BCS

Exam Questions CTFL4

ISTQB Certified Tester Foundation Level CTFL 4.0 Exam

About Exambible

Your Partner of IT Exam

Found in 1998

Exambible is a company specialized on providing high quality IT exam practice study materials, especially Cisco CCNA, CCDA, CCNP, CCIE, Checkpoint CCSE, CompTIA A+, Network+ certification practice exams and so on. We guarantee that the candidates will not only pass any IT exam at the first attempt but also get profound understanding about the certificates they have got. There are so many alike companies in this industry, however, Exambible has its unique advantages that other companies could not achieve.

Our Advances

* 99.9% Uptime

All examinations will be up to date.

* 24/7 Quality Support

We will provide service round the clock.

* 100% Pass Rate

Our guarantee that you will pass the exam.

* Unique Gurantee

If you do not pass the exam at the first time, we will not only arrange FULL REFUND for you, but also provide you another exam of your claim, ABSOLUTELY FREE!

NEW QUESTION 1
Which statement is true regarding confirmation testing and regression testing?

A. Confirmation testing confirms the quality of the test being run while regression testing ensures that the software still works after a change has been made.
B. Confirmation testing is an optional activity whilst regression testing is not negotiable.
C. Confirmation testing aims to verify that a defect has been resolved and regressiontesting ensuring that existing functionality still works after a change.
D. Testers' involvement is essential whilst running retesting and regression testing.
E. TESTER Involvement is essential whilst running retesting and regression testing.

Answer: C

Explanation:
Confirmation testing, also known as retesting, is conducted to verify that specific defects have been fixed. Regression testing, on the other hand, is performed to ensure that recent changes have not adversely affected existing features of the software. Both types of testing are crucial for maintaining the integrity and quality of the software after modifications.

NEW QUESTION 2
A calculator software is used to calculate the result for 5+6. The user noticed that the result given is 6.
This is an example of;

A. Mistake
B. Fault
C. Error
D. Failure

Answer: D

Explanation:
According to the ISTQB Glossary of Testing Terms, Version 4.0, 2018, page 18, a failure is ??an event in which a component or system does not perform a required function within specified limits??. In this case, the calculator software does not perform the required function of calculating the correct result for 5+6 within the specified limits of accuracy and precision. Therefore, this is an example of a failure.
The other options are incorrect because:
? A mistake is ??a human action that produces an incorrect result?? (page 25). A mistake is not an event, but an action, and it may or may not lead to a failure. For example, a mistake could be a typo in the code, a wrong assumption in the design, or a misunderstanding of the requirement.
? A fault is ??a defect in a component or system that can cause the component or system to fail to perform its required function?? (page 16). A fault is not an event, but a defect, and it may or may not cause a failure. For example, a fault could be a logical error in the code, a missing specification in the design, or a contradiction in the requirement.
? An error is ??the difference between a computed, observed, or measured value or condition and the true, specified, or theoretically correct value or condition?? (page 15). An error is not an event, but a difference, and it may or may not result in a failure. For example, an error could be a rounding error in the calculation, a measurement error in the observation, or a deviation error in the condition.
References = ISTQB Glossary of Testing Terms, Version 4.0, 2018, pages 15-18, 25;
ISTQB CTFL 4.0 - Sample Exam - Answers, Version 1.1, 2023, Question 96, page 34.

NEW QUESTION 3
The acceptance criteria associated with a user story:

A. are often written in a rule-oriented format using the template referred to as "Given/When/Then"
B. are often documented following in rule-oriented format using the following template: "As a [role], I want [feature], so that I can [benefit]"
C. can be written in different formats and represent an aspect of a user story referred to as confirmation' of the so called "3 C's"
D. must be written in one of the two following formats: scenario-oriented or rule-oriented

Answer: C

Explanation:
The acceptance criteria associated with a user story are the conditions that must be met for the user story to be considered done and to deliver the expected value to the user. They are often written in different formats, such as rule-oriented, scenario-oriented, or table- oriented, depending on the nature and complexity of the user story. They represent an aspect of a user story referred to as confirmation, which is one of the so called ??3 C??s?? of user stories. The other two aspects are card and conversation. Card refers to the concise and informal description of the user story, usually following the template: ??As a [role], I want [feature], so that I can [benefit]??. Conversation refers to the ongoing dialogue between the stakeholders and the team members to clarify and refine the user story and its acceptance criteria. Therefore, option C is the correct answer.
References: ISTQB® Certified Tester Foundation Level Syllabus v4.01, Section 3.2.2, page 35-36; ISTQB® Glossary v4.02, page 37.

NEW QUESTION 4
Which of the following work products cannot be examined by static analysis?

A. Test plans
B. Source code
C. Compiled code
D. Formal models

Answer: A

Explanation:
Static analysis is the process of examining the work products of a software development or testing activity without executing them. Static analysis can be applied to various types of work products, such as requirements, design, code, test cases, etc. However, test plans are not suitable for static analysis, because they are high-level documents that describe the test objectives, scope, strategy, resources, schedule, and risks of a testing project. Test plans are not executable or formalized in a way that static analysis tools can analyze them. Therefore, option A is the correct answer.
References: ISTQB® Certified Tester Foundation Level Syllabus v4.01, Section 2.2.1, page 20; ISTQB® Glossary v4.02, page 45.

NEW QUESTION 5
Which of the following statements about branch coverage is true?

A. The minimum number of test cases needed to achieve full branch coverage, is usually lower than that needed to achieve full statement coverage
B. If full branch coverage has been achieved, then all unconditional branches within the code have surely been exercised
C. If full branch coverage has been achieved, then all combinations of conditions in a decision table have surely been exercised
D. Exercising at least one of the decision outcomes for all decisions within the code, ensures achieving full branch coverage

Answer: D

Explanation:
Exercising at least one of the decision outcomes for all decisions within the code, ensures achieving full branch coverage, which is a test coverage criterion that requires that all branches in the control flow of the code are executed at least once by the test cases. A branch is a basic block of code that has a single entry point and a single exit point, and a decision is a point in the code where the control flow can take more than one direction, such as an if-then-else statement, a switch-case statement, a loop statement, etc. The decision outcomes are the possible paths that can be taken from a decision, such as the then branch or the else branch, the case branch or the default branch, the loop body or the loop exit, etc. The other statements are false, because:
? The minimum number of test cases needed to achieve full branch coverage, is usually higher than that needed to achieve full statement coverage, which is a test coverage criterion that requires that all executable statements in the code are executed at least once by the test cases. This is because branch coverage is a stronger criterion than statement coverage, as it implies statement coverage, but not vice versa. For example, a single test case can achieve full statement coverage for an if-then-else statement, but two test cases are needed to achieve full branch coverage, as both the then branch and the else branch need to be exercised.
? If full branch coverage has been achieved, then all unconditional branches within the code have not necessarily been exercised, as unconditional branches are branches that do not depend on any decision, and are always executed, such as a goto statement, a break statement, a return statement, etc. Unconditional branches are not part of the branch coverage criterion, as they do not represent different paths in the control flow of the code. However, they are part of the statement coverage criterion, as they are executable statements in the code.
? If full branch coverage has been achieved, then all combinations of conditions in a decision table have not necessarily been exercised, as a decision table is a test design technique that represents the logical relationships between multiple conditions and their corresponding actions, in a tabular format. A decision table can have more combinations of conditions than the number of decision outcomes in the code, as each condition can have two or more possible values, such as true or false, yes or no, etc. For example, a decision table with four conditions can have 16 combinations of conditions, but the corresponding code may have only two decision outcomes, such as pass or fail. To exercise all combinations of conditions in a decision table, a stronger test coverage criterionis needed, such as condition combination coverage, which requires that all possible combinations of condition outcomes in the code are executed at least once by the test cases.
References: ISTQB Certified Tester Foundation Level (CTFL) v4.0 sources and documents:
? ISTQB® Certified Tester Foundation Level Syllabus v4.0, Chapter 2.3.1, Test
Coverage Criteria Based on the Structure of the Software
? ISTQB® Glossary of Testing Terms v4.0, Branch Coverage, Statement Coverage, Branch, Decision, Decision Outcome, Unconditional Branch, Decision Table, Condition Combination Coverage

NEW QUESTION 6
Which of the following statements is TRUE?

A. User acceptance tests are usually automated and aim to verify the acceptance criteria for user stories
B. Acceptance criteria for user stories can include details on data definitions, for example by describing the format, allowed values, and default values for a data item
C. Acceptance criteria for user stones should focus on positive scenarios, while negative scenarios should be excluded
D. Tests derived from acceptance criteria for user stories are not included in any of the four testing quadrants

Answer: B

Explanation:
Acceptance criteria for user stories often include detailed specifications about data definitions, such as the format, allowed values, and default values for a data item. This helps ensure that the developed feature meets the expected requirements and provides a clear understanding for both developers and testers on what needs to be validated. Therefore, statement B is true as per the ISTQB CTFL syllabus.

NEW QUESTION 7
Testing Quadrants, as a model, is effective in aligning stakeholders within Agile teams. Which of the following examples demonstrates this?

A. Using Testing Quadrants, the test manager is able to measure and communicate test coverage to all stakeholders.
B. Using Testing Quadrants, the test manager is able to communicate potential product risk to all stakeholders.
C. Using Testing Quadrant, the test manager is able to prioritize defects by linking these to a specific type of test.
D. Using Testing Quadrants, the test manager is able to differentiate and describe the types of tests to all stakeholders.

Answer: D

Explanation:
The Testing Quadrants model helps Agile teams by categorizing different types of tests and their purposes. This differentiation helps test managers explain the testing strategy to all stakeholders, ensuring everyone understands the scope and objectives of each test type. This model aids in planning, executing, and tracking testing activities across different quadrants, making it easier to align with stakeholders' expectations and project goals.Reference:ISTQB CTFL Syllabus V4.0, Section 5.1.7

NEW QUESTION 8
A financial institution is to implement a system that calculates the interest rates paid on investment accounts based on the sum invested.
You are responsible for testing the system and decide to use equivalence partitioning and boundary value analysis to design test cases. The requirements describe the following expectations:
Investment range| Interest rate R500 to RIO 00010%
RIO 001 to R50 00011% R50 001 to RlOOOOO12% RIOOOOl to R500 000| 13%
What is the minimum number of test cases required to cover all valid equivalence partitions
for calculating the interest?

A. 5

B. 4
C. 8
D. 16

Answer: B

Explanation:
Using equivalence partitioning, the investment ranges are divided into four partitions:
? R500 to R10,000 (10%)
? R10,001 to R50,000 (11%)
? R50,001 to R100,000 (12%)
? R100,001 to R500,000 (13%)
Thus, the minimum number of test cases required to cover all valid equivalence partitions for calculating the interest is 4.

NEW QUESTION 9
Which of the following statements best describe Behavior-Driven Development (BDD)?

A. A collaborative approach that allows every stakeholder to contribute to how the softwarecomponent must behave.
B. Expresses the behavior of an application with test cases written in Given When Then format.
C. Is used to develop code guided by automated test cases.
D. A psychological technique in which the team's behavior in agile teams is evaluated.

Answer: A

Explanation:
Behavior-Driven Development (BDD) is a collaborative approach that enhances communication among project stakeholders, including developers, testers, and business analysts. It involves defining how software should behave through examples written in a common language understandable by all stakeholders, often using the Given-When-Then format.

NEW QUESTION 10
Consider a review for a high-level architectural document written by a software architect. The architect does most of the review preparation work, including distributing the document to reviewers before the review meeting. However, reviewers are not required to analyze the document in advance, and during the review meeting the software architect explains the document step by step. The only goal of this review is to establish a common understanding of the software architecture that will be used in a software development project.
Which of the following review types does this review refer to?

A. Inspection
B. Audit
C. Walkthrough
D. Informal review

Answer: C

Explanation:
This answer is correct because a walkthrough is a type of review where the author of the work product leads the review process and explains the work product to the reviewers. The reviewers are not required to prepare for the review in advance, and the main objective of the walkthrough is to establish a common understanding of the work product and to identify any major defects or issues. A walkthrough is usually informal and does not follow a defined process or roles. In this case, the review for a high-level architectural document written by a software architect matches the characteristics of a walkthrough. References: ISTQB Glossary of Testing Terms v4.0, ISTQB Foundation Level Syllabus v4.0, Section 2.4.2.2

NEW QUESTION 10
Which of the following statements about TDD, BDD and ATDD is TRUE?

A. Refactonng is a practice that is an integral part of TDD and is applied both to tests and to code wntten to satisfy those tests.
B. ATDD is a black-box test design technique that is applicable exclusively at acceptance test level.
C. BDD is a developer practice where business stakeholders are not usually involved as the tests are directly written at unit/component test level.
D. ATDD is the practice of running the automated acceptance tests as part of a continuous integration process.

Answer: A

Explanation:
Test-Driven Development (TDD) emphasizes writing tests before code and includes refactoring as a key practice to improve both the tests and the code. This ensures that the codebase remains clean andmaintainable. The ISTQB CTFL Syllabus v4.0 discusses TDD as a practice that includes writing tests first, coding to satisfy those tests, and then refactoring the code to improve its structure and readability while keeping the tests intact.

NEW QUESTION 14
Which of the following is an advantage of the whole team approach?

A. It helps avoid the risk of tasks associated with a user story not moving through the Agile task board at an acceptable rate during an iteration.
B. It helps team members understand the current status of an iteration by visualising the amount of work left to do compared to the time allotted for the iteration
C. It helps the whole team be more effective in test case design by requiring all team members to master all types of test techniques.
D. It helps team members develop better relationships with each other and make their collaboration more effective for the benefit of the project.

Answer: D

Explanation:
The whole team approach, often advocated in Agile methodologies, emphasizes collaboration and collective responsibility among all team members. This approach enhances the relationships within the team and improves overall collaboration, which in turn benefits the project's success. According to the ISTQB

CTFL Syllabus v4.0, the whole team approach fosters better communication and cooperation, leading to more effective problem-solving and higher-quality outcomes.

NEW QUESTION 19
For each test case to be executed, the following table specifies its dependencies and the required configuration of the test environment for running such test case:

Test Case	Dependencies	Configuration
TC1		CONF2
TC2	TC4	CONF2
TC3	TC4	CONF1
TC4		CONF1
TC5	TC1	CONF2

Assume that C0NF1 is the initial configuration of the test environment Based on this assumption, which of the following is a test execution schedule that is compatible with the specified dependencies and allows minimising the number of switches between the different configurations of the test environment^

A. TC4, TC3, TC2, TC1, TC5.
B. TCI, TC5, TC4, TC3, TC2
C. TC4, TC3, TC2, TC5, TC1.
D. TC4, TC1, TC5, TC2, TC3

Answer: A

Explanation:
To determine the optimal test execution schedule that minimizes the number of configuration switches and respects the dependencies, we start with the initial configuration, CONF1.
? TC4: It has no dependencies and runs on CONF1 (initial configuration).
? TC3: Depends on TC4 and runs on CONF1. Since TC4 is already executed, we
can proceed with TC3.
? TC2: Depends on TC4 and runs on CONF2. We switch to CONF2 after TC3.
? TC1: No dependencies and runs on CONF2. Since we are already in CONF2, we can execute TC1 next.
? TC5: Depends on TC1 and runs on CONF2. Since TC1 is already executed, we can proceed with TC5 without additional configuration switches.
By following this sequence (TC4, TC3, TC2, TC1, TC5), we respect the dependencies and minimize the number of configuration switches

NEW QUESTION 24
Which of the following is a task the Author is responsible for, as part of a typical formal review?

A. Determining the people who will be involved in the review
B. Recording the anomalies found during the review meeting
C. Identifying potential anomalies in the work product under review
D. Fixing the anomalies found in the work product under review

Answer: C

Explanation:
This answer is correct because identifying potential anomalies in the work product under review is one of the tasks the Author is responsible for, as part of a typical formal review. The Author is the person who creates the work product to be reviewed, such as a requirement specification, a design document, or a test case. The Author??s tasks include preparing the work product for the review, identifying potential anomalies in the work product, and fixing the anomalies found in the work product after the review. References: ISTQB Glossary of Testing Terms v4.0, ISTQB Foundation Level Syllabus v4.0, Section 2.4.2.1

NEW QUESTION 28
Which of the following statements is true?

A. A defect does not always produce a failure, while a bug always produces a failure
B. A defect may cause a failure which, when occurring, always causes an error
C. Failures can be caused by defects, but also by environmental conditions
D. Bugs are defects found during component testing, while failures are defects found athigher test levels

Answer: C

Explanation:
Failures can be caused by defects, but also by environmental conditions. A failure is an event in which the software system does not perform a required function or performs a function incorrectly, according to the expected behavior. A defect is a flaw in the software system or a deviation from the requirements or the specifications, that may cause a failure. However, not all failures are caused by defects, as some failures may be caused by environmental conditions, such as hardware malfunctions, network interruptions, power outages, incompatible configurations, etc. Environmental conditions are factors that affect the operation of the software system, but are not part of the software system itself. The other statements are false, because:
? A defect does not always produce a failure, while a bug always produces a failure.
This statement is false, because a defect may or may not produce a failure, depending on the inputs, the outputs, the states, or the scenarios of the software system, and a bug is just another term for a defect, so it has the same possibility of producing a failure as a defect. For example, a defect in a rarely used feature or a hidden branch of the code may never produce a failure, while a defect in a frequently used feature or a critical path of the code may produce a failure often. A bug is not a different concept from a defect, but rather a synonym or a colloquial term for a defect, so it has the same definition and implications as a defect.
? A defect may cause a failure which, when occurring, always causes an error. This
statement is false, because an error is not a consequence of a failure, but rathera cause of a defect. An error is a human action or a mistake that produces a defect in the software system, such as a typo, a logic flaw, a requirement misunderstanding, etc. An error is not observable in the software system, but rather in the human mind or the human work products, such as the code, the design, the documentation, etc. A failure is not a cause of an error, but rather a result of a defect, which is a result of an error. For example, an error in the code may cause a defect in the software system, which may cause a failure in the software behavior.
? Bugs are defects found during component testing, while failures are defects found at higher test levels. This statement is false, because bugs and failures are not different types of defects, but rather different terms for defects and their manifestations. As mentioned before, bugs are just another word for defects, and failures are the events in which the software system does not perform as expected due to defects. Bugs and failures can be found at any test level, not only at component testing or higher test levels. Test levels are the stages of testing that correspond to the levels of integration of the software system, such as component testing, integration testing, system testing, and acceptance testing. Defects and failures can occur and be detected at any test level, depending on the test objectives, the test basis, the test techniques, and the test environment. References: ISTQB Certified Tester Foundation Level (CTFL) v4.0 sources and documents:
? ISTQB® Certified Tester Foundation Level Syllabus v4.0, Chapter 1.1.2, Testing and Quality1
? ISTQB® Certified Tester Foundation Level Syllabus v4.0, Chapter 1.2.1, Testing Principles1
? ISTQB® Certified Tester Foundation Level Syllabus v4.0, Chapter 1.3.1, Testing in Software Development Lifecycles1
? ISTQB® Glossary of Testing Terms v4.0, Failure, Defect, Bug, Environmental Condition, Error, Test Level2

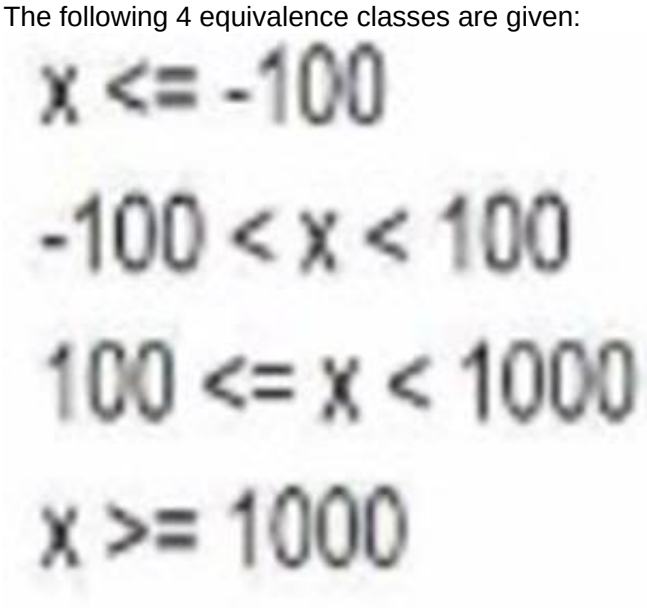
NEW QUESTION 33
Match each objective to the correct test level Objective:
A) Verifying whetherthe functionalandnon-functlonalbehaviorsof the system are as designed andspecified.
B) Verifying whetherthe functionalandnon-functlonalbehaviorsof the interfaces are as designed.
C) Verifying whetherthe functionalandnon-functionalbehaviorsof the components are as designedand specified.
D)Establishing confidence in the quality of the systemas a whole. Test Level:
* 1.Component testing. 2.Integration testing. 3.System testing. 4.Acceptance testing.

A. A3, B2.C4. D1
B. A2, B3, Cl, D4
C. A3.B2. C1. D4

Answer: C

Explanation:
The test levels and their objectives can be matched as follows:
? Verifying whether the functional and non-functional behaviors of the system are as designed and specified (A3: System testing).
? Verifying whether the functional and non-functional behaviors of the interfaces are as designed (B2: Integration testing).
? Verifying whether the functional and non-functional behaviors of the components are as designed and specified (C1: Component testing).
? Establishing confidence in the quality of the system as a whole (D4: Acceptance testing).

NEW QUESTION 36
The following 4 equivalence classes are given:



Which of the following alternatives includes correct test values for x. based on equivalence partitioning?

A. -100; 100:1000; 1001
B. -500; 0; 100; 1000
C. -99; 99:101; 1001
D. -1000; -100; 100; 1000

Answer: D

Explanation:
? The question is about selecting the correct test values for x based on equivalence partitioning. Equivalence partitioning is a software test design technique that divides the input data of a software unit into partitions of equivalent data from which test cases can be derived. In this case, the given equivalence classes are:
Option D provides a value from each of these partitions:
? For (x \leq -100), it gives -1000.

? For (-100 < x < 100), it gives -100 and 100.
? For (100 \leq x < 1000), it gives 500.
? For (x \geq 1000), it gives 1500.
So, option D covers all four given equivalence classes with appropriate values. References: ISTQB Certified Tester Foundation Level (CTFL) v4.0 documents available at ISTQB and ASTQB.
? 1: ISTQB Foundation Level Syllabus 2018, Version 4.0, p. 38
? 2: ISTQB Foundation Level Syllabus 2018, Version 4.0, p. 39
? : ISTQB Foundation Level Syllabus 2018, Version 4.0, p. 40

NEW QUESTION 39
Which of the following statements about checklist-based testing is TRUE?

A. Checklist-based testing is a technique for managing the review meeting that can be applied in those reviews where the use of checklists is mandatory, as is often the case in formal reviews.
B. Checklist-based testing is a review technique that can be used in a formal review process where reviewers, during individual review, try to detect issues within the work product based on a checklist
C. In checklist-based testing, using checklists at a high level of detail is more likely to produce test cases that are easier to reproduce than those using checklists at a low level of detail
D. Checklists used in checklist-based testing should be reviewed periodically for updates as, over time, test cases designed using the same checklist may become less effective at finding defects.

Answer: D

Explanation:
Checklist-based testing is a technique where testers use pre-determined checklists to ensure that important aspects of a work product are evaluated. Over time, these checklists should be reviewed and updated periodically to maintain their effectiveness in detecting defects. As systems evolve, outdated checklists may miss new types of defects, thus diminishing their usefulness. Therefore, statement D is true according to the ISTQB CTFL syllabus.

NEW QUESTION 40
Which of the following statements refers to good testing practice to be applied regardless of the chosen software development model?

A. Tests should be written in executable format before the code is written and should act as executable specifications that drive coding
B. Test levels should be defined such that the exit criteria of one level are part of the entry criteria for the next level
C. Test objectives should be the same for all test levels, although the number of tests designed at various levels can vary significantly
D. Involvement of testers in work product reviews should occur as early as possible to take advantage of the early testing principle

Answer: D

Explanation:
The statement that refers to good testing practice to be applied regardless of the chosen software development model is option D, which says that involvement of testers in work product reviews should occur as early as possible to take advantage ofthe early testing principle. Work product reviews are static testing techniques, in which the work products of the software development process, such as the requirements, the design, the code, the test cases, etc., are examined by one or more reviewers, with or without the author, to identify defects, violations, or improvements. Involvement of testers in work product reviews can provide various benefits for the testing process, such as improving the test quality, the test efficiency, and the test communication. The early testing principle states that testing activities should start as early as possible in the software development lifecycle, and should be performed iteratively and continuously throughout the lifecycle. Applying the early testing principle can help to prevent, detect, and remove defects at an early stage, when they are easier, cheaper, and faster to fix, as well as to reduce the risk, the cost, and the time of the testing process. The other options are not good testing practices to be applied regardless of the chosen software development model, but rather specific testing practices that may or may not be applicable or beneficial for testing, depending on the context and the objectives of the testing activities, such as:
? Tests should be written in executable format before the code is written and should act as executable specifications that drive coding: This is a specific testing practice that is associated with test-driven development, which is an approach to software development and testing, in which the developers write automated unit tests before writing the source code, and then refactor the code until the tests pass. Test-driven development can help to improve the quality, the design, and the maintainability of the code, as well as to provide fast feedback and guidance for the developers. However, test-driven development is not a good testing practice to be applied regardless of the chosen software development model, as it may not be feasible, suitable, or effective for testing in some contexts or situations, such as when the requirements are unclear, unstable, or complex, when the test automation tools or skills are not available or adequate, when the testing objectives or levels are not aligned with the unit testing, etc.
? Test levels should be defined such that the exit criteria of one level are part of the entry criteria for the next level: This is a specific testing practice that is associated with sequential software development models, such as the waterfall model, the V- model, or the W-model, in which the software development and testing activities are performed in a linear and sequential order, with well-defined phases, deliverables, and dependencies. Test levels are the stages of testing that correspond to the levels of integration of the software system, such as component testing, integration testing, system testing, and acceptance testing. Test levels should have clear and measurable entry criteria and exit criteria, which are the conditions that must be met before starting or finishing a test level. In sequential software development models, the exit criteria of one test level are usually part of the entry criteria for the next test level, to ensurethat the software system is ready and stable for the next level of testing. However, this is not a good testing practice to be applied regardless of the chosen software development model, as it may not be relevant, flexible, or efficient for testing in some contexts or situations, such as when the software development and testing activities are performed in an iterative and incremental order, with frequent changes, feedback, and adaptations, as in agile software development models, such as Scrum, Kanban, or XP, when the test levels are not clearly defined or distinguished, or when the test levels are performed in parallel or concurrently, etc.
? Test objectives should be the same for all test levels, although the number of tests designed at various levels can vary significantly: This is a specific testing practice that is associated with uniform software development models, such as the spiral model, the incremental model, or the prototyping model, in which the software development and testing activities are performed in a cyclical and repetitive manner, with similar phases, deliverables, and processes. Test objectives are the goals or the purposes of testing, which can vary depending on the test level, the test type, the test technique, the test environment, the test stakeholder, etc. Test objectives can be defined in terms of the test basis, the test coverage, the test quality, the test risk, the test cost, the test time, etc. Test objectives should be specific, measurable, achievable, relevant, and time-bound, and they should be aligned with the project objectives and the quality characteristics. In uniform software development models, the test objectives may be the same for all test levels, as the testing process is repeated for each cycle or iteration, with similar focus, scope, and perspective of testing. However, this is not a good testing practice to be applied regardless of the chosen software development model, as it may not be appropriate, realistic, or effective for testing in some contexts or situations, such as when the software development and testing activities are performed in a hierarchical and modular manner, with different phases, deliverables, and dependencies, as in sequential software development models, such as the waterfall model, the V-model, or the W-model, when the test objectives vary according to the test levels, such as component testing, integration testing, system testing, and acceptance testing, or when the test objectives change according to the feedback, the learning, or the adaptation of the testing process, as in agile software development models, such as Scrum, Kanban, or XP, etc.References: ISTQB Certified Tester Foundation Level (CTFL) v4.0 sources and documents:
? ISTQB® Certified Tester Foundation Level Syllabus v4.0, Chapter 1.1.1, Testing and the Software Development Lifecycle1
? ISTQB® Certified Tester Foundation Level Syllabus v4.0, Chapter 1.2.1, Testing Principles1

? ISTQB® Certified Tester Foundation Level Syllabus v4.0, Chapter 1.2.2, Testing Policies, Strategies, and Test Approaches1
? ISTQB® Certified Tester Foundation Level Syllabus v4.0, Chapter 1.3.1, Testing in Software Development Lifecycles1
? ISTQB® Certified Tester Foundation Level Syllabus v4.0, Chapter 2.1.1, Test Planning1
? ISTQB® Certified Tester Foundation Level Syllabus v4.0, Chapter 2.1.2, Test Monitoring and Control1
? ISTQB® Certified Tester Foundation Level Syllabus v4.0, Chapter 2.1.3, Test Analysis and Design1
? ISTQB® Certified Tester Foundation Level Syllabus v4.0, Chapter 2.1.4, Test Implementation1
? ISTQB® Certified Tester Foundation Level Syllabus v4.0, Chapter 2.1.5, Test Execution1
? ISTQB® Certified Tester Foundation Level Syllabus v4.0, Chapter 2.1.6, Test Closure1
? ISTQB® Glossary of Testing Terms v4.0, Work Product Review, Static Testing, Early Testing, Test-driven Development, Test Level, Entry Criterion, Exit Criterion, Test Objective, Test Basis, Test Coverage, Test Quality, Test Risk, Test Cost, Test Time2

NEW QUESTION 41
Which of the following statements about white-box testing is FALSE?

A. Static testing can benefit from using code-related white-box test techniques during code reviews.
B. White-box testing allows suggesting test cases for increasing coverage levels which are based on objective measures
C. Achieving full code coverage for a component or a system ensures that it has been fully tested
D. Black-box testing can benefit from using code-related white-box test techniques to increase confidence in the code.

Answer: C

Explanation:
Achieving full code coverage does not guarantee that the component or system is fully tested or free of defects. Code coverage metrics indicate the extent to which the source code has been tested, but they do not account for the quality of the tests or whether all possible scenarios have been considered. Other types of testing, including functional, performance, and security testing, are necessary to ensure comprehensive testing. The ISTQB CTFL Syllabus v4.0 highlights that while high code coverage is beneficial, it does not equate to complete testing.

NEW QUESTION 46
Which two of the following statements describe the advantages provided by good traceability between the test basis and test work products?

A. Analyzing the impact of changes.i
B. A measure of code quality.ii
C. Accurate test estimation.i
D. Making testing auditabl
E. Select the correct Answer:
F. i and ii
G. i and iv
H. i and iii
I. ii and iii

Answer: B

Explanation:
Good traceability between the test basis and test work products provides several advantages: i.Analyzing the impact of changes:Traceability allows for easy identification of which parts of the test work products will be affected by changes in the requirements or design, facilitating impact analysis. iv.Making testing auditable:Traceability ensures that there is a clear connection between the requirements and the test cases, which makes the testing process auditable and provides evidence that all requirements have been tested.

NEW QUESTION 47
To be able to define testable acceptance criteria, specific topics need to be addressed. In the table below are the topics matched to an incorrect description. Match the topics (the left column) with the correct description (the right column)

A. Mastered
B. Not Mastered

Answer: A

NEW QUESTION 50
Which of the following statements about the value of maintaining traceability between the test basis and test work products is not true?

A. Traceability can be useful for assessing the impact of a change to a test basis item on the corresponding tests
B. Traceability can be useful for determining how many test basis items are covered by the corresponding tests
C. Traceability can be useful for determining the most suitable test techniques to be used in a testing project
D. Traceability can be useful to support the needs required by the auditing of testing

Answer: C

Explanation:
Traceability is the ability to trace the relationships between the items of the test basis, such as the requirements, the design, the risks, etc., and the test artifacts, such as the test cases, the test results, the defects, etc. Traceability can provide various benefits for the testing process, such as improving the test coverage, the test quality, the test efficiency, and the test communication. However, not all the statements given are true about the value of maintaining traceability between the test basis and test work products. The statement that is not true is option C, which says that test objectives should be the same for all test levels, although the number of tests designed at various levels can vary significantly. This statement is false, because test objectives are the goals or the purposes of testing, which can vary depending on the test level, the test type, the test technique, the test environment, the test stakeholder, etc. Test objectives can be defined in terms of the test basis, the test coverage, the test quality, the test risk, the test cost, the test time, etc. Test objectives should be specific, measurable, achievable, relevant, and time-bound, and they should be aligned with the project objectives and the quality characteristics. Test objectives should not be the same for all test levels, as different test levels have different focuses, scopes, and perspectives of testing, such as component testing, integration testing, system testing, and acceptance testing. The other statements are true about the value of maintaining traceability between the test basis and test work products, such as:
? Traceability can be useful for assessing the impact of a change to a test basis item on the corresponding tests: This statement is true, because traceability can

help to identify which tests are affected by a change in the test basis, such as a new requirement, a modified design, a revised risk, etc., and to determine the necessary actions to update, re-execute, or re-evaluate the tests. Traceability can also help to estimate the effort, the cost, and the time needed to implement the change and to verify its impact on the software system.
? Traceability can be useful for determining how many test basis items are covered by the corresponding tests: This statement is true, because traceability can help to measure the test coverage, which is the degree to which the test basis is exercised by the test cases. Traceability can help to identify which test basis items are covered, partially covered, or not covered by the tests, and to evaluate the adequacy, the completeness, and the effectiveness of the testing process.Traceability can also help to identify the gaps, the overlaps, or the redundancies in the test coverage, and to prioritize, optimize, or improve the test cases.
? Traceability can be useful to support the needs required by the auditing of testing:
This statement is true, because traceability can help to provide evidence, documentation, and justification for the testing activities, results, and outcomes. Traceability can help to demonstrate that the testing process follows the standards, the regulations, the policies, and the best practices that are applicable to the software system, the project, or the organization. Traceability can also help to verify that the testing process meets the expectations, the needs, and the satisfaction of the users and the stakeholders. References: ISTQB Certified Tester Foundation Level (CTFL) v4.0 sources and documents:
? ISTQB® Certified Tester Foundation Level Syllabus v4.0, Chapter 1.2.2, Testing
Policies, Strategies, and Test Approaches1
? ISTQB® Certified Tester Foundation Level Syllabus v4.0, Chapter 2.1.1, Test Planning1
? ISTQB® Certified Tester Foundation Level Syllabus v4.0, Chapter 2.1.2, Test Monitoring and Control1
? ISTQB® Certified Tester Foundation Level Syllabus v4.0, Chapter 2.1.3, Test Analysis and Design1
? ISTQB® Glossary of Testing Terms v4.0, Traceability, Test Basis, Test Artifact, Test Objective, Test Level, Test Coverage, Test Quality, Test Risk, Test Cost, Test Time2

NEW QUESTION 51
Following a risk-based testing approach you have designed 10 tests to cover a product risk with a high-risk level. You want to estimate, adopting the three-point test estimation technique, the test effort required to reduce the risk level to zero by executing those 10 tests. You made the following three initial estimates:
• most optimistic = 6 person hours
• most likely = 30 person hours
• most pessimistic = 54 person hours
Based only on the given information, which of the following answers about the three-point test estimation technique applied to this problem is true?

A. The final estimate is between 22 person hours and 38 person hours
B. The final estimate is exactly 30 person hours because the technique uses the initial most likely estimate as the final estimate
C. The final estimate is between 6 person hours and 54 person hours
D. The final estimate is exactly 30 person hours because the technique uses the arithmetic mean of the three initial estimates as the final estimate

Answer: A

Explanation:
The three-point test estimation technique is a method of estimating the test effort based on three initial estimates: the most optimistic, the most likely, and the most pessimistic. The technique uses a weighted average of these three estimates to calculate the final estimate, which is also known as the expected value. The formula for the expected value is:
Expected value = (most optimistic + 4 * most likely + most pessimistic) / 6 Using the given values, the expected value is:
Expected value = (6 + 4 * 30 + 54) / 6 Expected value = 30 person hours
However, the expected value is not the only factor to consider when estimating the test effort. The technique also calculates the standard deviation, which is a measure of the variability or uncertainty of the estimates. The formula for the standard deviation is: Standard deviation = (most pessimistic - most optimistic) / 6
Using the given values, the standard deviation is:
Standard deviation = (54 - 6) / 6 Standard deviation = 8 person hours
The standard deviation can be used to determine a range of possible values for the test effort, based on a certain level of confidence. For example, using a 68% confidence level, the range is:
Expected value ?? standard deviation Using the calculated values, the range is: 30 ?? 8 person hours
Therefore, the final estimate is between 22 person hours and 38 person hours, which is option A.
References: ISTQB® Certified Tester Foundation Level Syllabus v4.01, Section 2.3.2, page 24-25; ISTQB® Glossary v4.02, page 33.

NEW QUESTION 53
Which of the following statements best describes the way in which decision coverage is measured?

A. Measured as the number of statements executed by the tests, divided by the total number of executable statements in the code.
B. Measured as the number of lines of code executed by the tests, divided by the total number of lines of code in the test object.
C. Measured as the number of decision outcomes executed by the tests, divided by the total number of decision outcomes in the test object.
D. It is not possible to accurately measure decision coverage.

Answer: C

Explanation:
Reference:ISTQB CTFL Syllabus V4.0, Section 4.3.2

NEW QUESTION 57
Which of the following answers describes a reason for adopting experience-based testing techniques?

A. Experience-based test techniques provide more systematic coverage cnteria than black- box and white-box test techniques
B. Experience-based test techniques completely rely on the tester's past experience for designing test cases.
C. Experience-based test techniques allow designing test cases that are usually easier to reproduce than those designed with black-box and white-box test techniques.
D. Experience-based test techniques tend to find defects that may be difficult to find with black-box and white-box test techniques and are often useful to complement these more systematic techniques.

Answer: D

Explanation:
Experience-based testing techniques leverage the tester's intuition and prior experience to identify defects that systematic techniques might miss. These techniques are valuable because they can uncover issues based on real-world usage and scenarios that aren't always covered by more formalized black-box and white-box methods. The ISTQB CTFL Syllabus v4.0 highlights the complementary nature of experience-based techniques in providing a broader defect detection

strategy.

NEW QUESTION 61
From a testing perspective, configuration management

A. Allows the expected results to be compared with the actual results.
B. Allows the tracking of all changes to versions of the testware.
C. Includes all activities that direct and control an organisation with regard to quality
D. Focuses on configuring static analysis tools to choose the most suitable breadth and depth of analysis.

Answer: B

Explanation:
Configuration management in the context of testing involves the systematic control of changes to the configuration items, including testware such as test scripts, test data, and test environments. It ensures that all changes are tracked and recorded, enabling the version control and management of testware .
Option A is related to test execution rather than configuration management. Option C describes quality management in a broader sense, not specifically configuration management. Option D is specific to the configuration of tools, not the overall management of testware versions.

NEW QUESTION 64
A system has a self-diagnostics module that starts executing after the system is reset. The diagnostics are running 12 different tests on the systems memory hardware. The following is one of the requirements set for the diagnostics module:
'The time taking the diagnostics tests to execute shall be less than 2 seconds' Which of the following is a failure related to the specified requirement?

A. The diagnostic tests fail to start after a system reset
B. The diagnostic tests take too much time to execute
C. The diagnostic tests that measure the speed of the memory, fail
D. The diagnostic tests fail due to incorrect implementation of the test code

Answer: B

Explanation:
A failure is an event in which a component or system does not perform a required function within specified limits1. A requirement is a condition or capability needed by a user to solve aproblem or achieve an objective2. In this case, the requirement is that the diagnostics tests should execute in less than 2 seconds. Therefore, any event that violates this requirement is a failure. The only option that clearly violates this requirement is B. The diagnostic tests take too much time to execute. If the diagnostic tests take more than 2 seconds to complete, then theydo not meet the specified limit and thus fail. The other options are not necessarily failures related to the specified requirement. Option A. The diagnostic tests fail to start after a system reset is a failure, but not related to the time limit. It is related to the functionality of the self-diagnostics module. Option C. The diagnostic tests that measure the speed of the memory, fail is also a failure, but not related to the time limit. It is related to the accuracy of the memory tests. Option D. The diagnostic tests fail due to incorrect implementation of the test code is also a failure, but not related to
the time limit. It is related to the quality of the test code. References = ISTQB® Certified Tester Foundation Level Syllabus v4.0, Requirements Engineering Fundamentals.

NEW QUESTION 69
An alphanumeric password must be between 4 and 7 characters long and must contain at least one numeric character, one capital (uppercase) letter and one lowercase letter of the alphabet.
Which one of the following sets of test cases represents the correct outcome of a two-value boundary value analysis applied to the password length? (Note: test cases are separated by a semicolon)

A. 1xA;aB11;Pq1ZZab;7iDD0a1x
B. aB11;99rSp:5NnN10;7iDD0a1x
C. 1xB: aB11: 99rSp: 5NnN10; 4NnN10T; 44ghWn19
D. 1RhT;rSp53;3N3e10;8sBdby

Answer: D

Explanation:
The correct outcome of a two-value boundary value analysis applied to the password length is the set of test cases represented by option D. Boundary value analysis is a test design technique that focuses on the values at the boundaries of an equivalence partition, such as the minimum and maximum values, or the values just above and below the boundaries. A two-value boundary value analysis uses two values for each boundary, one representing the valid value and one representing the invalid value. For example, if the valid range of values is from 4 to 7, then the two values for the lower boundary are 3 and 4, and the two values for the upper boundary are 7 and 8. The test cases in option D use these values for the password length, while also satisfying the other requirements of the password, such as containing at least one numeric character, one capital letter, and one lowercase letter. The test cases in option D are:
? 1RhT: a 4-character password that is valid
? rSp53: a 5-character password that is valid
? 3N3e10: a 6-character password that is valid
? 8sBdby: an 8-character password that is invalid The test cases in the other options are incorrect, because they either use values that are not at the boundaries of the password length, or they do not meet the other requirements of the password. For example, the test cases in option A are:
? 1xA: a 3-character password that is invalid, but it does not contain a capital letter
? aB11: a 4-character password that is valid
? Pq1ZZab: a 7-character password that is valid
? 7iDD0a1x: an 8-character password that is invalid References: ISTQB Certified Tester Foundation Level (CTFL) v4.0 sources and documents:
? ISTQB® Certified Tester Foundation Level Syllabus v4.0, Chapter 2.2.1, Black-box Test Design Techniques1
? ISTQB® Glossary of Testing Terms v4.0, Boundary Value Analysis, Equivalence Partition2

NEW QUESTION 70
Consider the following user story about an e-commerce website's registration feature that only allows registered users to make purchases ; As a new user, I want to register to the website, so that I can start shopping online"
The following are some of the acceptance criteria defined for the user story
[a] The registration form consists of the following fields: username, email address, first name, last name, date of birth, password and repeat password.

[b] To submit the registration request, the new user must fill in all the fields of the registration form with valid values and must agree to the terms and conditions.
[c] To be valid, the email address must not be provided by free online mail services that allow to create disposable email addresses. A dedicated error message must be presented to inform the new user when an invalid address is entered.
[d] To be valid, the first name and last name must contain only alphabetic characters and must be between 2 and 80 characters long A dedicated error message must be presented to inform the new user when an invalid first name and/or the last name is entered
[e] After submitting the registration request, the new user must receive an e-mail containing the confirmation link to the e-mail address specified in the registration form
Based only on the given information, which of the following ATDD tests is MOST LIKELY to be written first?

A. The new user enters valid values in the fields of the registration form, except for the email address, where he/she enters an e-mail address provided by a free online mail service that allow to create disposable email addresse
B. Then he/she is informed by the website about this issue.
C. The new user enters valid values in the fields of the registration form, except for the first name, where he/she enters a first name with 10 characters that contains a numbe
D. Then he/she is informed by the website about this issue.
E. The user accesses the website with a username and password, and successfully placesa purchase order for five items, paying by Mastercard credit card
F. The new user enters valid values in all the fields of the registration form, confirms to accept all the terms and conditions, submits the registration request and then receives an e-mail containing the confirmation link to the e-mail address specified in the registration form

Answer: D

Explanation:
Acceptance Test-Driven Development (ATDD) tests focus on verifying whether the system meets the specified acceptance criteria. The most critical path to test first would be the scenario where everything is done correctly (happy path), ensuring the basic functionality works as expected.
? The new user provides all valid data.
? This ensures the registration form works and the user receives a confirmation email.
This test covers the basic functionality and will help verify that the primary use case is handled correctly before testing invalid or edge cases.
Reference: ISTQB CTFL Syllabus V4.0, Chapter 4.5.3, Acceptance Test-Driven Development (ATDD).

NEW QUESTION 71
Which of the following statements best describes how configuration management supports testing?

A. Configuration management helps reduce testing effort by identifying a manageable number of test environment configurations in which to test the software, out of all possible configurations of the environment in which the software will be released
B. Configuration management is an administrative discipline that includes change control, which is the process of controlling the changes to identified items referred to as Configuration Items'
C. Configuration management is an approach to interoperability testing where tests are executed in the cloud, as the cloud can provide cost-effective access to multiple configurations of the test environments
D. Configuration management helps ensure that all relevant project documentation and software items are uniquely identified in all their versions and therefore can be unambiguously referenced in test documentation

Answer: D

Explanation:
This answer is correct because configuration management is a process of establishing and maintaining consistency of a product??s performance, functional, and physical attributes with
its requirements, design, and operational information throughout its life. Configuration management helps ensure that all relevant project documentation and software items are uniquely identified in all their versions and therefore can be unambiguously referenced in test documentation. This supports testing by providing traceability, consistency, and control over the test artifacts and the software under test. References: : ISTQB Glossary of Testing Terms v4.0, : ISTQB Foundation Level Syllabus v4.0, Section 2.2.2.2

NEW QUESTION 73
.....

Relate Links

100% Pass Your CTFL4 Exam with Exambible Prep Materials

https://www.exambible.com/CTFL4-exam/

Contact us

We are proud of our high-quality customer service, which serves you around the clock 24/7.

Viste - https://www.exambible.com/