## BCN 5789C Construction Project Simulation – Spring 2022

 Tuesday and Thursday Period 4 - 5 (10:40 AM - 12:35 PM), 225 Rinker Hall

**Instructor: Dr. Robert F. Cox**Office Location: 306 Rinker Hall

Email: robcox@ufl.edu

Phone: (352) 273-1153 Mobile : 765-404-2244

Office hours: T-H 9:30 – 10:30 am and by appointment

**Teaching Assistant**:

**TBD**

Office Location: 3XX Rinker Hall

Email: XXX@ufl.edu

Phone: XXXX

Office hours: XXXX pm and by appointment

**Course Description**:
A construction project is simulated with each student being responsible for designing, developing, estimating, scheduling, contracting, and administering the works for the completion of a small commercial or light industrial project.

**Course Learning Outcomes (CLOs):**Upon completion of the course, students will demonstrate their ability to:

1. Formulate the overall design of the project and prepare a 3D virtual model.
2. Perform quantity takeoffs and develop a complete estimate of project costs.
3. Organize the elements of the project into a viable construction work plan and schedule.
4. Set up a project administration system for contracts, schedule of values, and pay applications.
5. Organize, present, and defend the technical and financial data of the project.
6. Prepare a project proposal from a commercial development/investment perspective.

**Recommended Texts:**

Materials on CANVAS.

**Course Policy:**

**ATTENDANCE POLICY**: Attendance is expected.

School sponsored activities in which the appropriate faculty coach has provided a previous written notification of the activity will warrant an excused absence.

You are responsible for all material presented in class, lecture notes on CANVAS, handouts, guest speakers, and anything said or written by the instructor.

**SUBMISSION POLICIES**: ALL LATE WORK IS PENALIZED, regardless of the reason. You should consider the due date in a similar fashion to submitting a bid.

Each assignment submittal is due at the start of class on the due date. *While partial submissions are unacceptable – However, something is better than nothing*.

**COURSE TECHNOLOGY**: Students MUST have a laptop computer available for use in class and haveaccess to all required software.

**ONLINE COURSE EVALUATION**: Students are expected to provide professional and candid feedback on the quality of instruction in this course by completing course evaluations online via GatorEvals.

**GRADING POLICIES**

|  |  |  |
| --- | --- | --- |
| **ITEMS** | **POINTS** | **APPROX. %** |
| Attendance and Class participation | 100 points | 7% |
| Submittal Number 1Assignments #1-4  | 375 points | 23% |
| Presentation #1: Site Selection & Project Feasibility |  50 points | 3.33% |
| Submittal Number 2Assignments #5 - 7 | 425 points | 30% |
| Presentation #2 Pre-Construction Phase |  50 points | 3.33 % |
| Submittal Number 3Assignments #8 - 12 | 450 points | 30 % |
| Presentation 3 (Final Presentation) |  50 points | 3.33 % |
| **Total** | **1500 points** | **100%** |

**Grading Scale:**

Final grades will be assigned according to the following scale. Divide the total points you earn by the total possible points to obtain your percent.

|  |
| --- |
| The point value for each assignment will be clearly indicated when assigned. |
| Letter Grade | A | A- | B+ | B | B- | C+ | C | C- | D+ | D | D- | F |
| Numeric Grade | 93-100 | 90-92 | 87-89 | 83-86 | 80-82 | 77-79 | 73-76 | 70-72 | 67-69 | 63-66 | 60-62 | 0-59 |

**Course Method:**

* This course will be conducted with a two-period session of lecture, followed by a two-hour period of “lab sessions”. You are expected to follow along during the lecture and take notes in order to apply the new concepts to your assignments during the lab period. The lab period will be a workshop / seminar style where you are expected to work on the assignment and ask questions to help you successfully master each topic. To accommodate full coverage of all necessary topics for completing all course deliverables, discussion of project requirements and related topics will also take place during these lab sessions.

**Assignments and Final Project Submission**

* **Late submissions are not accepatable, regardless of circumstances.**
* All work turned in for this course should be of professional quality (grammar, etc.).
* All the assignments and final project have to be **submitted exclusively in Canvas.**
* It is **your responsibility** to verify the successful submission of the assignments/final project in Canvas. Submission by **email** or the **digital media** (such as USB drive) **will not be accepted**.
* In the case you have technical difficulties with Canvas, please contact the UF Help Desk at learning- support@ufl.edu, or (352) 392-4357 - select option 2, or go to Ground floor of the Hub. If your technical difficulties will cause you to miss a due date, you MUST report the problem to UF Help Desk **before the due date/time**. Include the ticket number that you are given in an e-mail to the instructor to explain the late assignment due to problem with Canvas.

**UF Policy:**

University Policy on Accommodating Students with Disabilities: Students requesting accommodation for disabilities must first register with the Dean of Students Office (<http://www.dso.ufl.edu/drc/>). The Dean of Students Office will provide documentation to the student who must then provide this documentation to the instructor when requesting accommodation. You must submit this documentation prior to submitting assignments or taking the quizzes or exams. Accommodations are not retroactive. Therefore, students should contact the office as soon as possible in the term for which they are seeking accommodations.

University Policy on Academic Misconduct: Academic honesty and integrity are fundamental values of the University community. Students should be sure that they understand the UF Student Honor Code at <http://www.dso.ufl.edu/students.php>.

University Policy on Teaching Evaluation: Students are expected to provide professional and respectful feedback on the quality of instruction in this course by completing course evaluations online via GatorEvals. Guidance on how to give feedback in a professional and respectful manner is available at <https://gatorevals.aa.ufl.edu/students/>. Students will be notified when the evaluation period opens, and can complete evaluations through the email they receive from GatorEvals, in their Canvas course menu under GatorEvals, or via [https://ufl.bluera.com/ufl/](https://urldefense.proofpoint.com/v2/url?u=https-3A__ufl.bluera.com_ufl_&d=DwMFAg&c=sJ6xIWYx-zLMB3EPkvcnVg&r=y2HjEMjRMHJhfdvLrqJZlYczRsfp5e4TfQjHuc5rVHg&m=WXko6OK_Ha6T00ZVAsEaSh99qRXHOgMNFRywCoehRho&s=itVU46DDJjnIg4CW6efJOOLgPjdzsPvCghyfzJoFONs&e=). Summaries of course evaluation results are available to students at <https://gatorevals.aa.ufl.edu/public-results/>.

**Class Demeanor:**

It is expected that everything submitted for a grade will be professional, with correct spelling and grammar. The expectations and caliber of the work expected in this course are elevated to the level of the business community and evaluated against that baseline. If your work product is considered unacceptable in the workplace, then it is unacceptable here. The goal is for all work to represent what you would submit to your immediate boss in a job scenario. If your boss won’t accept, then we won’t either.

Your work is subject to electronic verification by TurnItIn® or other technologies.

**Honor Code:**

* **The Honor Code will be applied in the class.** We, the members of the University of Florida community, pledge to hold ourselves and our peers to the highest standards of honesty and integrity. On all work submitted for credit by students at the university, the following pledge is either required or implied: **"On my honor, I have neither given nor received unauthorized aid in doing this assignment."**
* **Duplication of an assignment and quiz/exam/project/activity** both manually or by computer will be considered an act of academic dishonesty and dealt with accordingly. Any violation of the Honor code will not be tolerated. A student that is found guilty of Academic Dishonesty will be given a **failing grade** for the course.
* Do not allow others to access your files as that will also be considered violation of the Honor Code.
* Visit the website <http://www.dso.ufl.edu/sccr/honorcodes/honorcode.php> for more information about the University of Florida Student Honor Code.

**Getting Help:**

For issues with technical difficulties for E-learning in Canvas, please contact the UF Help Desk at:

* Learning-support@ufl.edu
* (352) 392-HELP - select option 2
* <https://lss.at.ufl.edu/help.shtml>

Other resources are available at <http://www.distance.ufl.edu/getting-help> for:

* Counseling and Wellness resources
* Disability resources
* Resources for handling student concerns and complaints
* Library Help Desk support

|  |  |  |  |
| --- | --- | --- | --- |
|  |  | **SPRING 2022** | **NOTES** |
| **WEEK**  | **Date** | **Planned Topics \*SUBJECT to Change**  |  |
|  |  | **PROJECT FEASIBILITY PHASE** |  |
| 1 | Thurs – Jan 6 | Course Introduction and Review of SyllabusIndustry Trends | Course expectations and Milestones |
|  | Tues – Jan 11 | Site Selection and Use Calculations*Site Looking for Use vs. Use looking for a Site* | *Detailed in* *Assignment #1* |
| 2 | Thurs – Jan 13 | Individual Project Workday – Site Selection and Use Ideation |  |
|  | Tues – Jan 18 | Site FeasibilityUnderstanding Project Owners – Project Feasibility Analysis Site Due Diligence | *Detailed in* *Assignment #1* |
| 3 | Thurs – Jan 20 | Understanding Project Owners – Delivery MethodsPre-Qualifications | *Detailed in* *Assignment #2* |
|  | Tues – Jan 25 | Programming and DesignConceptual Designs and EstimatesProject Narrative | *Detailed in* *Assignment #3* |
| 4 | Thurs- Jan 27 | Programming and DesignConceptual Designs and EstimatesProject Narrative | *Detailed in* *Assignment #3* |
| 5 | Tues – Feb 1 | Sustainability and LEED Considerations | *Detailed in* *Assignment #4* |
|  | Thurs – Feb 3 | ***In-Class Workday*** |  |
| 6 | **Tues – Feb 8** | ***Presentation #1******Site Selection and Project Feasibility*** | **Project Submittal #1 Due****Assignments #1-4**  |
|  |  | **PRECONSTRUCTION PHASE** |  |
|  | Thurs – Feb 10 | Individual Project Workday – |  |
| 7 | Tues- Feb 15 | Design Drawings and Detailed Estimates | *Detailed in* *Assignment #5*  |
|  | Thurs – Feb 17 | Detailed Estimates | *Detailed in* *Assignment #5* |
| 8 | Tues- Feb 22 | Schedules | *Detailed in* *Assignment #6* |
|  | Thurs – Feb 24 | Design – Schedule- Cost Relationships |  |
| 9 | Tues – Mar 1 | Cost loaded Schedules - Line of Credit Analysis | *Detailed in* *Assignment #7* |
|  | **Thurs – Mar 3** | ***Rinker Career Fair*** |  |
| **10** | **Mar 6-12** | **Spring Break!** |  |
| 11 | Tues – Mar 15 | Individual Project Workday – |  |
|  | Thurs – Mar 17 | Individual Project Workday – |  |
|  |  |  |  |
| **12** | **Tues – Mar 22** | ***Presentation #2******Pre-Construction Phase Presentation*** | **Project Submittal #2 Due** **Assignments #5-7**  |
|  |  | **CONSTRUCTION PHASE** |  |
|  | Thurs – Mar 24 | ContractingNegotiating Strategies Notice to Owner | *Detailed in* *Assignment #8*  |
| 13 | Tues – Mar 29 | Site Utilization PlansProject Start-upProject Safety Plans | *Detailed in* *Assignment #9*  |
|  | Thurs – Mar 31 | Establishing a Schedule of Values Progress MeasurementPay Applications | *Detailed in* *Assignment #10* |
| 14 | Tues – Apr 5 | Owner Directed Change Orders | *Detailed in* *Assignment #11* |
|  | Thurs- Apr 7 | **Change Order Presentations** |  |
| 15 | Tues, Apr 12 | Substantial CompletionFinal Payments and Release of LiensProject Close-out | *Detailed in* *Assignment #12* |
|  | Thurs -Apr 14 | In-Class Working Session |  |
| **16** | **Tues – Apr 19** | ***Final Presentations*** | **Project Submittal #3 Due****Assignments #8-12** |