Report on Projected Construction Costs and Hurricane Katrina

Davis Langdon is a national cost consultant whose client base includes the University System of California, the University System of Washington, and Johns Hopkins University in Maryland. They have offices in New York and Philadelphia on the east coast. Their recent business efforts include the establishment of an economics intelligence group to predict market trends and to assess construction cost-related risks for public owners.

In a recent conversation with Peter Morris of their office, he shared the following observations and after comparing views we came to the following conclusions:

Observations:

1. Peter does not believe that North Carolina will experience the direct regional market effects produced by Katrina. He believes these will be acutely felt in Georgia and that we will feel the secondary effects of a reorientation of Georgia resources toward the gulf region. The housing or residential construction market will feel many more direct effects. Projects using wood framing etc. will show the greatest impact. Overall he believes we will observe construction commodity price escalations in commercial and institutional construction projects from 5% to 8% over the next year.
2. Peter believes that a greater determinant on the already stressed North Carolina construction market will be a projected 5% growth rate for construction in Virginia. He observes that this will take place in the medical market in the northern portion of the state. Projected growth laboratory and other similar institutional construction in the Upper Atlantic and the Northeast will also begin to affect the North Carolina market. As this growth begins to take shape, the North Carolina market will have to be watched carefully.
3. Recent research on the escalating cost of oil on the construction market yields some moderately surprising results. It appears that one barrel of oil relates to approximately 10 sf of building area. Therefore, the present cost increases in a barrel of oil would net about a $3 per gross building square foot cost increase due solely to the cost of oil.
4. Expected rates of inflation for the construction industry range from 8% to 12% depending on the source of the data. Recent surveys of public owners indicate that 92% of the owners experienced an inflation rate of 13.2% for 2004.
5. The next few months will yield market volatility related to subcontractors and building materials. In a fixed price or lump sum contracting method with the risk passed along to the subcontractors to hold their price over an extended period of time, there will most likely be volatility in bidding over the next six months or more.

Local Data:

A recent article in the Raleigh News and Observer indicated that costs of construction products have risen abnormally during the past year. They site the following:

Report on Projected Construction Costs and Hurricane Katrina

Percentage increases from July 2004 to July 2005:

- No. 2 Diesel fuel 53.6%
- Cement 14.5%
- Ready-mixed concrete 13.9%
- Asphalt 13.3%
- Gypsum Products 11.2%
- Concrete block and brick 10.3%
- Steel Piping and tubing 6.4%

The increases appear to be most prevalent in products that are used for both residential and commercial types of construction. Rebuilding the damage to the housing in Florida after last year's hurricanes, combined with the already tight construction market, are likely contributors. Some of these products are largely petroleum-based and the volatility in the oil market is an additional factor.

Conclusions:

Owners are in the best position to manage the risk associated with their projects. They can spread it across areas of a project. Some likely methods are as follows:

1. Include dedicated float in construction schedules to address delays related to materials shortages or delays in obtaining materials. This will share the risks associated with supply volatility with the contractors.
2. Consider procuring materials per allowances in construction tied to commodity market pricing at the time of bid. If the commodity goes up, the owner will pay the actual material cost increase instead of the subcontractors bid premium in anticipation of possible cost increases. This will share the risks associated with potential price increases that may occur during the construction schedule.
3. Identify up to 20 key building materials to be tied to indexes at the time of bid. If the risk is shared at the time of bid and the market remains stable, the owner will pay no premium. If the commodity goes up, the owner will pay the actual material cost increase instead of the subcontractors bid premium in anticipation of possible cost increases. This will share the risks associated with potential price increases that may occur during the construction schedule.
4. We are faced with a period of known inflation driven by Hurricanes Katrina and Rita and residual market demand. In addition, there may be market volatility especially in the areas of material supply and procurement. Materials that are used on both residential and commercial and institutional projects are likely to be most affected.
5. Prudent choices of materials and risk mitigation in procurement are the best defensive strategies in the present construction environment.