

GOVERNMENT POLYTECHNIC MUMBAI

TERM END EXAMINATION

Programme : Information Technology (Sandwich Pattern)
Course Title : Software Engineering

2:30 Hours / 60 marks

Enrolment No.

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Instructions:

1. Attempt all the questions.
2. Illustrate your answers with neat sketches wherever necessary.
3. Use of Mathematical Tables, Steam Table and Pocket Calculator (non-programmable) is permissible.
4. Marks on Right Hand Side indicate full marks for the question.
5. Assume suitable additional data, if necessary
6. CO=COURSE OUTCOMES, L=LEVELS

Q.1 Attempt any SIX

12 Marks

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| <ol style="list-style-type: none"> <input checked="" type="checkbox"/> a. Differentiate between personal software process and team software process. <input checked="" type="checkbox"/> b. Define software engineering practices. <input checked="" type="checkbox"/> c. Give importance of Agile methodology. <input checked="" type="checkbox"/> d. State prototyping. <input checked="" type="checkbox"/> e. List core principles of software engineering practices. <input checked="" type="checkbox"/> f. State agility principles. <input checked="" type="checkbox"/> g. Define software. <input checked="" type="checkbox"/> h. Enlist devops testing method. <input checked="" type="checkbox"/> i. Enlist types of testing. | <p>[CO-2, L-U]</p> <p>[CO-4, L-R]</p> <p>[CO-3, L-A]</p> <p>[CO-2, L-R]</p> <p>[CO-4, L-R]</p> <p>[CO-3, L-R]</p> <p>[CO-1, L-R]</p> <p>[CO-6, L-R]</p> <p>[CO-5, L-R]</p> |
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Q.2 Attempt any THREE

12 Marks

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| <ol style="list-style-type: none"> <input checked="" type="checkbox"/> a. Explain DFD level 0, level 1 with the help of example. <input checked="" type="checkbox"/> b. Give selection criteria for software process model. <input checked="" type="checkbox"/> c. Explain software engineering-A layered approach. <input checked="" type="checkbox"/> d. Describe dynamic system development method. | <p>[CO-5, L-U]</p> <p>[CO-2, L-R]</p> <p>[CO-1, L-U]</p> <p>[CO-3, L-A]</p> |
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Q.3 Attempt any THREE

12 Marks

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| <ol style="list-style-type: none"> <input checked="" type="checkbox"/> a. Explain Agile process model-scrum process flow. <input checked="" type="checkbox"/> b. Describe test case template with neat diagram. <input checked="" type="checkbox"/> c. Explain water fall model with diagram. <input checked="" type="checkbox"/> d. State requirement gathering and analysis. | <p>[CO-3, L-U]</p> <p>[CO-5, L-R]</p> <p>[CO-2, L-A]</p> <p>[CO-4, L-R]</p> |
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Q.4 Attempt any FOUR

12 Marks

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| <ol style="list-style-type: none"> <input checked="" type="checkbox"/> a. Sketch V model. Enlist its benefits. <input checked="" type="checkbox"/> b. Explain "Identifying a task set". <input checked="" type="checkbox"/> c. Enlist types of requirement. Explain any two. <input checked="" type="checkbox"/> d. Define devops. States its feature. <input checked="" type="checkbox"/> e. Give application of cocomo model. | <p>[CO-2, L-U]</p> <p>[CO-1, L-R]</p> <p>[CO-4, L-U]</p> <p>[CO-3, L-R]</p> <p>[CO-6, L-A]</p> |
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IT23108

12 Marks

Q. 5 Attempt any TWO

- ~~a.~~ Explain four p's of management spectrum. [CO-6, L-R]
- ~~b.~~ Compare black-box and white-box testing (minimum six point each). [CO-5, L-U]
- c. Describe the following i) Need of SRS ii) Format iii) characteristics. [CO-4, L-A]

****End****