



MOOGAMBIGAI CHARITABLE AND EDUCATIONAL TRUST

Rajarajeswari College of Engineering

(An Autonomous Institution under VTU, Recognized by GOK & Approved by AICTE)

OFFICE OF THE DEAN-ACADEMICS

Ref. No: RRCE/DA/2024-25/44

Date: 01/08/2025

NOTIFICATION

Sub: Clarification regarding 01- Credit AEC/SEC Courses – PG (M.Tech) – Semester End Examination (SEE) – Reg

As per circular from VTU with Ref. No: VTU/BGM/PG-AEC-SEE related /782/2024-25/1512
Dated: 08.07.2025.

Assessment details : CIE and SEE

The weightage of Continuous Internal Evaluation (CIE) is 50% and Semester End Examination is 50%. The minimum passing mark for CIE is 50% of the maximum marks (25 out of 50). The minimum passing marks for SEE is 40% of maximum marks (20 out of 50). A student shall be deemed to have satisfied the academic requirements and earned the credits allotted to each course if the student secures not less than 50% (50 out of 100) in the sum total of CIE and SEE together.

Semester End Examination(SEE) : 01 credit AEC/SEC (P24SCS208)

The SEE assessment for 01 credit AEC/SEC courses is written as theory with MCQ type question paper. SEE paper shall be set for 50 questions each of the 01 mark. The pattern of the question paper is Multiple Choice Questions (MCQ). The time allotted for SEE is 01 hour. The student has to score a minimum of 40% of the maximum marks (20/50). The examination duration is 1 hour.


Dean-Academics
DEAN-ACADEMICS
Rajarajeswari College of Engineering
Bengaluru - 560 074.


Principal 8/8/25

Copy to:

1. Principal
2. COE
3. M.Tech - Coordinator

Campus: #14, Ramohalli Cross, Kumbalgodu, Mysore Road, Bengaluru – 560074

Phone: +91-80-28437124 / 284373751; extn: 212

Email Id: academicdean@rrce.org

Website: <https://www.rrce.org>



ವಿಶ್ವೇಶ್ವರಯ್ಯ ತಾಂತ್ರಿಕ ವಿಶ್ವವಿದ್ಯಾಲಯ
ವಿಜಯ ಅಧಿನಿಯಮ ೧೯೯೪ರ ಅಡಿಯಲ್ಲಿ ಕರ್ನಾಟಕ ಸರ್ಕಾರದಿಂದ ಸ್ಥಾಪಿತವಾದ ರಾಜ್ಯವಿಶ್ವವಿದ್ಯಾಲಯ
VISVESVARAYA TECHNOLOGICAL UNIVERSITY
State University of Government of Karnataka Established as per the VTU Act, 1994 "InanaSangama", Belagavi-590018, Karnataka, India



Prof. B. E. Rangaswamy, Ph.D
REGISTRAR

Phone: (0831) 2498100
Fax: (0831) 2405467

REF: VTU/BGM/PG-AEC-SEE related /782/2024-25/ 1512

DATE: 8 JUL 2025

CIRCULAR

Subject: Clarification Regarding 1-Credit AEC/SEC Courses - Semester End Examination (SEE)

Reference:

1. Syllabus PG programmes of scheme 2024
2. VTU/BGM/PG Online Courses/764/2024-25/806, dated:

This is with reference to the subject cited above. It has come to our notice that errors have been identified in the Semester End Examination (SEE) section of the syllabus, particularly concerning 1-credit Ability Enhancement Courses (AEC) / Skill Enhancement Courses (SEC).

In light of the upcoming examinations, the following clarifications are issued for the benefit of:

- Question paper setters
- Faculty members handling AEC/SEC courses
- Students registered for these courses and appearing for the SEE

Assessment Details (both CIE and SEE)

The weightage of Continuous Internal Evaluation (CIE) is 50% and for Semester End Exam (SEE) is 50%. The minimum passing mark **for the CIE is 50% of the maximum marks**. Minimum passing marks **in SEE is 40% of the maximum marks of SEE**. A student shall be deemed to have satisfied the academic requirements and earned the credits allotted to each subject/ course if the student secures not less than **50% (50 marks out of 100)** in the sum total of the CIE (Continuous Internal Evaluation) and SEE (Semester End Examination) taken together

1. **The SEE for 01 credit AEC/SEC courses is written as theory with MCQ type question papers**

Semester End Examinations (SEE)

SEE paper shall be set for 50 questions, each of the 01 marks. The pattern of the question paper is MCQ (multiple choice questions). The time allotted for SEE is **01 hour**. The student has to secure a minimum of 40% of the maximum marks meant for SEE.

Examination duration is 01 hour



Semester II				
Skill Enhancement for Research Excellence - 1				
Category: SEC				
Stream: Computer Science and Engineering (M. Tech)				
(Theory)				
Course Code	:	P24SCS208	CIE	: 50 Marks
Teaching Hours L:P: SDA	:	1:0:0	SEE	: 50 Marks
Total Hours	:	15	Total	: 100 Marks
Credits	:	1	SEE Duration	: 1 Hrs.

Course Objectives

1	To introduce the purpose and types of research, and to develop skills in literature review and critical analysis
2	To provide students with knowledge of research methods, design, and techniques to plan and execute systematic research effectively
3	To develop the ability to structure, write, and present clear and compelling research proposals.
4	To equip students with the skills to plan, draft, and refine scholarly research papers suitable for publication.
5	To develop effective research presentation skills and to foster awareness of ethical principles and practices in conducting and reporting research.

Module - 1	No. of Hrs.
Understanding Research Fundamentals: Definition and Significance of Research: Importance of research in the context of science and technology development, Types of Research: Basic research: focus, objectives, Applied research: focus, objectives, Comparison between basic and applied research, Literature Review: Purpose of conducting a literature survey, Identifying and selecting relevant academic papers, Critical Analysis of Existing Research: Techniques for critically reading and evaluating research papers, Identifying strengths, weaknesses, and research gaps, Using critical analysis to refine research questions or approaches	3
Module - 2	No. of Hrs.
Research Methodology and Proposal Writing: Selecting a Research Topic: Identifying topics aligned with personal interests and emerging trends in technology, Defining clear and focused research objectives. Research Design: Understanding qualitative, quantitative, and mixed methods, Choosing an appropriate design based on research questions and objectives, Data Collection Techniques: Overview of methods: surveys, interviews, experiments, and simulations, Strengths, limitations, and suitability of each technique. Writing Research Proposals : Structure of a proposal: Introduction, Literature Review, Methodology, Expected Outcomes, References, Principles of clear academic writing and formal style	3
Module - 3	No. of Hrs.
Data Analysis: Statistical Tools for Data Analysis: Basics of data handling, visualization, and statistical testing using these tools ,Selecting appropriate tools based on research needs, Interpreting Results: Techniques to analyze and interpret quantitative and qualitative data, Drawing meaningful conclusions from analysis, Relating results back to research questions and objectives, Discussing implications and limitations of findings	3
Module - 4	No. of Hrs.
Writing Research Papers: Structure of a Research Paper: Key sections: Abstract, Introduction, Methodology, Results, Discussion, Conclusion, References, Purpose and content of each section, Academic Writing Skills: Writing clearly and coherently for academic audiences, Proper citation and referencing styles (e.g., IEEE, APA), Avoiding plagiarism and maintaining originality , Peer Review Process: Importance and role of peer review in scholarly publishing, How to respond constructively to reviewers, Revising and improving manuscripts based on feedback	3



Module - 5	No. of Hrs.
Presentation Skills & Ethical Considerations in Research: Effective Communication: Techniques for presenting research clearly and confidently, Structuring presentations for academic and professional audiences, Engaging the audience and handling questions, Use of Visual Aids: Designing effective slides, charts, and graphs, Integrating visuals to support and clarify key points, Common mistakes to avoid in research presentations, Understanding Ethics in Research, Overview of ethical guidelines and codes of conduct, Research involving human subjects: consent and confidentiality, Data privacy, plagiarism, and responsible authorship, Importance of integrity and transparency in research	3

Course Outcomes: At the end of the course, the students will be able to	
CO1	Explain the purpose and significance of research in science and technology.
CO2	Apply principles of formal academic writing in proposal preparation
CO3	Analyze and interpret both quantitative and qualitative data effectively
CO4	Understand the peer review process and its importance in publishing.
CO5	Deliver research presentations clearly and confidently to academic and professional audiences

Text Books	
1	C.R. Kothari & Gaurav Garg, <i>Research Methodology: Methods and Techniques</i> (4th Edition)
Reference Text Books	
1	Ranjit Kumar, <i>Research Methodology: A Step-by-Step Guide for Beginners</i>
2	Wayne C. Booth, Gregory G. Colomb, Joseph M. Williams, <i>The Craft of Research</i>
3	John W. Creswell & J. David Creswell, <i>Research Design: Qualitative, Quantitative, and Mixed Methods Approaches</i>

CO-PO Mapping

PO CO	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11
CO1	3	1	2	3	2	-	-	-	-	-	1
CO2	1	2	2	2	1	-	-	-	-	-	1
CO3	3	1	1	-	1	-	-	-	-	-	1
CO4	2	2	1	2	1	-	-	-	-	-	1
CO5	3	2	1	3	1	-	-	-	-	-	1

*3-Highly mapped 2-Moderately mapped 1-Slightly mapped



ASSESSMENT DETAILS (BOTH CIE AND SEE)

The weightage of Continuous Internal Evaluation (CIE) is 50% and for Semester End Exam (SEE) is 50%. The minimum passing mark for the CIE is 50% of the maximum marks (25 marks out of 50) and for the SEE minimum passing mark is 40% of the maximum marks (20 out of 50 marks). A student shall be deemed to have satisfied the academic requirements and earned the credits allotted to each subject/ course if the student secures a minimum of 50% (50 marks out of 100) in the sum total of the CIE (Continuous Internal Evaluation) and SEE (Semester End Examination) taken together.

CONTINUOUS INTERNAL EVALUATION (CIE)

CIE FOR THE THEORY:

1. Three tests each of 50 marks, after the completion of the syllabus 40%, 70% and 80% respectively.
2. Average of best two internal assessment tests each of 50 marks, scale down to 30 marks.
3. Any two assessment methods as per regulations i.e. Two assignments and Seminar for 20 marks,
4. Total marks scored (30+20 = 50 marks).
5. The minimum passing mark for the CIE is 50% of maximum marks (25 marks out of 50).

SEMESTER END EXAMINATION (SEE)

SEE paper shall be set for 50 questions, each of the 01 marks. The pattern of the question paper is MCQ (multiple choice questions). The time allotted for SEE is 01 hour. The student has to secure a minimum of 40% of the maximum marks.