



Project Management provides members with the opportunity to demonstrate knowledge around competencies in project management. This competitive event consists of an objective test.

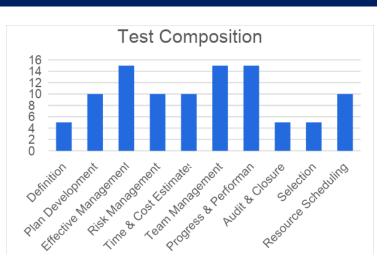
#### **Event Overview**

Division: Collegiate Event Type: Individual Event Category: Objective Test, 100-multiple choice questions (breakdown of question by competencies below) Objective Test Time: 50 minutes NACE Connections: Career & Self-Development

Equipment Competitor Must Provide: Pencil, Computer Equipment FBLA Provides: One piece of scratch paper per competitor

#### Competencies

- Project Definition
- Project Plan Development
- Effective Project
  Management
- Risk Management
- Project Time and Cost Estimates
- Project Team Management
- Progress and Performance Measurement and Evaluation
- Project Audit and Closure
- Project selection
- Resource Scheduling



### State

The State Leadership Conference has limitations on the number of competitive events a member may enter and compete in. Limited to a maximum of three (3) competitive events in total which may include:

- Limited to a maximum of two (2) National Qualifying Events
- Limited to a maximum of three (3) Objective Test Events

In order to be eligible to register for the State Leadership Conference, members must be registered and paid in FBLA Connect. Members will auto-populate in the chapter list of eligible attendees. Paid membership records auto-sync from FBLA Connect to the Blue Panda Conference Management System within 5 minutes.

## **Project Management**



Chapter advisers, parents, alumni, local administrators, teacher educators or other interested individuals are eligible to attend the State Leadership Conference. Every event attendee at the State Leadership Conference MUST be registered and paid by the registration deadline.

Online objective testing is completed on the first day of the State Leadership Conference in person. Chapters are asked to bring their own computers for online testing of all objective tests. Objective testing will be conducted on a web browser like Chrome or Firefox. Iowa FBLA does not provide technical support during the conference for school or personal devices.

lowa FBLA follows National FBLA rules for Event Administration (see below) unless a change is noted, otherwise.

#### National

#### Policy and Procedures Manual

• Competitors should be familiar with the Competitive Events Policy & Procedures Manual, found on the Competitive Events page on <a href="https://www.fbla.org">www.fbla.org</a>.

#### Eligibility

- FBLA membership dues are paid by 11:59 pm Eastern Time on April 15<sup>th</sup> of the current program year.
- Members must be registered for the NLC and pay the national conference registration fee in order to participate in competitive events.
- Members must stay in an official FBLA hotel to be eligible to compete.
- Each state may submit four entries per event.
- Each member can compete in up to two individual/team events and one chapter event (Community Service Project or State of Chapter Presentation).
- If competitors are late for an objective test, they will be allowed to compete until such time that results are finalized, or the accommodation would impact the fairness and integrity of the event. Competitive event schedules cannot be changed. Competitive events start in the morning before the Opening Session of the NLC.
- Picture identification (physical or digital driver's license, passport, state-issued identification, or school-issued identification) is required when checking in for competitive events.

### Recognition

• The number of competitors will determine the number of winners. The maximum number of winners for each competitive event is 10.

### Event Administration

- This event is an objective test administered online at the NLC.
- No reference or study materials may be brought to the testing site.
- No calculators may be brought into the testing site; online calculators will be provided through the testing software.

## **Project Management**



Tie Breaker

• Ties are broken by comparing the correct number of answers to 10 pre-determined questions on the test. If a tie remains, answers to 20 pre-determined questions on the test will be reviewed to determine the winner. If a tie remains, the competitor who completed the test in a shorter amount of time will place higher.

### Americans with Disabilities Act (ADA)

• FBLA meets the criteria specified in the Americans with Disabilities Act for all competitors with accommodations submitted through the conference registration system by the registration deadline.

### Penalty Points

- Competitors may be disqualified if they violate the Competitive Event Guidelines or the Honor Code.
- Five points are deducted if competitors do not follow the Dress Code or are late to the testing site.

### Electronic Devices

• All electronic devices such as cell phones and smart watches must be turned off before competition begins.



### Project Management

### Study Guide: Competencies and Tasks

- A. Project Definition
  - 1. Define project management and the context of modern project management.
  - 2. Describe how to manage projects throughout the five major process groups.
  - 3. Define the characteristics of a project.
  - 4. Explain the project management knowledge areas.
  - 5. Define a project life cycle.
  - 6. Identify and define project stakeholders.
  - 7. Explain the responsibilities, skills, and characteristics of an effective project manager.
  - 8. Explain the relationship between program requirements and program scope.
  - 9. Define the roles of the project manager, the project team member, and effectively communicate with the project team, clients, and customer.
  - 10. Explain the trends and the need for project management.
- B. Project Plan Development
  - 1. Identify project sponsors and other stakeholders.
  - 2. Identify and explain planning aids.
  - 3. Describe the major implementation activities, responsibilities, and project constraints.
  - 4. Specify influences of organizational structures on project management.
  - 5. Define the total scope of a project and create the detail scope statement.
  - 6. Describe the components of the plan and the functions of a good project plan.
  - 7. Apply the sequential steps of the project management framework.
  - 8. Explain the importance and function of project management and apply the project process of initiating, planning, executing, controlling, and closing the project.
  - 9. Produce a statement of work (SOW) and decompose overall project goals.
  - 10. Develop a work breakdown structure (WBS), using established tools and techniques, to achieve stated project objectives.
  - 11. Produce a task flow network, using established tools and techniques, and analyze the contingencies, interrelationships, and critical paths of the work elements.
  - 12. Explain the proposal preparation process and create a project plan.
  - 13. Describe contract administration policies and procedures including vendor selection, contract negotiation, and administration.
  - 14. Produce a Gantt chart, using established tools and techniques, to schedule the completion of all work elements.
- C. Effective Project Management
  - 1. Discuss ways for managing the scope, time (including slack time), cost, quality relationship in project management.
  - 2. Explain methods for assuring quality through quality planning.
  - 3. Discuss ways for handling and avoiding project pitfalls.
  - 4. Explain utilizing Project Management Maturity Models.
  - 5. Develop the major chart types used for project management.
  - 6. Apply basic project scope management techniques, including introductory configuration management techniques.

## **Project Management**



- 7. Define the execution of the project plan.
- 8. Explain key indicators essential to effective project management.
- 9. Discuss techniques for change management and control.
- 10. Execute the project, control the project objects and manage changes in project.
- 11. Explain the importance of monitoring and controlling.
- 12. Establish performance milestones including "go" and "no-go" decision points.
- Define the elements of project integration management, project quality management, project procurement management, and project human resource management.
- 14. Restate the role that project management plays in organizations.
- 15. List the features of the project management process including strategic views of the project life cycle.
- 16. Analyze the approaches to managing a project's strategic issues.
- 17. Describe contract administration policies and procedures.
- 18. Describe reviewing computerized project management tools.
- D. Risk Management
  - 1. Define the elements of project risk management and identify the risk management process.
  - 2. Describe techniques for identifying and categorizing risks.
  - 3. Contrast qualitative risk analysis and quantitative risk analysis.
  - 4. Identify risk response strategies and develop a risk response plan including risk monitoring and control strategies.
  - 5. Describe risk consequences and contingencies.
  - 6. Develop a risk management strategy/plan for a project.
  - 7. Analyze the risk management process cycle within a company.
  - 8. Define the role of risk management in overall project management.
  - 9. Identify risk management activities throughout the project life cycle.
  - 10. List the shortcuts of risk management.
- E. Project Time and Cost Estimates
  - 1. Classify different types of costs and explain common cost benefit analysis.
  - 2. Discuss methods of project budgeting and prepare budget plans.
  - 3. Conduct a cost estimate through analogous estimating, bottom-up estimating, parametric estimating, and computerized estimating tools.
  - 4. Calculate Present Value, Net Present Value, Internal Rate of Return, Payback Period, Benefit Cost Ratio, and Opportunity Cost.
  - 5. Determine variable cost, fixed costs, direct costs and indirect costs.
  - 6. Explain Project Life Cycle Costing.
  - 7. List considerations when making project cost estimates.
  - 8. Develop cost summaries for tracking project expenditures to budgeted costs.
  - 9. Develop cost forecasts to proactively control future planned expenditures.
  - 10. Determine the project break-even point.
  - 11. Calculate the impact of change on project cost and performance.
  - 12. Estimate the duration of the project through the use of CPM, PER, and Monte Carlo.



## **Project Management**

- 13. Develop a schedule management plan and schedule control.
- 14. Define the elements and apply project time management concepts to the final project.
- 15. Determine critical path, non-critical paths, and earliest start and finish times.
- F. Project Team Management
  - 1. Clarify team expectations and accountability by role.
  - 2. Describe the process of setting team goals.
  - 3. Define operating processes to perform project tasks.
  - 4. List the process of reporting and rewarding progress.
  - 5. Describe the process of assessing team performance.
  - 6. Organize project teams using organizational breakdown structures.
  - 7. Describe techniques for team building, resolving conflicts, and human resource constraints.
  - 8. Define work to be done and discuss methods of subdivision.
  - 9. Create the WBS and describe its uses.
  - 10. Define the roles of the team members and the critical skills needed.
  - 11. Explain the roles and responsibilities of project team members.
  - 12. Explain the relationship between project managers and line managers, especially in terms of the division of responsibility and authority.
  - 13. Identify sources of diversity, either corporate or ethnic, that impact project team effectiveness.
  - 14. Assess the strategic issues facing a project team.
  - 15. Describe how to build and work with cross-functional teams within a project.
- G. Progress and Performance Measurement and Evaluation
  - 1. Explain tracking with the plan-monitor-control cycle.
  - 2. Explain the methodology for collecting, analyzing, and reporting data.
  - 3. Define earned value analysis and use earned value management (EVM) to evaluate project performance.
  - 4. Explain controlling scope creep with change control systems.
  - 5. Establish the use of baselines to monitor the progress of the project.
  - 6. Explain the impacts of poor quality.
  - 7. Describe the tools used for quality management planning and develop a quality management plan.
  - 8. Describe quality control through Fishbone Diagram, Pareto Diagram, and Control Chart.
  - 9. Prepare progress reports.
  - 10. Define requirements to meet needs, including performance-based outcomes and setting performance standards.
  - 11. Formulate the key features of the test and evaluation program, including modeling and simulation.
  - 12. Describe how project management information systems (PMIS) are used to monitor, evaluate, and control planned cost and schedule performance.
  - 13. Describe the procedure for conducting periodic project performance evaluation audits.
- H. Project Audit and Closure

### **Project Management**



- 1. Explain how to audit projects with a structured process.
- 2. Describe a process to conclude a project.
- 3. Explain the purpose of a post-implementation evaluation.
- 4. Describe administrative closure vs. contractual closure.
- 5. Categorize project closure by project endings: integration, starvation, addition, or extinction.
- 6. Explain how project managers must communicate audit results to customers and management in order to manage expectations.
- 7. Describe how, as a result of project audits, project managers conduct trade-off analyses of project performances versus cost and schedule constraints.
- 8. Identify causes associated with project success and failure.
- 9. Specify ways in which a project can be terminated upon completion.
- 10. Describe the contract termination procedures.
- 11. Record lessons learned for future use and communication with other company projects.
- I. Project Selection
  - 1. Describe the content of requests for proposal and requests for quotation.
  - 2. Define the elements and importance of the project charter.
  - 3. Highlight methods for project selection identify project constraints.
  - 4. List the advantages and disadvantages of contract type selection.
  - 5. Assess a project's potential profit and evaluate and rank project using a matrix.
  - 6. Select relevant financial data for decision making.
  - 7. Assess project portfolio risk using quantitative measures.
  - 8. Define the scope of the final project selected.
- J. Resource Scheduling
  - 1. Describe personnel needs.
  - 2. Discuss leveling resources.
  - 3. Describe setting resource priorities and explain assigning resources to a project.
  - 4. Explain the importance of the project schedule's critical path.
  - 5. Explain methods for developing a schedule.
  - 6. Develop network diagrams (PERT, CPM, and PDM charts).
  - 7. Calculate slack, crashing, and fast tracking a project.
  - 8. Develop a schedule management plan.
  - 9. Determine the sequence of activities.
  - 10. Develop and document an integrated master schedule.
  - 11. Analyze optimal labor utilization for cost effectiveness and schedule efficiency by using a resource-loading chart.
  - 12. Explain types of scheduling diagrams and construct a project schedule.