BCN 6585 SUSTAINABLE CONSTRUCTION

Spring 2025 SYLLABUS

CLASS LOCATION: RINKER 210

TUESDAY 10:40 AM - 12:50 PM

THURSDAY 10:40 AM - 11:30 AM

INSTRUCTORS: Dr. Ryan Sharston

Office location: School of Architecture, Room 246

r.sharston@ufl.edu

352 2493375

OFFICE HOURS: Thursday 2 - 4 PM. Email to schedule appointment with instructor via Zoom or at Ayers Building.

COURSE WEBSITE: http://elearning.ufl.edu

COURSE COMMUNICATIONS:

This course is set up as a learning community, and a questioning approach is central to building healthy educational relationships. Students should use the discussion board on Canvas to ask questions that the whole class might benefit from considering. Inquiries of a private nature can be sent to r.sharston@ufl.edu

REQUIRED OR RECOMMENDED COURSE MATERIALS:

The purchase of textbooks is not required for this course. Your learning resources will be a mixture of books, academic journal papers, media articles, videos and other sources that arise. These will be advised and updated on Canvas.

Citation Management Guide from UF Libraries:
http://guides.uflib.ufl.edu/citationsoftware

COURSE DESCRIPTION:

This course invites students to explore and critique the sustainable development and resilience paradigms in relation to the interface of built environment, society and nature. Sustainable development includes reducing the impacts of human activities on natural ecosystems and understanding the role these ecosystems have in the economy and on human welfare. It involves understanding the lessons that human society can learn from natural systems and how these lessons can help provide a good quality of life for the planet's population. This course will cover the fundamental concepts of sustainable development and resilience in the built environment, including: paradigms of "development", sustainability and resilience; environmental / resource issues related to human activities including construction; environmental ethics and environmental justice; ecological / environmental economics including Life Cycle Costing; building assessment (frameworks) and ecolabels; energy systems; and Life Cycle Assessment.

COURSE GOALS:

By the end of this course, students will be able to:

1) *Negotiate historical and contemporary understandings of sustainability, resilience and sustainable development.*

2) *Evaluate sustainability and resilience in the built environment at component, building, community, city, country and planetary scales.*

3) *Manage the operational challenges for construction in the 21st Century, drawing on ethical, moral and socio-political consciousness.*

4) *Apply a comprehensive toolbox for sustainable construction to their personal lives and professional practice.*

5) *Adapt to complex design challenges using sustainability and resilience principles.*

6) *Position themselves as an advocate for change in response to an unsustainable status quo.*

INSTRUCTIONAL METHODS:

The course will use a mix of lectures, discussions, readings, videos and practical group activities in the classroom. The central approach will be to develop and maintain a dialogue between all participants in the course (instructors included). You should review the Module materials in advance of attending the class on each topic – we will be discussing readings, videos, websites etc.

COURSE POLICIES:

ATTENDANCE POLICY:

In order to fully be part of the learning community, you are expected to attend class at Rinker School on Wednesdays for the duration of the semester. Requirements for attendance and all work in this course are consistent with university policies that can be found at: https://catalog.ufl.edu/ugrad/current/regulations/info/attendance.aspx

ASSIGNMENT POLICY:

Assignments are due as indicated in the "GRADING POLICIES" section of this syllabus. A 40% deduction will be imposed for assignments up to 24 hours late. Assignments more than 24 hours late will receive no credit. For information on make-ups, see "GETTING HELP" section.

STUDENT 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/. Summaries of course evaluation results are available to students at https://gatorevals.aa.ufl.edu/public-results/.

UF POLICIES:

UNIVERSITY POLICY ON ACCOMMODATING STUDENTS WITH DISABILITIES:

I believe that all students have a right to access the same opportunities for learning. Inclusivity is critical for a healthy learning environment. Some of you may experience particular disabilities for which you require accommodations. This is something that your instructors need to know about as soon as possible, so that they can plan appropriately. If this is the case, and you have not already done so, you should first register with the Disability Resource Center (352-392-8565, www.dso.ufl.edu/drc/) . The DRC is a group of people dedicated to supporting students – they are friendly and there to help. Once you register, the DRC can provide an accommodation letter that you can present to me and other instructors so that we can respond to those needs.

UNIVERSITY POLICY ON ACADEMIC CONDUCT:

UF students are bound by The Honor Pledge which states, "We, the members of the University of Florida community, pledge to hold ourselves and our peers to the highest standards of honesty and integrity by abiding by the Honor Code. On all work submitted for credit by students at the University of Florida, the following pledge is either required or implied: "On my honor, I have neither given nor received unauthorized aid in doing this assignment." The Honor Code (http://www.dso.ufl.edu/sccr/process/student-conduct-honor-code/) specifies a number of behaviors that are in violation of this code and the possible sanctions. Furthermore, you are obligated to report any condition that facilitates academic misconduct to appropriate personnel. If you have any questions or concerns, please consult with Dr von Meding.

CLASS DEMEANOR OR NETIQUETTE:

All members of this class are expected to follow rules of common courtesy in the classroom, in email messages, threaded discussions and chats.

When communicating in general, you should always:

- Treat instructor and each other with respect, even in email or in any other online communication
- Feel free to refer to your instructor as Jason (or Dr von Meding if you are more comfortable)

- Use clear and concise language
- Remember that all college level communication should have correct spelling and grammar, and avoid slang terms
- Be cautious when using humor or sarcasm as tone is sometimes lost in an email or discussion post and your message might be taken seriously or offensive
- Be careful with personal information (both yours and other's)

When you send an email to your instructor, teaching assistant, or classmates, you should:

- Use a descriptive subject line
- Be brief
- Avoid attachments unless you are sure your recipients can open them
- Avoid HTML in favor of plain text
- Sign your message with your name and return e-mail address
- Think before you send the e-mail to more than one person. Does everyone really need to see your message?
- Be sure you REALLY want everyone to receive your response when you click, "reply all"
- Be sure that the message author intended for the information to be passed along before you click the "forward" button

When posting on the Discussion Board, you should:

- Make posts that are on topic and within the scope of the course material
- Take your posts seriously and review and edit your posts before sending
- Be as brief as possible while still making a thorough comment
- Always give proper credit when referencing or quoting another source

- Be sure to read all messages in a thread before replying
- Don't repeat someone else's post without adding something of your own to it
- Avoid short, generic replies such as, "I agree." You should include why you agree or add to the previous point
- Always be respectful of others' opinions even when they differ from your own
- When you disagree with someone, you should express your differing opinion in a respectful, non-critical way
- Do not make personal or insulting remarks
- Be open-minded

GETTING HELP:

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

- http://helpdesk.ufl.edu
- (352) 392-HELP (4357)
- Walk-in: HUB 132

Any requests for make-ups due to technical issues MUST be accompanied by the ticket number received from the Help Desk when the problem was reported to them. The ticket number will document the time and date of the problem. You MUST e-mail your instructor within 24 hours of the technical difficulty if you wish to request a make-up.

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

(Required) Should you have any complaints with your experience in this course please visit http://www.distance.ufl.edu/student-complaints to submit a complaint.

GRADING POLICIES:

METHODS BY WHICH STUDENTS WILL BE EVALUATED AND THEIR GRADE DETERMINED:

Grading will be based foremost on the quality of the submissions by the students. All references must be fully specified at the end of each assignment and keyed into the written text by author, year, and page number(s) if the citation is a book or journal. Spelling and grammar are also subject to evaluation. All submission and presentations will be graded based on the assignment rubrics. Generally speaking, as a graduate level course, *a deep engagement with the content though guided and independent learning, as well as sustained effort as an active participant in the course will be necessary to achieve high grades.*

INFORMATION ON CURRENT UF GRADING POLICIES FOR ASSIGNING GRADE POINTS:

See https://catalog.ufl.edu/ugrad/current/regulations/info/grades.aspx

Assignment	Points
Reflections on Learning	130
Paper 1 – "Development" Issues	100 (20 outline + 80 paper)
Paper 2 – Resilience/Sustainability	100 (20 outline + 80 paper)
Paper 3 – Net-Zero Buildings	100 (20 outline + 80 paper)
Problem 1 – Resilient Cities	50
Problem 2 – Ethical Procurement	50

Problem 3 – Life Cycle Assessment	50
Group Project – A Sustainable Community	170 (20 proposal + 30 outline + 50 presentation + 70 report)
	Total points available: 750

COURSE PAPERS (3 PAPERS, 100 POINTS EACH)

Each paper should be 1000 words in length +/- 10%. Be aware that each has an outline deadline and a full submission deadline. Your papers should have a minimum of 10 citations and Turnitin will scan papers for originality.

COURSE PROBLEMS (3 PROBLEMS, 50 POINTS EACH)

There are 3 problems that will be introduced and worked through in class, and then taken home to complete.

- Resilient Cities Analysis
- Ethical Procurement
- Life Cycle Assessment (LCA)

REFLECTIONS ON LEARNING (130 POINTS – 10 POINTS EACH X 13 MODULES)

A weekly reflection should be undertaken as you engage with the Module materials and after you attend and participate in class (Wednesdays). The reflection should be posted to the discussion boards by the Friday following each class, and you need to respond to the post of a peer by Sunday.

GROUP PROJECT (170 POINTS)

This will be a scaffolded assessment with marks accumulating over 4 weeks. Each team will consist of three or four students. The Report should be between 2000-3000 words and the presentation will be 30 minutes maximum.

FORMAT FOR WRITING:

Follow the American Psychological Association (APA format) available at *http://apastyle.org*

GRADING SCALE:

For information on how UF assigns grade points, visit:
https://catalog.ufl.edu/UGRD/academic-regulations/grades-grading-policies/

A	94 – 100% of possible points		C	74 – 76%
A-	90 – 93%		C-	70 – 73%
B+	87 – 89%		D+	67 – 69%
B	84 – 86%		D	64 – 66%
B-	80 – 83%		D-	60 – 63%
C+	77 – 79%		F	<60