

# Analytical and Strategic Skills Development Guide

## Skill Overview

Analytical and strategic skills enable project managers to make sound decisions, solve complex problems, and align projects with organizational goals. This guide provides a structured approach to developing these critical competencies across three developmental stages.

## Competency Framework

Skill Area	Define Stage	Develop Stage	Scale Stage
Problem-Solving & Decision-Making	Basic problem analysis, simple decision frameworks	Complex problem decomposition, advanced decision techniques	Systems thinking, enterprise decision frameworks
Goal Setting & Strategic Planning	Project goal alignment, tactical planning	Program goal integration, strategic roadmapping	Portfolio alignment, enterprise strategy development
Contract Management	Basic vendor management, simple contract understanding	Comprehensive procurement strategy, contract negotiation	Strategic sourcing, complex multi-vendor ecosystems
Innovative & Strategic Thinking	Idea generation, basic innovation concepts	Applied innovation techniques, strategic option analysis	Disruptive innovation, business model transformation
Data Analysis & Critical Thinking	Basic data interpretation, logical reasoning	Complex data analysis, pattern recognition	Predictive analytics, strategic insight generation

## Development Activities by Stage

### Define Stage (Foundation Building)

#### Knowledge Development

- Learn basic problem-solving methodologies (5 Whys, Fishbone)
- Study fundamental decision-making frameworks
- Understand project goal-setting and alignment principles
- Learn basic contract and vendor management concepts
- Study introduction to data analysis and visualization

#### Skill Application

- Apply structured problem-solving to project issues
- Create decision matrices for project choices
- Align project goals with department objectives
- Assist with simple vendor selections
- Create basic project data reports and analyses

## **Practice Scenarios**

### 1. **Scenario: Problem Analysis**

- A recurring issue is causing project delays
- **Practice Exercise:** Apply root cause analysis techniques, document findings, propose solutions

### 2. **Scenario: Decision Framework**

- You need to select between three implementation approaches
- **Practice Exercise:** Create decision criteria, develop scoring matrix, document rationale

### 3. **Scenario: Vendor Selection**

- Your project requires selecting a new software tool
- **Practice Exercise:** Create requirements list, develop evaluation criteria, compare vendor options

## **Progression Indicators**

- Uses structured approaches to analyze problems
- Makes decisions using defined criteria
- Sets clear project goals aligned with business objectives
- Demonstrates basic understanding of contracts and vendor relationships
- Creates simple data analyses to support project decisions

## **2 Develop Stage (Capability Enhancement)**

### **Knowledge Development**

- Study advanced problem-solving methodologies
- Learn multi-criteria decision analysis techniques
- Understand strategic roadmapping and planning
- Study contract negotiation and vendor management strategies
- Learn advanced data analysis and business intelligence concepts

### **Skill Application**

- Lead complex problem-solving for project challenges
- Develop and apply advanced decision frameworks

- Create strategic project roadmaps aligned with business goals
- Negotiate vendor contracts and manage relationships
- Design and implement metrics for project performance analysis

## **Practice Scenarios**

### 1. **Scenario: Complex Problem Resolution**

- Multiple interdependent issues are threatening project success
- **Practice Exercise:** Map problem systems, identify key drivers, develop comprehensive solution approach

### 2. **Scenario: Strategic Project Planning**

- Your project must deliver incremental business value while working toward a long-term vision
- **Practice Exercise:** Create value-based roadmap, develop strategic release plan, build business alignment

### 3. **Scenario: Vendor Performance Issues**

- A critical vendor is underperforming against contractual agreements
- **Practice Exercise:** Perform contract gap analysis, develop performance improvement plan, create escalation strategy

## **Progression Indicators**

- Successfully resolves complex, multi-faceted problems
- Makes sound decisions balancing multiple competing factors
- Develops strategic roadmaps with clear business alignment
- Effectively negotiates and manages vendor relationships
- Uses data analysis to drive project decisions and demonstrate value

## **3 Scale Stage (Mastery Development)**

### **Knowledge Development**

- Study systems thinking and complexity theory
- Learn portfolio decision models and optimization techniques
- Understand enterprise architecture and strategy development
- Study strategic sourcing and partner ecosystem development
- Learn predictive analytics and advanced business intelligence

### **Skill Application**

- Apply systems thinking to enterprise-level challenges

- Develop portfolio investment and prioritization frameworks
- Create enterprise capability roadmaps
- Establish strategic vendor and partner ecosystems
- Implement advanced analytics for portfolio performance

## Practice Scenarios

### 1. Scenario: Enterprise Capability Development

- Your organization needs to develop a new strategic capability across multiple business units
- **Practice Exercise:** Create capability model, develop multi-year roadmap, design cross-organizational governance

### 2. Scenario: Portfolio Prioritization

- Limited resources must be allocated across competing strategic initiatives
- **Practice Exercise:** Develop investment criteria, create portfolio balancing framework, build executive decision support

### 3. Scenario: Strategic Partner Ecosystem

- Your program requires multiple specialized vendors working together
- **Practice Exercise:** Design partner ecosystem model, develop integration framework, create collaborative governance structure

## Progression Indicators

- Successfully applies systems thinking to enterprise challenges
- Creates effective portfolio decision frameworks
- Develops enterprise capability strategies and roadmaps
- Establishes strategic partnerships and vendor ecosystems
- Uses advanced analytics to guide strategic decisions

## Assessment Questions by Development Stage

### Define Stage Assessment

#### 1. Basic Problem Analysis

- "Describe a structured approach you would use to analyze a project problem."
- "How would you determine the root cause of a recurring issue?"
- "What techniques do you use to break down complex problems into manageable parts?"

#### 2. Decision-Making Frameworks

- "Explain how you would make a decision between competing project solutions."
- "How do you ensure objectivity when making project decisions?"

- "Describe a decision matrix you've created for a project choice."

### **3. Project Goal Alignment**

- "How do you ensure your project goals support broader business objectives?"
- "Describe your process for establishing clear project success criteria."
- "How would you handle a situation where stakeholders have different views of project success?"

### **4. Basic Contract Management**

- "What elements do you look for when reviewing a simple vendor contract?"
- "How would you manage a vendor that isn't meeting expectations?"
- "Describe your approach to documenting vendor requirements."

### **5. Data Interpretation**

- "How do you use data to track project progress?"
- "Describe how you would present project metrics to stakeholders."
- "What project data do you consider most important to collect and analyze?"

## **Develop Stage Assessment**

### **1. Complex Problem-Solving**

- "Describe how you've resolved a complex problem involving multiple interrelated issues."
- "How do you approach problems with no clear solution path?"
- "Explain how you've facilitated team problem-solving for complicated challenges."

### **2. Advanced Decision Techniques**

- "How do you make decisions when facing significant uncertainty?"
- "Describe your approach to balancing competing priorities in decision-making."
- "Explain how you've used scenario planning to inform project decisions."

### **3. Strategic Roadmapping**

- "How do you develop a long-term strategic roadmap while delivering incremental value?"
- "Describe your approach to aligning technical implementations with business strategy."
- "Explain how you prioritize capabilities on a multi-year roadmap."

### **4. Contract Negotiation**

- "Describe your approach to negotiating favorable terms with vendors."
- "How do you establish performance metrics in vendor contracts?"
- "Explain how you've resolved a contract dispute or performance issue."

### **5. Advanced Data Analysis**

- "How do you use data to identify emerging project risks or opportunities?"
- "Describe your approach to establishing meaningful project metrics."

- "Explain how you've used data analysis to guide a critical project decision."

## Scale Stage Assessment

### 1. Systems Thinking

- "How do you apply systems thinking to enterprise-level challenges?"
- "Describe your approach to understanding interdependencies across a complex organization."
- "Explain how you've addressed unintended consequences in complex initiatives."

### 2. Portfolio Decision Models

- "How do you establish criteria for portfolio investment decisions?"
- "Describe your approach to balancing risk and value across a project portfolio."
- "Explain how you've optimized resource allocation across multiple programs."

### 3. Enterprise Strategy Development

- "How do you translate business strategy into portfolio execution?"
- "Describe your approach to developing multi-year capability roadmaps."
- "Explain how you've aligned multiple programs to support strategic objectives."

### 4. Strategic Sourcing

- "How do you develop a strategic sourcing strategy for complex initiatives?"
- "Describe your approach to creating vendor ecosystems for enterprise programs."
- "Explain how you've established governance across multiple strategic vendors."

### 5. Predictive Analytics

- "How do you use advanced analytics to inform strategic decisions?"
- "Describe your approach to implementing predictive capabilities in project management."
- "Explain how you've used data to identify strategic opportunities or threats."

## Development Resources

### Define Stage Resources



#### Recommended Reading

- "Problem Solving 101" by Ken Watanabe
- "Smart Choices: A Practical Guide to Making Better Decisions" by John S. Hammond
- "The Pyramid Principle" by Barbara Minto



#### Training Opportunities

- Introduction to business analysis
- Basic data analysis and visualization

- Structured problem-solving techniques
- Fundamentals of contract management

### **Practice Exercises**

- Create a fishbone diagram for a current project issue
- Develop a simple decision matrix for an upcoming project choice
- Map project objectives to organizational goals
- Analyze basic project metrics and identify trends

## **Develop Stage Resources**

### **Recommended Reading**

- "Thinking in Systems" by Donella H. Meadows
- "Good Strategy/Bad Strategy" by Richard Rumelt
- "The Art of Business Value" by Mark Schwartz
- "Business Analytics for Managers" by Gert Laursen

### **Training Opportunities**

- Advanced problem-solving and decision-making
- Strategic planning and roadmapping
- Contract negotiation and vendor management
- Business intelligence and data analysis

### **Practice Exercises**

- Facilitate a complex problem-solving workshop
- Create a strategic project roadmap with business value milestones
- Negotiate terms for a significant vendor agreement
- Develop a comprehensive metrics framework for a major initiative

## **Scale Stage Resources**

### **Recommended Reading**

- "The Fifth Discipline" by Peter Senge
- "Playing to Win: How Strategy Really Works" by A.G. Lafley
- "Enterprise Architecture as Strategy" by Jeanne W. Ross
- "Competing on Analytics" by Thomas H. Davenport

## **Training Opportunities**

- Systems thinking and complexity management
- Portfolio management and optimization
- Enterprise architecture fundamentals
- Strategic sourcing and partner management
- Predictive analytics and business intelligence

## **Practice Exercises**

- Develop a portfolio investment framework
- Create an enterprise capability roadmap
- Design a partner ecosystem strategy
- Implement a predictive analytics approach for portfolio management

## **Case Studies for Skill Development**

### **Define Stage Case Study: Project Prioritization Challenge**

**Scenario:** A marketing department needs to launch three campaigns but has limited resources. As project manager, you must help prioritize and sequence the work.

#### **Development Activities:**

1. Apply a simple decision matrix with weighted criteria
2. Conduct basic cost-benefit analysis for each campaign
3. Create a sequenced implementation plan
4. Present recommendations with supporting data

#### **Learning Outcomes:**

- Structured approach to decision-making
- Basic data analysis for justifying choices
- Alignment of projects with business objectives
- Clear documentation of decision rationale

### **Develop Stage Case Study: Product Roadmap Strategy**

**Scenario:** Your company is developing a new product line with quarterly releases planned over two years. You must create a strategic roadmap that delivers incremental value while building toward the full vision.

#### **Development Activities:**

1. Create a capability-based roadmap with business value mapping



2. Develop scenario analyses for different market conditions
3. Build a release strategy with metrics for each milestone
4. Design a stakeholder alignment approach for the long-term vision

**Learning Outcomes:**

- Strategic roadmapping with value focus
- Scenario planning for uncertainty
- Metrics-driven release planning
- Long-term stakeholder alignment

**Scale Stage Case Study: Enterprise Technology Transformation**

**Scenario:** Your organization is undertaking a major technology transformation affecting multiple business units over three years. You need to develop the portfolio strategy and implementation approach.

**Development Activities:**

1. Create a systems map showing interdependencies across the enterprise
2. Develop a portfolio prioritization framework
3. Design a capability evolution model with transition states
4. Build a governance model for cross-organizational decision-making
5. Establish a strategic vendor ecosystem strategy

**Learning Outcomes:**

- Systems thinking application
- Portfolio optimization techniques
- Enterprise architecture transition planning
- Cross-organizational governance
- Strategic partner management