At SKIT it is ensured that the students are provided with quality teaching by well qualified, experienced and knowledgeable faculty members who are equipped with an effective evidence based teaching approach that upholds the high teaching standards through strategic professional development at all levels.

- Subject wise course files are prepared which contains course scheme and syllabus, course plan & coverage, list of books required, CO-PO-PSO Mapping, Tutorial sheets, mid-term & university question papers, assignments, subject notes and handouts etc.
- As per the need prerequisites courses are discussed
- To fill the gap between curriculum and industry need expert lectures of industry and academic experts are arranged on a regular basis to share their knowledge with the faculty and students.

### **2.2 Inclusive Teaching-Learning**

At SKIT focus is on adoption of inclusive teaching approaches that deal with individual needs of the students as they come from diverse backgrounds and having different abilities. The fresher's on join the institute are provided three-week induction programme in which students are able to engage themselves actively, feel safe and welcome.

### **2.3 Experimental Learning**

- The institute has a large number of well-equipped specialized laboratories in all the academic departments where students are required to perform experiments and analyses the observed data in order to strengthen their theoretical concepts learnt during lecture classes.
- A lot of emphasis is given on project based experimental learning at the final year level. It not only enhances the practical knowledge of the students to meet the industry requirement but also help them to gain life skills.
- The students are encouraged to exhibit their projects in exhibitions held in house and also at National level competitions.

## **2.4 Project Allotment Policy**

### **2.4.1 Guidelines for Project Identification**

Two main criteria that must drive a project proposal are:

- Feasibility of the project (time, supervision, cost implication, availability of equipment and literature)
- It should satisfy course outcomes, POs and PSOs of this course.

All the projects for B. Tech. should be formulated in such a way that after completion of the project, course outcomes (mentioned below) are realized. Usually, purely software-based projects (doing design and simulation on computers only) will get low priority but in Covid-19 situation software projects also acceptable.

### **2.4.2 Guidelines for Project Allotment**

- To administer and allocate project to students, Project Coordinators are appointed by Head of the Department.
- All the faculty members and students are requested to submit to HOD two different projects according to their areas of interest.
- Submitted project proposals are checked and approved by the HOD and Project Coordinators.
- The number of projects allocated to faculty of the Department shall be limited to a maximum of two.
- The students are given choice to list 3 projects in order of priority and to submit their choices to the Project Coordinator in one-two weeks' time
- Based on students' choices, the projects are allocated by the Project Coordinators.

### **2.4.3 Guidelines for Approved Project Proposal**

The approved Project proposal comprises of following points:

- Project title:
- What will be the end product?
- Target specifications of the end product
- Objective of the project
- What will the student learn from the project?
- Specific Knowledge
- Software
- Hardware



- Hardware Interfacing
- Design
- Simulation
- Fabrication
- Assembly
- Testing
- Team members
- Resources required
- Brief description of the project:
- Motivation for taking up this project: –
- The new system (proposed in this project): –
- Methodology: (Project Implementation Details)
- References
- Activity bar chart.

## **2.5 Guidelines for Organizing Industrial Tours for Students of Engineering & Management Studies**

### **2.5.1 Objective**

The Rajasthan Technical University has made the industrial tour a part of curriculum of B. Tech. VI Semester and MBA IV Semester. The purpose of industrial tour is both educational and to make the students familiar with the industrial practices by arranging their visits to large and medium size industries. It also helps them to develop in them organizational and leadership qualities.

### **2.5.2 Guidelines**

- Each Engineering Department other than CS/IT and Management Department will organise well in advance industrial tour for their B. Tech. VI semester students and MBA IV semester students respectively. Planning should be initiated five months in advance.
- The tour should be organised preferably in February/March and the duration should not exceed seven days.
- The tour should be restricted up to the neighboring states so that much time is not lost in travel.
- The dates of tour should be so selected that they do not clash with other activities like examinations, placements etc.

- For every division two faculty members and for two divisions four faculty members should accompany the students.
- Female faculty members should also accompany the tour where female students are there. As far as possible avoid sending a single female faculty on tour.
- The names of faculty should be decided by the respective HODs in consultation with the faculty concerned about 3 to 4 months in advance. One person should be nominated as the tour incharge.
- The tour incharge will finalise the tour programme in consultation with the HOD concerned and then take the initial approval from the Principal for further actions.
- During the seven days it is expected that each student should visit five to seven well establishment large industries apart from educational visits. The industry visits must be as far as possible uniformly distributed over the entire tour duration.
- Having obtained the initial approval from the Principal the tour incharge should plan the tour programme and industrial visits in consultation with other faculty members. He may also get in touch with the established and proven tour operators for making tour arrangements. In such a situation proper negotiations should be done regarding tour details (no. of days, places to be visited) transportation facilities offered, stay arrangements, food to be served during tour, educational visits, insurance cover and total charges (inclusive of taxes etc., if any) per student. It must be made clear to the tour operator that the Institute will not bear any hidden charges or charges towards the travel, boarding and lodging of accompanying faculty members. All the negotiations with the tour operator must be done in consultation with the HOD concerned. Having done negotiations every details including terms and conditions should be obtained in writing from the tour operator. Based on this document the tour incharge should obtain the final approval from the Principal.
- The tour Incharge will contact several industries enroute the tour and obtain permission for the visits. Normally industries do not grant permission to large batches of students. Hence divide the students in three or four batches as required and ask them to visit different industries in parallel at the same place.
- The faculty members accompanying the students on tour should collect the requisite amount from the students in advance.

- Before setting out for tour, the Incharge should personally check that all the required documents (drivers' licenses, bus fitness, route permit etc.), student ID cards, first aid box etc. are there in order.
- The tour Incharge should carry with him some basic medicines and the first aid box. The contents may be finalized in consultation with the Institute's doctor.
- The faculty members accompanying the tour party should ensure that the students maintain discipline throughout the tour. Special care must be taken while visiting industries so that good lasting impression about the Institute is left on the minds of industry people.
- During the tour nobody should indulge in any unlawful activity. Strict action will be taken against those who indulge in consumption of intoxicants.
- The tour Incharge will address all the students before the commencement of the tour and explain them about all the DOs and DONTs.
- During the tour the tour Incharge at the end of each day should inform his/her HOD on phone about the day's progress.
- After the tour is concluded each student should be asked to submit a ten-page report about the visits. A questionnaire may also be given to the students by the tour Incharge for getting feedback.
- The faculty who accompanied the students should evaluate the reports and submit marks to the examination cell out of 20 as per requirements of RTU within ten days of concluding the tour.
- The tour Incharge should maintain proper records of the expenditure and submit the accounts along with the feedback report to the Principal within ten days of concluding the tour.
- The tour Incharge will also submit a list of the students who did not attend the tour along with the reason and permission granted by the respective HOD. All such students will be required to undergo additional summer training of 10 days along with the regular summer training. This will be evaluated by the tour in-charge and the marks out of 20 should be submitted to the examination cell.

## **2.6 ICT Driven Learning**

Students at SKIT have access to an on-line resource library containing lecture notes, case studies, in house recorded audio-video lectures and other learning materials such as MOOCs, E-Journals, Print Journals, Expert video lectures ie. NPTEL etc.

## **2.7 Learning and Assessment Practices**

At SKIT the number of learning and assessment practices are followed like Assignments, Case Studies, Quiz, Model Making, Projects, Surprise Tests, Mid Term Tests, Soft Skill input, Group discussions, CRT training, Internships, Seminars, Conferences, Workshops, Industry expert interactions, Industrial tours, Mock interviews etc.

## **2.8 Scientific and Transparent Evaluation System**

- To save students from commonly prevalent examination and evaluation problems the institute offers a mixed blend of external and continual internal unbiased and transparent evaluation system.
- The system consists of continual evaluation through properly structured internal evaluation system based on assignments, case studies, quiz, projects, surprise class tests, midterm tests, viva-voce, presentation etc.
- The solution of the internal question paper along with marking scheme is uploaded on the institute web portal for two week soon after the internal examinations are over.
- The evaluation of the answer sheets is to be done within a one week of the examinations.
- The internal answer sheets are shown to the students and marks earned by the students are displayed on the notice boards after resolving grievances of the students, if any.
- The faculty members are submitted the result analysis report in the prescribed format and also analyses attainment level.
- On the basis of performance in the midterm examinations, students are identified as slow learners and advance learners.

## **2.9 Incentive to Advance Learners**

Students with fast learning capacity can do the degree with additional courses from MOOCs and complete their degree with Honours. In order to guide the students the institute appoints departmental coordinators and course mentors. The role of coordinators is to identify the credit courses to be pursued by the students the course mentors motivate and clarify the difficulties encountered by them.

## **2.10 Support to Slow Learners**

On the basis of performance of the students in the class slow learners are identified by the subject teacher. These students are given assignments by the subject teacher in order to help them to improve

in their class performance, Also remedial classes are arranged for them so that they complete their degree within the period specified by the University.

### **2.11 Free and Open Source Software (FOSS)**

SKIT has tied up with FOSS IIT Bombay which allows students to undergo training in a range of upcoming technologies through on-line mode.

### **2.12 Virtual Laboratory**

SKIT has tied up with IIT Delhi and started a local chapter of virtual laboratory. Students are encouraged to perform laboratory experiments in virtual environment for extra practice and deep learning. The faculty is also encouraged to frame new experiments for virtual environment.

## **3. Outcome Based Education Policy**

### **Calculating Attainment of POs/PSOs and PEOs through COs**

For every organization Vision and Mission statements are important. Vision statement leads to Mission statement. For an Institute first vision and mission statements are formulated for the entire institute and then vision & mission statements are formulated for individual department in synchronization with the statements of the institute. Mission statement should naturally progress into PEO statements and then into PO Statements which culminate into CO statements. For undergraduate courses in engineering NBA has specified 12 PO statements which are general. For a particular branch two to three programme specific POs called PSOs are to be defined in the department concerned. For NBA the following method for evaluation of course outcome (CO), programme outcome (PO) and Programme educational objective (PEO) is suggested.

- A. Drafting of vision & mission for each department in synchronism with the vision and mission statements of the Institute.
- B. Drafting of PEO statements (Programme Educational Objectives) and their Mapping with Mission statements
- C. Drafting of PO and PSO statements
- D. Drafting Competencies (CA) and Performance Indication (PI) for each PO & PSO
- E. Drafting of COs
- F. Mapping the relationship between POs-PSOs and COs

- G. Determination of curricular gap
- H. Steps to bridge the curricular gap
- I. Assessment Tools for PO & PSO
- J. Direct Attainment of PO & PSO
  - J.1 Assessment of Theory courses
  - J.2 Assessment of Practical courses
  - J.3 Assessment of Seminar
  - J.4 Assessment of Project
  - J.5 Assessment of Industrial Training
  - J.6 Combined Direct Attainment of PO & PSO
- K. Indirect Attainment of PO & PSO
- L. Overall Assessment of PO & PSO
- M. Mapping of PEOs with PO-PSO
- N. Tools and Relative weights for Attainments of PEOs
  - N.1 Direct Attainment Tools for PEOs
  - N.2 Indirect Attainment Tools for PEOs
  - N.3 Direct Attainment of PEOs through attainment of PO-PSO
  - N.4 Direct Attainment of PEOs through placement, higher studies and entrepreneurship.
  - N.5 Indirect Attainment of PEOs through graduate exit survey
  - N.6 Indirect Attainment of PEOs through alumni survey
  - N.7 Indirect Attainment of PEOs through employers' survey
  - N.8 Indirect Attainment of PEO through parents Assessment
- O. Evaluation Process
- P. Appendix I
- Q. Appendix II
- R. Appendix III
- S. Appendix IV

### **A. Drafting of Vision and Mission of each department**

The vision and mission of the department should be drafted by DPAQIC in consultation with all stakeholders in such a way that they are consistent-with the vision and mission of the Institute. These should be reviewed every five years and may be modified if required.

### **B. Drafting of PEOs and their Mapping with Vision Statement**

Proper Procedure be followed for drafting of PEOs by DPAQIC and mapped with the mission statements of the department. The mapping between the mission statements and PEOs is finalized with the help of various feedback/suggestions received from all the stake holders.

Mapping is defined based on the following levels-

low (1), medium (2), high (3)

Levels (1/2/3) should be assigned based on the extent to which key words of mission statements are implemented and justified by various stakeholders. (state clearly justification).

**Example:** Three mission statements are mapped with four PEO statements

**Mapping of PEOs with Mission Statements**

PEO statement\ Mission Statement	M1	M2	M3
PEO1 .....	3	1	2
PEO2 .....	2	3	3
PEO3 .....	-	2	1
PEO4 .....	3	3	3

### **C. Drafting PO and PSO Statements**

POs and PSOs provide guidance at the programme level for curriculum design, delivery and assessment of student learning. POs represent high level generic goals whereas PSOs represent branch specific goals. There are 12 well defined POs for engineering disciplines by AICTE whereas PSOs are to be defined for each specific branch for Engineering which may be 2 to 3 in number. The 12 POs as defined by NBA are as under.

- (i) Engineering knowledge
- (ii) Problem Analysis
- (iii) Design development of solutions
- (iv) Conduct Investigations of Complex problems

- (v) Modern tool usage
- (vi) The engineer and society
- (vii) Environment and sustainability
- (viii) Ethics
- (ix) Individual and team work
- (x) Communication
- (xi) Project management and finance
- (xii) Life-long learning

Formation of PSOs are branch specific. Some examples are given below-

**Example: Branch Electrical Engineering**

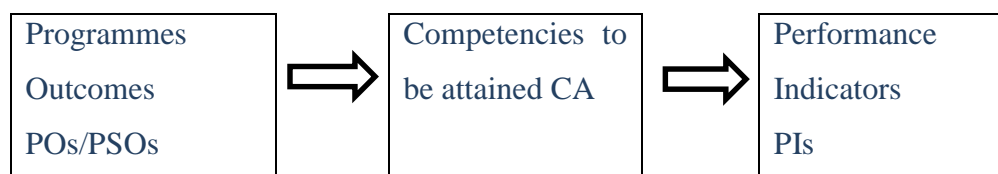
<b>PSO1:</b>	To train students for professional career in Electrical Engineering such that they are able to solve broadly defined complex electrical engineering problems.
<b>PSO2:</b>	To develop proficient Electrical Engineering graduates so that they can apply their knowledge and make decisions.
<b>PSO3:</b>	To induct creativity, entrepreneurship and curiosity towards learning new ideas in Electrical Engineering

**D. Defining Competences (CA) and Performance Indicators (PI) for each PO-PSO**

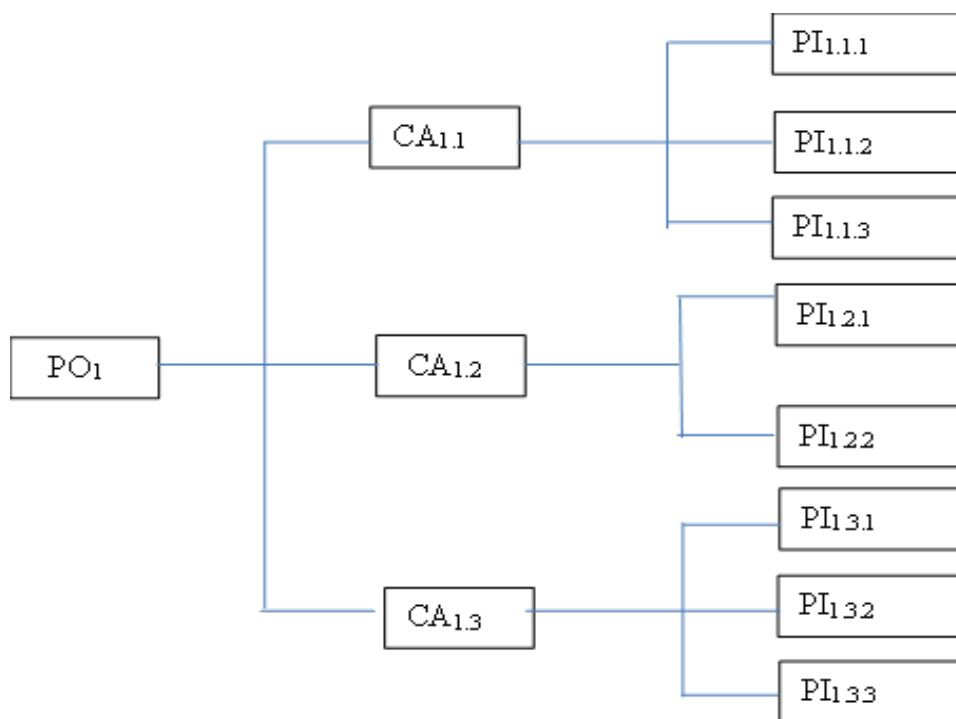
POs & PSOs are useful guide at the programme level for curriculum design and represent high level generic goals that are not directly measurable. To map POs & PSOs with COs it is necessary to define the following two terms.

- (i) Competencies (CA) and
- (ii) Performance Indications (PI)

Competencies are the abilities which we wish students to achieve whereas PIs are the breakup statements of POs & PSOs.







**Figure 1: Possible Mapping of CA and PI for PO1**

Competencies (CA) are defined for each PO & PSO and for each competency performance indicators (PI) are defined. As an example three competencies CA<sub>1.1</sub>, CA<sub>1.2</sub> & CA<sub>1.3</sub> are defined for PO<sub>1</sub>. Performance indications 3, 2 & 3 in number are defined for CA<sub>1.1</sub>, CA<sub>1.2</sub> & CA<sub>1.3</sub> respectively. This is shown in Fig. 1.

### **Examples of Competencies:**

Competency examples may be framed for each PO & PSO in the following format:

The student should be able to demonstrate an ability to generate/define/ select/model etc.

**Examples of PIs:** The student should be able to Identify/Apply/Build/ Analyse/Design/Describe/Create etc.

### **E. Drafting of COs**

As POs & PSOs are for the complete programme, COs are for specific course. They should be drafted in such a way that they are achievable and measurable. Also they should have linkage with POs & PSOs and enhance the learners understanding of the course. While drafting COs, it should be kept in mind that they pushes the learner from first to the final order of Blooms's Taxonomy.

**Example:** The student should be able to understand, apply, analyse, evaluate, create, discuss, explain, develop, classify, compare, design. COs for Project, Seminar and Industrial Training and sample theory and practical course are given in Appendix I

#### F. Mapping the Relationship between POs, PSOs and COs

The correlation value for all PO-PSO with all the courses (theory, practical, Seminar, Project, Industrial training) for all the semesters is determined by considering each course separately. The steps are given below:

**Step 1:** Draft Competencies (CAs) and Performance Indicators (PIs) for all POs-PSOs.

**Step 2:** The correlation value of a particular PO-PSO (say  $PO_j$ ) with CO under consideration (say  $CO_i$ ) is calculated as a number of correlated PIs (say  $PI_{jk}$ ) divided by the total PIs ( $\sum PI_{jk}$ ) of that particular  $PO_j$

The relationship between PO-PSO and CO can be classified as low (1), medium (2), high (3) according to the following rubric as given in Table II

**Table II – Rubric for mapping PO-PSO with CO**

Ratio	Mapping
If $0 < \text{ratio} \leq 0.33$	Low (1)
If $0.33 < \text{ratio} \leq 0.67$	Medium (2)
If $0.67 < \text{ratio} \leq 1.00$	High (3)

**Example:** If  $CO_1$  of a particular course satisfies 2 PIs out of total defined 5 PIs of  $PO_1$ , then the ratio is  $2/5$  i.e 0.4 which lies between 0.33 & 0.67.

Hence mapping of  $CO_1$  with  $PO_1$  is 2

Table III below depicts correlation matrix for all COs for a particular course with POs and PSOs as obtained using step 1 and step 2.

**Table III – Weighted Average Matrix for a Single Course**

POs COs	$PO_1$	$PO_2$	$PO_3$	$PO_4$	.....	$PO_{12}$	$PSO_1$	$PSO_2$
$CO_1$	2	1	-	-		-	2	1
$CO_2$	3	-	1	-		3	-	-

CO <sub>3</sub>	1	2	-	-		2	1	3
CO <sub>4</sub>	-	-	2	-		-	2	1
CO <sub>5</sub>	-	2	1	2		1	2	2
<b>Weighted Average</b>	<b>2</b>	<b>2</b>	<b>2</b>	<b>2</b>		<b>2</b>	<b>2</b>	<b>2</b>

In Table III weighted average for the course under consideration is calculated for every PO-PSO by summing relationship number (1, 2 or 3) for all COs of that course and dividing it by the maximum attainable value of the COs that have correlation with that particular PO-PSO.

$$\text{Weighted average of } PO_i \text{ for the course} = \frac{\text{Sum of mapping for } PO_i}{\text{No. of COs contributing for } PO_i \times 3}$$

In the example under consideration PO<sub>1</sub> has correlation with CO<sub>1</sub>, CO<sub>2</sub> and CO<sub>3</sub>. The Course outcomes of CO<sub>4</sub> and CO<sub>5</sub> have no correlation with PO<sub>1</sub>. Hence the weighted average of PO<sub>1</sub> with COs of this course is (2+3+1+0+0)/(3x3) i.e. 0.67 which lies between 0.33 and 0.67, hence weighted average as per rubric in Table II is 2.

**Step 3:** As explained in Step 2, obtain relationship as low (1), medium (2) and high (3) for all the courses with all the POs-PSOs.

### G. Determination of curricular gaps.

According to the procedure described in section 6 correlation weighted average is computed for all courses from semester I to VIII with all POs-PSOs. This is shown in Table IV. In this table curricular sufficiency is calculated by summing up all the weighted average values for a particular PO-PSO and dividing the sum by the number of courses in the programme which have correlation with that particular PO-PSO. The ideal achievement for curricular sufficiency for all courses is 3.0 (high). Hence curricular gap can be obtained by subtracting curricular sufficiency of each PO-PSO from the ideal achievable value (3.0).

**Table IV – Weighted Average Matrix for all Courses**

All Courses I to VIII Semesters	Weighted Averages of POs/PSOs							
	PO <sub>1</sub>	PO <sub>2</sub>	PO <sub>3</sub>	PO <sub>4</sub>	.....	PO <sub>12</sub>	PSO <sub>1</sub>	PSO <sub>2</sub>
Course 1	*	*	-	-		*	*	*
Course 2	*	-	*	-		-	*	-

Course n	-	-	*	*		*	*	*
sum of Weighted Average	*	*	*	*		*	*	*
No. of correlated courses	*	*	*	*		*	*	*
Curricular sufficiency	*	*	*	*		*	*	*
Curricular Gap	*	*	*	*		*	*	*

## H. Steps to Bridge the Curricular Gap

In order to bridge the curricular gap extra efforts are needed at the faculty, department and institute level. Some of the suggested activities which may be introduced are listed below.

- (i) Introduction of certain important topics beyond syllabus.
- (ii) Introduction of certain important experiments beyond syllabus.
- (iii) Introduction of one/two open ended experiments in each lab.
- (iv) Introduction of virtual lab
- (v) Group assignment to the students
- (vi) Organization of experts lectures from academia/industry
- (vii) Organization of seminars/conferences/workshops
- (viii) Organization of local visits and industrial tour
- (ix) Organization of Hackathon and other social activities
- (x) Participation in MOOCs
- (xi) Short term certificate courses in emerging technologies related with industry needs.
- (xii) Campus Recruitment Training
- (xiii) Soft Skill Training
- (xiv) Universal Human Values Training
- (xv) Creating students chapters of professional societies

### 1. Assessment Tools for POs and PSOs

These can be classified as

- (i) Direct Assessment Tools
- (ii) Indirect Assessment Tools

## J. Direct Attainment of POs-PSOs

- Step 1 Obtain attainment of all courses (theory, practical, seminar, project, industrial training) using internal assessment tools.
- Step 2 Obtain attainment of all courses using external assessment tools.
- Step 3 Using correlation matrix (Table III) obtain the combined internal attainment of POs-PSOs.

### J.1 Assessment of Theory Courses

#### J.1.1 Direct Internal Assessment Tools and Their Relative Weights

	Tools	Weightage
(i)	Mid Term Examination (Two)	2 x 0.25
(ii)	Unit Test (Two)	2 x 0.1
(iii)	Assignment (Two)	2 x 0.1

#### Step 1: Calculation of internal attainment level of COs for each assessment tool

The following benchmark may be adopted for assessing the performance of the students for every assessment tool. Performance level low (1), medium (2), high (3) may be selected as the number of students (N) in per cent getting target marks 60%.

$0 < N \leq 50\%$	Low (1)
$50\% < N \leq 70\%$	Medium (2)
$70\% < N \leq 100\%$	High (3)

#### Step 2: Map each CO with attainment level corresponding to each assessment tool for a course.

Example: For a single course it is shown in Table V.

**Table V – Mapping of Direct Internal Assessment Tools with Cos**

Direct Internal Assessment Tool	Attainment of COs				
	CO <sub>1</sub>	CO <sub>2</sub>	CO <sub>3</sub>	CO <sub>4</sub>	CO <sub>5</sub>
Mid Term Examination 1	2	3	2		
Mid Term Examination 2			3	2	2
Unit Test 1	2	2			
Unit Test 2			2	3	2
Assignment 1	3	3	3		

Assignment 2				3	3
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In Table V – Lower order COs on Bloom’s Taxonomy such as ‘Remember’ and ‘Understand’ can be assessed with the tools such as Unit Tests and to some extent with the help of Assignments. The higher order COs such as Apply and Analyze can be assessed with the help of mid-term examination, assignments and group assignment.

### Step 3: Calculation of Direct Internal Attainment for COs

The overall attainment of CO<sub>i</sub> can be calculated as follows:

$$= \frac{\sum_{j=1}^6 [\text{Attainment of CO}_i(\text{for } j^{\text{th}} \text{ tool}) \times \text{Weightage of used assessment tool}_j]}{\sum_{j=1}^6 \text{Weightage for used assessment tool}_j}$$

Example: For single course it is shown in Table VI.

**Table VI – Calculation of Direct Internal Attainment of COs**

Direct Internal Assessment Tool	Weightage	Attainment of COs				
		CO <sub>1</sub>	CO <sub>2</sub>	CO <sub>3</sub>	CO <sub>4</sub>	CO <sub>5</sub>
Mid Term Examination 1	0.25	2x0.25	3x0.25	2x0.25		
Mid Term Examination 2	0.25			3x0.25	2x0.25	2x0.25
Unit Test 1	0.10	2x0.10	2x0.10			
Unit Test 2	0.10			2x0.10	3x0.10	3x0.10
Assignment 1	0.15	3x0.15	3x0.15	3x0.15		
Assignment 2	0.15				3x0.15	3x0.15
<b>Course Outcome Attainment</b>	<b>1.00</b>	<b>2.30</b>	<b>2.80</b>	<b>2.53</b>	<b>2.50</b>	<b>2.50</b>

For example, overall attainment of CO<sub>3</sub> =  $\frac{2 \times 0.25 + 3 \times 0.25 + 2 \times 0.10 + 3 \times 0.15}{0.25 + 0.25 + 0.10 + 0.15} = 2.53$

### J.1.2: Direct External Assessment and Their Relative Weight

Tool	Weightage
Semester End Examination	1.0

Outcome rubric for external assessment of theory courses.

Reference level low (1), medium (2), high (3) are computed as the number (N) in percent getting target marks 40%.

0 < N ≤ 50%	Low (1)
50% < N ≤ 70%	Medium (2)
70% < N ≤ 100%	High (3)

External Attainment in a theory course

1.0 x performance level in semester end examination

Example:  $1.0 \times 2.0 = 2.0$

### J.1.3: Overall Attainment in Theory Courses

Overall attainment is obtained by combining 30% weightage of attainment from internal assessment and the remaining 70% weightage of attainment from external assessment. The distribution of weightage between internal and external assessment depends upon the teaching scheme adopted. In the example considered this ratio between internal and external assessments has been taken as 30:70 for overall assessment.

#### **0.3 x Internal Attainment + 0.7 x External Attainment**

Example: For theory courses it is shown in Table VII

**Table VII – Overall Direct Attainment of CO in theory courses**

Direct Internal CO Attainment	Course Outcome COs				
	CO <sub>1</sub>	CO <sub>2</sub>	CO <sub>3</sub>	CO <sub>4</sub>	CO <sub>5</sub>
Internal Assessment	2.30	2.80	2.53	2.50	2.50
External Assessment	2.00	2.00	2.00	2.00	2.00
20% of Internal Attainment	0.69	0.84	0.76	0.75	0.75
80% of External Attainment	1.40	1.40	1.40	1.40	1.40
<b>Overall Direct Attainment</b>	<b>2.09</b>	<b>2.24</b>	<b>2.16</b>	<b>2.15</b>	<b>2.15</b>

## J.2 Assessment of Practical Courses

### J.2.1 Direct Internal Assessment Tools & Their Relative Weights

Tools	Relative Weightage
(i) Mid Term Examination 1 including conduct of Exp. And viva-voce	0.20 + 0.1
(ii) Mid Term Examination 2 including conduct of Exp. and viva-voce	0.20 + 0.1
(iii) Performance in conduct of Lab experiments during semester	0.20
(iv) Quality of Lab records	0.10
(v) Attendance and punctuality in submission of lab records	0.10

**Step 1: Calculation of internal attainment level of COs for each assessment tool for practical courses.**

The following benchmark may be adopted for assessing the performance of students for every assessment tool. Performance level low (1), medium (2), high (3) may be selected as the number of students (N) in per cent getting target marks 60%.

$0 < N \leq 60\%$	Low (1)
$60\% < N \leq 80\%$	Medium (2)
$80\% < N \leq 100\%$	High (3)

**Step 2: Map each CO with attainment level corresponding to each assessment tool for a practical course.**

Example: For a single practical course it is shown in Table VIII.

**Table VIII Mapping of Direct Internal Assessment tools with practical course.**

Direct Internal Assessment Tool	Practical Course Outcome COs				
	CO <sub>1</sub>	CO <sub>2</sub>	CO <sub>3</sub>	CO <sub>4</sub>	CO <sub>5</sub>
Mid Term Exam 1 + Viva Voce	3	2	2	3	3
Mid Term Exam 2 + Viva Voce	2	2	2	3	3
Lab Performance in Conduct of Exp.		3	3	3	
Quality of Lab records			2	2	
Attendance & Punctuality in submission of lab records					3

In Table VIII lower order COs for well-defined close ended experiments can be assessed through mid-term examinations while higher order COs for design type open ended experiments can be assessed through regular laboratory work.

**Step 3: Calculation of Direct Internal Attainment for COs**

The overall attainment of CO<sub>i</sub> can be calculated as follows:

$$= \frac{\sum_{j=1}^5 [Attainment\ of\ CO_i(\text{for } j^{th}\text{ tool}) \times Weightage\ of\ used\ assessment\ tool_j]}{\sum_{j=1}^5 Weightage\ of\ used\ assessment\ tool_j}$$

Example: For a single lab course it is shown in Table IX.



**Table IX: Mapping of Direct Internal Attainment with CO**

Direct Internal Assessment Tool	Weightage	Weighted Lab Course Outcome COs				
		CO <sub>1</sub>	CO <sub>2</sub>	CO <sub>3</sub>	CO <sub>4</sub>	CO <sub>5</sub>
Mid Term Exam 1 + Viva Voce	0.30	3x0.30	2x0.30	2x0.30		
Mid Term Exam 2 + Viva Voce	0.30	2x0.30	2x0.30	2x0.30		
Lab Performance in conduct of Exp.	0.20	3x0.20		3x0.2		2x0.2
Quality of Lab Records	0.10		3x0.10		2x0.1	3x0.1
Attendance & Punctuality in submission of lab records	0.10				3x0.1	
<b>Lab Course Outcome Attainment</b>	<b>1.00</b>	<b>2.63</b>	<b>2.14</b>	<b>2.25</b>	<b>2.5</b>	<b>2.33</b>

**J.2.2 Direct External Assessment Tool and Their Relative Weights**

Tools	Weightage
(i) External Examination including conduct of Experiment	0.5
(ii) Quiz	0.2
(iii) Viva voce	0.3

**Step-I: Calculation of external attainment level of COs for each assessment tool for practical courses.**

The following benchmark may be adopted for assessing the performance of students for every assessment tool. Performance level low (1), medium (2), high (3) may be selected as the number of students (N) in per cent getting target marks 60%.

$0 < N \leq 60\%$	Low (1)
$60\% < N \leq 80\%$	Medium (2)
$80\% < N \leq 100\%$	High (3)

**Step 2: Map each CO with attainment level corresponding to each assessment tool for a practical course.**

Example: For a single lab course, it is shown in Table X.

**Table X: Mapping of Direct External Assessment Tool with Practical Course**

Direct External Assessment Tool	Attainment of COs				
	CO <sub>1</sub>	CO <sub>2</sub>	CO <sub>3</sub>	CO <sub>4</sub>	CO <sub>5</sub>
External Exam Assessment	2	3	2	2	3
Quiz	2	2	2	3	
Viva Voce	2	2	2	2	

**Step 3: Calculation of Direct external Attainment for COs**

The overall attainment of CO<sub>i</sub> can be calculated as follows:

$$= \frac{\sum_{j=1}^3 [\text{Attainment of CO}_i(\text{for } j^{\text{th}} \text{ tool}) \times \text{Weightage of used assessment tool}_j]}{\sum_{j=1}^3 \text{Weightage of used assessment tool}_j}$$

Example: For a single lab course it is shown in the Table XI.

**Table XI – Mapping of Direct External Attainment of CO**

Direct External Assessment Tool	Weightage	Weighted Lab Course Outcome COs				
		CO <sub>1</sub>	CO <sub>2</sub>	CO <sub>3</sub>	CO <sub>4</sub>	CO <sub>5</sub>
External Exam Assessment	0.5	2x0.5	3x0.5	2x0.5		
Quiz	0.2		2x0.2	2x0.2	3x0.2	
Viva Voce	0.3	2x0.2			3x0.2	2x0.2
<b>Lab Course Outcome Attainment</b>	<b>1.0</b>	<b>2.00</b>	<b>2.71</b>	<b>2.00</b>	<b>3.00</b>	<b>2.00</b>

**J.2.3 Overall Attainment in Laboratory Courses**

It is obtained by combining 60% weightage of attainment from internal assessment and 40% weightage of external assessment.

$$0.6 \times \text{Internal Attainment} + 0.4 \times \text{External Attainment}$$

**Table XII: Overall Attainment of CO in Practical Course**

CO Attainment of Lab Course	COs				
	CO <sub>1</sub>	CO <sub>2</sub>	CO <sub>3</sub>	CO <sub>4</sub>	CO <sub>5</sub>
Internal Attainment	2.63	2.14	2.25	2.5	2.33
External Attainment	2.00	2.71	2.00	3.00	2.00
60% of Internal Attainment	1.58	1.28	1.35	1.50	1.40
40% of External Attainment	0.80	1.08	0.80	1.20	0.80
Overall Attainment	2.38	2.37	2.15	2.70	2.20

### J. 3 Assessment of Seminar

#### J.3.1 Direct Internal assessment Tools and their relative weights

	Tools	Weightage
(i)	Abstract and References	0.1
(ii)	Critical Literature Review add Subject Clarity	0.5 (0.2+0.3)
(iii)	PPT and Presentation Skill	0.2
(iv)	Question-Answer	0.1
(v)	Participation in other seminars	0.1

#### Step-I: Calculation of internal attainment level of COs for each assessment tool for Seminar.

The following benchmark may be adopted for assessing the performance of students for every assessment tool. Performance level low (1), medium (2), high (3) may be selected as the number of students (N) in per cent getting target marks 60%.

$0 < N \leq 60\%$	Low (1)
$60\% < N \leq 80\%$	Medium (2)
$80\% < N \leq 100\%$	High (3)

#### Step 2: Map each CO with attainment level corresponding to each assessment tool for Seminar.

Example: It is shown in Table XIII

**Table XIII: Mapping of Internal Assessment Tools with seminar outcomes**

Direct Internal Assessment Tools	Attainment of COs				
	CO <sub>1</sub>	CO <sub>2</sub>	CO <sub>3</sub>	CO <sub>4</sub>	CO <sub>5</sub>
Abstract and References	3	3			
Critical Literature Reviews & Subject Clarity	2	3	2	1	1
PPT & Presentation Skill			2	3	
Question-Answer	2	2			
Participation in other seminars	3				2

#### Step 3: Calculation of Direct Internal Attainment for COs

The overall attainment of CO<sub>i</sub> can be calculated as follows:

$$= \frac{\sum_{j=1}^5 [\text{Attainment of CO}_i(\text{for } j^{\text{th}} \text{ tool}) \times \text{Weightage of used assessment tool}_j]}{\sum_{j=1}^5 \text{Weightage of used assessment tool}_j}$$

Example: It is shown in Table XIV

**Table XIV – Mapping of Direct Internal Assessment Tools with seminar outcomes**

Direct Internal Assessment Tools	Weightage	Weighted Seminar Outcome COs				
		CO <sub>1</sub>	CO <sub>2</sub>	CO <sub>3</sub>	CO <sub>4</sub>	CO <sub>5</sub>
Abstract & References	0.1	3x0.1	3x0.1			
Critical Literature Review & Subject Clarity	0.5	2x0.5	3x0.5	2x0.5	1x0.5	1x0.5
PPT & Presentation Skill	0.2			2x0.2	3x0.2	
Question Answer	0.1	2x0.1	2x0.1			
Participation in other seminars	0.1	3x0.1				
<b>Seminar Outcome Attainment</b>	<b>1.0</b>	<b>2.25</b>	<b>2.86</b>	<b>2.00</b>	<b>1.57</b>	<b>1.00</b>

### J.3.2 Direct External Assessment Tools and their relative weights

	<b>Tools</b>	<b>Weightage</b>
(i)	Report Evaluation	0.6
(ii)	Viva voce	0.4

#### Step-I: Calculation of external attainment level of COs for each assessment tool for Seminar.

The following benchmark may be adopted for assessing the performance of students for every assessment tool. Performance level low (1), medium (2), high (3) may be selected as the number of students (N) in per cent getting target marks 60%.

$0 < N \leq 60\%$	Low (1)
$60\% < N \leq 80\%$	Medium (2)
$80\% < N \leq 100\%$	High (3)

#### Step 2: Map each CO with attainment level corresponding to each assessment tool for a Seminar.

Example: It is shown in Table XV

**Table XV: Mapping of Direct External Assessment Tools with Seminar Outcomes**

Direct External Assessment Tool	Seminar Outcomes				
	CO1	CO2	CO3	CO4	CO5
Report Evaluation	3	3	3		
Viva voce	2	2	2	2	

#### Step 3: Calculation of Direct external Attainment for COs

The overall attainment of CO<sub>i</sub> can be calculated as follows:

$$= \frac{\sum_{j=1}^2 [\text{Attainment of } CO_i(\text{for } j^{th} \text{ tool}) \times \text{Weightage of used assessment tool}_j]}{\sum_{j=1}^2 \text{Weightage of used assessment tool}_j}$$

Example: It is shown in Table XVI

**Table XVI: Mapping of Direct External Assessment Tools with Seminar Outcomes.**

Direct Internal Assessment Tool	Weight age	Weighted Seminar Outcome COs				
		CO <sub>1</sub>	CO <sub>2</sub>	CO <sub>3</sub>	CO <sub>4</sub>	CO <sub>5</sub>
Report Evaluation	0.6	3x0.6	3x0.6	2x0.6		
Viva-voce	0.4	2x0.4	2x0.4	1x0.4	3x0.4	1x0.4
<b>Seminar Outcome Attainment</b>	<b>1.0</b>	<b>2.60</b>	<b>2.60</b>	<b>1.60</b>	<b>3.00</b>	<b>1.00</b>

### J.3.3 Overall Attainment of Seminar.

It is obtained by combining 60% weightage of attainment of internal assessment and 40% weightage of attainment of external assessment. Example: It is shown in table XVII

**Table XVII: Mapping of overall attainment of seminar**

CO Attainment of Seminars	COs				
	CO <sub>1</sub>	CO <sub>2</sub>	CO <sub>3</sub>	CO <sub>4</sub>	CO <sub>5</sub>
Internal Attainment	2.25	2.86	2.00	1.57	1.00
External Attainment	2.60	2.60	1.60	3.00	1.00
60% of Internal Attainment	1.35	1.72	1.20	0.94	0.60
40% of External Attainment	1.04	1.04	0.64	1.20	0.40
<b>Overall Attainment</b>	<b>2.39</b>	<b>2.76</b>	<b>1.84</b>	<b>2.14</b>	<b>1.00</b>

## J.4 Assessment of Project

### J.4.1 Direct Assessment Tools for Internal Assessment of Project

Tools	Weightage
(i) Objectives, Literature survey & Problem Formulation	0.1
(ii) Project planning and designing	0.2
(iii) Fabrication/Software Development and Testing	0.3
(iv) Weekly progress Report and Timely Completion	0.1
(v) Outcome and future scope	0.1
(vi) Report submission, presentation & Q-A	0.2

#### Step-I: Calculation of internal attainment level of COs for each assessment tool for Project.

The following benchmark may be adopted for assessing the performance of students for every assessment tool. Performance level low (1), medium (2), high (3) may be selected as the number of students (N) in per cent getting target marks 60%.

$0 < N \leq 60\%$	Low (1)
$60\% < N \leq 80\%$	Medium (2)
$80\% < N \leq 100\%$	High (3)

**Step 2: Map each CO with attainment level corresponding to each assessment tool for Project.**

Example: It is shown in Table XVIII

**Table XVIII: Mapping of Direct Internal Assessment Tools with Project outcomes**

Direct Internal Assessment Tools	Attainment of COs				
	CO <sub>1</sub>	CO <sub>2</sub>	CO <sub>3</sub>	CO <sub>4</sub>	CO <sub>5</sub>
Objectives, Literature survey & Problem Formulation	3				
Designing			3		
Fabrication/Software Development and Testing			3	3	
Weekly Progress Report and timely completion		3			
Outcome and Future Score					2
Report submission, presentation & Q-A					2

**Step 3: Calculation of Direct Internal Attainment for COs**

The overall attainment of CO<sub>i</sub> can be calculated as follows:

$$= \frac{\sum_{j=1}^5 [\text{Attainment of CO}_i(\text{for } j^{\text{th}} \text{ tool}) \times \text{Weightage of used assessment tool}_j]}{\sum_{j=1}^5 \text{Weightage of used assessment tool}_j}$$

Example: It is shown in Table XIX

**Table XIX: Mapping of Direct Internal Assessment Tools with Project Outcomes.**

Direct Internal Assessment Tool	Weightage	Weighted Project Outcome CO				
		CO <sub>1</sub>	CO <sub>2</sub>	CO <sub>3</sub>	CO <sub>4</sub>	CO <sub>5</sub>
Objective , Literature Survey & Problem Formulation	0.1	3x0.1				
Designing	0.2			3x0.2		
Fabrication/Software Development & Testing	0.3			3x0.3	3x0.3	
Weekly Progress Report and timely completion	0.1		3x0.1			
Outcome & Future Scope	0.1					2x0.1
Report Submission Presentation & Q-A	0.2					2x0.2
<b>Project Outcome Attainment</b>	<b>1.0</b>	<b>3.00</b>	<b>3.00</b>	<b>3.00</b>	<b>3.00</b>	<b>2.00</b>

#### J.4.2 Direct External Assessment Tools for External Assessment of Project and their Relative Weights.

	Tools	Weightage
(i)	Achievement of Objectives	0.1
(ii)	Functional Demonstration	0.5
(iii)	Viva voce	0.3
(iv)	Report	0.1

#### Step-I: Calculation of external attainment level of COs for each assessment tool for Project.

The following benchmark may be adopted for assessing the performance of students for every assessment tool. Performance level low (1), medium (2), high (3) may be selected as the number of students (N) in per cent getting target marks 60%.

$0 < N \leq 60\%$	Low (1)
$60\% < N \leq 80\%$	Medium (2)
$80\% < N \leq 100\%$	High (3)

#### Step 2: Map each CO with attainment level corresponding to each assessment tool for Project.

Example: It is shown in Table XX

**Table XX: Mapping of Direct External Assessment Tools with Project outcomes.**

Direct External Assessment Tools	Attainment of COs				
	CO <sub>1</sub>	CO <sub>2</sub>	CO <sub>3</sub>	CO <sub>4</sub>	CO <sub>5</sub>
Achievement of Objectives	3	3	3	3	3
Functional Demonstration	3	3	3	3	3
Viva voce	2	2	2	2	2
Report	3	3	3	3	3

#### Step 3: Calculation of Direct external Attainment for COs

The overall attainment of CO<sub>i</sub> can be calculated as follows:

$$= \frac{\sum_{j=1}^3 [\text{Attainment of CO}_i(\text{for } j^{\text{th}} \text{ tool}) \times \text{Weightage of used assessment tool}_j]}{\sum_{j=1}^3 \text{Weightage of used assessment tool}_j}$$

Example: It is shown in Table XXI

**Table XXI: Mapping of Direct External Assessment Tools with Project outcomes.**

Direct Internal Assessment Tool	Weightage	Weighted Project Outcome COs				
		CO <sub>1</sub>	CO <sub>2</sub>	CO <sub>3</sub>	CO <sub>4</sub>	CO <sub>5</sub>
Achievement of Objectives	0.1	3x0.1	3x0.1	3x0.1	3x0.1	3x0.1
Functional Demonstration	0.5	3x0.5	3x0.5	3x0.5	3x0.5	3x0.5
Viva voce	0.3	2x0.3	2x0.3	2x0.3	2x0.3	2x0.3
Report	0.1	3x0.1	3x0.1	3x0.1	3x0.1	3x0.1
<b>Project Outcome Attainment</b>	<b>1.0</b>	<b>2.70</b>	<b>2.70</b>	<b>2.70</b>	<b>2.70</b>	<b>2.70</b>

### J.4.3 Overall Attainment of Project

It is obtained by combining 60% weightage of attainment of internal assessment and 40% weightage of attainment external assessment.

$$0.6 \times \text{Internal Attainment} + 0.4 \times \text{External Attainment}$$

Example: It is shown in Table XXII

**Table XXII: Mapping of Overall Attainment of Project**

CO Attainment of Project	COs				
	CO <sub>1</sub>	CO <sub>2</sub>	CO <sub>3</sub>	CO <sub>4</sub>	CO <sub>5</sub>
Internal Attainment	3.00	3.00	3.00	3.00	2.00
External Attainment	2.70	2.70	2.70	2.70	2.70
60% of Internal Attainment	1.80	1.80	1.80	1.80	1.20
40% of External Attainment	1.08	1.08	1.08	1.08	1.08
<b>Overall Attainment</b>	<b>2.88</b>	<b>2.88</b>	<b>2.88</b>	<b>2.88</b>	<b>2.28</b>

## J.5 Assessment of Industrial Training

### J.5.1 Direct Internal Assessment Tools and their relative weights for Assessment of Industrial Training

Tools	Weightage
(i) Objectives and their achievements	0.2
(ii) Training Report	0.5
(iii) Preparation of PPTs	0.1
(iv) Performance in Q-A Session	0.2

**Step-I: Calculation of internal attainment level of COs for each assessment tool for Industrial Training.**



The following benchmark may be adopted for assessing the performance of students for every assessment tool. Performance level low (1), medium (2), high (3) may be selected as the number of students (N) in per cent getting target marks 60%.

$0 < N \leq 60\%$	Low (1)
$60\% < N \leq 80\%$	Medium (2)
$80\% < N \leq 100\%$	High (3)

**Step 2: Map each CO with attainment level corresponding to each assessment tool for Industrial Training.**

Example: It is shown in Table XXIII

**Table XXIII: Mapping of Direct Internal Assessment Tools with Industrial Training**

Direct Internal Assessment Tools	Attainment of COs				
	CO <sub>1</sub>	CO <sub>2</sub>	CO <sub>3</sub>	CO <sub>4</sub>	CO <sub>5</sub>
Objectives and their achievements	3	3	3	3	
Training Report				2	
Preparation through PPTs	2	2	2	2	2
Performance in Q-A Session	2	2	2	2	2

**Step 3: Calculation of Direct Internal Attainment for COs**

The overall attainment of CO<sub>i</sub> can be calculated as follows:

$$= \frac{\sum_{j=1}^5 [\text{Attainment of CO}_i(\text{for } j^{\text{th}} \text{ tool}) \times \text{Weightage of used assessment tool}_j]}{\sum_{j=1}^5 \text{Weightage of used assessment tool}_j}$$

Example: It is shown in Table XXIV

**Table XXIV: Mapping of Direct Internal Assessment Tools with Industrial Training Outcomes.**

Direct Internal Assessment Tool	Weightage	Weighted Industrial Training Outcomes COs				
		CO <sub>1</sub>	CO <sub>2</sub>	CO <sub>3</sub>	CO <sub>4</sub>	CO <sub>5</sub>
Objectives & Their Achievements	0.2	3x0.2	3x0.2	3x0.2	3x0.2	
Training Report	0.5				2x0.5	
Preparation through PPTs	0.1	2x0.1	2x0.1	2x0.1	2x0.1	2x0.1
Performance in Q-A Session	0.2	2x0.2	2x0.2	2x0.2	2x0.2	2x0.2
<b>Industrial Training Attainment</b>	<b>1.0</b>	<b>2.40</b>	<b>2.40</b>	<b>2.40</b>	<b>2.2</b>	<b>2.00</b>

### J.5.2 Direct External Assessment Tools and their relative weights for External Assessment of Industrial Training

	Tools	Weightage
(i)	Report Evaluation	0.4
(ii)	Attendance & Regularity in Training	0.2
(iii)	Viva voce	0.4

#### Step-I: Calculation of external attainment level of COs for each assessment tool for Industrial Training.

The following benchmark may be adopted for assessing the performance of students for every assessment tool. Performance level low (1), medium (2), high (3) may be selected as the number of students (N) in per cent getting target marks 60%.

$0 < N \leq 60\%$	Low (1)
$60\% < N \leq 80\%$	Medium (2)
$80\% < N \leq 100\%$	High (3)

#### Step 2: Map each CO with attainment level corresponding to each assessment tool for Industrial Training.

Example: It is shown in Table XXV

**Table XXV: Mapping of Direct External Assessment Tools with Industrial Training Outcomes.**

Direct External Assessment Tools	Attainment of COs				
	CO <sub>1</sub>	CO <sub>2</sub>	CO <sub>3</sub>	CO <sub>4</sub>	CO <sub>5</sub>
Report Evaluation	3	3	3	3	3
Attendance & Regularity in Training	3	3			
Viva voce	2	2	2	2	1

#### Step 3: Calculation of Direct external Attainment for Cos

The overall attainment of CO<sub>i</sub> can be calculated as follows:

$$= \frac{\sum_{j=1}^3 [\text{Attainment of CO}_i(\text{for } j^{\text{th}} \text{ tool}) \times \text{Weightage of used assessment tool}_j]}{\sum_{j=1}^3 \text{Weightage of used assessment tool}_j}$$

Example: It is shown in Table XXV

**Table XXIV: Mapping of Direct External Assessment Tools with Industrial Training Outcomes.**

Direct Internal Assessment Tool	Weightage	Weighted Industrial Training Outcomes COs				
		CO <sub>1</sub>	CO <sub>2</sub>	CO <sub>3</sub>	CO <sub>4</sub>	CO <sub>5</sub>
Report Evaluation	0.4	3x0.4	3x0.4	2x0.4	3x0.4	2x0.4
Attendance & Regularity in Training	0.2	3x0.2	3x0.2			
Viva voce	0.4	2x0.4	2x0.4	2x0.4	2x0.4	1x0.4

<b>Training Outcome Attainment</b>	<b>1.0</b>	<b>2.60</b>	<b>2.60</b>	<b>2.00</b>	<b>2.50</b>	<b>1.50</b>
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### J.5.3 Overall Attainment of Industrial Training

Overall attainment of Industrial Training is obtained by combining 60% weightage of assessment of internal attainment and 40% weightage of assessment of external attainment.

Example: It is shown in Table XXVII

**Table XXVII: Mapping of Overall Attainment of Industrial Training**

CO Attainment of Industrial Training	COs				
	CO <sub>1</sub>	CO <sub>2</sub>	CO <sub>3</sub>	CO <sub>4</sub>	CO <sub>5</sub>
Internal Attainment	2.40	2.40	2.40	2.2	2.00
External Attainment	2.60	2.60	2.00	2.50	1.50
60% of Internal Attainment	1.44	1.44	1.44	1.32	1.20
40% of External Attainment	1.04	1.04	0.80	1.00	0.60
Overall Attainment	2.48	2.48	2.24	2.32	1.80

### J.6 Combined Direct Attainment of PO & PSO

The mapping matrix for a single course relating COs and POs- PSOs was depicted in Table III. Table XXVIII depicts the CO attainments and corresponding CO-PO mapping for all courses in a program.

**Table XXVIII: Depicts correlation between COs and POs / PSOs and attainment values of COs.**

Course Code/Name	CO	Attainm ent	Mapping of PO-PSO with COs							
			PO <sub>1</sub>	PO <sub>2</sub>	PO <sub>3</sub>	PO <sub>4</sub>	...	PO <sub>12</sub>	PSO <sub>1</sub>	PSO <sub>2</sub>
7ME7-5 IC Engine	CO1	2.09	3	1	-	-	...	-	2	1
	CO2	2.24	2	-	1	-	...	3	-	-
	CO3	2.16	1	2	-	-	...	2	1	3
	CO4	2.15	-	-	2	-	...	-	-	1
	CO5	2.15	-	-	2	-	...	-	-	-
8AG6-60.1 Energy Management	CO1	2.09	3	2	1	-	...	1	2	2
	CO2	2.24	1	2	1	-	...	-	-	2
	CO3	2.16	3	-	1	-	...	-	-	-
	CO4	2.15	2	1	-	-	...	1	-	2
	CO5	2.15	3	2	-	-	...	-	-	-
...	...	...	...	...	...	...	...	...	...	...
...	...	...	...	...	...	...	...	...	...	...
All courses in program (N)	CO1									
	CO2									
	CO3									
	CO4									
	CO5									
<b>Direct Attainment of PO</b>			2.15	2.15	2.17	-	-	2.18	2.10	2.15

The direct attainment of  $PO_k$  can be calculated as follows:

$$= \frac{\sum_{j=1}^N [\text{Attainment of } CO_i \text{ for } j^{th} \text{ course} \times \text{Correlation of } CO_i \text{ for } j^{th} \text{ course with } PO_k]}{\sum_{j=1}^N \text{Correlations of } CO_i \text{ for } j^{th} \text{ course with } PO_k}$$

Where  $i$  = No. of course outcomes in a course (5 or 6)  
 $j$  = No. of courses in the program  
 $k$  = No. of POs/PSOs

This process can be done in excel.

## K. Indirect Attainment of PO & PSO

Indirect Attainment of PO-PSO can be calculated using the following tools.

	Tools	Weightage
(i)	Graduate Exit Survey	0.6
(ii)	SODECA	0.2
(iii)	Faculty (Batch Counsellor) Perception	0.2

(i) An exit survey is conducted for all the students of particular programmes at the end of the final year. It encourages the students to be proactive and become more responsible for their own learning and help the department to identify all those domains that require improvement. For exit survey relevant questionnaire related with PO-PSO is circulated to all the outgoing students and the feedback collected. The questionnaire is enclosed in Appendix II.

(ii) SODECA (Student Discipline and Extra and Co-curricular Activities) takes care of participation of students in some of the co-curricular and extra-curricular activities. It may be assumed same for attainment of all PO-PSO.

(iii) Faculty (batch Counsellor) perception about the student growth is important because batch counsellor observes a batch of 25 to 30 students for all the four years of their stay in the institute. It may also be assumed same for attainment of all PO-PSO.

### K.1 Evaluation Process

- (i) The questionnaire for graduate survey consists of one question for each PO/PSO. Each question has three options namely low (1), medium (2), high (3). Average for each PO-PSO is calculated.

- (ii) The following rubric may be adopted for classifying students based on their participation in co-curricular or extra-curricular activity during their four year of stay in the institute.

No Participation in any activity	Low (1)
Participation in at least three activities	Medium (2)
Participation in two or more activities and won award in any one activity	High (3)

Average mapping for all the students may be obtained which may be assumed same for all PO-PSO.

- (iii) The following rubric may be adopted for classifying students based on their participation in class room activities, class attendance, certifications in MOOCs.

Low attendance, NO certification in MOOCs	Low (1)
Average attendance, At least two certification in MOOCs	Medium (2)
Good attendance, More than two certifications	High (3)

Average mapping for all the students may be obtained which may be assumed same for all PO-PSO.

**Table XXIX: Indirect Attainment of PO-PSO.**

PO-PSO	PO <sub>1</sub>	PO <sub>2</sub>	PO <sub>3</sub>	PO <sub>4</sub>	....	PO <sub>12</sub>	PSO <sub>1</sub>	PSO <sub>2</sub>
Response of graduate exit survey								
60% of response of graduate exit survey								
Response of SODCA	Attainment values of SODECA same for all PO-PSO							
20% Response of SODECA								
Response of faculty perception	Attainment values of faculty perception same for all PO-PSO							
20% Response of faculty perception								
Overall indirect response								

#### **L. Overall attainment of PO/PSO**

Overall attainment of PO/PSO is calculated by the following formula.

$$\text{Overall Attainment} = 0.8 \times \text{Direct Attainment} + 0.2 \times \text{Indirect attainment}$$

**Table XXX: Calculation of overall attainment**

POs PSOs Attainment	PO <sub>1</sub>	PO <sub>2</sub>	PO <sub>3</sub>	PO <sub>4</sub>	PO <sub>5</sub>	.....	PO <sub>12</sub>	PSO <sub>1</sub>	PSO <sub>2</sub>
Direct Attainment									
Indirect Attainment									
80% of Direct Attainment									
20% of Indirect Attainment									
Overall Attainment									

### M. Mapping of PEOs with PO-PSO

**Step 1 :** Programme educational objectives are framed for each programme according to the Mission statements of the department as discussed in Sec. B.

**Step 2:** The PEOs so framed under step 1 are mapped with POs/PSOs. A sample matrix for some POs/PSOs is shown in Table XXXI.

**Table XXXI: Mapping of PEOs with PO-PSO**

POs PSOs Attainment	PO <sub>1</sub>	PO <sub>2</sub>	PO <sub>3</sub>	PO <sub>4</sub>			PO <sub>12</sub>		PSO <sub>1</sub>	PSO <sub>2</sub>
PEO1	*	*	*						*	
PEO2	*			*					*	*
PEO3		*			*		*			*
PEO4	*						*		*	

### N. Tools and Relative weights for attainments of PEOs classified as

#### N.1 Direct attainment tools for PEOs

Tools	Relative Weight
(i) Through attainment of PO/PSO	0.8
(ii) Trough placement, higher studies and entrepreneurship	0.2

#### N.2 Indirect attainment tools for PEOs

Tools	Relative Weight
(i) Graduate Exit Survey	0.3
(ii) Alumni Survey	0.3
(iii) Employers survey	0.2
(iv) Parents survey	0.2

### N.3 Direct Attainment of PEOs through attainment of POs-PSOs.

Target level and actual attainment of each PO-PSO as calculated through direct and indirect tools and the percentage attainment is shown in table XXXII.

**Table XXXII: Percentage attainment of PO-PSO**

	PO <sub>1</sub>	PO <sub>2</sub>	PO <sub>3</sub>	PO <sub>4</sub>	PO <sub>5</sub>	....	PO <sub>12</sub>	PSO <sub>1</sub>	PSO <sub>2</sub>
Target Level (x)	*	*	*	*	*		*	*	*
Actual Attainment (y)	*	*	*	*	*		*	*	*
% Attainment $Z=(y/x) \times 100$	*	*	*	*	*		*	*	*
80% of z	*	*	*	*	*		*	*	*

### N.4 Direct Attainment of PEOs through Placement, Higher Studies and Entrepreneurship.

Number of students placed + opted for higher studies + became entrepreneur during the last 3 years = P

Number of final year students during the last 3 years = Q

$$\% (\text{Placed} + \text{higher studies} + \text{entrepreneurship}) = \frac{P}{Q} \times 100 = R$$

The following rubric may be adopted

If	$0 < R \leq 30\%$	Low (1)
	$30\% < R \leq 40\%$	Medium (2)
	$40\% < R \leq 100\%$	High (3)

$$20\% \text{ of it} = (1/2/3) \times 0.2$$

### N.5 Indirect Attainment through graduate exit survey

Indirect attainment of PO-PSO through exit survey is explained in Sec. K.1

### N.6 Indirect Attainment through alumni survey

An alumni survey is conducted at least once a year during alumni meet. This survey help and enable the departments to revise and modify the course contents as per the future needs of industries. For alumni survey relevant questionnaire related with PO-PSO is circulated to all alumni attending the meet and feedback collected. The questionnaire is given in Appendix III.

### N.7 Indirect Attainment through Employers Survey

Employers survey is conducted by the placement cell by sending e-mail to employers who visit the institute for campus recruitment. Feedback is also obtained from the recruiters when they come for placement of the students.

#### Total number of participants E

Response	Value	Response Value
Good	2	$2 \times E_1$
Excellent	3	$3 \times E_2$

$$\text{Average Response} = (2E_1 + 3E_2)/E$$

$$\text{Contribution to each PO-PSO} = 0.2 \times \text{Average Response}$$

### N.8 Parents Assessment

Parents Assessment is based on the basis of fulfilment of their expectations from the Institute in grooming their wards into successful engineers. It is done every year by the department from the parents of the graduating students.

#### Total number of participants P

Response	Value	Response Value
Low	1	$1 \times P_1$
Medium	2	$2 \times P_2$
High	3	$3 \times P_3$

$$\text{Average Response} = (1 \times P_1 + 2 \times P_2 + 3 \times P_3)/P$$

$$\text{Contribution to each PO/PSO} = 0.2 \times \text{Average Response}$$

### O. Evaluation Process

The questionnaire for exit survey and alumni survey consists of one question for each PO/PSO. Each question has three options namely low (1), medium (2) and high (3).

Indirect attainment of PEOs through indirect attainment of PO/PSO is given in Table XXXIII

**Table XXXIII: Indirect attainment of PEOs**

POs/PSOs	PO <sub>1</sub>	PO <sub>2</sub>	PO <sub>3</sub>	PO <sub>4</sub>	....	PO <sub>12</sub>	PSO <sub>1</sub>	PSO <sub>2</sub>
30% Response of Graduate Exit Survey	Attainment values of Graduate Exit Survey							
30% Response of Alumni Survey	Attainment values of Alumni Survey							



20% Response of Employers Survey	Attainment values of Employers Survey Same for all PO/PSO							
20% Response of Parents Assessment	Attainment values of Parents Survey Same for all PO/PSO							
Overall Indirect Response								

**Table XXXIV: Direct Attainment of PEOs through indirect attainment of PO-PSO**

POs/PSOs	PO <sub>1</sub>	PO <sub>2</sub>	PO <sub>3</sub>	PO <sub>4</sub>	....	PO <sub>12</sub>	PSO <sub>1</sub>	PSO <sub>2</sub>
80% of Direct Attainment through PO/PSO								
20% of Direct Attainment through Placement etc.	Attainment values through of Placement + Higher Students + Entrepreneurship Same for all PO/PSO							
Overall Indirect Response								

Overall Attainment of PEOs through PO-PSO is given in Table XXXV.

**Table XXXV: Overall Attainment of PEOs thorough PO-PSO.**

POs/PSOs	PO <sub>1</sub>	PO <sub>2</sub>	PO <sub>3</sub>	PO <sub>4</sub>	....	PO <sub>12</sub>	PSO <sub>1</sub>	PSO <sub>2</sub>
80% of Direct Attainment								
20% of Indirect Attainment								
Overall Attainment								

The attainment of PEOs can be obtained using the relationship between PEOs and PO-PSO as given in Table XXXI. The elements of matrix given in Table XXXVI can be filled using Table XXXV.

**Table XXXVI – Attainment of PEOs through overall attainment of PO-PSO**

PO/PSO	PEO <sub>1</sub>	PEO <sub>2</sub>	PEO <sub>3</sub>	PEO <sub>4</sub>
PO <sub>1</sub>				
PO <sub>2</sub>				
PO <sub>3</sub>				
PO <sub>4</sub>				
PO <sub>12</sub>				
PSO <sub>1</sub>				
PSO <sub>2</sub>				
Average PEOs				

## P. Appendix-I

### Course Outcomes of Project

After the completion of project the student should be able to

- (1) articulate the complex engineering problem statement, understand the existing literature, identify the objectives and analyse it.

- (2) develop professionalism and team work ability in project planning and implementation to ensure timely completion.
- (3) design and develop appropriate skills for fabrication/software development.
- (4) demonstrate project functionality and trouble shooting ability.
- (5) write effective report & design documentation and make impressive presentation.
- (6) reply queries raised and point out the future extension of the project.

### **Course Outcomes of Seminar**

After the completion of seminar the student should be able to

- (1) learn to select topic in emerging area of the branch chosen and understand the background literature.
- (2) analyse critically the existing literature, and point out the future scope.
- (3) develop oral as well as written presentation skill
- (4) answer questions raised during presentation
- (5) participation in seminars other than his/her own

### **Course Outcome of Industrial Training**

Having completed the industrial training, the student should be able to-

- (1) make comprehensive use of acquired technical knowledge to understand industrial processes.
- (2) acquire project management and problem-solving skills.
- (3) learn operation, maintenance aspects of industrial processes.
- (4) acquire oral and written communication and human resource management skills.
- (5) demonstrate professional and ethical responsibilities of an engineer.

## **Q. Appendix II**

### **Graduate Exit Survey Questionnaire**

- |  |     |
|--|-----|
| 1. I have acquired enough knowledge of Mathematics, Basic Sciences and Engineering to articulate problem statement, identify, Objectives and develop mathematical model to analyse it. | PO1 |
| 2. I am able to identify, search relevant literature and solve engineering problem.  | PO2 |
| 3. I am able to extract requirements from relevant engineering codes and standards and design appropriate system.  | PO3 |
| 4. I am able to build models/ prototypes based on the design.  | PO4 |

- |     |   |      |
|-----|---|------|
| 5.  | I am able to make use of relevant engineering tools and techniques to design appropriate experiments to test the products/prototypes and analyse the experimental data collected. | PO5  |
| 6.  | I am able to apply appropriate instrumentation and or software tools to make measurements of physical quantities.   | PO6  |
| 7.  | I have developed an understanding of the Impact of technology on social, environmental and economic aspects of the society.   | PO7  |
| 8.  | I am able to apply ethical principles, responsibility and norms of the engineering practice.  | PO8  |
| 9.  | I have developed sufficient understanding to apply management principles to work as a member and leader in a team to manage projects in multi-cultural environment.               | PO11 |
| 10. | I am able to communicate effectively on complex engineering problems with the engineering community and with Society at large   | PO9  |
| 11. | I am able to analyse and evaluate the projects on economic, environmental and sustainability aspects.   | PO12 |
| 12. | I am able to maintain composure in different situation and lead the team effectively.   | PO10 |
| 13. | I am able to analyse, design and implement application specific Electrical/Electronics/Civil/Mechanical/Information Technology/AI/IOT/Data Science system effectively.            | PSO1 |
| 14. | I am able to adapt to changing need of the society and to the rapid changes in the technology.  | PSO2 |

## **R. Appendix-III**

### **Alumni Feedback Survey Questionnaire**

- |    |  |     |
|----|--|-----|
| 1. | Do you think the knowledge of Mathematics, Science and Engineering fundamentals acquired during the Course period empowered you to solve complex engineering problems. | PO1 |
| 2. | Do you think that the course curriculum provided enough training to analyse problems you encounter during your professional work                                       | PO2 |
| 3. | Do you think the course curriculum help you design system components or processes that are appropriate from the consideration of social and environmental needs.       | PO3 |

4. Have you been trained enough during the course, to handle appropriate hardware/software tools to carry out project during your professional career. PO4
5. Do you think that the experience of conducting experiments in various laboratories helped you in your professional carrier in analysing and Interpreting data. PO5
6. Do you think your training in the use of IT technologies, modern software tools during the course was adequate for your profession. PO6
7. Do you think that the course curriculum facilitates you in cognitive, social, ethical and environmental growth. PO7
8. To what extent conduct of soft skill training, seminars, workshops and student development programmes have enabled you to improve oral, written communication and technical skills. PO8
9. Effort of the Institute in promoting internship, local field visits and industrial tour for students helped in broaden their outlook PO9
10. Do think your roll in performing group activities in laboratories, project work, extra and co-curricular activities helped in your development as a leader. PO10
11. How far this programme helped to prepare yourself for life-long learning. PO11
12. How far in your opinion the Institute has achieved its mission to promote quality education, training and research in the field of engineering. PO12
13. To what extent the course curriculum helped in enhancing technical knowledge in the chosen programme and your future prospective. PSO1
14. To what extent the course curriculum is helpful in tackling challenges of 21<sup>st</sup> century such as climate change, financial crisis, rapid developments in technology etc. PSO2

## S. Appendix IV

### Sample PEOs

#### PEOs

PEO1:	To empower students with strong fundamental Concepts, analytical capability and problem-solving skills.
PEO2:	To motivate students to pursue higher studies, Carryout industry sponsored innovative projects and undertake research.
PEO3:	To prepare students to embrace professional career growth in the chosen branch of engineering with values, ethics and urge for life long learning.

## 4. Research Policy

To promote quality education, the institute puts greater focus on research programs. All the departments of the institute have good research facilities.

- The departments of Electrical Engineering, Electronics and Communication Engineering, Computer Science and Engineering, Mechanical Engineering and Management Studies have research centers approved by Rajasthan Technical University. These departments are equipped with special research laboratories.
- Students pursuing Ph.D. degree are provided with scholarship. Institute also encourages the faculty members to pursue Ph.D. Part time.
- The institute has excellent library facilities. It supports the research initiatives of the faculty and research scholars by the following resources.
  - Printed reference and other latest books
  - Subscribes e-journals and printed journals
  - Assistance to faculty in buying books related to projects
  - Make available specific research papers to research scholars through inter library loan through DELNET/other local institutes.
  - Display of research papers published by the faculty in the international journals of repute
  - Excellent Wi-Fi facility (More than 1GBPS)
- To strengthen research programmes further the faculty is encouraged to participate and publish their research work in National and International journals of repute. For this purpose the institute provides financial support to the faculty members.
- Institute also publishes its in-house research journal for the last eleven years. Institute encourages faculty members to file for patents. The patent filing cost is partially met by the institute.
- Faculty members who publish research papers in SCI Journals with high H-index/Impact factor are felicitated and given cash award on Independence Day and those faculty members who publish their research papers in SKIT Research Journal are felicitated on Republic Day.
- Essential Conditions for the award to authors belonging to SKIT on Independence Day for publication of high quality research paper are-

- The research journal in which the paper is published must be listed at least in one of the following:
- SJR-SC Image Journal & Country Ranking
- Thomson Reuters
- SCI: Science Citation Index
- It must have H-Index/Impact Factor for the last three years.
- It is mandatory for the author to have reported in the paper his /her affiliation with SKIT and should have acknowledged the support received from the Institute.
- If the paper is contributed by more than one faculty member, the award money is shared by all the authors equally.

In order to enhance the research and development activities in the Institute, it has been decided to establish Research and Development Cell at the Institute level and DRC at the departmental level.

#### **4.1 Objective of Research & Development Cell**

- To create awareness regarding opportunities in research among the faculty and students.
- To promote interdisciplinary/multidisciplinary/trans disciplinary research as per guidelines of NEP-2020.
- To encourage the faculty to explore outside world for enhancing their research abilities.
- To frame policy. Prescribe rules & regulations and ensure the compliance of all research quality assurance framework and research code.
- To develop Institutional Research Information System.
- To identify the thrust area of research in each department and form related groups.
- To modernize existing laboratories by creating additional facilities for research in emerging technologies.
- To monitor research progress and optimize research resource and ensure timely completion of research projects.
- To review and monitor the level of projects at UG and PG level.
- To develop ecosystem for increasing research publications in reputed journals.
- To identify research funding agencies/industries and guide researchers in the preparation and submission of research proposals.

- To identify potential collaborators from industries, research organizations, academic institutions etc. for cooperation to undertake joint research projects.

#### **4.2 Composition of R & D Cell:**

The composition of R & D cell shall be as follows:

- Convener (To be nominated by AMC)
- DRC member of each department (Engineering, Sciences, Humanities, DMS)
- SPOC of AICTE/DST etc.
- PG Coordinator (Institute Level)

**Duration:** Three Years

**Frequency of Meeting:** Meeting may be held as and when required but it should be at least one per semester.

#### **4.3 Departmental Research Committee (DRC)**

In addition to R & D Cell, each department (Engineering, Sciences, Humanities, Management) shall have DRC of its own.

##### **4.3.1 Objectives of DRC**

- To function at the departmental level in the light of objectives of the Institutional R & D Cell.
- To Check and appraise to the institutional R & D Cell about the progress regarding research work done by the faculty /research fellows of the department by examining them from time to time.

##### **4.3.2 Composition of DRC**

The composition of DRC shall be as follows:

- Coordinator (One senior faculty of the department of the rank of Professor/Associate Professor to be nominated by AMC)
- All Professors of the department (Members)
- Two Associate Professor of the department (Members)
- P.G. Coordinator (Member)

**Duration:** Three Years

**Frequency of Meeting:** Meeting may be held as and when required but it should be at least two per semester.

## 5. Consultancy Policy

### Consultancy Cell

In order to encourage the faculty to undertake consultancy/ testing/ training assignments, a consultancy cell is created at the Institute level.

#### 5.1 Objective of Consultancy Cell

- To frame policy, rules and regulations to ensure compliance of consultancy assignments.
- To encourage faculty and staff to improve their skills and knowledge about standard professional practices for adoption.
- To establish linkage with industries, government organizations and institutes for consultancy/testing/training assignments.

#### Composition of Consultancy Cell:

- Convener (To be nominated by AMC)
- Training and Placement Head (Ex-officio member)
- One Member (To be nominated by AMC)

**Duration:** Three Years

**Frequency of Meeting:** Meeting may be held as and when required but it should be at least two per semester.



## 6. Policy Regarding Higher Education

The institute is promulgating the following policy regarding the higher education for faculty to pursue part-time M. Tech./ Ph. D. programmes.

### 6.1 Purpose

- Purpose of the policy is to enhance faculty talents.
- Provide opportunity for individual growth.
- Strengthen stability of faculty at SKIT.

### 6.2 Eligibility

- Any faculty member who has completed at least one year of employment with good performance is eligible for this program.
- The employee may apply for permission to pursue higher studies in local institutes.
- The permission has to be sought in writing giving the details of the program, degree sought, branch, institute of study, duration and any other pertinent information.

### 6.3 Permission

The institute will permit the faculty members subject to the following constraints:

- Only two members for M. Tech. and two members for Ph. D. will be allowed from one of department at a time. This is to mean that if the study course is two years duration and two members of a department have already been allowed then no other member will be allowed to enroll until they have completed their course work.
- Permission will be granted on the basis of undertaking from the employee stipulating that.
  - The employee will serve at least one year after he completes his/her intended program at the institute of study.
  - The employee undertakes to allow SKIT to withhold ten percent of the salary during the study period.
  - The salary amount so withheld will be released to the employee after he completes one year of service at SKIT after he gets the intended degree.
  - The salary amount so withheld is subject to forfeiture if the employee violates the terms of this undertaking given by him/her voluntarily.

#### **6.4 Implementation**

- After permission has been granted the institute will adjust its academic calendar to allow the employee time for completing his course work.
- If more than permissible number of faculty members are applying for this scheme, then the management will select the candidates to grant permission based on their employment duration their relative performances and contributions to SKIT.
- One increment in the pay scale will be allowed after the completion of M. Tech. degree program and two increments after the completion of Ph. D. degree programme.

#### **6.5 Benefits**

- The management will allow additional increment in the pay scale of the employee after the award of the intended degree.

#### **6.6 Definitions**

- For the purpose of this document the following terms are to be taken to mean
- Course work: Attending classes and to carry out other academic activities for which the physical presence of the candidate is mandatory for his program of study on the campus of the institute where program is being pursued.
- This includes defense of the thesis/dissertation being submitted but does not include preparation or writing of thesis/dissertation as the same can be done from anywhere else.

#### **6.7 Rules for sponsoring a faculty member for Higher Education**

A faculty member pursuing higher education may be sponsored subject to the following conditions:

- A candidate should have a minimum of three-years of teaching experience.
- If Institute is sending the candidate on deputation and paying full salary, then candidate will have to write an undertaking to provide his/her service to the institute at least for three years.
- After completing higher education, candidate may be given promotion and other benefits.
- If candidate violating the undertaking, then he/she has to refund the amount paid by the institute along with 10% extra of the amount paid by the institute.
- If institute is not paying salary for that period and manipulating the account, then Income Tax and P.F. amount should be deposited by the institute and after completion candidate will refund total deposited amount to the institute.
- If institute is not paying any salary and not manipulating the account then candidate should give an undertaking to the institute that after completing higher education, he/she will not work with

any other private engineering college other than SKIT but he/she is free to work with other organizations or further education.

## **7. Policy for QIP Sponsored Higher Education**

The institute has decided to pursue vigorously its policy to promote quality education. In order to achieve its goal of quality education it is necessary that the teaching faculty must be well trained and qualified, due to non-availability of well qualified faculty the institute has decided to encourage and sponsor faculty members to the various centers of higher learning under Quality Improvement Programme (QIP) sponsored by AICTE.

### **7.1 Purpose**

- To improve quality of teaching faculty.
- To recognize and support meritorious teachers.
- To provide opportunities for up gradation of knowledge and skills of teachers.
- To encourage research and development.

### **7.2 Eligibility**

- Any faculty members possessing good B. Tech degree and who has put in at least two years of employment with SKIT with good performance is eligible for sponsorship under this scheme for doing M. Tech. at any of the QIP centres recognized by AICTE.
- For doing Ph. D. degree under the scheme the faculty member must possess good M. Tech. degree with at least three years of employment with SKIT with good performance.
- The faculty member may apply for permission to pursue higher studies (M. Tech. or Ph. D.) at any of the QIP centers.
- The permission has to be sought in writing giving details of the programme, degree sought, branch and institute of study, duration and other pertinent information.

### **7.3 Permission**

The institute may permit the faculty members subject to the following constraints-

- From each department not more than one faculty member for M. tech and not more than one faculty member for Ph. D. will be sponsored at a time. No other faculty member will be

considered for sponsorship till the previously sponsored faculty member returns back and joins the department after expiry of leave period.

- The faculty member will have to execute a bond on the stamp paper that he/she will serve the institute for a period of two years after availing a leave of two years for doing M. Tech. and for a period of three years after availing a leave of three years for doing Ph. D.

#### **7.4 Extension of leave period**

- Initially the leave granted will be for a period of one year. On receipt of satisfactory progress report from the institute where the faculty member is pursuing higher education the leave period will be extended up to a total maximum period of two years for M. Tech. and up to a maximum total period of three years for Ph. D.
- If a faculty member on the recommendations from the QIP Institute extends leave beyond the maximum period allowed, he/she will have to execute another bond extending the bond period by duration equal to the extended leave duration.

#### **7.5 Implementation**

- The candidate will have to seek admission under QIP at any one of the designated centre on his own after checking eligibility conditions as mentioned earlier.
- If more than permissible numbers of faculty members apply under the scheme, then the Principal will select the candidate on the basis of seniority, their employment duration with the Institute and their relative performance. The decision of the Principal will be final and binding.

#### **7.6 Benefits**

- The sponsored candidates will be paid half the total emoluments which he/she was drawing at the time of relieving for going to the QIP Centre for the entire duration of leave period. The Income tax and PF will be deducted and deposited as per rules.
- On joining the parent Institution after completion of higher education, the faculty member will be given two additional increments for M. Tech. and three additional increments for Ph. D. These increments will be in addition to the annual increments for the leave period which will be released on rejoining the Institute.
- After completing higher education the faculty member may be rewarded with promotion.

### **7.7 Non-fulfillment of bond obligation**

If the faculty member fails to join back the Institute after availing leave he/she will have to refund twice the amount he/she has received from the Institute during the leave period.

## **8. Policy for Sponsoring Higher Education**

A faculty member pursuing higher education may be sponsored subject to the following conditions:

- A candidate should have a minimum of three-years of teaching experience.
- If Institute is sending the candidate on deputation and paying full salary then candidate will have to write an undertaking to provide his/her service to the institute at least for three year.
- After completing higher education, candidate may be given promotion and other benefits.
- If candidate violating the undertaking then he/she has to refund the amount paid by the institute along with 10% extra of the amount paid by the institute.
- If institute is not paying salary for that period and manipulating the account then Income Tax and P.F. amount should be deposited by the institute and after completion candidate will refund total deposited amount to the institute.
- If institute is not paying any salary and not manipulating the account then candidate should give an undertaking to the institute that after completing higher education, he/she will not work with any other private engineering college other than SKIT but he/she is free to work with other organizations or further education.

## 9. Policy for Promotion of Faculty/Staff Member

### 9.1 Career Advancement Scheme

Applications will be invited every year from the eligible in-house candidates. They will be required to fill the prescribed application form and submit the same to the Principal along with the supporting documents. After a thorough scrutiny these applications will be placed before the Selection Committee. The composition of the Selection Committee will be as follows:

1. Chairman
2. Director
3. Principal
4. Dean
5. HOD, if of the rank of Professor
6. At least one subject expert

The candidates may be promoted to the next higher position if found suitable by the Selection Committee.

The pay scales for various teaching posts in Swami Keshvanand Institute of Technology, Management and Gramothan will be as follows:

1. Assistant Professor (Category 1): (15600-39100) + AGP 6000+DA+PF
2. Assistant Professor (Category 2): (15600-39100) + AGP 7000+DA+PF
3. Associate Professor (Category 1): (15600-39100) + AGP 8000+DA+PF
4. Associate Professor (Category 2): (37400-67000) + AGP 9000+DA+PF
5. Professor: (37400-67000) + AGP 10000+DA+PF

The promotion under career advancement scheme for the faculty will be as under:

#### **1. Assistant Professor (Cat. 1) To Assistant Professor (Cat. 2)**

- The minimum length of service for eligibility to move into the grade of Assistant Professor (Category 2) would be three years for those with Ph.D. (Science/Humanities), and four years for those with M.Tech/M.E. at the level of Assistant Professor (Category 1). Out of this service at least two years should be at SKIT. Previous teaching experience would be considered provided it is of at least degree level. Those having Ph.D. degree in Engineering from a reputed

institute may be considered for promotion to the post of Assistant Professor (Category 2) without previous teaching experience.

- Significant contribution to teaching/academic environment.
- Contribution in organising extra curricular activities, maintaining discipline, helping in admissions, examinations and other administrative works.
- It is desirable to have attended in-house faculty development programme, published research papers in SKIT Research Journal, Guided student projects, and Industrial projects.
- It is desirable to have contributed in the development of laboratories by upgrading experiments/laboratory manual etc.
- It is desirable to have developed course material, prepare course file and uploading them on D-Space.

## **2. Assistant Professor (Cat. 2) To Associate Professor (Cat. 1)**

An Assistant Professor (Category 2) will be eligible for promotion to the post of Associate Professor (Category 1) if he/she has

- completed 4 years of service as Assistant Professor (Category 2)
- Obtained Ph.D. degree from a reputed institute.
- Significant contribution to teaching/academic environment.
- Must have attended faculty development programmes in-house and at other reputed institutes.
- Published research papers in SKIT Research Journal and or other International/National Journals of repute.
- Must have taught at M.Tech. level, guided M.Tech. dissertations, guided student projects, undertaken industrial projects etc.
- Contributed in organising extra curricular activities, helped in NBA accreditation work, publication of SKIT Research Journal, SKIT Times, admissions, examinations, campus placement and other administrative works.

## **3. Associate Professor (Cat. 1) To Associate Professor (Cat. 2)**

- Must have obtained a Ph.D. degree from a reputed institute and possess a minimum of two years of post-Ph.D. teaching experience as Associate Professor (Category 1)
- Significant contribution to teaching/academic environment.

- Published research papers in SKIT Research Journal and or other International/National Journals of repute, published books, monograms etc.
- Must have taught at M.Tech. Level, guided M.Tech. Dissertations, guided student projects, undertaken industrial projects etc.
- Contributed in organizing seminar/conference/workshop etc, helped in NBA accreditation work, delivered invited talks at other institutes.
- Significant contribution in motivating and providing career counseling to students for their holistic development.
- It is desirable to have undertaken consultancy work.

#### **4. Associate Professor (Cat. 2) to Professor**

- Completed 3 years of service as Associate Professor (Category 2)
- Possesses consistently good performance appraisal reports
- Significant contribution in research by way of publications in reputed International/National Journals, published books, monograms etc.
- Significant contribution to teaching/academic environment.
- Supervised innovative projects, undertaken industrial projects, undertaken consultancy work etc.
- Contribution in organizing seminar/conference/workshop etc, helped in NBA accreditation work, delivered invited talks, chaired sessions, organized FDP.
- Must have taught at M.Tech. Level, guided M.Tech. Dissertations.
- Desirable to have Ph.D. guiding experience.

### **Minimum Qualification and Pay Scales for Laboratory Staff/Workshop Staff**

#### **1. JUNIOR Laboratory Assistant /Assistant Technician**

These positions are for semi-skilled persons who may be promoted from peons or helpers as a stop-gap-arrangement.

Minimum Qualifications:-10<sup>th</sup> pass with some experience.

Grade (4440-7440)+AGP Rs 1300/-+ DA\*+PF\*\*

Increment Rs. 290/-

#### **2. Laboratory Assistant/Technician.**



**Minimum Qualifications:-**ITI in the concerned trade for workshop and B.Sc. in the subject of concerned science laboratories.

Grade (5200-20200) + AGP Rs 1900/- + D.A.\* + P-F\*\*

Increment Rs 355/-

### **3. Technical Assistant/Senior Technician.**

**Minimum Qualification: -** Diploma in the branch of concerned Engg. /PGDCA/M.Sc.(CS or IT).

Grade (6200-20200) + AGP Rs 2800/- + D. A\* + P.F. \*\*

Increment Rs 450/-

### **4. Senior Technical Assistant/ Foreman.**

**Minimum Qualification: -** AMIE or B. E./B. Tech. in the branch of concerned Engineering/ MCA.

Grade (9300-34800) + AGP Rs 4200 + D.A\* + P.F.\*\*

Increment Rs. 675/-

The higher positions may be filled directly or by promotions from the lower cadre. Any person who has put in a continuous service of 8 years out of which at least four years of service at SKIT in a particular grade and whose performance has been adjudged satisfactory may be considered for the next higher grade.

**D. A.\* and P.F. \*\*** will be as applicable from time to time

Maximum P.F. deduction will be on Rs 6500/- Only.

## **9.2 Performance Appraisal Scoring System: PASS (Revised version 2022-23)**

### **9.2.1 Objective**

The main objective of introducing performance appraisal scoring system (PASS) is to introduce a transparent system to motivate each member of faculty to perform better and better in delivering quality education and research in SKIT. The results of this assessment shall be used for the following purposes.

1. Award of annual increment in the pay bands.
2. Award of career advancement/promotion
3. Monitoring and recording of the regular growth of each member of faculty for ready reference.

The assessment shall be carried out every academic year after completion of the academic year. The overall performance of a faculty member during an academic year will be judged on the basis of the Credit Points earned as given below:

Range of Credit Points Earned	Grade Description
Greater than or equal to 80	Excellent
Greater than or equal to 70 and less than 80	Very Good
Greater than or equal to 60 and less than 70	Good
Greater than or equal to 50 and less than 60	Fair
Less than 50	Unsatisfactory

*Annual increment may be withheld for faculty member getting less than 50 credit points during any academic year.*

The performance appraisal system report comprises two parts. The Part A is ‘Self-Appraisal’ to be filled by the faculty member and Part B is ‘Remarks of the Reporting Officer’ to be filled by the respective HOD or Officer nominated by the Head of the Institute.

### 9.2.2 Components of Assessment and Performance of Faculty Member

The job responsibilities of a faculty member can be broadly classified into six components which are given following:

S. No.	Category	Max. Credit Points
I	Academic Activities	30
II	Research Activities	30
III	Extension Activities	10
IV	Administrative Activities	15
V	Extra-Curricular Activities	5
VI	Credit Points by HoD	10

#### I Academic Activities (30)

##### 1. Teaching

*Performance of students in the theory courses taught:*

Semesters	Pass Percentage	Credit Points
B. Tech. I & II	More than 60	16
	Between 50 & 60	08
	Less than 50	0
B. Tech. III & IV	More than 80	16
	Between 70 & 80	8
	Less than 70	0

B. Tech. V & VI	More than 90	16
	Between 80 & 90	8
	Less than 80	0
B. Tech. VII & VIII	More than 95	16
	Between 85 & 95	8
	Less than 85	0
MBA	More than 70	16
	Between 60 & 70	8
	Less than 60	0
M. Tech.	More than 70	16
	Between 60 & 70	8
	Less than 60	0

*Additional Credit Points 4 will be awarded if **Grade Point Average** of all the students taught  $\geq 6.0$*

*Additional Credit Points 2 will be awarded if **Grade Point Average** of all the students taught  $\geq 5.0$  but  $< 6.0$*

## **2. Related Development Activities**

### *a. Qualification Added*

Qualification	Credit Points
Ph. D. from NIT/IIT/CU/CSIR	14
Ph. D. from RTU (SKIT)/ State Universities/IIT	12
Ph. D. from RTU (other Institutes)	10
Ph. D. from other private Universities	7

### *b. Publication of a new book/book chapter*

Publisher	Credit Points	
	Main Author	Co-Author
Book Publication by International Publisher	8	6
Book Publication by National Publisher	4	3
Book Publication by Regional/State Publisher	3	2
Book Chapter	2	1

### *c. Awards, Honours and any other Academic Distinction received*

Award	Credit Points
International Award	10
National Award	7
Local Award	2

### *d. Member of any Statutory Body of RTU or any other University*

Membership	Credit Points
Board of Governors	4
Academic Council	3
Board of Studies	2

e. Foreign visit related with academic work as a visiting member: **10**

f. Invited lectures and Chairmanship at International/National Conference

International/National Conference	Credit Points
International conference outside India	10
International conference outside state	8
National Conference outside state	5
International/National Conference within state	2

g. Recording of quality video lectures (one full course) **4**

h. Certification in MOOCs (SWYAM-NPTEL): Courses which are equivalent to FDP as per AICTE

Course Duration	Credit Points*			
	Topper	Gold	Silver	Successful
12 week course	12	8	6	4
8 week course	8	6	4	2

**\*On completion of courses from MOOCs not having equivalent FDP only 50% Credit Points shall be awarded.**

i. For developing on-line courses for SWYAM

Course duration (weeks)	Credit Points
12	12
8	8
4	4

j. For adding new experiment under Virtual Lab at National Level: **10**

## II Research Activities (30)

a. Academic Research : Research Guidance (degree awarded)

Degree	Credit Points
Ph.D.	8 per candidate
M. Tech.	3 per candidate
B. Tech. (Project)	2 per group

b. Sponsored Research

S.No	Sponsored Research	Credit Points
i.	Preparation and submission of each project proposal to funding Agency	2
ii.	Sponsored ongoing project	
	For each major project (Rs. 3.0 lakh & above)	5
	For each minor project (Rs. 0.15 lakh above)	3
iii.	For each complete major project on submission and approval of final report by funding agency	10
iv.	Patent Publication	2

v	Project outcome (Patent Granted / Technology/ Product/ Process)	10
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c. *Research Publication*

Journal Type	Credit Points	
	Author	Co-Author
For each paper in SCI Journal (Ratings Q <sub>1</sub> , Q <sub>2</sub> )	10	5
For each paper in UGC CARE LIST II and SCI Journals (Ratings Q <sub>3</sub> & Q <sub>4</sub> )	8	4
For each paper in UGC CARE LIST I and SKIT Research Journal	6	3
Other Journals having ISBN/ISSN & DoI Numbers and Conference Proceedings	3	2

**III Extension Activities (10)**

S.No.	Activities	Credit Points
i.	Consultancy Project Carried out/ongoing (Amount mobilized for every 0.5 lakh)	4
ii.	Carrying Routine and Developmental (Testing services as per standards for every 0.15 lakh)	2
iii.	Conferences/seminars/workshops/symposia etc. organized for International/National Level	
	a. As Coordinator/Convener (for more than 1, credit points will equally divide)	2/day (Max.5)
	b. As Organizing Secretary	1/day (Max.3)
	c. As Organizing Committee Members	0.5/day
	<i>50% Credit Points for state and college level (Publication of proceedings with ISBN No./Special Issue of Journal is mandatory for awarding credit points to convener and Organizing Secretary)</i>	
iv.	Conferences/seminars/workshops/symposia etc. attended and presented a paper at IITs/NITs / BITS/Central University/ State University/IITs	3
	Conferences/seminars/workshops/symposia etc. attended and presented a paper at institutes other than above	2
v	Refresher/Orientation/Summer School/Winter School/ FDPs/ Training/soft skill development programme/methodology workshops organized	
	<b>1. Two Week Duration</b>	
	a. As Coordinator/convener	5
	b. As Organizing Secretary	3
	c. As Organizing Committee Member	2
	<b>2. One Week Duration</b>	
	a. As Coordinator/Convener	3
	b. As Organizing Secretary	2
	c. As Organizing Committee Member	1

vi	Refresher/orientation/summer school / winter school / FDPs/ Training / soft skill development programme / methodology workshop attended at IITs/NITs Central University/ State University/IITs/BITS	
	a. Duration 2 week	4
	b. Duration 1 week	2
	Refresher/orientation/summer school / winter school / FDPs/ Training / soft skill development programme / methodology workshop attended at Institute other than above	
	a. Duration 2 week	2
	b. Duration 1 week	1
vii	Extension Lecture delivered at any other Institute	2
viii	Hackathon organized	
	a. As Coordinator/convener	3
	b. As Organizing committee members	2

#### IV Administrative Activities (15)

S.No.	Activities	Credit Points
i	Departmental Dy. HOD	4
ii	Dy. Incharge Examination Cell	4
iii	UG/PG Examination Cell Coordinator	3
iv	Member Examination Cell	2
v	Chief Proctor	4
vi	Proctors	2
vii	Laboratory Incharge	2
viii	Member-Office of Student Affairs	2
ix	Member-Office of Faculty Affairs	2
x	Chief Counsellor (Department)	2
xi	Batch Counsellor	2
xii	Advisor SKIT Research Journal	4
xiii	Editors SKIT Research Journal	2
xiv	Editor-in-Chief SKIT Times	4
xv	Editors SKIT Times	2
xvi	Chief Coordinator Professional Society/Student Chapter	3
xvii	Coordinator Professional Society/Student Chapter	2
xviii	Coordinator E-Cell	2
xix	Chief Coordinator Alumni Association	3
xx	Coordinator Alumni Association (Department)	2
xxi	MOOCs Coordinator/Mentors	1-4 (To be awarded by Director (Academics))
xxii	NPTEL Certified Top Performing Mentors	
xxiii	NPTEL Star Certificate Holders	
xxiv	Chief Coordinator Admission & Counselling Cell	4
xxv	Member Admission & Counselling Cell	2

xxvi	Nodal Coordinator virtual lab	2
xxvii	Coordinator virtual lab	2
xxviii	Coordinator FOSS Local Chapter	2
xxix	Industrial Tour Incharge	2
xxx	Placement Mentor	2
xxxi	Members DPAQIC	2
xxxii	Convener-Institution's Innovation Council/Incubation Cell	5
xxxiii	Member incubation cell	2
xxxiv	Coordinator NIRF	2
xxxv	Coordinator AISHE	2
xxxvi	Coordinator Time Table	2
xxxvii	Coordinator ERP	2
xxxviii	NAAC Core Team Members (To be awarded by NAAC Coordinator/Dean)	3-5
xxxix	NBA Coordinator (Institute Level)	4
xl	SPOC (AICTE/DST)	2
xli	Coordinator-IPR Cell	3
xlvi	Member-IPR Cell	2
xlvi	Coordinator-UHV & EC	3
xliv	Member-UHV & EC	2
xlvi	PG (M.Tech/PhD) Program Coordinator (Central)	3
xlvi	PG (Department) Coordinator	2
xlvi	Nodal Officer NITTT	2
xlvi	Coordinator-AICTE 360 Degree Feedback	3
xlvi	Coordinator -Institute Website (Institute level)	3
l	Coordinator -Institute Website (Department level)	2
li	Coordinator-REVAMP	3
lii	Hospitality Committee Member	2
liii	Coordinator Women Cell	3
liv	Coordinator Skill Development Cell	3
lv	Coordinator BIS Cell	3
lvi	Parakh/Vidyanjali/other Nodal Officer AICTE/DST	2

#### V Extra-Curricular activities (5)

S.No.	Activities	Credit Points
i	Coordinator Sports & Games	3
ii	Chief Coordinator Pravah	5
iii	Members Core Committee Pravah (To be awarded by Pravah Chief Coordinator)	0-2
iv	Chief Coordinator Extra Curricular Activities	3
v	Coordinator various clubs	2
vi	Coordinator NSS	2
vii	Chief Coordinator/ Coordinator Blood Donation Camp	2

viii	Coordinator Media & News	3
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All the Chief and other coordinators of extracurricular activities will have to submit detailed report of the activities organized during the academic year latest by 31<sup>st</sup> March failing which Award Points will not be granted.

#### VI Credit Points by HoD (10)

##### a. Student feedback in theory courses taught(ERP)

Feedback	Credit Points
Excellent	5
Very Good	4
Good	3
Average	2

##### b. Participation in NBA/NAAC accreditation activities (at Department level): 0-4

##### c. Organizing certificate course for working people (More than 6 participants):4

##### d. Coordination with colleagues in departmental activities 0-2

##### e. Participation in departmental activities other than NBA/NAAC 0-2

##### f. Contribution towards the overall growth of department 0-2

##### g. Contribution in course designing 0-2

##### h. Punctuality in discharging duties 0-2

#### Important Note:

Criteria I, II, III & VI are to be verified by respective HOD

Criteria IV is to be verified by OFA

Criteria V is to be verified by OSA

### 9.2.3 Components of Assessment and Performance of Non Teaching Staff

#### Part A: To be filled by the staff members

Name of the staff

Designation

Department

Date of Joining

Date of last promotion

Current salary

Qualifications

Qualification upgraded if any during the current session

Details of any staff development programme attended

Skill upgraded if any during the current session

Date

Signature of the staff

Place

Name:



**Part B: To be filled by the Reporting Officer**

(Laboratory incharges or other officer nominated)

By Head of the Department

Whether the staff member is regular in attendance	YES/NO
Does the staff sincere to his/her work	YES/NO
Is he/she courteous and helpful to students	YES/NO
Knowledge of staff member about his/her job	Good/Average/Poor
Does the staff member take initiative in the job assigned	YES/NO
Aptitude of the staff member in upgrading his/her knowledge in his/her domain area	Good/Average/Poor
Whether the staff member has taken +ve/-ve initiative to upgrade his/her qualification	YES/NO
Does he/she take keen interest in the repair and maintenance of the laboratory	YES/NO
Has he/she attended any staff development programme to enhance his/her skill	YES/NO
If yes, has he/she improved after training	YES/NO
Has he/she introduced any innovative idea at any time during the session	YES/NO
How is the staff member's inter-personal relationship with his/her	
(i) Superiors – Faculty members	Good/Average/poor
(ii) Colleagues	Good/Average/Poor
Any other contribution worthy of mentioning.....	
Certified that I have personally verified all the information provided in Part A by Shri/Smt./Kumari/..... and the remarks and the statements entered by me in Part B are true to the best of my knowledge and belief.	

**Signature of the Reporting Officer**

**Date**

**Name**

**Place**

**Designation**

**Countersigned by the Head of Development Concerned**

**Date**

**Signature of the HOD**

**Place**

**Name**

## **10. Policy for Financial Support: Professional Development Allowance (PDA Policy 2021)**

To pursue vigorously the policy to promote quality education, the Institute has decided to put greater emphasis on post graduate and research programmes. To strengthen these programmes the faculty will be encouraged to participate and publish their research papers in National and International journals of repute. For this purpose the Management may provide financial assistance. Request for financial assistance to attend national and international conferences, seminars and workshops for the purpose of presenting papers will also be considered but will have lower priority.

### **10.1 Purpose**

- To promote faculty development activities.
- To strengthen PG programmes.
- To encourage research and development.
- To allow the faculty to interact with faculty of institute of higher learning.

### **10.2 Eligibility**

From Financial year 2023-24, PDA policy is applicable to all the faculty members who have completed probation period successfully at SKIT. Such Faculty members are eligible for the Professional Development Allowance (PDA) of ₹7000/- in a financial year (i.e. 1<sup>st</sup> April to 31<sup>st</sup> March) with a maximum of ₹5000/- per six months. The revised PDA policy will be effective from 1<sup>st</sup> April, 2023.

The fund is intended to be used by all of the eligible faculty members for academic growth and global exposure.

### **10.3 Order of Priority**

- Top priority will be given to those whose research papers are accepted in the standard refereed international journals. The faculty members will have to seek travel and other financial assistance from the bodies like AICTE, UGC, CSIR, DST etc. The management may grant them subsidy on the recommendations from the Principal on the basis of reputation of the journal, seniority of the faculty and the availability of funds.
- Second priority will be given those whose research papers are accepted in the refereed National journals of repute. All such faculty members will be granted full registration fee, to and fro

railway/bus fare and boarding and lodging expenses if the same are not provided by the organizers.

- Peer reviewed research papers accepted for presentation in international/national conference to be held in India in the Institute of National importance (IISc, IITs, IIMs, NITs and Central Universities etc.) will be given next priority, The faculty members will be given 50% of the registration charges and full to-and-fro rail/bus fare and boarding and lodging expenses if the same are not provided by the organizers.
- Research papers accepted for presentation in local and other conferences where papers are not peer reviewed will be given the last priority. In all such cases only 50% of total expenses which may include registration charges, to-and-fro rail/bus fare and boarding and lodging charges will be reimbursed.

#### **10.4 PDA Policy**

Each financial year, funds allocated for professional development should be utilized to the following activities:

- To attend Seminars, Workshops, Conferences, Short Term Courses (STC), Faculty Development Program (FDP), Meetings of Professional Bodies, etc., (Event) in India or abroad.
  - a. International event within State up to ₹1500 (Maximum 50% of Registration)
  - b. National event within State up to ₹1000 (Maximum 50% of Registration)
  - c. International event within India up to ₹3000 (Maximum 50% of Registration)
  - d. National event within India up to ₹2000 (Maximum 50% of Registration)
  - e. International event outside India up to ₹5000 (Maximum 50% of Registration)
  - f. Event within SKIT\* up to ₹1500
  - g. The maximum amount of INR 2000/- or 50% of registration fee (whichever is less) will be reimbursed to attend an online event. No amount will be reimbursed to attend an online event within Jaipur.

***\*HODs may use PDA allocated to the department for conducting such academic events in the absence of or not sufficient any external funding subject to the above mentioned condition. For this each faculty members have to be registered in the event and attend all the sessions actively. Process of reimbursement will remain the same.***

- For membership fee of professional organizations relevant to one's domain (up to ₹2000 only or 50% of actual fee paid whichever is less).

***(There is no restriction on number of membership of Professional organizations availed per year under the limit of ₹2000/-)***

- For payment towards online courses like MOOC, etc., to enhance professional competency, on production of certificate of completion (Maximum ₹2000 and up to ₹1000/- per course). As our institute is a part of SWAYAM NPTEL local chapter so all the faculty members should answer “YES” to the questions related to information sharing with the institute. In addition to the existing policy from April 1, 2023, the reimbursement of examination fee is made permissible for Non-Teaching Staff for doing On-line courses (Maximum INR 1000/- per financial year) through MOOCs. The course should be relevant to enhance technical and professional skills. In such case the prior-approval from respective head of the department is mandatory.
- Professional Courses/Certification courses like machine learning, cyber security, leadership development program, quality management or other emerging field offered by renowned professional bodies/institution of repute (Maximum ₹2000 per annum with prior approval)
- For payment of filing charges of Patents (Maximum ₹7000 per financial year) wherein the institute must be mentioned as applicant. The claim can be made only after successful publication of patent. The application must be forwarded and recommended through IPR Cell

### 10.5 Conditions

In all the activities/events, faculty members are required to mention his/her affiliation as *Swami Keshvanand Institute of Technology, Management & Gramothan, Jaipur*. The name faculty member must be the same as mentioned in appointment letter.

### 10.6 Guidelines for participating in the conferences

- a. During a financial year, faculty members may attend one National and one International conference related to their research or academic field, organized by any recognized university or other premier institution.
- b. Faculty member must present paper/poster while attending a conference and produce evidence of the same for claiming the reimbursement.
- c. The faculty members should attend reputable/indexed conferences organized by premier institutions or societies to contribute to cascading knowledge within the academic community.
- d. If paper presentation is held abroad then there should be a prior presentation in the Department before the DPAQIC (Departmental Programme Assessment and Quality Improvement Committee).

### **10.7 Guidelines for participation in the Workshops/Faculty Development Program (FDP) / Short Term Course (STC)**

During a financial year, faculty members may attend one workshop, one faculty development program (FDP), and one Short Term Course (STC) related to their research or academic field, organized by any recognized university or other premier institution.

### **10.8 Procedure of approval of PDA application**

- a. In order to participate in conferences, workshops and other events inside and outside India, prior approval from the authority responsible is required.
- b. A completed application must be submitted to HOD one month before an event taking place in India and two months before for events occurring in abroad.
- c. After receiving approval from the HOD, all such applications should be sent to the Director (Academics)/Principal
- d. After obtaining approval from Director (Academics)/Principal the application will be submitted to Registrar/HR office (for records).
- e. Un-availed amount of PDA in a financial year will not be carried forward to the next financial year.

### **10.9 Post event report submission**

- a. Faculty has to submit the complete form through proper channel.
- b. Reimbursement of expenses will be made only on claims which are supported by original vouchers, receipts, and on production of certificate of attendance and post attendance report.
- c. The faculty must provide a report on their presentation/publication in Conference / Workshop / FDP / STC.
- d. A faculty member must present their findings to their peer group after the event.
- e. Quarterly report (in the prescribed format) has to be submitted to Director (Academics)/Principal by the HOD otherwise new applications will not be considered from respective department.
- f. The applicant needs to complete the formalities within one week after the completion of event.

### **10.10 Grant of leave**

- In all such cases the faculty members will have to apply in advance for academic leave out of six for which they are eligible. For presentation of research paper outside India the faculty members may be granted academic leave in excess of six academic leave if need arises.

*(Note: In case the applicant does not attend the event after getting approval due to some unavoidable circumstances, the information should be provided to Director (Academics)/Principal by e-mail with copy to HOD)*

## 11. Policy for Entitlements for Travel and TA/DA

### 11.1 Preamble

The aim of these rules is to ensure that all concerned are aware of their entitlements for moves on duty, the mode of transport authorized, the TA/DA and incidentals they can claim, and the amounts that would be reimbursed for meeting the Hotel expenses. It is necessary that all members of SKIT family exercise restraint in expenditure while on duties involving official moves outside the college. The duties must be planned well in advance and maximum advantage must be taken of low fares especially when travelling by air. Short distance journeys to places within Rajasthan and to places within 500 kms would always be undertaken by bus/taxi/train. All claims would be made on actual expenditure incurred.

### 11.2 Classification of Duty

#### a. Local Duties within Jaipur. Instructions regarding:

- Reimbursement on use of own Transport. For duties within Jaipur, personal transport would be made use of. No reimbursement would be made in case of one-off duty to places located close-by. However, in case the duty requires frequent travel, a request for reimbursement of fuel charges may be made.
- Use of Institution Transport. The institutional transport, being a limited resource, cannot be normally made available for local duties. However, in case own transport is not available, the staff/faculty member must make a request for using SKIT transport. The request duly recommended by the respective HOD, would be put up to the Registrar for approval. Such requests must be made at least a day in advance. When using the Institution transport, it should be ensured that the no misuse occurs and it is used exclusively for the purpose sanctioned.
- Use of City Taxis/Auto Rickshaws/Buses from/to Rly/Bus Station or the Airport. Use of private taxis/auto rickshaws/city buses may be made for specific purposes like travelling to and from the institute/residence to the airport/railway station/bus station as part of an official duty. Actual expenditure incurred on taxi charges may be claimed as reimbursement. The entitlements would be as under:
  - Normal Taxi-Professors and above and equivalents.

- Shared Normal Taxi-Associate Professors (Categories 1 & 2) and equivalents.
- Auto Rickshaws-Assistant Professors (Categories 1 & 2) and equivalents.
- Buses-Technical Assistant and Class IV staff.

**b. Out Station Duties.**

i. Travelling by Air, Entitlement to travel by air is permissible only to Professors and above. However, in case of urgency, others may be permitted with the prior specific approval of the Director. The following would be ensured while travelling by air:

- Prior sanction will be obtained
- It will be resorted to only in rare cases where time is a constraint
- Low cost airlines would be made use of and the best bargain fares obtained
- Discount will be sought by availing a return ticket
- Travelling by Bus. The entitlement for travel by bus would be as given below:
- Volvo Bus- Professors and above
- Super Deluxe Bus- Associate Professors (Categories 1 & 2) and Assistant Professors (Categories 1 & 2).
- Deluxe/Normal Express Bus- Other than above.

ii. Travelling by Train. AC I, AC II or AC III Entitlements.

- AC I : Not be permitted for anyone
- AC II: Professors and above and equivalents
- AC III: Associate Professors (Categories 1 & 2) and Assistant Professors (Categories 1 & 2).
- Sleeper-All others

iii. Travelling by Taxi. Travel by taxi for intercity travel would be made only in exceptional circumstances. Where inescapable, use of small segment taxi will be made. Use of AC taxi will be made only if the high temperatures make it necessary. For hiring of transport in the distant city, use will be made of auto rickshaw and city buses to the maximum extent and car taxi would be hired as an exception. When car taxi are hired, the entitlements would only for Professors and above and equivalents as under:

- AC Taxi – Professors and above and equivalents.
- Shared Non AC Taxi- Associate Professors (Categories 1 & 2) and Assistant Professors (Categories 1 & 2) and equivalents.

- Travelling by own Transport. Travel by own transport may be done for inter-city travel. The reimbursement will be limited to the train fare (AC II or AC III fare as entitled).

### **11.3 TA/DA reimbursement:**

- In addition to the PDA allowance of maximum INR 7000/-, each faculty member is entitled for travelling allowance /dearness allowance of maximum INR 3000/- or actual expenses, whichever is less in one financial year to present a paper in an international event (Seminar/Conference/Workshops/Symposium and similar) in reputed institute (IITs/NITs/IIITs/CUs/SUs) outside Jaipur (Not applicable for online events). Prior approval from Director (Academics)/Principal is mandatory for availing such financial support. The above mentioned amount cannot be reimbursed in parts.
- In addition to the above, M.Tech. / Ph.D. supervisors are entitled for getting financial support to visit Rajasthan Technical University, Kota regarding official visits as mentioned below:
- Professor/Associate Professor: Maximum INR 3000/- or actual expenses whichever is less per visit. It includes all the expenses like local transport, intercity travelling expenses, meal charges etc.
- Assistant Professor: Maximum INR 2500/- or actual expenses whichever is less per visit including all expenses.
- To visit within the city, the existing policy will remain the same.

### **11.4 Advance Requisition**

All moves would be got approved in advance and the application would indicate the mode of travel, the place of stay and the likely expenses that would be incurred.

### **11.5 Preferring of Claims for Reimbursement**

Actual bills in support of the claim would be submitted.

### **11.6 Other Pre-requisites**

- All moves on duty must be authorized by the competent authority.
- Moves must be planned well in advance –preferably at least four months ahead for educational tours and one month for other activities.
- Leave will normally not be granted in conjunction with duty.



- Cancellation charges owing to poor planning will not be reimbursed.
- While staying in hotels sharing of rooms with same gender colleagues would be resorted to.
- Maximum use would be made of low fares and discounts available.

Agent charges would not be reimbursed.

## **12. Policy for Vacations/Availing Leave by Faculty Members**

### **12.1 Summer Vacations**

- The teachers are entitled to summer vacation of 30 days with pay who join the Institute in the beginning of the academic session (up to end of August) and 15 days with pay who join in the middle of academic session (September to December). Teachers who join after 31<sup>st</sup> December will not be entitled for summer vacation.
- A teacher may be granted PL (Privilege Leave) in lieu of summer vacation if the Institute detains him/her. The PL so granted will be fifty percent of the total number of days for which he/she is detained.
- The PL earned by a teacher can be availed of during the subsequent academic session with the prior approval of the competent authority. It is clarified that PL cannot be claimed like CL. Its prior approval is essential and the Management reserves the right not to grant PL to any teacher.
- The PL cannot be accumulated and carried forward beyond one academic session.
- The PL can be availed on medical grounds provided a medical certificate from the competent authority is submitted to the satisfaction of the Management.

### **12.2 Autumn and/or Winter Break**

- The teachers are normally entitled for autumn and/or winter break which may be curtailed/cancelled for some or all teachers without any compensation.

### **12.3 Maternity Leave**

- All the married female teachers are entitled for maternity leave without pay for a period of three months for a maximum of two children on production of medical certificate from the competent authority. If the leave so granted exceeds three months, the date of increment will be deferred by a period (in complete months) by which it exceeds three months.

## **12.4 Academic Leave**

- A teacher may be granted three days academic leave with pay per semester for academic work elsewhere. For availing academic leave the faculty must attach proof of academic work along with the leave application and submit certificate of attendance after availing leave.
- If a teacher is officially sponsored for higher studies he/she may be granted academic leave on the days of end semester examinations.

If a teacher is officially sponsored for attending a course during the session he/she may be granted academic leave during the course period. No teacher shall be permitted to attend more than two such courses during any one academic session. If the course duration exceeds six days, the summer vacation will be curtailed corresponding to the number of days by which the course duration exceeds.

## **12.5 Casual Leave**

A teacher at SKIT can avail casual leave subject to the following conditions:

- A teacher at SKIT is entitled to avail casual leave with pay up to a maximum period of 12 days in one academic session. Within the first semester a newly appointed teacher can not avail leave with pay for more than six days during the probation period.
- The teacher will have to get the leave sanctioned in advance from the competent authority except in case of sudden illness or emergency. This kind of privilege cannot exceed more than six times in the entire academic year. If it exceeds, the leave may be converted into leave without pay, even there is a casual leave in balance.
- No leave can be claimed as a matter of right.
- If the total leave without pay during any academic session exceeds 10 days, his/her date of next increment will be deferred by three months except in case of one time leave granted on account of medical reason or the marriage of the self.
- . If the period of leave sought by a teacher exceeds the leave in balance, then, the entire period will be considered as leave without pay.
- A teacher may be granted up to two short leaves per month each not exceeding two hours for attending urgent work which cannot be carried out after college hours. This kind of leave is not meant for going home early or for coming late in the morning or for attending family functions.

- Half casual leave will not be granted if you have a class during the leave period. In such a case leave should be applied for full day.
- Sundays, holidays and any other type of leave cannot be combined with without pay leave.
- If a faculty member is called on duty on holidays he may be granted compensatory casual leave which has to be consumed in the following week only. CCL can't be claimed as a matter of right.
- If a person remains absent without permission his/her increment may be deferred by three months. In case of repeated absence may lead to termination of his/her services from the Institute.

### **12.6 Procedure for Availing Casual Leave**

All the teaching and non-teaching staff members are required to follow the rules and proper procedure when they wish to avail leave.

- The leave application duly forwarded and recommended by the Head/In-charge must be submitted well in advance for all planned activities like family functions, going out of station, examination and other academic activity elsewhere etc.
- It is the responsibility of the person concern to make alternative arrangement for engaging classes or other duties. No leave will normally be sanctioned if alternative arrangements are not made.
- If under emergency conditions a person avails casual leave then he/she should inform the Head/Principal at the earliest possible opportunity so that alternative arrangements can be made with minimum possible dislocation of work. In no case leave application will be entertained if he/she forgets to submit his/her leave application on the day of resuming duties. In such a case the entire period of leave will be treated as leave without pay.

### **12.7 Guidelines for Granting Short Leave**

- The short leave to faculty and staff, henceforth will be granted by the respective HODs.
- In no case it should exceed two hours.
- A maximum of two short leaves in a month can be granted to any faculty/staff.
- It cannot be accumulated.
- Not more than 10% of the faculty/ staff should be granted short leave on any one day.
- A short leave may be granted to faculty /staff on the grounds that he/she may have an appointment with the doctor, bank work or work in any other office which normally closes after

the working hours of the Institute. It should not be granted for going home early or for going out of station. In such a case he/she should be asked to apply for half casual leave.

- In no case short leave be granted to any one if he/she has a teaching assignment during that slot. They should be asked to apply for half casual leave and provide substitute for engaging that class.
- A record of short leave should be maintained in the respective HOD's office by the office assistant.
- Ordinarily only HODs are authorized to sanction short leave, but if they are on leave on any day it may be sanctioned by Deputy HODs.

## 13. Campus Placement Policy

### 13.1 Preamble

The biggest concern of a final year engineering student is to get a good job in a reputed organization before he/she completes his/her degree. The Institute's placement cell provides the students with the best possible opportunities through campus placements. Many good students sometimes fail to get jobs in good companies due to absence of right guidance. The purpose of placement policy is to prepare them well in advance so that students get selected by their dream companies.

### 13.2 Apex Placement Committee

- **Purpose:** The purpose of this committee is to formulate placement policy and to provide guidelines to the Placement Working Committee. The Apex Placement Committee will review from time to time the achievements of placement working committee and may make changes in the policy.
- **Composition:** The Apex Placement Committee will be composed of the following members
  - Director (Academics)
  - Principal
  - Adviser
  - Registrar
  - All Heads of Engineering Departments

### 13.3 Placement Working Committee

- **Purpose:** The purpose of this committee is
  - To contact and invite companies for placement.
  - To organize training in various skills required for placement and to motivate students to participate wholeheartedly.
  - To obtain feedback from all stake holders.
  - To forward quarterly reports to the Apex Placement Committee
- **Composition:** Placement working committee will be composed of the following members:
  - Adviser
  - Two members to be nominated by the Apex Placement Committee
  - T.P. Officer
  - One faculty member from each engineering department to be nominated by respective HODs
  - Two students from each department (one each from B. Tech V & VII semesters) to be nominated by respective HODs)
- **Nomination:** The members of the placement working committee may be changed or re-nominated by the Apex Placement Committee

### 13.4 Implementation of Policy

- The training of students in various skills may be organized in stages which may be decided by the Placement Working Committee. Keeping in view the importance of communication skills, soft skills and CRT programme in the corporate world, every student who is interested in campus placement will have to undergo these trainings to be organized in the Institute. Without undergoing these trainings no student will be permitted to participate in the campus interviews. It is suggested that training for communication skills, soft skills and CRT programme may be imparted during B. Tech I/II sem, III/IV sem and V/VI sem respectively. The training should be organized during free periods, if possible or beyond Institute's working hours. While organising these trainings, care should be taken that as far as possible academic programmes are not curtailed.

- During B. Tech I year the faculty members and batch counselors, after the admissions are finalized, will assess strengths and weaknesses of each student based on their observations. The criteria for observation will be prepared and provided by the placement cell.
- At the beginning of the B. Tech III semester, the students will register themselves with the placement cell and provide the required information such as their contact numbers and e-mail addresses.
- At the beginning of the B. Tech VI semester, the students interested in campus placements will fill the detailed application form obtainable from placement cell & register themselves for campus placements. Based on the information provided by the students, the placement cell will compile the data and the Placement Working Committee will carry out the process of placements of the students.

### 13.5 Placement options for students

A renowned company as decided by the Apex Placement Committee will be given the status of Day One Company which will be invited by the Placement Working Committee before all other companies. At the time of registration the students will give their choice for any company henceforth will be called **Dream Company**. Sometimes it may happen that core companies may be permitted to hold campus interviews before the visit of Day One Company. In order to give fair chance to all the students certain restrictions will be imposed on the participation of students in campus interviews. The participation rules are as follows.

- Every eligible registered candidate will be permitted to participate in the campus interview of his/her Dream Company.
- If a registered student gets selected in his/her Dream Company, prior to the arrival of Day One Company, he/she will not be permitted to participate in the subsequent campus interviews including that of Day One Company.
- All eligible registered students debarring the category as mentioned in (1) above will be permitted to participate in the campus interview of Day One Company.
- Eligible registered students not selected under categories (1) and (2) above will be permitted to appear in subsequent campus interviews till he/she gets placed in some company. However, if a student is rejected in two consecutive campus placements he/she will have to undergo retraining.

prescribed by placement cell. Without undergoing retraining the student will not be permitted to appear in subsequent campus interviews.

- No student will be allowed to seek more than one offer letter from companies other than BPOs through campus placements.
- No student will be allowed to seek more than one offer letter from BPOs through campus placements.
- In some exceptional circumstance the Apex placement committee may permit some or all students to appear in some renowned company.
- Any student who has registered for any particular campus placemat will have to participate seriously in all stages of recruitment process failing which he/she will be debarred from participation in two subsequent campus placements.
- Any student furnishing false information will be debarred from that and the next campus placement.

### **13.6 Future Action Plan**

- An action research plan will be prepared and based on that effectiveness of each of the modules of different trainings imparted to the students for their placements will be analyzed. Based on the outcomes these modules may be revised or enlarged/curtailed.
- For any other uncovered point the Placement Working Committee will seek guidance from the Apex Placement Committee.

## **14. Scholarship/Studentship Policy**

### **14.1 Procedure**

Applications for award of scholarships/studentships will be invited from all the eligible candidates at the beginning of each academic session.

### **14.2 Eligibility**

- All bonafied and regular students of SKIT & SKIP pursuing any of the B. Tech., B. pharm or MBA courses and whose parents' income (combined income of both parents) is less than Rs. 1.0 lakh per annum and who have passed the previous university examination in single attempt are eligible to apply for the scholarship/ studentship. The students admitted under Tuition Fee

Waiver Scheme and Institute/Management quota or receiving financial support from any other source are not eligible to apply.

- Merit list will be prepared branch wise and class wise on the basis of results of previous year/semester university examination by the award committee. In the case of first year the merit will be prepared on the basis of the rank in RPET/CMAT/RPPT (state level and (or) national level entrance examination for admission in the applied course). The number and amount of scholarships/ studentships may vary each year and will depend upon the availability of funds.
- In general, the scholarships/ studentships will be awarded on the basis of need cum merit. However, the preference will be given to those candidates whose parents are not alive (supporting documentary evidence(s) will be required).
- The candidates will have to produce documentary evidence of combined income of both parents from the appropriate authority.
- The recipients of the scholarship/ studentships will be required to give an undertaking that they will remain regular and maintain attendance more than 75% in each theory/tutorial /laboratory separately and also strictly abide by the rules and regulations of the institute, failing which the scholarship/ studentship will be discontinued and the awardees may be required to refund the previously awarded amount.
- On the recommendations of the committee the selected students may also be given books on loan from the institute's book bank without any charge. This will be in addition to the number of books issued to the students from the library.
- Those Students (except diploma) whose parents are employees of SKIT and the combined income of both parents is less than Rs. 1.5 Lakh per annum are eligible for the scholarship/studentship. A maximum of one candidate will be considered in this category. It is essential that candidates must have secured a minimum of first class at secondary and senior secondary level examinations. In case of more than one candidate, selection will be made on the basis of merit. Preference will be given to female candidates. An employee can avail this facility only once.
- Students with back-logs in his/her available result of previous year/semester will not be considered for scholarships/ studentships. The result at the time of submission of application will be the basis for the merit i.e. eligibility cannot be reestablished on the basis of revised result after the re-totaling /revaluation process.



- Students who, after having completed their educational career in one professional line, like Diploma are not eligible for the scholarships/ studentships.
- If a student is receiving scholarship (or has received scholarship in the past), then none of his/her brother(s)/sister(s) will be eligible for the scholarship/ studentship in present or later time.
- Students with any financial dues in the previous year/session will not be considered for the scholarship.
- Normally a student can only apply for the scholarship/ studentship at the time of his/her admission. However, based on the recommendation of scholarship/ studentship committee a student may also be considered for scholarship during the intermediate session.
- If a student has shown an extraordinary performance in areas of sports/extra-curricular activity, then based on the recommendation of scholarship/ studentship committee he/she may be considered for scholarship/studentships.

## 15. Student Attendance Policy

### 15.1 Recording of Attendance

It is mandatory for all the faculty members to maintain attendance records of students in their lecture/tutorial/laboratory classes properly and methodically. Casual attitude regarding maintenance of attendance records is counter –productive and it has been observed in the past that condoning of attendance by teachers on medical or any other ground has resulted in deterioration of discipline. It has been decided to implement attendance rules very strictly. The faculty members are, therefore, requested to maintain attendance records carefully so as to avoid any last minute problem. The following points must be strictly adhered to.

- The faculty members in their very first class must explain to the students about the importance of classroom attendance and about the strict attendance policy of the Institute.
- The attendance must be recorded right from the day one of the commencement of classes in a permanent register obtainable from the office.
- The faculty members must take the attendance of the students by their names and not by serial number/roll number.
- If a student is present his/her attendance should be recorded 1, 2, 3 ,..... and not by “P”.

- If a student is absent he/she should be marked “A” and not by a dot. Anyone can very easily convert a dot into a present.
- The attendance should be recorded along with the date. If on any particular day a scheduled class could not be held due to some reason, then, a column corresponding to this date should be assigned in the register and the reason for not holding the class along with the date should be recorded. The possible reason may be campus interview, an industrial visit, teacher on leave, a holiday, mass cut by students etc.
- No faculty member will grant any attendance to any student on account of medical or any other reason except when the student is deputed officially to represent the Institute elsewhere. In all such cases the faculty members may grant duty leave to students (which should be treated as **present for attendance** purpose only) on production of a certificate to this effect from the Principal. No verbal statement from the student be considered. Duty leave should be recorded as “D” in the attendance register.
- The faculty members must inform to the students in their very first class that they will not get any attendance on the basis of medical certificates. You may, however, keep in your record a photocopy of the medical certificate, if a student submits it to you.
- On any day even if a single student is present the attendance must be recorded along with the date and the class be engaged for full time in the allotted classroom or the laboratory. The student who has turned up should not be sent away as it encourages others to cut classes.
- The faculty members after every two weeks should disclose in the class the names of the students having attendance less than 75%.
- The faculty members at the end of every four weeks should forward to their respective HOD the attendance of all the students. This record must contain information about classes engaged, classes attended and percentage of attendance highlighting the names of the students having attendance less than 75%.
- The HODs will consolidate the list submitted by the individual teachers and display on the notice board the list of those who have shortage of attendance. They should also forward a copy to the Principal and inform the parents through batch counsellors.
- As per the prevailing rules and regulations of the University it is mandatory for the students to have minimum of 75% attendance in each subject including tutorials and in each laboratory class.

- One week before the commencement of each term test the teachers are required to submit to their respective HOD the attendance of all the students as mentioned in 11 above, clearly identifying students having attendance less than 75%. The attendance for the first term test be counted from the beginning of the session to one week before the start of the first term test. The attendance for the second term test be counted from one week before the first term test to one week before the start of second term test.
- The HODs will consolidate all the cases and submit the consolidated list of students along with the attendance details and their comments if any to the Principal at least three days before the beginning of each term test so that it can be displayed on the notice board.
- No separate reminders will be issued in future and the teachers are requested to fully cooperate and submit the required information without delay and without fail. Further the teachers must take utmost care in sending the names of the students having attendance below 75%.
- If a student arrives late in the first period by more than ten minutes no attendance should be granted to the student.
- To ensure that the instructions are strictly followed, the HODs will inspect the attendance registers once in a fortnight and put their signatures.
- The faculty members may be asked to submit the attendance register to the Principal without prior notice.

## **15.2 Mandatory Requirement of Attendance**

A minimum of 75% attendance is mandatory as per RTU notification to become eligible for appearing in the midterm and University examinations. The students are therefore advised in their own interest to remain regular right from the beginning so that in case of any contingency their attendance may not fall below the statutory requirement.

### **15.2.1 Eligibility for First Midterm Examination**

- A student must have a minimum of 65% attendance in all theory papers, corresponding tutorials and laboratories put together in order to become eligible for appearing in the first midterm examination.
- Students having overall attendance less than 65% will be debarred from appearing in the first midterm examination. However, they may be permitted to appear in those subjects in which their attendance is more than 65%.

- The attendance for the first midterm examination will be counted from the beginning of the session to the last working day prior to first midterm examination.

#### **15.2.2 Eligibility for Second Midterm Examination**

- A student must have a minimum of 65% attendance in all theory papers, corresponding tutorials and laboratories put together in order to become eligible for appearing in the second midterm examination.
- The attendance for the second midterm examination will be counted from the working day just after the first midterm examination to the last working day prior to second midterm examination.
- Students may also be permitted to appear in the second midterm examination if they have a minimum of 65% attendance from beginning of the semester to the last working day prior to second midterm examination.
- If none of the above two conditions are satisfied the students will be debarred from appearing in the second midterm examination. However they may be permitted to appear in those subjects in which their attendance is more than 65%.

#### **15.2.3 Eligibility for University Examinations**

- The overall attendance for appearing in the University examination should be as per norms set by the University.
- Attendance of students on days of midterm examinations will also be counted for overall attendance for appearing in the university examinations provided the students have appeared in the midterm examinations.
- Similarly attendance of students on days of back paper examinations will also be counted for overall attendance for appearing in the university examination provided the students have appeared in the back paper examinations.

#### **15.2.4 Extra Midterm Examination**

- A student who has been debarred due to shortage of attendance in the first midterm examination but attains a minimum of 65% attendance from the beginning of the semester to the end of the semester may be allowed to appear in the extra midterm examination.

- As per university rules a relaxation in attendance not exceeding 5% may be granted on medical grounds provided medical certificate is submitted to the principal at the time of medical contingency.
- A student who has not been debarred in midterm examination but could not write the examination (one or more papers) due to medical reasons may be allowed to appear in extra midterm examination provided he/she has submitted medical certificate to the principal at the time of medical contingency.
- A student who has class attendance more than 80% and wish to improve his midterm examination marks may also be allowed to appear in the extra midterm examination. Marks of the best two performances in the midterm examinations will be considered.

#### **15.2.5 Rules Regarding Grant of O.D. Leave**

- During any one semester O.D. leave not more than five days may be granted to a student. In a special case this rule may be relaxed provided there are valid reasons. The O.D. leave will be directly marked by the principal on ERP.
- Student's participation in activities outside the Institute it is essential that the participant must have a minimum of 75% attendance. No permission will be granted to any one whose attendance is less than 75%
- Students attending seminars/workshops/extension lectures/ industrial visits etc. organized by the Department will be considered for grant of attendance on hourly basis by the respective department.
- Students required to undergo summer training must join the place of training on dates as specified in the Institute's academic calendar.
- Students joining training on a later date without prior permission will not be granted O.D. leave.
- In case training duration is extended by mutual agreement between the student and the training organization, it must be brought to the notice of the Institute well in advance for prior approval from the Principal.

## 16. Co-Curricular/Extra-Curricular/Sports Policy

SKIT focuses on all round personality development of the students. They are constantly encouraged to participate in co-curricular and extra-curricular activities. The primary goals of these activities is to focus on the individual student level, the institutional level and the broader community level. These activities complement the academic curriculum and augment students' learning and development. By working together in a group, students learn to negotiate, communicate, manage conflict and lead others. They also understand the importance of critical thinking skills, time management and intellectual competence.

- To give students an opportunity to show case and have their talents and also to prepare them for inter and intra college competitions, more than 30 clubs have been floated in the Institute, students of first year to final year can participate in any club depending upon his/her interest. The faculty coordinator and student coordinator for each club is provided to run the club. These clubs are run and managed by the students under the guidance of the faculty member. Some of the important clubs are Sports Club, Toastmasters Club, Robotics Club, Cultural Club, Fine Arts & Crafts Club, SPIC MACAY Club, Heritage Club, NSS Club, ASME Club, OSA Chapter, IE (I) Chapter, IETE Chapter, ISTE Chapter, ICI Chapter, NIRMAN Club Etc.
- The institute has created excellent sports facilities for students which includes, four tennis courts, three basketball courts, two volleyball grounds, three badminton courts cricket ground, football ground, separate gymnasiums for boys and girls, facilities of indoor games such as table tennis, chess, carom etc.
- These clubs organize state level competitions during the institute's week. The institute encourages participation of students in various competitions held at state level and national level. Adequate funds are provided to run the activities of the various clubs. Extension activities such as cleanliness drives, tree plantations and blood donation camps, etc. are regularly conducted with high level of students participations.
- Students are given duty leaves for their participation in Co-Curricular and Extra-Curricular activities. They are also awarded marks in discipline & extracurricular activities section for motivating their participation.

### **16.1 Policy for Student Participation in Inter-Collegiate Events**

For registration, students have to submit proof (dully verified by batch counselor) of having maintained at least 75% attendance in the current semester.

- For any event if the number of entries exceeds the number required, it will be finalized by the expert (In-house faculty) in that field.
- A student can participate in maximum two events in a semester.
- For participation in outstation events, only those students will be considered who possess a past record of participation in the events conducted in Jaipur itself.
- Registration of girl candidates for participation in outstation events is subject to the consent of their parents in writing.
- Registered participants are entitled for grant of attendance in the classes held during the period of the respective event.
- Registered participants are entitled for reimbursement only after submitting the report on the event.

### **16.2 Reimbursement Rules (for the registered candidates only)**

- 50% of the registration fee.
- 50% fare of the sleeper class/bus (in case of out-station event)

## **17. Incubation Cell Policy**

The Institute has established incubation cell *“Techno SKIT Incubation Centre (SRIJAN)”*

### **17.1 Vision & Mission**

- Vision: To foster a culture of innovation, problem solving and research for the betterment of the society and the nation
- Mission: To promote interest and research in path breaking tech driven ideas leading to entrepreneurship, while hand holding young start-ups and accelerating their growth through vital inputs, supportable mentorship and industrial connect.

### **17.2 Objectives of Incubation Centre**

- Encourage students to develop innovative projects/products to become job givers instead of job seekers through facilitation in opening start ups

- Take up development of industry sponsored projects.
- Encourage Faculty /students teams to conduct seminars/trainings on state of art technology platforms otherwise not covered in syllabus.
- Collaborate with semiconductor companies like TI/FREE SCALE/ST/MICROCHIP to undertake embedded learning through embedded club activity.
- Encourage amongst faculty/students C.F.T Culture for project development.

### **17.3 Major Roles of Incubation Centre**

- Infrastructure support :
  - A strong intellectual infrastructure: A dedicated team from all departments for technical mentoring of the projects, laboratories.
  - Physical Infrastructure: internet, computers, dedicated area for sitting & working with working till 9 PM for pass out student batch and after 2:30 PM daily pursuing B. Tech students.
- Entrepreneurs & entrepreneurs support mechanism: Create & working with entrepreneurial culture.
- Support for commercialization: Regular mentoring of the teams for different commercial aspects, legal liabilities, government policies.
- Funding: Generate funds for the teams.

### **17.4 Major Services of Incubation centre**

Following is the List of few service supports from incubation centre.

- Mentorships from Industry Professionals.
- Connect with leading entrepreneurs.
- 12-24 weeks of co-working space in campus.
- Office resources.
- Prototyping & Product Development.
- Connect with Funding Resources.
- Student Semester Projects.
- Intellectual Property and related advice.
- Financial & Legal Consultants.
- Business advice from our Program Partners.



### **17.5 Additional Programs for promoting Incubation activities**

- Knowledge infrastructure support.
- Student growth & better visibility programs.
- Faculty development program to increase opportunity & participation.
- Better visibility of college among peers.
- Building reusable knowledge digital database.
- Alumni connectivity.
- Better placements.

### **17.6 Setting up process of START-UP in SKIT**

- Project starting till one year after graduation
- Monthly Progress review by development board
- The prototype model will be funded by the team itself.
- \*SKIT will fund for its engineered model
- \*Trial production (before Mass production) by start-up with 50:50 equity by students & SKIT
- IPR & patent rights by SKIT
- Company formation / expense be borne by students & SKIT on 50:50 basis.
- Patent filing expenses to be borne by SKIT
- Test Facility: CAPEX to be created by SKIT.
- People connected from SKIT to Knowledge network of incubation center must be freed from other responsibilities other than teaching during their project guiding tenure & their engagement in any project will be rewarded as a appraisal.
- Profit loss partnership of 50:50 between SKIT & Start-up Company for 1 years only, and subsequently IP rights can be transferred after mutual discussion with either one time/Royalty/profit sharing etc.

## 18. Grievance Policy

The institute has well defined **Grievance Redressal Policy** to address any kind of grievance.

Various committees like Women Grievance / Anti-Sexual Harassment Committee, Anti-Ragging Committee, Caste Based Discrimination Prevention Committee are formed under an umbrella of Grievance Redressal Committee (GRC) for taking appropriate action against any grievance.

### 18.1 Grievance Redressal Mechanism (GRM)

Grievance Redressal is a management- and governance-related process adopted in SKIT, Jaipur. The term "Grievance Redressal" primarily covers the receipt and processing of complaints from stakeholders, a wider definition includes actions taken on any issue raised by them to function as per their roles more effectively. The institute has a Grievance Redressal Committee, which takes care of any kind of Grievance occurring in the organization.

The effectiveness of implementation of a Grievance Redressal Mechanism (GRM) can be calculated with the following parameters:

- Count of cases received
- Nature of cases received
- Time taken for corrective action
- Escalations required
- Confirmations & rejections after completion
- Repeat nature of grievances

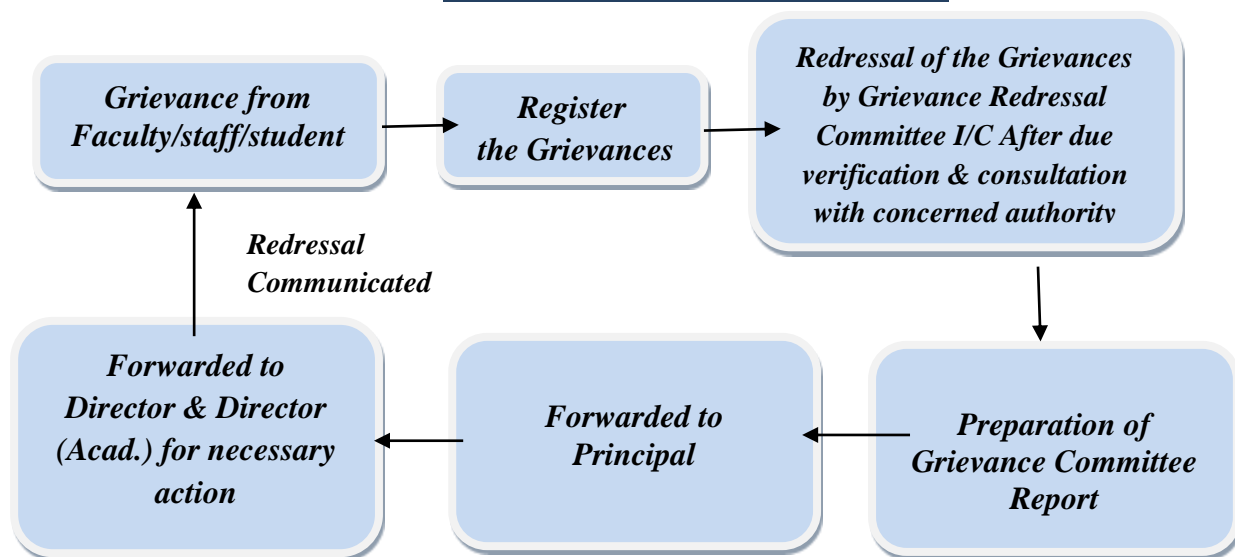
#### 18.1.1 Process

- **Input acceptance:** Faculty members/ staff members and students may convey their grievance to the organization through online mechanism available on ERP. They may also submit their grievances through feedback forms, emails or in person to the Grievance Redressal Committee.
- **Anonymity:** Complainants are often reluctant to report grievances that target individual faculty or staff members of the organization. To avoid such issues, the committee assures that Complainant identity will be hidden from others, and preferably from everyone.

### 18.1.2 Work Flow

The objective of this cell is to deal with redress of grievance. The aggrieved individuals (Faculty/staff/students) shall indicate the details of his/her grievance and the same to the principal, who in turn will refer the same to the concern redressal committee. The grievance of the individual will be given fair and reasonable opportunity to be heard in detail before the chairman and other members of the concerned committee in a peaceful and conciliatory environment depending upon the issue if need to be, appropriate evidence in the form of a material evidence or personal witness may be introduced by the aggrieved person. The chairman of the committee, in constitution with the member(s) will submit the report to the principal at the earliest possible time. The principal in turn, depending upon nature, magnitude and jurisdiction of the issue, will arrange for the appropriate and early measure of redressal of grievance, under the management and same will be communicate to the 'aggrieved person'. All the proceeding, of the Grievance Mechanism will be suitably documented and recorded.

#### *Grievance Redressal Flow-Chart*



### 18.1.3 Composition of GRC

<b>Principal/Sr. Professor of the institute</b>	<b>Chairperson</b>
<b>Professor/ Sr. Associate Professor for a period of two years</b>	Vice-Chairperson
<b>Registrar</b>	Convener
<b>Associate/Sr. Assistant professor for a period of two years</b>	Member

#### **18.1.4 Terms of Reference of the Grievance Redressal Committee**

- Any employee of the college could address his/her grievance in writing to the Chairman of the Committee.
- The grievance could be arising out of policy matters or personal reasons.
- Whenever an employee wishes to put forth any claim or seeks redress of any grievance or of any wrong, which he deemed having been done to him, he must forward his case through proper channel, and shall not forward such advance copies of his application to any higher authority, unless the lower authority has rejected the claim, or refused relief, or the disposal of the matter is delayed by more than three months.
- No employee shall be a signatory to any joint representation addressed to the authorities for redress of any grievance or for any other matter.
- The committee shall call for meeting within a week of receiving any grievance and submit its recommendations to the Director within a fortnight of having received a grievance. The process could be expedited at the discretion of the Chairman of committee if the grievance be of such a nature which may need immediate attention.
- Three members of the committee, present in person, shall constitute a quorum at any meeting of the committee.
- If the complaint is against any member of the committee at above, he /she shall not form the quorum of that committee in which his / her case is being heard of and decided. In such a case, the senior most person on the committee will co-opt another suitable member with the permission of Director to have the quorum of three members on the committee.
- The decision of the Director will be final.

#### **18.2 Women's Grievance / Anti-Sexual Harassment Cell**

The Institution has established Women's Grievance Cell with the objectives of redressing the grievances of the students and the staff, of any sort related to women. It provides confidential and supportive environment for members of the campus community who might likely have been sexually harassed; advises complainant of the informal and formal means of redressal; ensures the fair and timely redressal of sexual harassment complaints.

It also provides information regarding counseling and support services on the campus, and promotes awareness about sexual harassment through educational initiatives that encourages and fosters a respectful and safe campus environment.

#### **18.2.1 Objectives of the Cell**

- To provide a platform for listening to complaints and redressal of grievances.
- To incorporate hygiene habits and ensure a healthy atmosphere in and around the university premises.
- To prevent sexual harassment and to promote general well-being of female students, teaching and non-teaching women staff of the institute.

#### **18.2.2 Composition of the Cell**

<b>Female Professor/Associate Professor</b>	<b>Presiding Officer</b>
<b>Female Professor/Associate Professor</b>	Member 1
<b>Female Professor/Associate Professor/Assistant Professor</b>	Member 2
<b>Female Professor/Associate Professor/Assistant Professor</b>	Member 3
<b>Deputy Registrar</b>	Member 4
<b>Office Assistant (Office of Director Academics)</b>	Member 5
<b>Representative of Girl Students</b>	Member 6
<b>Representative of Boy Students</b>	Member 7
<b>Other</b>	Member 7

#### **18.2.3 What is Sexual Harassment?**

According to the Supreme Court Order, sexual harassment is any unwelcome:

- Physical contact and advances,
- Demand or request for sexual favour
- Sexually coloured remarks
- Display of pornography
- Any other unwelcome physical, verbal and non-verbal conduct of a sexual nature.
- Basically it is any unwelcome words or actions of sexual nature.

#### **18.2.4 Functions of the Cell**

- To provide a neutral, confidential and supportive environment for members of the campus community who may have been sexually harassed;

- To advise complainants of the informal and formal means of resolution as specified by the Cell;
- To ensure the fair and timely resolution of sexual harassment complaints;
- To provide information regarding counselling and support services on the campus;
- To ensure that students, faculty and staff are provided with current and comprehensive materials on sexual harassment and assault;
- To promote awareness about sexual harassment through educational initiatives that encourages and fosters a respectful and safe campus environment.

#### 18.2.5 Goals of the Cell

The Cell seeks to achieve

- **Awareness Through Dissemination of Information** - through production, distribution and circulation of printed materials, posters and handouts
- **Awareness Through Workshops** - about sexual harassment for faculty, non-teaching staff and students. The aim is to develop non-threatening and non-intimidating atmosphere of mutual learning.
- **Awareness by Counseling** - Confidential counseling service is an important service as it provides a safe space to speak about the incident and how it has affected the victim because sexual harassment cases are rarely reported as it is being a sensitive issue.

#### 18.2.6 Preventive steps

It will be the endeavor of the committee: -

- To facilitate a safe environment that is free of sexual harassment.
- To promote behaviors that create an atmosphere that ensures gender equality and equal opportunities.

#### 18.2.7 Remedial

- To ensure that the mechanism for registering complaints is safe, accessible and sensitive.
- The mechanism for registering complaints is safe, accessible and sensitive.

- To take cognizance of complaints about sexual harassment, conduct enquiries, provide assistance and redressal to the victims, recommend penalties and take action against the harasser, if necessary.
- To advise the competent authority to issue warnings or take the help of the law to stop the harasser, if the complainant consents.
- To seek medical, police and legal intervention with the consent of the complainant.
- To make arrangements for appropriate psychological, emotional and physical support (in the form of counseling, security and other assistance) to the victim if so desires.

#### **18.2.8 Procedure for Registering Complaints**

- All complaints must be brought by the complainant in person to any member of the committee. The exception for this will be in case of forced confinement of the person. In such a case, brought by another person on behalf of the complainant, the committee will examine whether an investigation, intervention or some other assistance needed. In exceptional cases, third party/witness complaints may be entertained. In such cases, the committee will ascertain whether the person alleged to have been harassed wishes to lodge a formal complaint. Once such a complaint is received the committee shall proceed to investigate it as per the procedure specified.
- If the complainant wishes, can be accompanied by a representative. The committee will consist of three faculty members to be nominated by the academic and Management council for a period of three years.
- A complainant can go directly to the competent authority. However, in such cases, which should be exceptional, the complainant should give reasons for doing so. In such cases, it is open to the competent authority to refer the complaint back to the appropriate committee/authority.

#### **18.2.9 Enquiry Procedure**

A suggested enquiry procedure would be as follows:-

- Any person may register a complaint of Sexual Harassment against any student, employee or third party of the Institute or vice versa, with the Chairperson or, at their choice, any of the other members of the committee. They should do so at the earliest point of time, but preferably within 30 days of occurrence of the alleged incident.

- The complaint may be made orally or in writing. If the complaint is made orally, the complainant will be requested to confirm the complaint in writing and sign it.
- The committee, or a minimum of 3 members of the full Committee, will meet with the complainant latest within 30 days of receipt of the complaint. They will inform the complainant of this meeting date at the earliest.
- At the first meeting with the Committee, the Complaint will be heard and his/her statements will be recorded. The complainant will be asked to produce any corroborative material that can substantiate the complaint.
- The committee will record the proceedings of the enquiry, and the attendance of all parties present at any of the meetings.
- Thereafter, the person accused of the alleged Sexual Harassment will be called for a meeting with the Committee. The letter of invitation will mention the fact that a complaint has been registered against him/her. During the meeting the complaint will be related to the Accused in detail, and the Accused will be given the opportunity to provide his/her view of the situation.
- The Committee will provide the Accused with a copy of the statement of allegation made by the Complainant, and provide the Accused with an opportunity to submit a written response, should he/she so desire, within 15 days of receipt of the statement.
- The Complainant will be provided with a copy of the written response submitted by the Accused.
- If the Complainant or the Accused want to call on witnesses, they must write to the Committee with the names and contact details of those witnesses, after which the Chairperson of the Committee will call the witnesses.
- If the Complainant wishes to provide any documentary evidence, he/she must supply true copies of those documents to the Chairperson of the Committee. Similarly, if the Accused wishes to tender any documentary evidence, he/she will be requested to provide true copies of those documents to the Complainants Committee. To ensure that the documents are considered as true copies, parties will be required to sign the documents submitted.
- After having heard both parties, the Committee will conduct an enquiry into the evidence provided by both parties. The enquiry may include meeting with witnesses,



consultation with experts and any other activities required to establish a balanced view of the case.

- The committee will provide every reasonable opportunity to the Complainant and to the Accused to put forward, and defend their respective cases.
- The Committee will complete the enquiry as soon as is reasonably possible, and communicate its findings and its recommendations for the disciplinary action, if any, to the Competent Authority.
- In case the complaint registered by the Complainant is found to be frivolous or false, the Complainant will be liable for punishment.

#### **18.2.10 Redressal**

The complaints may be addressed as follows: -

- The committee can ask the Institute to suspend the alleged harasser from an administrative post/classes if his/her presence is likely to interface with the enquiry.
- The victim of sexual harassment as per the Supreme Court judgment will have the option to seek transfer of the perpetrator or their own transfer where applicable.
- The Head of the Institution upon receipt of the enquiry report shall refer the same to the Governing Body / Executive Council and Institute disciplinary action on the basis of the recommendations of the Complaint Committee under relevant service rules.
- The disciplinary action will be commensurate with the nature of the violation.
- In the case of Institute employee, disciplinary action could be in the form of:-
  - Warning
  - Written apology
  - Bond of good behavior
  - Adverse remarks in the confidential report
  - Debarring from supervisory duties
  - Denial of membership of statutory bodies
  - Denial of re-employment
  - Stopping of increments/promotion
  - Reverting, demotion
  - Suspension
  - Dismissal

- Any other relevant mechanism
- In case of students, disciplinary action could in the form of:-
  - Warning
  - Written apology
  - Bond of good behavior
  - Debarring entry into a hostel/campus
  - Suspension for a specific period of time
  - Withholding results
  - Debarring from exams
  - Debarring from award of any institutional scholarship
  - Debarring from holding posts such as member of Committee etc.
  - Expulsion
  - Denial of admission
  - Declaring harasser as “persona non grata” for stipulated period of time.
  - Any other relevant mechanism

### **18.3 Protection against Victimization**

SKIT has an obligation to ensure that a person who registers a complaint in good faith and without malice is protected, and will not allow a person raising a concern to be victimized for doing so. In the unfortunate event where, despite the best of precautions, the Complainant would be victimized, SKIT shall treat this as a serious matter and take disciplinary action against the perpetrator

### **18.4 Anti-Ragging Committee**

Anti-ragging committee will be the supervisory and advisory committee on matters of planning action for building and preserving a culture of ragging free environment in the institute campus. Anti-ragging committee does checks regularly places like hostels, buses, canteens, classrooms and other places of student congregation, for any incidences of ragging, and shall educate the students at large in the college about menace of ragging and related punishment provisions. Anti-ragging committee will be involved in designing strategies and action plan for curbing the menace of ragging in the institute by adopting array of activities.

#### 18.4.1 Composition of Committee

<b>Principal/ Professor (Senior Faculty)</b>	<b>Chairman</b>
<b>Head of Department 1/Professor (Senior Faculty)</b>	Member 1
<b>Head of Department 2/Professor (Senior Faculty)</b>	Member 2
<b>Professor/Associate Professor/Assistant Professor (Male)</b>	Member 3
<b>Professor/Associate Professor/Assistant Professor (Male)</b>	Member 4
<b>Professor/Associate Professor/Assistant Professor (Female)</b>	Member 5
<b>Professor/Associate Professor/Assistant Professor (Female)</b>	Member 6
<b>House Manager/ Non-Teaching Staff</b>	Member 7

### 18.5 Caste Based Discrimination Prevention Committee

#### 18.5.1 Aims and Objectives

- To oversee the effective implementation of policies and programmes for the SC/ST/OBC
- To provide guidance, counselling and resolve issues pertaining to the Caste Based Discrimination in the institute
- To enhance the diversity within the campus.

#### 18.5.2 Functions

- To ensure equity and equal opportunity to the community.
- To enhance the diversity among the students, teaching and non-teaching staff and at the same time eliminate the perception of Caste Based Discrimination.
- To help individuals or a group of students belonging to the SC/ST/OBC regarding issues related to Caste Based Discrimination.
- To sensitize the college on the problems of Caste Based Discrimination.

#### 18.5.3 Composition of Committee

<b>Registrar</b>	<b>Convener</b>
Faculty Member (OBC)	Member 1
Faculty Member (SC)	Member 2
Faculty Member (ST)	Member 3
Technical Staff/ Non-Teaching Staff (ST/SC/OBC)	Member 4

## 19. IQAC/PAQIC Policy

The development of students and faculty is at the core of the institute philosophy. To accomplish this philosophy, the institute has established Programme Assessment and Quality Improvement Cell (PAQIC). The prime task of PAQIC is to build up a system for planning, guiding and monitoring Quality Assurance (QA) and Quality Enhancement (QE) activities of the institute.

### 19.1 Roles and Responsibilities of PAQIC

- To carry out periodic review of vision, mission and quality policy of the Institute based on feedback received from all the stake holders and suggest modification/amendments if any.
- To carry out SWOC analysis of the Institute and prepare strategic plan for development of the Institute. Also relate development plan activities with the result of SWOC analysis which will help improve visibility of our Institute in the entire country.
- To prepare an action plan for the development of faculty and technical staff and train them in their respective functional areas to improve quality of teaching.
- To prepare an action plan for improving the academic performance of weak students through innovative methods.
- To guide the Academic departments in the formulation of COs, POs, PSOs, PEOs and their mapping with the course curriculum and development of methodology to identify attainments level of POs/PSOs through COs.
- To guide and prepare the Academic development so that NBA/NAAC/ accreditation NIRF rank can be achieved.

Head, PAQIC will carry out faculty & staff development programme for the entire institute in order to improve teaching-learning process and also guide academic departments to obtain NBA/NAAC accreditation. On January 4, 2021 in view of NAAC and NBA requirements name of committee is changed from PAQIC to “**IQAC**”. Term IQAC stands for Internal Quality Assurance Cell. This will work for performance evaluation, assessment and accreditation and quality up-gradation of our Institute.

The primary aim of IQAC is-

- To develop a system to improve the academic and administrative performance of the Institute.
- To promote measures towards quality enhancement through internalization of quality culture and promote best practices

#### Functions of IQAC

- Development of quality culture in the institution.
- Establishment of quality benchmarks/parameters for various academics and administrative activities of the institution.
- Creation of a learner centric environment conducive to quality education.
- Collection and analysis of feedback data and share the outcome with appropriate bodies for corrective action.
- Documentation of various activities and preparations of annual quality assurance report as per guidelines of NAAC for onward transmission to NAAC.

### 19.2 Constitution of DPAQIC

Department System and Management Committee (DSMC) (later renamed as “Departmental Program Assessment and Quality Improvement Committee (DPAQIC) is to be constituted in each academic department for deciding all matters pertaining to operation, management and development of the department. It will be comprising the following (maximum 10 members):

- Head of Department as Convener
- All Professors
- Associate Professors Category 2 in the ratio of 1:2 (or 3) for a period of two years to be rotated as per seniority at SKIT
- Associate Professors Category 1 / Assistant Professors Category 1 &2 in the ratio of 1:5 (or 7) for a period of two years to be rotated as per seniority at SKIT

DPAQIC will ensure that its decision / recommendations take care of concerns of all the faculty and staff of the department.

## 20. Publication Policy

### 20.1 SKIT Research Journal

Innovations and research activities are essential for the growth of any technical institution. In order to promote and encourage research among student and faculty members in the institute, it has been decided to publish, '**SKIT Research Journal**' in open access mode. It will be published twice every year in the month of April and October. The journal will have following three sections on basis of broad area of research:

- Section A: Engineering Disciplines
- Section B: Applied Sciences
- Section C: Humanities and Management

The research paper should necessarily contain some new aspects. It should not be copied or plagiarized version of some other published work. The authors will be required to submit a declaration to that effect along with the paper. The journal may also publish a review paper on the current topics of interest and proceedings of national/international conferences.

The copyright of the research papers published in the '**SKIT Research Journal**' shall be transferred to the journal before publication of research publication.

In order to encourage research work and to maintain the quality of journal the following points must be adhered to.

- Each M. Tech. student will be required to submit one research paper related with his/her dissertation work. Without this paper the dissertation will not be accepted for submission.
- Each faculty member doing Ph. D. /M. Tech. either from SKIT or from any other Institute will have to compulsorily submit at least one research paper. More than one research paper are expected from those who are doing Ph. D. degree.
- The HODs of CSE, IT, EE, ME, EE and EC departments will ensure that every year five papers based on five best B. Tech. projects are submitted for publication in the journal.
- The HOD of management science will ensure that every year three papers based on three best projects/case studies/survey are submitted for publication.
- The authors of the research papers are required to submit the manuscripts through online submission system available through journal's website <https://ijskit.org/> in prescribed format.

The authors of the research papers are required to strictly adhere to the guidelines.

## **20.2 SKIT Times**

The SKIT Times is an in-house publication of the institute to trigger and employ the creative domains of the members of the institute. The magazine was introduced in the year 2003 and continues to spread its maiden vigour of inspiring the creative writers and artists. The magazine is popular among both teachers and students. In fact over the years the non-teaching staff has also started contributing to the magazine. The magazine captures both English and Hindi articles. During the last few years, the editors have included a special space for sketches and paintings to broaden the canvas and display of creative imagination. There are certain norms that the magazine follows:

- The magazine is released on a quarterly basis.
- The team is headed by the editor-in-chief. Various co-editors support the editor-in-chief.
- The editor-in-chief will constitute a team of student editors.
- The copyright of the articles published remains with the publisher.
- The magazine does not entertain articles or any write-up on controversial themes such as religion, caste, gender etc.
- The final right to approve or disapprove any write –ups resides with the editor-in-chief.
- The co-editors should also give consent for any write-ups to be published.
- The magazine accepts only original write-ups of technical, non-technical or literary nature.
- The write-ups go through a plagiarism scan in the very first stage.
- The second stage includes the quality check. Sometimes the articles are sent back for revision. Sometimes articles lacking substantial quality are rejected with a note to the writer.
- The board of editors meets twice a year to discuss important matters related to the magazine.
- The editor-in-chief is appointed by the publisher on a rotational basis.

## 21. Green Campus Policy

Eco-friendly practices and educational resources combine in a Green Campus to promote sustainable practices. It allows institutions to re-define their environmental culture and develop new paradigms for solving the social, economic, and environmental problems of mankind by utilizing a Green Campus concept.

### 21.1 Objectives of the Policy

- To safeguard the environment within and around the campus.
- To keep the campus clean and environment friendly.
- To motivate all stake holders to ensure judicious use of scarce natural resources.
- To increase awareness among staff and students regarding different issue and possible solutions related to environment and motivate them to adopt good practices for protection of environment.
- To frame the green policies that will enhance the ecological efficiency in the campus.
- To continually improve the efficient use of all natural resources including water and energy.
- To make sustainable efforts to make the campus plastic free and tobacco free.
- To improve resource use through reduction in material use by reducing waste and to identify recycling opportunities for waste generated such as metal scrap, paper, e-waste etc.
- To conduct in house environmental and energy audits from time to time.
- To make the campus self reliant in energy using solar energy and to make the campus net zero.
- To recycle used water and utilize it for landscape irrigation.

### 21.2 Scope of the Policy

Green Campus develops new extracurricular and co-curricular practices that allow students to take leadership roles in creating positive change. As a result of these initiatives, all infrastructural and administrative activities will be reviewed from the viewpoints of energy, efficiency, sustainability, and environment. The focus areas of the policy are

- Green Campus Initiatives
- Clean Campus Initiatives



- Tobacco free Campus
- Net Zero Campus
- Water Conservation Initiatives
- Waste Management Initiatives

### **21.3 Policy for Plastic Ban in Campus**

The pollution of the environment by plastics has now been identified as a global problem. A quick-term advantage and ease of use have made plastic and plastic goods wildly popular. Plastic has grown more and more popular over the past century, outpacing trash management as a result. Our environment, as well as our health and well-being, suffer from plastic pollution. We have all contributed, consciously or unwittingly, to this issue, and we must work together to minimize and eradicate plastic pollution.

The government has chosen to implement a plastic ban on a nationwide scale in order to address the environmental dangers created by the widespread usage of plastic. Educational institutions must take the lead in this national effort. Educational institutions must take a leadership role in the fight to phase out single-use plastics.

#### **21.3.1 Guidelines**

The guideline aims to assist Indian higher education institutions in achieving a plastic-free campus. It is not intended to be comprehensive, but rather to offer basic guidelines and suggestions relevant to all institutions. The recommendations urge institutions to implement policies and practices that promote a more environmentally friendly and plastic-free campus environment.

- The institute will educate stakeholders about the need of reducing, reusing, and recycling plastic.
- All stakeholders are encouraged to reduce their reliance on plastic bags on campus.
- Stakeholders must adhere to rigorous waste segregation guidelines.
- As far as feasible, students should recycle the resources available for creative work at college festivals.
- Conducting events and poster contests, among other things, to promote the creation of ecological and environmentally friendly products in order to reduce the use of single-use plastic.

## 22. Policy for Maintenance & Utilization of Resources

### 22.1 Infrastructure

- The Institute has a full time House Manager with a team of supporting staff for efficient and effective supervision and maintenance of infrastructure facilities of the institute. This team looks after the regular maintenance of civil works such as electricity, plumbing, painting, carpentry and housekeeping. Also, besides the indoor facilities supervision, this team oversees the maintenance of the outdoor areas such as, parking areas, playgrounds, lawns, gardens etc.
- Maintenance of the entire campus is carried out without disturbing any academic activity.
- Annual maintenance contract (AMC) is signed for water purifier, RO, fire extinguishers, elevator, Air conditioners, and roof top solar power plant. Apart from contract workers, the institute has appointed trained electrician, plumbers, gardeners and also supporting staff for maintaining sewerage treatment plant.
- The green area of the campus is well maintained by a team of horticulturists.
- In order to improve and maintain the physical ambience of the campus, periodic painting and white washing of buildings, labs and hostels are carried out.
- There are fire extinguishers in every nook and corner of the building with trained staff to put out fire, if it breaks out abruptly. Mock drills are also conducted regularly.
- The pest control is done every year by the maintenance department
- The entire campus including class rooms, laboratories, canteen, mess etc. is under CCTV surveillance.
- Administrative offices, staff rooms, class rooms, tutorial rooms, seminar halls, laboratories are kept cleaned and maintained by supporting staff.
- Wash rooms and rest rooms are well maintained by housekeeping staff. Dustbins are placed in each office and in corridor of each floor.
- The benches and windows are cleaned and mopping of the class rooms is done every day.
- A proper record is maintained centrally having details of all the day to day maintenance work.

### 22.2 Laboratories

- Students are assigned lab hours as per RTU teaching scheme and as per time table they perform their experiments in prescribed lab in the supervision of faculty member and technical staff.

- In lab, technical staff maintains a proper record of experiment/ equipment allotment to the students. Students are required to handover all the accessories issued to them for performing experiment to the technician after lab hours.
- All the laboratories are under CCTV surveillance for security and safety.
- The laboratory equipment are under the supervision of staff and faculty members, lab technicians and they are being given the responsibility for the maintenance of equipment.
- Initially the technical staff associated with laboratory tries to repair the equipment as and when required and the same is communicated to the respective HOD. The institute prefers to contact equipment manufacturers for any job that seems intricate and where technical expertise is deemed to be a prudent solution.
- Lab Technician/assistant keeps proper record of day to day maintenance work
- Lab-in-charge maintain record the details of consumable and non-consumable equipment in registers duly verified by competent authority and HOD.
- Different committees of faculty members are constituted for physical verification of all the laboratories and physical facilities at the end of each academic session. The report of the same is then forwarded to Director (Academics) for further action as per need. The non-repairable items are write-off through proper procedure.
- Lab in-charge make a list of repairable/non repairable equipment on the basis of which new requirements are forwarded to purchase departments at the end of the each academic session.
- Maintenance of computers is taken care of by the computer department.

### **22.3 Sports**

- A full time sports officer is appointed to handle the matters and concerns related to sports.
- Sports officer prepares a list of required sports equipment which is then forwarded to registrar office for approval.
- Sports committee has responsibility of organizing- planning, executing and conduct of sports events without disturbing academic calendar.
- It is the responsibility of sports officer and team to maintain sports ground and material.
- Students are permitted to utilize and take sports material with prior notice to the sports officer and in this reference a proper register is maintained.

## 22.4 Library

- All the students, faculty members, and employees of the institute are normally entitled for membership of the library. Their entitlements in terms of number of books that they can borrow and the permissible loan period is given below:

Description	No. of Books	Period of Loan
Teaching Faculty	15	For whole semester
Non-Teaching/Technical staff	5	For whole semester
B.Tech. Students	3	21 Days
M.Tech. Students	4	21 Days
Research Scholar	4	45 Days

- Books or any teaching material are issued to the students against the submission of library card. Library card are valid for one academic year for students. In case of loss of library card, new card is issued only after proper checking.
- If the books are lost, then the borrower replaces the book after getting permission from chief librarian.
- The Reference Section in the Library functions on all working days. Reference books are not allowed to be lent out.
- Publisher Catalogues are frequently sent to the committee members for selection and recommendation of new books.
- SKIT library organize annual exhibition of books, reputed publisher has displayed their latest titles and the faculty and student recommend the books during the exhibition.
- The books purchased from the special grant of the Social Welfare Department, Rajasthan State govt. are kept in SC/ST & BPL Category Book-Bank. Books are issued only to SC/ST students. If there is, no demands from SC/ST students only then the books are issued to weaker general category students from this book bank. The SKIT Library also provides books to students of BPL class.

- The library maintains a register where user can register required books which are currently issued to other users. Such users are informed promptly on phone as soon as the current borrower returns the books.
- If any book is not available in the institute's library, it can be provided to the reader by procuring it from other library through DELNET.
- Stock verification of library books, journals, magazines etc. is carried out once in a year.
- Central library remains open from 8AM to 8PM on Working Days and 10:00AM to 5.00PM on Holidays.

## 23. Alumni Policy

Institute has a registered Alumni society since July 2004 with the following objectives:

To promote and encourage a continuing interest in and loyalty to the institute.

- To keep a roster of all alumni of the institute and their relevant data.
- To effectively employ the talents, energies and contributions of alumni to constructive ends for the institute and this society
- To maintain updated and correct information of all alumni.
- To create a bridge between its members, fresh graduates, students and industries etc.
- To support management, staff, faculty and student body in their efforts to improve the quality of institute like in placement, entrepreneurship development, research, working culture etc,
- To arrange and conduct meetings of the alumni
- To provide a forum for the alumni for exchange of ideas on academic, cultural and social issues of the day by organizing and coordinating networking events
- To conduct any and all appropriate activities to accomplish the above objectives and purposes.

The institute has an online portal for alumni registration (<https://alumni.skit.ac.in>). The institute regularly holds Alumni meets in different parts of the country and the same is being attended by a designated team comprising Director, Principal, Advisors, Training & Placement Officer, alumni association's coordinator etc.

## 24. Feedback Policy

The feedback policy followed at SKIT is good seeking, adaptive and self-corrective. Regular feedback is obtained from all stake holders-students, parents, faculty, employers and alumni in order to safe guard the interests of the educational processes and maintenance of standards. The feedback system infuses confidence among all the stake holders.

SKIT has adopted five tier feedback system to facilitate quality sustenance and improvement measures. These are-

- Student feedback
  - Parents feedback
  - Faculty feedback
  - Employer feedback
  - Alumni feedback
- Institute has prepared separate forms of questionnaire for obtaining feedback from different stakeholders.
  - Student feedback is obtained through by the departments/ERP at the end of each semester in which more than 90% students participate.
  - The feedback received is analyzed and reviewed department wise in their departmental meetings.
  - All shortcomings and suggestions for improvement regarding teaching-learning process and other activities are discussed and appropriate action are initiated.
  - The feedback of students about the performance of the faculty is discussed by the Head of the department with individual faculty. The strong points and the weakness are told to the faculty and suggestions are given for their improvement.
  - Parents feedback is collected and analyzed by respective department once in a year.
  - Employer feedback is obtained via placement cell and their suggestion are incorporated by providing additional inputs during CRT training.
  - The institute has registered alumni society and also separate web portal. Alumni feedback is collected online and/or at the time of alumni meet.
  - SKIT also conducts workshops and faculty development programmes with a blend of internal and external expertise.

- Apart from regular feedback through questionnaire, suggestion boxes are kept in all the academic buildings in which students can drop their problems and suggestions for improvement.

## **25. Examination Policy**

The institute is affiliated to Rajasthan Technical University, Kota and hence follows all the guidelines issued by Parent University strictly.

### **25.1 Internal Assessment**

- The examination schedule is notified in advance in the academic calendar and is followed throughout the academic year.
- Internal assessment of theory courses consists of two midterm examinations, one extra midterm examination, assignments/ presentation/ class test/quizzes etc. Internal assessment of lab courses consists of two internal practical examination, practical record, attendance, viva-voce, presentation, day to day performance on the basis of each experiment is assessed.
- Midterm examination process is centrally governed by examination cell. Time Table and the important information like invigilation duty chart, room setting plan etc. is notified well before the commencement of examination.
- Faculty is required to submit required number of papers in a sealed envelope to examination cell in stipulated time period.
- Question papers are prepared strictly as per the University end term paper pattern with Bloom's Taxonomy levels along with detailed solutions and marking scheme.
- The mapping of question paper with course outcomes and Bloom's Taxonomy is provided along the question paper in the prescribed format. Also the distribution of Bloom's level/Course Outcomes in percentage is provided with the question paper.
- Examination Cell appoints internal flying squad of senior faculty members during examination to avoid any type of misconduct.
- The examination evaluation is performed on the basis of course outcomes which ensure the result of the achievement.
- The evaluated answer sheets of all Internal Examination are shown to the students in the class for self-evaluation, discussion and verification of marks.

- Solutions of the question papers are uploaded on institute web portal for at least 15 days after the completion of examination along with detailed marking scheme.
- Students are free to interact with subject teacher/head of the department to resolve any grievance.
- The result of examination is declared within a week from the last date of examination.
- The assessment of the project work is based on a variety of features including the adequacy of the literature survey and data search, standard of presentation and grammar, Interpretation of data and results, Practical ability etc.
- Extra midterm examination is conducted at the end of the semester for those students who were absent during examination due to unavoidable medical conditions. Students who were debarred due to shortage of attendance are also permitted to appear in exam if they maintain required attendance at the end of the semester.
- In order to improve attendance, a student who has overall class attendance more than 80%, is also permitted to appear in extra midterm examination. In such case, marks of the best two performances are considered.
- For detailed attendance norms for appearing in examinations, please refer “**Student Attendance Policy**”

## 25.2 Appointment of External Examiner for Lab Courses

- As per the guidelines issued by RTU, Kota, the institute appoints external examiner from other institutes for the fair and unbiased conduction of end term practical examination.

## 25.3 Invigilation Duty

- Every faculty member except HOD, Dy. HOD and Contractual faculty will be allotted examination work as specified below-

Designation	Nature of Duty	Minimum Number of Duties			
		Mid-Term Theory Exam	University Theory Exam	Mid-Term Practical Exam	Total
<b>Professor</b>	Flying Squad, Supervision, Room Invigilation	6	6	6	18



<b>Associate Professor II</b>	Flying Squad, Supervision, Room Invigilation	6	6	6	18
<b>Associate Professor I</b>	Flying Squad, Room, Invigilation, Reserve	9	9	6	24
<b>Assistant Professor I &amp; II</b>	Room Invigilation, Reserve	13	13	-	26

- Depending upon the circumstances the allotment of number of duties may increase.
- At the end of each semester, the examination cell will forward to the Director (Academics)/principal a comprehensive report regarding allotment of number of examination duties performed by each faculty.