COURSE SYLLABUS

Independent Government Cost Estimation (IGCE) Course (Self-Paced)

This course helps acquisition, financial, budget, and program professionals develop Independent Government Cost Estimates (IGCEs) that are accurate, defensible, and FAR-compliant. Participants learn to build a fair and reasonable cost baseline that withstands audit and protest scrutiny.

> Group classes in Live Online and onsite training is available for this course. For more information, email onsite@graduateschool.edu or visit: https://www.graduateschool.edu/courses/independent-government-cost-estimation-igce-course-self-paced

support@graduateschool.edu • (888) 744-4723

Course Outline

Module 1: The Strategic Foundation – The IGCE in the Acquisition Lifecycle

- Identify the regulatory requirements and primary purpose of the IGCE within the Federal Acquisition Regulation (FAR).
- Map the integration of the IGCE across the four major phases of the acquisition lifecycle.
- Distinguish between the IGCE's role in “Price Reasonableness” and “Cost Realism” evaluations.
- Evaluate how a high-quality IGCE mitigates financial and legal risks, including Anti-Deficiency Act violations.
- Recognize the “Independent” nature of the estimate and the importance of shielding it from vendor influence.

Module 2: Breaking Down the Requirement – From Words to Worksheets

- Deconstruct a Statement of Work (SOW) or Performance Work Statement (PWS) into a Work Breakdown Structure (WBS) suitable for cost estimation.
- Identify cost drivers within technical requirements, including labor categories, material quantities, and geographic location impacts.
- Analyze the Level of Effort (LOE) required for tasks by distinguishing mandatory “shall” statements from discretionary “should” statements.
- Determine appropriate Labor Category (LCAT) alignment by matching SOW task complexity to professional standards.
- Evaluate the impact of contract type (Fixed-Price vs. Cost-Reimbursement) on how requirements are broken down and risk is priced.

Module 3: The 5 Methods of Estimation – Moving Beyond the Guesswork

- Categorize the five primary estimating methods based on their accuracy and data requirements.
- Select the most appropriate estimating method based on the acquisition lifecycle phase and the maturity of the requirement.
- Apply the Analogy Method by identifying a comparable historical project and adjusting for inflation, quantity, and complexity.
- Execute a Parametric Estimate using statistical relationships and Cost Estimating Relationships (CERs).
- Evaluate the risks and rewards of Expert Opinion (Delphi Method) and document it to pass a reasonableness review.

Module 4: Labor Rates and Indirect Costs – Calculating the “Fully Burdened” Reality

- Define and calculate a fully burdened labor rate, including Fringe, Overhead, G&A, and Profit/Fee.
- Navigate government data sources (GSA CALC, BLS, and O*NET) to find defensible market rates.
- Apply geographic locality adjustments to account for cost-of-living differences between performance sites.
- Differentiate between direct costs and indirect costs to ensure no double-counting.
- Justify the selection of specific escalation factors (CPI, ECI) for multi-year contract options.

Module 5: Market Research & Data Sources

- Determine whether a product range meets the Minimum Essential Requirements.
- Assess the competitive landscape and small business opportunities within a requirement.
- Establish a "fair and reasonable" price range using authoritative government data sources.
- Navigate and apply GSA CALC+, BLS, FPDS, and other market research tools.
- Document market research in an audit-proof source citation log.

Module 6: Defensibility & Documentation

- Identify exactly what a Contracting Officer legally needs to sign off on a price.
- Distinguish between Price Analysis (commercial/competitive) and Cost Analysis (certified cost or pricing data).
- Translate raw pricing data into a defensible narrative using Historical Prices Paid, catalogs, and parametric modeling.
- Justify price variances based on quantity discounts, inflation (EPA), and geographic requirements.
- Build a Basis of Estimate (BOE) package that allows a CO to make a Fair and Reasonable determination with confidence.

Module 7: Escalation, Inflation, and Market Volatility

- Differentiate between escalation, inflation, and volatility, and identify the FAR clauses that apply to each.
- Navigate and extract data from the BLS, targeting the Producer Price Index (PPI) and Employment Cost Index (ECI).
- Draft Economic Price Adjustment (EPA) clause requests for inclusion under FAR 16.203.
- Execute data normalization by applying mathematical adjustments to historical data for loss of purchasing power.
- Develop risk-mitigation narratives that justify risk premiums without triggering a "not reasonable" determination.

Module 8: Specialized Estimation – Software, Agile, and Data Lifecycle

- Deconstruct Agile requirements by translating user stories and story points into defensible cost figures using velocity and labor mapping.
- Compare Fixed-Price Team (pod) estimating with LCAT estimating and determine when to use each.
- Identify Agile-specific risks and mitigate the velocity variables and points-to-dollars mapping trap.
- Implement a data lifecycle plan to collect and store historical IGCEs and contractor actuals.

Module 9: Final Review – Comparing the IGCE to Actual Vendor Proposals

- Perform the final IGCE-to-proposal comparison using core comparison logic.
- Analyze the variance ("delta") using identification, technical reconciliation, and normalization.
- Determine the appropriate Contracting Officer action based on the four outcome scenarios.
- Synthesize all course content into a complete, defensible IGCE package.