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Construction Management
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Jacksonville Arena
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Project Delivery Evaluation



A. Contracts:

The contracts which are being used on this project by Turner Construction Company are a performance based, this allows Turner the security to know that if the work is not done to their or the owners satisfaction that the subcontractor is liable for the work. Turner uses this contract on all of their projects; it is a standard Turner Subcontract. All contracts issued on this project are completed in accordance with plans and specifications. The City of Jacksonville (Owner) has taken out an owner controlled insurance policy for the whole of the project. This takes away any subcontractors insurance policies, or construction manager's insurances and it puts all of it in one general "blanket" policy held by the owner. The owner has also taken out an owner bond for Turner Construction Co. Turner, in hand, has required all subcontracts in excess of \$100 K be bonded for the work.

(See attachment)

B. Contractor Selection:

Once the City of Jacksonville knew that they were going to be building this new arena they needed a Construction Company to handle the construction of the project. They issued an RFE, and then the CM's went to the City and presented their approach to the project, various projects which they had worked on in the past, as well as their fee for the project. Turner was one of three final selections for the award. They were then brought back to make a one hour presentation during which they were to layout their entire approach including subs(who they thought would do the best work), their ability to keep the project on schedule, their expected quality of the project, and Turner's expected safety regulations.

C. Staffing Plan:

Turner Construction Company is handling the construction of the new arena. Their office in Orlando is taking this project due to the close proximity to that location. They currently have 13 full time employees on the project, including administration, technical employees, and a superintendent. In speaking with John Reich who is one of the managers on the project from Turner, there was very little executive time spent on this project. Turner has been on the project since before the estimating phase in order to be on top of the coordination between the design firms and the subcontractors doing the work. They basically only spent executive time on this project when they were handling the estimate, when the schematic design was coming out, and again when DD's came out. Turner's executives only worked on this project when it was still in office and in the preconstruction phase. Turner was brought on board on August 30th, 2001, and they issued GMP on July 15th, 2002.

D. Design Coordination:

Turner has been coordinating the work on the MEP systems since the initial design phase. They were working with the design firms as well as the subcontractors to make sure that everything was done in accordance with all of the systems and contractors. All of the subcontractors who were awarded or chosen to do the work are under contract to perform the work according to plans and specifications. This assisted Turner in that the subs are responsible for making the systems work in the shop drawing phase. Turner presented to the City of Jacksonville a lump sum for which they could construct the project, and in this sum Turner calculated allowances for everything that could present a problem as well as for issues which had not yet been worked out at the time of their presentation. The HVAC and Plumbing went to the same subcontractor, while the electrical and the Fire Protection went to individual contractors. The HVAC subcontractor heads up the coordination for the MEP work due to the fact that the duct work is the most integral part of that scope of work. Everything else is designed around that. The HVAC sub is responsible for coordinating with all of the rest of the subs, but the others are also responsible for coordinating with each other. There have been no coordination problems as of yet in the field as the project has not yet reached that stage of construction.

E. Project Controls:

The main project controls for the New Jacksonville Arena are being handled by Turner using Prolog for the cost controls, and Primavera for the scheduling controls. Initially the arena was earmarked by the city to be completed by the first of October 2003, but due to some of the initial milestones being missed by the owner, the date of completion has been just recently pushed back to mid November 2003. Regarding the safety controls Turner usually uses their own safety program, but in this case they consulted with the city. The City of Jacksonville has their own safety protocol, so Turner and the city collaborated and came up with a safety program for this project which used the best of both safety programs. The safety program for the new arena is 90% Turner's and 10 % the City of Jacksonville's.

F. Building Systems Analysis:

Initially when I first looked at this project I was immediately drawn to the elaborate system used for the ice rink. I was surprised to find that the Ice Rink is frozen for ice events and then thawed and drained to utilize the concrete event floor. Evidently this is a common system for multi-use facilities. Most of the ice rinks today are strictly ice rinks so they are kept frozen all the time. I was just unaware that the multi-use facilities didn't keep the ice frozen under a temporary floor. I am going to investigate the possibility of installing different freezing and thawing systems, as well as the possibility of keeping the rink frozen. The current system was designed by SSR out of Nashville, TN. Since the ice system is completely independent of any of the other MEP systems I am going to look at the other systems such as the air circulation systems. I am also going to look into the different possibilities around the foundation, using piles instead of spread footings, etc. I could look into building the structure out of concrete up to the roof instead of steel. It just is not plausible to erect the roof out of concrete due to the long spans.