

Enrolment No. /Seat No.: _____

GUJARAT TECHNOLOGICAL UNIVERSITY

MCA – SEMESTER II- EXAMINATION –WINTER-2024

Subject Code:629406

Date: 22/11/2024

Subject Name: Software Testing

Time:02:30 PM TO 05:00 PM

Total Marks: 70

Instructions:

1. Attempt all questions.
2. Make Suitable assumptions wherever necessary.
3. Figures to the right indicate full marks.
4. Use of simple calculators and non-programmable scientific calculators are permitted.

- Q.1** (a) What is Software Quality Assurance? Explain the Software Quality Challenges. **07**
(b) **Do as directed:**
1. Define the term Test Case **01**
 2. Give a difference between Verification and Validation **02**
 3. List the components of Software. **02**
 4. List the major risk items for the development of the software **02**

- Q.2** (a) Explain SQA Components in detail. **07**
(b) Explain in detail the Pre-Project Software Quality. **07**

OR

- (b) What is the classification of the causes of software errors? **07**
- Q.3** (a) Differentiate Software Quality Assurance vs Software Quality Control. **07**
(b) Explain all attributes of McCall`s classic factor model. **07**

OR

- Q.3** (a) Write a detail note on Black Box Testing. **07**
(b) What are the tasks performed by the head of the SQA unit? **07**
- Q.4** (a) Define automation testing. List the main type of automated software test and discuss it. **07**
(b) List the various software development models. Explain waterfall model in detail. **07**

OR

- Q.4** (a) Write a detail note on White Box Testing. **07**
(b) What are the objectives of training and certification? **07**
- Q.5** (a) Write a note on Alpha and Beta testing. **07**
(b) Explain bottoms-up and top-down testing strategies in details. **07**

OR

- Q.5** (a) Explain Corrective and preventive action process. **07**
(b) Explain Issues of controlled document storage and retrieval. **07**
