



Version 6.1 Updated for the 2021
Project Management Professional (PMP)[®] Exam



Crosswind Success Series: PMP[®] Exam Bootcamp Manual

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Version 6.1 aligned with the Project Management Institute, *A Guide to the Project Management Body of Knowledge, (PMBOK[®] Guide)* - Sixth Edition, Project Management Institute Inc., 2017

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14.9. Project Risk Management Formulas and Variables

Description	Formula	Variable (Components)	Example
The sum of all probabilities for outcome of an event must equal 1.0.	Total Probabilities = Sum of all probabilities	N/A	Outcome A = 0.5 Outcome B = 0.3 Outcome C = 0.2 Totals equal 1.0
EMV is expected monetary value. Here, the probability of the outcome is multiplied by the impact, and then the products of the outcome are summed for a total EMV of the decision.	Probability x Impact (summed)	Probability = P Impact = I Expected Monetary Value = EMV	Outcome A = 0.5 x \$100 Outcome B = 0.3 x \$300 Outcome C = 0.2 x \$300 Total probabilities equal 1.0 and EMV equals \$200

14.10. Project Risk Management Terminology

Term	Description
Analytical Techniques	Techniques used to evaluate, analyze or forecast potential outcomes based on project variables and relationships among those variables
Contingency	A possible event that could negatively impact the project and is typically neutralized by accessing the schedule or budget reserve established for that purpose
Contingency Allowance	An allowance or reserve, typically related to the budget or schedule, set aside to compensate for unanticipated events
Contingency Reserve	Funds set aside for unforeseen events that can negatively effect the project
Contingent Response Strategies	The tactics that will be employed if a specific risk trigger occurs
Data Gathering and Representation Techniques	The collection, organization, and presentation of data and information
Decision Tree Analysis	A technique used to assess possible responses to a threat or opportunity in order to make the best decision; it involves diagramming the options and notating the expected monetary value (EMV) potential of each option
Document Analysis	The evaluation of current documentation related to project risk
Expected Monetary Value	A statistical technique, typically applied in decision tree analysis, used to determine the average outcome when contingent scenarios for future project risks must be considered
Fallback Plan	The plan that will supersede the original plan if it is not effective

Term	Description
Identify Risks	The process of identifying the risks that can impact the project and documenting their attributes
Implement Risk Responses	The process of determining the actions that will be taken should a threat or opportunity arise within the project
Management Reserve	Funds set aside for unanticipated project work and excluded from the performance measurement baseline
Modeling	The process of evaluating various situations represented in the model in order to determine their impact on the project
Monitor Risks	The process of monitoring the implementation of risk response plans, tracking identified risks, identifying and analyzing new risks, and evaluating risk process effectiveness
Monte Carlo Simulation	A process that simulates possible project schedule or cost outcomes; often used to estimate required reserves based on the scatter diagram or probability table that is typically the output of the process
Multi-criteria Decision Analysis	A process that utilizes a decision matrix to systematically analyze project information such as risk levels, uncertainty, value, and prioritization
Opportunity	A risk whose occurrence will result in a positive impact on the project
Overall Project Risk	The impact that uncertainty, including the cumulative effect of individual risks, has on the project; the exposure of stakeholders to the implications of variations in project outcome, both positive and negative
Perform Qualitative Risk Analysis	The process of ranking risks for additional evaluation based on the probability of each risk and the impact on the project if the risk occurs
Perform Quantitative Risk Analysis	The process of numerically evaluating the impact of identified risks on the project
Plan Risk Management	The process of determining the methods that will be used to execute project risk management activities
Plan Risk Responses	The process of determining the actions that will be taken should a threat or opportunity arise within the project
Probability and Impact Matrix	An array used in qualitative risk management to prioritize risk, typically based on each risk's probability of occurrence and potential impact
Project Risk Management	The process required to plan for, determine, evaluate, respond to, and control potential or actual project threats and opportunities
Quantitative Risk Analysis and Modeling Techniques	Common approaches to producing a more detailed evaluation of project risk; techniques include expected monetary value (EMV) and decision tree analysis
Reserve	Funds set aside for risks to the budget or schedule, for example management reserves or contingency reserves, as provided for in the project management plan
Reserve Analysis	An analysis technique used to identify the critical features and relationships of components in order to determine the amount of reserves realistically needed for the project with consideration of schedule duration, budget, and cost estimation
Residual Risk	The remaining risk following the implementation of risk responses
Risk	An unscheduled, but possible, event that may have a positive or negative impact on the project if it occurs
Risk Acceptance	A risk response strategy that involves acknowledgment only of the risk; no planned response is formulated unless the risk occurs

Term	Description
Risk Appetite	The amount of uncertainty an organization or individual is willing to accept in anticipation of a reward
Risk Audits	The evaluation of project risk responses to determine the effectiveness of the utilized approach to risk
Risk Avoidance	A risk response strategy that involves the elimination of the threat or protection of the project from the impact of the threat
Risk Breakdown Structure (RBS)	A representation of risks ranked by category
Risk Categorization	The organization of risks by source or other criteria to increase understanding of overall project risk
Risk Category	A class of risks, such as organizational risks or market risks, defined by its potential cause
Risk Data Quality Assessment	An evaluation of risk-associated data to determine its quality
Risk Database	A data repository that stores and manipulates information associated with the risk management processes
Risk Enhancement	A risk response strategy that increases the probability of occurrence or impact of an opportunity as a result of deliberate team action
Risk Escalation	A risk response strategy that transfers ownership of the risk from the project team to a higher organizational level for more effective management
Risk Events	Events that may impact the project (either negative or positive)
Risk Exploiting	A risk response strategy that ensures the occurrence of an opportunity as a result of deliberate team action
Risk Exposure	A quantified potential for loss or gain at any given time during the project
Risk Factors	Numbers representing the risk of certain events, the likelihood of their occurring, plus the impact on the project (if the event does occur)
Risk Management Plan	The document, part of the project or program management plan, used to describe the manner in which risk management activities will be framed and executed
Risk Mitigation	A risk response strategy that involves the reduction of the threat or the probability that the risk will occur
Risk Owner	The person responsible for the monitoring of a risk and for the determination and implementation of an appropriate risk response strategy
Risk Register	A document that lists each risk along with the results of its analysis and risk response planning
Risk Reassessment	The process of identifying new risks, reassessing risks that have already been identified, and closing of expired risks
Risk Report	A project document that establishes the progressive development of risk management processes throughout the project, summarizes individual project risk information, and delineates the degree of overall project risk
Risk Review	A meeting used to examine and document the effectiveness of risk responses in relation to identified, individual project risks and to overall project risk
Risk Seeking	Possessing a higher tolerance than most for risk
Risk Sharing	A risk responses strategy that allocates ownership of an opportunity from the project team to a third party who is best able to capture the benefits of that opportunity
Risk Symptoms	Characteristics which indicate that a risk event is possibly starting to occur; could also be called risk triggers

Term	Description
Risk Threshold	The degree of risk exposure that defines the upper limit of risk acceptance; risks whose level exceed the threshold must be addressed
Risk Tolerance	The level of risk that an individual or organization is willing to permit; also known as risk utility
Risk Transference	A risk response strategy that involves shifting the impact of a threat, as well as accountability for the response, to a third party
Risk Urgency Assessment	The evaluation of risk responses to determine priority in order of timing
Risk-averse	Possessing a low desire or tolerance for risk
Risk-neutral	A middle ground between the risk taken and the benefit received
Root Cause Analysis	An analytical technique used to ascertain the fundamental reason a variance, defect, or risk exists
Secondary Risk	A risk that results from a risk response implementation
Sensitivity Analysis	A quantitative risk analysis and modeling technique used to identify those risks that have the greatest effect on the project
Simulation	A project computer model that can counterfeit the project outcome when there is uncertainty associated with schedule, cost or resources
Strengths, Weaknesses, Opportunities, and Threats (SWOT) Analysis	A risk analysis technique which considers the strengths, weaknesses, opportunities, and threats of the project to facilitate a more knowledgeable risk management analysis
Threat	A risk whose occurrence will result in a negative impact on the project
Trigger Condition	An indicator that a risk event could occur
Workaround	A response to a risk that was unplanned or that had an ineffective planned response

The source for the above definitions is the Glossary of the Project Management Institute, *A Guide to the Project Management Body of Knowledge, (PMBOK® Guide) – Sixth Edition*, Project Management Institute Inc., 2017

14.11. Project Risk Management Tests and Exercises

14.11.1. Project Risk Management Practice Test

Answers are in section 14.12.1.

1. Calculate EMV from the following: 0.4 probability of \$6,500, 0.3 probability of -\$3,200, 0.2 probability of \$2,000, 0.1 probability of \$1,000.
 - (A) \$10,500
 - (B) \$2,700
 - (C) \$2,140
 - (D) \$2,500

2. In defining a risk trigger, which of the following is most accurate?
 - (A) A trigger is an indication that a risk event could occur in the near future
 - (B) A trigger is the same as a risk
 - (C) A trigger is an indicator that a risk event has definitely occurred
 - (D) A trigger is an indicator that a risk event will definitely occur

3. The telecom project is scheduled to run until year's end. There is a strong possibility that the union collective bargaining agreement will not be renewed immediately upon its expiration next month. Union negotiation is outside the control of senior management and the project, so senior management has decided to reassign the job responsibilities of union personnel to non-union personnel to minimize project schedule slippage. Of the following, what best describes the type of risk response represented by this decision?
 - (A) Risk avoidance, which avoids negative risk by taking actions to prevent it
 - (B) Risk transference, which avoids negative risk by transferring or reassigning responsibilities
 - (C) Risk mitigation, which mitigates negative risk by taking actions to lessen its impact
 - (D) Risk acceptance, which accepts negative risk and has a plan to deal with it if it occurs

4. The company is concerned about its position during the economic downturn. Its CEO is a risk taker. Of several strategies on the table for consideration, which is he most likely to pursue?
 - (A) Mandating that senior management lay the ground work for a reduction in force in the event it is necessary
 - (B) Entering a relatively untested market in the hope of significant reward
 - (C) Trying new markets that do not require significant investment while mandating traditional "belt-tightening" procedures
 - (D) None of the answers

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5. You are the project manager on a server infrastructure project. You have just started creating the risk register. What process did you just complete?
- (A) Identify risks
 - (B) Plan risk management
 - (C) Perform qualitative risk analysis
 - (D) Implement risk responses
6. You have been doing quantitative risk analysis on a nationwide mapping project. Which of the following best describes when it makes the most sense to do this type of analysis?
- (A) For risks where money is involved
 - (B) For risks that cross a higher threshold of probability and impact or projects that are higher risk compared to others
 - (C) For risks that cross a higher threshold of probability and impact
 - (D) For higher risk projects
7. The project manager and the team have made risk-related contract decisions and updated the risk register and project management plan. Which of the following best describes the process they have just completed?
- (A) Identify risks, which entails determining what risks and triggers could occur on the project
 - (B) Plan risk responses, which entails determining what will be done if risk events occur and who will be responsible for executing those actions
 - (C) Monitor risks, which entails observing project activities for risks and risk triggers and implementing the means to control them
 - (D) Perform qualitative risk analysis, which entails assigning probability and impact ratings to each risk
8. In response to economic and market changes, the company is moving from a conservative strategy to a more market-driven strategy. As a result of this change, the company has just approved a project that aligns with the new strategy. A number of the stakeholders, however, are still risk-averse. The project manager is meeting with them to explain his risk management plan. The stakeholders are very interested in the concept of a risk review. Which of the following best describes a risk review?
- (A) The process of determining the project risks
 - (B) The process of determining the characteristics of the project risks
 - (C) The process of determining the validity of the documented risks and looking for new risks that could occur
 - (D) The process of determining who will implement a risk response plan

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9. The project manager and the team created change requests as a result of unforeseen occurrences. Which of the following best describes the process they have just completed?
- (A) Identify risks, which entails determining what risks and triggers could occur on the project
 - (B) Plan risk responses, which entails determining what will be done if risk events occur and who will be responsible for executing those actions
 - (C) Monitor risks, which entails observing project activities for risks and risk triggers and implementing the means to control them
 - (D) Perform qualitative risk analysis, which entails assigning probability and impact ratings to each risk
10. The reservation system has been working well. Today, the main database engine crashed, preventing the airline from creating reservations for its flights. The risk response didn't fix the problem, so the airline must respond. Which of the following should it perform first?
- (A) Fix the problem with a work-around
 - (B) Determine why the risk response plan failed
 - (C) Adjust the risk response plan
 - (D) Determine why the problem occurred
11. Perform qualitative risk analysis uses a variety of tools for analysis. Which of the following is most closely associated with this process?
- (A) A probability and impact matrix
 - (B) The expected monetary value (EMV) formula
 - (C) Templates for work-around documentation
 - (D) Risk trigger determination
12. The makers of the video game are making a new version. It's key to have it released in time for the holiday shopping season. The project manager is monitoring the schedule and has noticed that an event has been triggered showing there is a high probability the schedule will slip. The project manager follows the plan and brings in 4 new contract programmers to help get it back on track. What process is she doing?
- (A) Planning risk responses
 - (B) Updating the risk management plan
 - (C) Monitoring risks
 - (D) Implementing risk responses

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13. The project has been experiencing a greater than normal realization of risks. The project manager is trying to get ahead of this problem. She calls a meeting for the team to organize potential risks. The project manager wants to organize them by category and use it across the organization. What document will they create or update?
- (A) Risk register
 - (B) Risk report
 - (C) Risk breakdown structure
 - (D) Risk response strategies
14. Of the following, which best describes a secondary risk?
- (A) A vendor was unable to fulfill a contract commitment by the due date in the contract
 - (B) A vendor was unable to fulfill a contract commitment by the due date in the contract due to a strike
 - (C) A vendor was unable to fulfill a contract commitment by the due date in the contract because a sub-contractor delivered a defective product
 - (D) A vendor was unable to fulfill a contract commitment by the due date in the contract, so the team chose another vendor that also could not meet the due date because of the late start
15. If a risk on the project has a high probability of occurring and a high-impact if it does occur, the project team will more than likely do what?
- (A) Determine the insurable risk amount
 - (B) Perform qualitative risk analysis
 - (C) Determine the pure risk amount
 - (D) Perform quantitative risk analysis
16. The construction company has been awarded a \$40M contract to build an upscale community shopping center. Of the following, which is the best example of an exploit type of risk response strategy?
- (A) The company hires inexperienced workers and pays them only 25% of the salary received by union workers
 - (B) The company realizes the adjoining land will increase in value upon completion of the project, so it purchases the adjoining land at current prices
 - (C) The company purchases materials below the grade specified in the contract, although satisfying local building standards
 - (D) The company hires inexperienced workers and pays them scale, but does not provide the benefits given to the union workers

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17. The project manager is discussing risk with a risk-averse stakeholder regarding the market expansion project. The stakeholder has been exposed to project management concepts, but wants to know more about management reserves. The project manager explains that management reserves are created specifically for...
- (A) Risk events you know can occur on the project
 - (B) Risk events you cannot logically forecast for the project
 - (C) Risk events that do occur with a cumulative cost greater than the amount set aside in management reserves
 - (D) Risk events that do occur with a cumulative cost greater than the amount set aside in contingency reserves
18. The mobile application transition project is going basically as planned, but a market related risk has occurred: two competitors have merged. While a possible merger was anticipated, there was a great deal of uncertainty as to which competitors would be involved. The team has identified the potential impact. Which of the following will graphically demonstrate the impact to the project and company?
- (A) Probability and impact matrix
 - (B) Tornado diagram
 - (C) Expected monetary value
 - (D) Risk register
19. The project management team has just completed the process of identifying risks on the project. They have broken the information into categories and displayed this information in a graphical format. What have they created?
- (A) Prioritized list of quantified risks
 - (B) Risk breakdown structure
 - (C) Risk probabilities and impact matrix
 - (D) Risk checklist analysis chart
20. The project manager is discussing risk with a risk-averse stakeholder on the market expansion project. The stakeholder has been exposed to project management concepts, but wants to know more about contingency reserves. The project manager explains that contingency reserves are created specifically for...
- (A) Risk events you know can occur on the project
 - (B) Risk events you cannot logically forecast for the project
 - (C) Risk events that do occur with a cumulative cost greater than the amount set aside in management reserves
 - (D) Risk events that do occur with a cumulative cost greater than the amount set aside in contingency reserves

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21. You are a project manager on a road construction project. You are implementing risk responses. What process did you just complete?
- (A) Plan risk responses
 - (B) Perform qualitative risk analysis
 - (C) Perform quantitative risk analysis
 - (D) Monitor risks
22. The construction company has been awarded a \$20M contract to build a shopping community center. The company is relatively small, and this contract is bigger than anything it has been awarded to date. To ensure that it can effectively complete the contract and not jeopardize other work, it has chosen to pursue a share strategy. Of the following, which is the best example of the share strategy?
- (A) The company subcontracts the finishing work to a company with large cash reserves
 - (B) The company partners with a company that specializes in foundation and concrete work
 - (C) The company assigns its best employees to the shopping center contract and uses the remaining employees and day workers from Employee Share, Inc. for its other projects
 - (D) None of the answers
23. Your company is evaluating two projects for consideration. Project A has a 40% probability of \$69,000 and a 60% probability of -\$10,000. Project B has a 60% probability of \$56,000 and a 40% probability of -\$15,000. Which of the projects do you select based on the greatest expected monetary value?
- (A) Project A
 - (B) Project B
 - (C) Project A and B are of even value
 - (D) The expected monetary value is not high enough on either to make a selection
24. The database project team members are planning the project. They are involved in planning risk responses and assigning risk owners. What will the risk owner potentially do next?
- (A) Watch for additional risks on the project
 - (B) Watch for risk triggers and tell the project manager when they occur
 - (C) Let the project manager know that the risk has occurred
 - (D) Implement a risk response if the risk event occurs

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25. You are the project manager on a boardwalk restoration project. You are doing quantitative risk analysis. Which of the following is a tool and technique you will use during this process?
- (A) Probability and impact matrix
 - (B) Data quality assessment
 - (C) Decision tree analysis
 - (D) Assessment of other risk parameters
26. A film distribution company involved in global expansion has a chief marketing officer who is familiar with cutting edge marketing techniques and strategies. The marketing project for the expansion is set to rollout in 10 countries via the Internet and cable television. An account manager discovers that the chief marketing officer has been embezzling from the company for the last 90 days to help a terminally ill relative. During risk management execution, which of the following best represents an escalation strategy?
- (A) Confront the senior marketing manager about his actions
 - (B) Allow him to remain in his position and reimburse the company for the amount embezzled plus all incidental expenses
 - (C) Terminate him, file felony theft charges, and have someone different run the campaign
 - (D) Update the CEO with the details of what you have discovered
27. Sheldon is doing quantitative risk analysis on his project. He has gotten resistance from his sponsor about doing this. Which of the following best describes why he would want to do this type of risk analysis?
- (A) On higher probability, higher impact risks
 - (B) On new types of projects where there is a greater degree of uncertainty
 - (C) On higher probability, higher impact risks, or new types of projects where there is a great degree of uncertainty
 - (D) Any risk that has financial impact
28. The project manager is having a major issue with a team member. She meets with him and explains how things need to be, to have the project come in on schedule and how key the team member's performance is to the team. The project manager hopes this works and gets the team member back in sync with what is needed on the project. Which of the following is most likely to be of primary concern to the project manager?
- (A) Residual risk
 - (B) Secondary risk
 - (C) Adding it to the risk register
 - (D) Shifting to a risk-averse management strategy

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29. A film distribution company involved in global expansion has a chief marketing officer who is familiar with cutting edge marketing techniques and strategies. The marketing project for the expansion is set to rollout in 10 countries via the Internet and cable television. It's discovered that the chief marketing officer has been embezzling from the company for the last 90 days to help a terminally ill relative. Senior management is extremely concerned because this person knows more about this type of campaign than anyone in the industry and it doesn't want to impact the company negatively. During risk management execution, which of the following best represents an avoidance strategy associated with the embezzlement?
- (A) Allow him to remain at the company because the embezzlement was not done for personal gain
 - (B) Allow him to remain in his position and reimburse the company for the amount embezzled plus all incidental expenses
 - (C) Terminate him, file felony theft charges, and have someone different run the campaign
 - (D) Terminate him and outsource the marketing function to an ad agency
30. The project manager and the team created the risk register. Which of the following best describes the process they have just completed?
- (A) Identify risks, which entails determining what risks and triggers could occur on the project
 - (B) Plan risk responses, which entails determining what will be done if risk events occur and who will be responsible for executing those actions
 - (C) Monitor risks, which entails observing project activities for risks and risk triggers and implementing the means to control them
 - (D) Perform qualitative risk analysis, which entails assigning probability and impact ratings to each risk

14.12. Project Risk Management Answers for Tests and Exercises

14.12.1. Project Risk Management Practice Test Answers

We recommend that you download answer sheets from the Crosswind website, so you can practice the test as many times as you like.

1. Calculate EMV from the following: 0.4 probability of \$6,500, 0.3 probability of -\$3,200, 0.2 probability of \$2,000, 0.1 probability of \$1,000.

Correct Answer: (C) \$2,140

Explanation: To calculate the expected monetary value (EMV), multiply each probability by its dollar amount and add the products of all multiplication. The result is a value of \$2,140. [Crosswind Manual 14.5.4; *PMBOK® Guide* 11.4.2.5]

2. In defining a risk trigger, which of the following is most accurate?

Correct Answer: (A) A trigger is an indication that a risk event could occur in the near future

Explanation: A trigger is an indication that a risk event could occur in the near future. Just because a trigger occurs, don't automatically assume that the risk will occur. [Crosswind Manual 14.3.3; No *PMBOK® Guide* Reference]

3. The telecom project is scheduled to run until year's end. There is a strong possibility that the union collective bargaining agreement will not be renewed immediately upon its expiration next month. Union negotiation is outside the control of senior management and the project, so senior management has decided to reassign the job responsibilities of union personnel to non-union personnel to minimize project schedule slippage. Of the following, what best describes the type of risk response represented by this decision?

Correct Answer: (C) Risk mitigation, which mitigates negative risk by taking actions to lessen its impact

Explanation: Risk mitigation attempts to minimize the bad risk or maximize the good risk. In this case, management is attempting to minimize the impact of a labor strike. Risk acceptance simply deals with the risk if it occurs. Risk avoidance involves doing what can be done to eliminate the risk. Transference assigns or transfers the risk to some external party. [Crosswind Manual 14.6.2; *PMBOK® Guide* 11.5.5.3]

4. The company is concerned about its position during the economic downturn. Its CEO is a risk taker. Of several strategies on the table for consideration, which is he most likely to pursue?

Correct Answer: (B) Entering a relatively untested market in the hope of significant reward

Explanation: A risk seeker mentality is that of looking for the big reward and being prepared to pay significantly if it is missed. The risk-averse mentality is a very conservative approach to risk. A risk-neutral mentality is somewhere between that of a risk seeker and risk-averse mentality. [Crosswind Manual 14.2.7; No *PMBOK® Guide* Reference]

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5. You are the project manager on a server infrastructure project. You have just started creating the risk register. What process did you just complete?

Correct Answer: (B) Plan risk management

Explanation: Identify risks starts to create the risk register. Plan risk management comes before identify risks. Perform qualitative risk analysis follows identify risks. Implement risk responses comes later in the flow of risk processes. [Crosswind Manual 14.2, *PMBOK® Guide* 11.1]

6. You have been doing quantitative risk analysis for a nationwide mapping project. Which of the following best describes when it makes the most sense to do this type of analysis?

Correct Answer: (B) For risks that cross a higher threshold of probability and impact or projects that are higher risk compared to others

Explanation: Quantitative risk analysis is performed on higher probability and higher impact risks, so that you can get a better degree of the detail regarding the risk. It is also done on higher uncertainty projects to compare to other projects. Risks involving money is a distracter. [Crosswind Manual 14.5, *PMBOK® Guide* 11.4]

7. The project manager and the team have made risk-related contract decisions and updated the risk register and project management plan. Which of the following best describes the process they have just completed?

Correct Answer: (B) Plan risk responses, which entails determining what will be done if risk events occur and who will be responsible for executing those actions

Explanation: Plan Risk Responses documents who should do what if risk events occur. Identify Risks is the process of determining what risks and triggers could occur on the project. Monitor Risks focuses on observing project activities for risk triggers and risks and implementing the means to control them. Perform Qualitative Risk Analysis assigns probability and impact ratings to the risk. [Crosswind Manual 14.6; *PMBOK® Guide* 11.6]

8. In response to economic and market changes, the company is moving from a conservative strategy to a more market-driven strategy. As a result of this change, the company has just approved a project that aligns with the new strategy. A number of the stakeholders, however, are still risk-averse. The project manager is meeting with them to explain his risk management plan. The stakeholders are very interested in the concept of a risk review. Which of the following best describes a risk review?

Correct Answer: (C) The process of determining the validity of the documented risks and looking for any new risks that could occur

Explanation: Risk reviews verify that the risks are still valid and that no new risks have appeared on the project. The other answers come before or after risk reviews. [Crosswind Manual 14.3.4; *PMBOK® Guide* 11.2.3.1]

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9. The project manager and the team created change requests as a result of unforeseen occurrences. Which of the following best describes the process they have just completed?

Correct Answer: (C) Monitor risks, which entails observing project activities for risks and risk triggers and implementing the means to control them

Explanation: Monitor Risks focuses on observing project activities for risk triggers and risks and implementing the means to control them. Plan Risk Responses documents who should do what if risk events occur. Identify Risks is the process of determining what risks and triggers could occur on the project. Perform Qualitative Risk Analysis assigns probability and impact ratings to the risk. [Crosswind Manual 14.8; *PMBOK® Guide* 11.7]

10. The reservation system has been working well. Today, the main database engine crashed, preventing the airline from creating reservations for its flights. The risk response didn't fix the problem, so the airline must respond. Which of the following should it perform first?

Correct Answer: (A) Fix the problem with a work-around

Explanation: This is a chicken or the egg question in that you more than likely will do all the answers, but what comes first? Fixing the problem, then determining why the risk response plan failed, and why the problem occurred, then adjusting the risk response plan is the sequence for the other answers. [Crosswind Manual 14.7.3; No *PMBOK® Guide* Reference]

11. Perform qualitative risk analysis uses a variety of tools for analysis. Which of the following is most closely associated with this process?

Correct Answer: (A) A probability and impact matrix

Explanation: Perform Qualitative Risk Analysis uses a risk rating matrix to rank risks and create an overall risk rating for the project. Expected monetary value (EMV) is used in Perform Quantitative Risk Analysis. The other answers are distracters. [Crosswind Manual 14.4; *PMBOK® Guide* 11.3]

12. The makers of the video game are making a new version. It's key to have it released in time for the holiday shopping season. The project manager is monitoring the schedule and has noticed that an event has been triggered showing there is a high probability the schedule will slip. The project manager follows the plan and brings in 4 new contract programmers to help get it back on track. What process is she doing?

Correct Answer: (D) Implementing risk responses

Explanation: The process being described is implementing risk responses. Planning risk responses is where they establish what will be done if needed. Updating the risk management plan is not a process, but can come from a variety of processes as applicable. Monitoring risks would lead to the implementing of risk responses. [Crosswind Manual 14.7; *PMBOK® Guide* 11.6]

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13. The project has been experiencing a greater than normal realization of risks. The project manager is trying to get ahead of this problem. She calls a meeting for the team to organize potential risks. The project manager wants to organize them by category and use it across the organization. What document will they create or update?

Correct Answer: (C) Risk breakdown structure

Explanation: The risk breakdown structure is a list of risks by category. This can be used in a company as an organizational process asset for use on future projects. The risk register shows the identified risks and their characteristics for the project. The risk report provides project related risk information in the form of a report. Risk response strategies is a distracter. [Crosswind Manual 14.2.2, *PMBOK® Guide* 11.1.3.1]

14. Of the following, which best describes a secondary risk?

Correct Answer: (D) A vendor was unable to fulfill a contract commitment by the due date in the contract, so the team chose another vendor that also could not meet the due date because of the late start

Explanation: Secondary risk is what occurs when a risk event occurs and its response creates new risk. [Crosswind Manual 14.7.2; *PMBOK® Guide* 11.5.5.3]

15. If a risk on the project has a high probability of occurring and a high-impact if it does occur, the project team will more than likely do what?

Correct Answer: (D) Perform quantitative risk analysis

Explanation: The team will undertake the Perform Quantitative Risk Analysis process if the Perform Qualitative Risk Analysis process shows that the risk has a high probability of occurring and high-impact if it does. Perform Qualitative Risk Analysis helps determine the probability and impact of a risk; therefore, you must complete this analysis before you can evaluate the probability and impact of the risk. Determination of insurable risk and determination of pure risk are distracters. [Crosswind Manual 14.5; *PMBOK® Guide* 11.4]

16. The construction company has been awarded a \$40M contract to build an upscale community shopping center. Of the following, which is the best example of an exploit type of risk response strategy?

Correct Answer: (B) The company realizes the adjoining land will increase in value upon completion of the project, so it purchases the adjoining land at current prices

Explanation: Exploiting the risk is to undertake activity that grows or expands the positive aspects of the risk. Sharing the risk is to work with someone else to maximize the risk. Mitigate attempts to minimize the negative impact of the risk. Accepting the risk is to tolerate whatever occurred. [Crosswind Manual 14.6.2; *PMBOK® Guide* 11.5.5.3]

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17. The project manager is discussing risk with a risk-averse stakeholder regarding the market expansion project. The stakeholder has been exposed to project management concepts, but wants to know more about management reserves. The project manager explains that management reserves are created specifically for...

Correct Answer: (B) Risk events you cannot logically forecast for the project

Explanation: Management reserves are created for unknown unknowns: risk events you cannot forecast for the project. Contingency reserves are created for known unknowns: risk events you know can occur during the project. The other answers are distracters. [Crosswind Manual 14.6; *PMBOK® Guide* 11.5]

18. The mobile application transition project is going basically as planned, but a market related risk has occurred: two competitors have merged. While a possible merger was anticipated, there was a great deal of uncertainty as to which competitors would be involved. The team has identified the potential impact. Which of the following will graphically demonstrate the impact to the project and company?

Correct Answer: (B) Tornado diagram

Explanation: The tornado diagram graphically demonstrates the potential impact of the event to the project and the company via sensitivity analysis. The probability and impact matrix demonstrates the probability and impact of the risk. Expected monetary value (EMV) demonstrates what the opportunity is worth, but doesn't necessarily show it graphically. The risk register contains all the information about the project risks. [Crosswind Manual 14.5.7; *PMBOK® Guide* 11.4.2.5]

19. The project management team has just completed the process of identifying risks on the project. They have broken the information into categories and displayed this information in a graphical format. What have they created?

Correct Answer: (B) Risk breakdown structure

Explanation: The risk breakdown structure (RBS) is a graphical representation of the risk categorization and risks within those categories of the project. The prioritized list of quantified risks comes in the risk register and involves risk ranking, not identification categorization. The risk probabilities and impact matrix is part of the risk management plan and is used in qualitative risk analysis. The risk checklist analysis chart is a distracter. [Crosswind Manual 14.2.2; *PMBOK® Guide* 11.1.3.1]

20. The project manager is discussing risk with a risk-averse stakeholder on the market expansion project. The stakeholder has been exposed to project management concepts, but wants to know more about contingency reserves. The project manager explains that contingency reserves are created specifically for...

Correct Answer: (A) Risk events you know can occur on the project

Explanation: Contingency reserves are created for known unknowns: risk events you know can occur during the project. Management reserves are created for unknown unknowns: risk events you cannot forecast for the project. The other answers are distracters. [Crosswind Manual 14.6; *PMBOK® Guide* 11.5]

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21. You are a project manager for a road construction project. You are implementing risk responses. What process did you just complete?

Correct Answer: (A) Plan risk responses

Explanation: The implement risk responses process comes after plan risk responses. The perform qualitative and quantitative risk analysis processes come before plan risk responses. Monitor risks follows implement risk responses. [Crosswind Manual 14.6, *PMBOK® Guide* 11.5]

22. The construction company has been awarded a \$20M contract to build a shopping community center. The company is relatively small, and this contract is bigger than anything it has been awarded to date. To ensure that it can effectively complete the contract and not jeopardize other work, it has chosen to pursue a share strategy. Of the following, which is the best example of the share strategy?

Correct Answer: (B) The company partners with a company that specializes in foundation and concrete work

Explanation: Sharing the risk with another company is the basis of a share strategy. Subcontracting is not risk sharing. [Crosswind Manual 14.6.2; *PMBOK® Guide* 11.5.5.3]

23. Your company is evaluating two projects for consideration. Project A has a 40% probability of \$69,000 and a 60% probability of -\$10,000. Project B has a 60% probability of \$56,000 and a 40% probability of -\$15,000. Which of the projects do you select based on the greatest expected monetary value?

Correct Answer: (B) Project B

Explanation: To calculate the expected monetary value (EMV), multiply the probabilities by their dollar amounts and add the products of the multiplication for each project. This results in a value of \$21,600 for Project A and \$27,600 for Project B. With the highest expected monetary value, Project B is the one to select. [Crosswind Manual 14.5.4; *PMBOK® Guide* 11.4.2.5]

24. The database project team members are planning the project. They are involved in planning risk responses and assigning risk owners. What will the risk owner potentially do next?

Correct Answer: (D) Implement a risk response if the risk event occurs

Explanation: Risk owners are responsible for implementing the risk response assigned to them. Watching for additional risks on the project could fall under the responsibility of a risk owner, but isn't the main responsibility. Letting the project manager know that a risk event has occurred isn't the main responsibility of the risk owner. Watching for risk triggers and telling the project manager if they occur isn't taking a proactive approach to risk or project management. [Crosswind Manual 14.7; *PMBOK® Guide* 11.6]

25. You are the project manager for a boardwalk restoration project. You are doing quantitative risk analysis. Which of the following is a tool and technique you will use during this process?

Correct Answer: (C) Decision tree analysis

Explanation: Decision tree analysis is the only tool and technique listed from perform quantitative risk analysis. The other answers are tools and techniques of perform qualitative risk analysis. [Crosswind Manual 14.5, *PMBOK® Guide* 11.4]

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26. A film distribution company involved in global expansion has a chief marketing officer who is familiar with cutting edge marketing techniques and strategies. The marketing project for the expansion is set to rollout in 10 countries via the Internet and cable television. An account manager discovers that the chief marketing officer has been embezzling from the company for the last 90 days to help a terminally ill relative. During risk management execution, which of the following best represents an escalation strategy?

Correct Answer: (D) Update the CEO with the details of what you have discovered

Explanation: Updating the CEO would be an example of an escalation strategy. Outsourcing the work is a transference strategy. Allowing him to stay at the company and pay back the amount represents an attempt to mitigate (or minimize) risk, but it could still occur. Terminating him and having someone different run the campaign would be a combination of avoid and mitigate. Confronting the manager doesn't fit any option. [Crosswind Manual 14.6.2; *PMBOK® Guide* 11.5.5.3]

27. Sheldon is doing quantitative risk analysis on his project. He has gotten resistance from his sponsor about doing this. Which of the following best describes why he would want to do this type of risk analysis?

Correct Answer: (C) On higher probability, higher impact risks, or new types of projects where there is a great degree of uncertainty

Explanation: Quantitative risk analysis is typically done on higher probability, higher impact risks, or to establish the overall risk of a project compared to other projects. New projects often fit this criteria because of the uncertainty. There is usually some threshold that is used to establish the justification for the additional effort with the quantitative risk analysis. [Crosswind Manual 14.5; *PMBOK® Guide* 11.4]

28. The project manager is having a major issue with a team member. She meets with him and explains how things need to be, to have the project come in on schedule and how key the team member's performance is to the team. The project manager hopes this works and gets the team member back in sync with what is needed for the project. Which of the following is most likely to be of primary concern to the project manager?

Correct Answer: (A) Residual risk

Explanation: Residual risk is risk that remains after implementing a risk response. It appears that the project manager was trying to deal with the risk and as a result, that residual risk of performance issue could remain. Secondary risk would be a side effect of implementing the risk response, which doesn't really fit here. Shifting to a risk-averse management strategy is a distracter. Adding it to the risk register is a distracter. [Crosswind Manual 14.7.1, *PMBOK® Guide* 11.5.3.3]

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29. A film distribution company involved in global expansion has a chief marketing officer who is familiar with cutting edge marketing techniques and strategies. The marketing project for the expansion is set to rollout in 10 countries via the Internet and cable television. It's discovered that the chief marketing officer has been embezzling from the company for the last 90 days to help a terminally ill relative. Senior management is extremely concerned because this person knows more about this type of campaign than anyone in the industry and it doesn't want to impact the company negatively. During risk management execution, which of the following best represents an avoidance strategy associated with the embezzlement?

Correct Answer: (C) Terminate him, file felony theft charges, and have someone different run the campaign

Explanation: An avoidance strategy is the strategy that eliminates the risk, i.e. terminating him to eliminate further exposure and having someone else run the campaign is the best answer in terms of an avoidance strategy. Allowing him to stay at the company and pay back the amount represents an attempt to mitigate (or minimize) risk, but it could still occur. Allowing him to stay because he did not use the money for personal gain would be to accept (or tolerate) the risk. Outsourcing the work is a transference strategy. [Crosswind Manual 14.6.2; *PMBOK® Guide* 11.5.5.3]

30. The project manager and the team created the risk register. Which of the following best describes the process they have just completed?

Correct Answer: (A) Identify risks, which entails determining what risks and triggers could occur on the project

Explanation: Identify Risks is the process of determining what risks and triggers could occur on the project. Plan Risk Responses documents who should do what if risk events occur. Monitor Risks focuses on observing project activities for risks and their triggers and implementing the means to control them. Perform Qualitative Risk Analysis assigns probability and impact ratings to the risk. [Crosswind Manual 14.3; *PMBOK® Guide* 11.2]