Spring 2011

Thesis Presentation Outline

Penn State AE Senior Thesis

UMBC
Performing Arts &
Humanities Facility
Baltimore, MD

Courtney L Glaub
Construction Management
Dr. Chimay Anumba

Thesis Presentation Outline

Courtney Glaub – CM
Dr. Chimay Anumba

I. Introduction (2 screens)
   a. Present myself
   b. What is my project
   c. Outline of topics discussed

II. Project Background (6 screens)
   a. Location of project
   b. General building info/parameters
   c. Building stats

III. Analysis 1 – Precast Façade – Structural Breadth (~20 screens)
   a. Problem/goal
   b. Original brick design
   c. Precast design
   d. Structural impact
   e. Schedule impact
   f. Cost impact
   g. Site logistics
   h. Conclusion

IV. Analysis 2 – Crane Comparison (~10 screens)
   a. Problem/goal
   b. Crane comparison/pros & cons
   c. Schedule impact
   d. Cost impact
   e. Site logistics
   f. Conclusion

V. Analysis 3 – PV Panels – Electrical/Structural Breadth (~25 screens)
   a. Problem/goal
   b. System design/parameters
   c. Structural impact
   d. Electrical breadth
   e. Feasibility study/rebates
   f. Conclusion

VI. Overall Conclusion/Opinions (2 screens)

VII. Acknowledgements/Questions (2 screens)

PRESENTATION OUTLINE:

I. Project Background
II. Analysis 1 – Precast Façade
    I. Structural Breadth #1
III. Analysis 2 – Crane Comparison
    I. Constructability Review
IV. Analysis 3 – PV Array Feasibility Study
    I. Structural Breadth #2
    II. Energy/Electrical Breadth
V. Concluding Thoughts
VI. Acknowledgements

UMBC Performing Arts & Humanities Facility

Baltimore, MD

Penn State AE Senior Capstone Project

Courtney Glaub – Construction Management
Dr. Chimay Anumba – CM Advisor

Precast Façade Design

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Courtney Glaub – Construction Management

PRESENTATION OUTLINE:

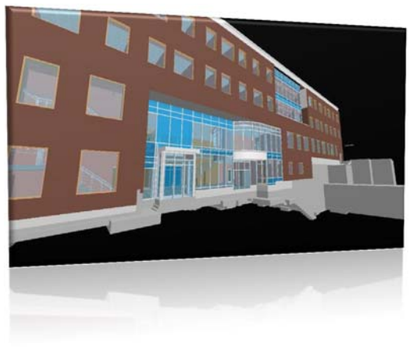

IMAGE COURTESY OF WHITING-TURNER

PROBLEM IDENTIFICATION:

- Complete project on time and efficiently
- Building is made up of three different structural elements
- delays encountered due to adjacent work being completed

RESEARCH GOAL:

- Perform preliminary design of precast façade
- Reduce masonry schedule and eliminate any delays

Site Logistics Image

Crane Comparison

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PRESENTATION OUTLINE:

IMAGE COURTESY OF WHITING-TURNER, Multivista

PROBLEM IDENTIFICATION:

- Time efficiency/completion on time
- Time to mobilize tower crane
- Cost to use tower crane

RESEARCH GOAL:

- Reduce cost & schedule by utilizing mobile cranes
- Accelerate schedule & complete project on time

Mobile crane image