
**Bharati Vidyapeeth's Institute of Management & Information Technology,
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Details of Internal Assessments

Programme sets Course Outcome (CO) attainment levels for all courses. Attainment level is to be measured in terms of student performance in internal assessments with respect to the Course Outcomes of a course in addition to the performance in the University examination. Processes used for assessment (Internal and University) based on, but not limited to, specific examination/, assignments, laboratory tests, project evaluation and student portfolios.

List of Assessment processes:

1. Test
2. Assignments
3. University Exams
4. Laboratory test and oral viva
5. Projects
6. Research paper writing and presentation
7. Activities beyond curriculum (aptitude, value added course, presentations, case study etc.)

Weightage to University examination and weightage to internal assessment is decided according to the marking scheme of University of Mumbai as shown in the Table 2.2.1

Sr No	Course	Total Marks	Internal Assesment	University Term end marks	Practical / Oral Exam	Internal Assessment weightage	University weightage
1	Theory	100	20	80	--	20%	80%
2	Lab	100	25		75	25%	75%
3	Mini Project	50	50	--	--	100%	--
4	Internship Project	150	50	100	--	33.33%	67%
5	Research Project	50	--	--	50	--	100%

Internal Assessment:-

1. Test 1 and 2
2. Practical/ oral Examination

Assessment of the attainment of the Programme Outcomes

Assessment tools and processes used for assessing the attainment of each PO Assessment tools are divided into two categories as follows:

1. **Direct Assessment:** Unit test I & II, Termwork (Theory and Practical), Term End Examination, Oral Practical Examination, Projects (Mini, Internship), Research paper presentation.
2. **Indirect Assessment :** Alumni Survey, Employer survey, Recruiter survey, Industry survey, Graduate Survey etc.

The assessment tools and processes used to gather the data upon which the evaluation of each of the Program Outcomes and Program Specific Outcomes, indicating the frequency with which these processes are carried out is explained in Table 2.3.1

Table 2.3.1: PO Assessing Methods and Tools

Direct/ Indirect	Assessing Tool	Description
Direct	Unit test I & II	Assessing the understanding of theory concepts and expression of knowledge gained Conducted by the Institute twice during each semester for every course.
	Term End Examination	Assessing the understanding of theory concepts and expression of knowledge gained. Conducted by the University at end of each semester for every course.
	Termwork (Theory and Practical)	Assessing theory and practical knowledge. Conducted by the Institute during each semester for every course.
	Oral Practical Examination	Assess practical skills. Conducted by the University at end of each semester for practical course
	Projects (Mini, Internship)	Assessing the application of the theoretical knowledge and solving real time problems. Project Evaluation conducted among the students towards the end of their Semester.
	Research paper presentation	Attain experience in preparation of research materials for publication or presentation.

		Conducted by the University at end of semester for final year.
Indirect	External Examiner's Survey	Conducted at University Examinations to assess the Level of theoretical/ practical understanding of the course knowledge.
	Employer/ Recruiters/ Industry survey	Survey conducted among both as formal and informal mode of communication.
	Seminar / workshop/ Guest Lecture / Industrial Visits	Assessing the theoretical/ practical knowledge and solving real time problems.
	Course end Survey	Student feedback Survey conducted among the students twice once after 40% completion of syllabus and one after university examinations.
	Alumni Survey	Alumni Survey conducted among alumni at the end of each academic year.
	Graduate Survey	Student Exit Survey conducted among the graduates.
	Curricular, Co-curricular and Extra-curricular	Participation and involvement in different competitions, technical fest and cultural fest.

Theory term work and practical term work of each student is continually evaluated and documented. The students expected to be reasonably proficient with each of the program outcomes (POs). The achievement of program outcomes are assessed with the help of course outcomes of the relevant courses through different methods. These assessments are carried out periodically and hence allow the faculty members to monitor and provide attention to the students who may not be attaining the PO's to the required level. This ensures that all students attain the minimum level of each programme outcomes. Every student is assigned a mentor who guides the students for summer project, internship project and research paper writing and process is monitored. The various tools for assessing the student are aptitude test, assignments, mini project, summer projects, unit test (I and II) examinations, internship and paper presentation, reports and viva-voce are used for assessing the attainment of each PO. The laboratory course work provides students with the opportunity to apply their fundamental concepts learnt in theory classes, skills, tools, techniques and use various components and equipments for practical purposes. This also develops their team-working skills and the ability to meet targets within strict deadlines. Laboratory exams, mini projects, internship projects and research paper contribute to the assessment of practical skills which reflect the ability of students to implement ideas and techniques. The project works allows the students to choose a specific area of their interest and develop a deep understanding of that topic, its implementation and application. Reports, oral

presentation and viva-voce contribute to the assessment of overall communication skills and dissemination of ideas. Assessment of live projects, mini projects, internship projects work to ensure proficiency in the students' chosen field of interest and the tools necessary to practice that field. Unit test examinations, aptitude test and assignments contribute to assessing the student's ability to use fundamental concepts, quantitative, numerical and analytical skills. Unit test questions ranging from basic to challenging problems are used to assess the fundamental concepts, numerical and analytical skills. Mini projects/practical assignments/ power point presentations are used to evaluate the students' ability to use various tools, equipments, components and software. Aptitude test are conducted online to improve proficiency in the student's logical skill, technical skill and reasoning ability necessary for making them prepare for placement drives. Assignments on specific topics which involve application of concepts to solve a wide range of problems are given to the students. Participation and involvement in different societies such as workshop, seminar, CSI events, conferences, inter-collegiate technical fest and cultural fest to evaluate the curricular, co-curricular and extra-curricular activities and the abilities to work as a team in a professional environment. Students are encouraged to appear for certification courses, short and long duration courses as well as NET/SET/ Higher education etc. and scores of such exams are also used as secondary tools to evaluate attainment of PO's.

Question paper for Unit test I and II:

Process to designs Unit test Question papers used for internal evaluation is as follows.

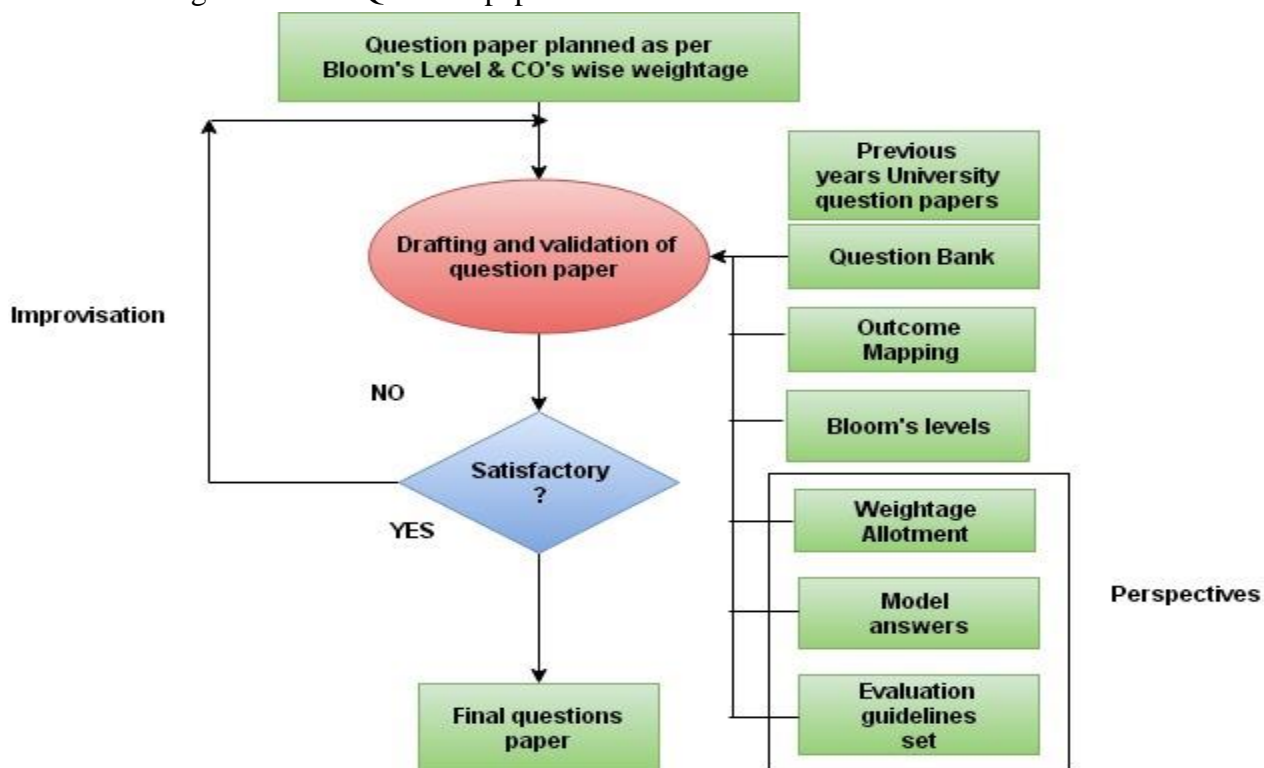


Figure No 2.3.1: Process to designs Unit test Question papers

Laboratory work:

Faculty designs laboratory work which provides students with the opportunity to apply their fundamental concepts learnt in theory classes, skills, tools, techniques and use various components and equipments for practical purposes. This also develops their team-working skills and the ability to meet targets within strict deadlines. This contribute to the assessment of practical skills which reflect the ability of students to implement ideas and techniques. laboratory work are given on regular basis to assess course outcome. Continuous monitoring is done to assess progress of the lab experiments carried out and students maintain journal.

- Assignments / Laboratory work are assigned to students.
- Continuous assessment as per the rubrics in Table 2.3.2
- Record of marks in the students' Journal.
- Evaluation of COs attainment.
- COs attainment analysis submitted to Principal/DAB.
- DAB suggests further action to concerned course owners.
- Submission of compiled term work (calculations as per the course evaluation scheme) to examination section.

Table 2.3.2: Rubrics for Laboratory work assessment

Timely Submission (02)	Presentation (02)	Understanding (06)	Total (10)

Data collection process for students Portfolio for placement drives:

Students Portfolios are maintained through the format which consist of following points:-

1. Personal information
2. Co-curricular activity (All Technical Events)
3. Extra-curricular activity (Sports/Cultural/CSR etc.)
4. Workshops/Seminar/ value added course/short term / long term course attended
5. Internship/mini project/live projects
6. Higher study
7. Placement details
8. Research Publications
9. Entrepreneurship
10. Results

Frequency of Assessment Process

Direct/ Indirect	Assessing Tool	Frequency
Direct	Unit test I & II	Conducted by the Institute twice during each semester for every course.
	Term End Examination	Conducted by the University at end of each semester for every course.
	Termwork (Theory and Practical)	Conducted by the Institute during each semester for every course.
	Oral Practical Examination	Conducted by the University at end of each semester for practical course
	Projects (Mini, Internship)	Project Evaluation conducted among the students towards the end of their Semester.
	Research paper presentation	Conducted by the University at end of semester for final year.
Indirect	External Examiner's Survey	Conducted at University Examinations.
	Employer/ Recruiters/ Industry survey	Once in a year
	Seminar / workshop/ Guest Lecture / Industrial Visits	As per requirement of the course and program.
	Course end Survey	Student feedback Survey conducted among the students twice once after 40% completion of syllabus and one after university examinations.
	Alumni Survey	Alumni Survey conducted among alumni at the end of each academic year.
	Graduating Student Exit Survey	Student Exit Survey conducted among the graduates.
	Curricular, co-curricular and Extra-curricular	As per requirement of the course and program

How the results are documented and maintained.

The results of evaluation process are documented and maintained by the department as follows.

- COs are mapped with the POs and PSOs by course owner and are documented in course file.

- Program outcome attainments are calculated and are documented by each faculty during the academic session and at the end the same is handed over to the Principal. The DAB and principal combines all PO attainment for all courses taught during the entire semester and compute the attainment of PO. Departmental Assessment Committee(DAC) meets twice a semester and gives suggestions for improvements and actions to be taken if any.
- Result of Internal evaluation Unit Test I and II examination and University Term end is maintained in a separate file academic year wise.
- The soft copy of the gazette received from University of Mumbai is circulated by Examination section to the students and also is maintained in the examination section. Hard copies of the Gazette are also maintained in the Examination Section.
- Result of unit test I and II are displayed on the notice board, student's signature is taken and they are asked to inform their parents. At the time of PTM parents are informed about the students overall performance. PO attainment results are analyzed illustrating extend to which each PO are attained and are documented.
- The feedback obtained from External examiners for the Practical lab and viva, employer's / recruiter's feedback and Delegates were used to emphasize the importance of fundamental concepts, analytical thinking and practical scenarios in the curriculum and are used as indirect methods to evaluate PO attainment. Indirect attainment contributes to 20% of Total attainment.
- Course exit survey and graduate survey assessment is documented and maintained in file and are used as indirect methods to evaluate PO attainment. Indirect attainment contributes to 20% of Total attainment.
- Additional efforts to impart knowledge to attain POs, through Contents Beyond Syllabus and it is documented and maintained by the subject teacher.