



## **CMP 4960/6960 Planning for Bicycling and Walking**

Fall Semester 2018

Thursdays, 4:30 – 7:30 pm

BU C (Business Classrooms Bldg), Room 206

**Instructor:** Thomas Millar (preferred: Mr. Millar or Tom)

**Email (preferred):** thomasomillar@gmail.com

**Phone Number:** 801-698-4290 (cell); not available after 8:00 pm

**Office Hours:** By appointment, typically before or after class

### **Materials**

There is no required textbook for this course. You will instead be directed to articles, videos, online books and reports, handouts, web links, etc., as needed through Canvas.

Some materials that you may wish to download (if applicable) and/or cursorily review in anticipation of the beginning of the course include:

- *Manual for Uniform Traffic Control Devices (MUTCD)*, 2009 [PDF]
- Federal Highway Administration (FHWA) *Small Town and Rural Multimodal Networks Guide*, 206 [PDF]
- Alliance for Biking and Walking (ABW) *Benchmarking Report*, 2016 [PDF]
- *Utah Travel Study*, 2012 [PDF]
- Smart Growth America's website
- League of American Bicyclists' website
- America Walks' website

### **Course Description**

"Planning for Bicycling and Walking" is a relatively new, multi-disciplinary course at the University of Utah. It is also the first (and currently only) "active transportation" course in higher education in the state of Utah. Students in this course will engage opportunities, standards, misconceptions and myths, implementation strategies, funding sources, general land use and transportation planning, and much more related to walking and bicycling planning, design, and engineering. Although a deeper prowess in these topics may take many years to develop, the content and activities in this course will provide students with the opportunity to imagine solutions, mitigation strategies, and design approaches to real world issues. The "Planning for Bicycling and Walking" Fall 2018 course is worth three (3) credit hours. The course will occur weekly on Thursday evenings from 4:30 to 7:30 pm and will begin on August 23<sup>rd</sup> and finish on December 13<sup>th</sup>.

### **Course Outcomes**

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

- Integrate active transportation needs and best practices into diverse professional fields
- Identify solutions to societal issues related to land use, transportation, and public health (i.e. physical, mental, and environmental health; traffic congestion; sprawl; resource

depletion; natural disaster and emergency preparedness; public and private financial issues; air quality)

- Expand imagination while basing solutions in reality and in the human scale
- Plan and design high-quality, standards-based walking and bicycling infrastructure
- Be well-versed in the design and engineering standards related to walking and bicycling
- Communicate need, benefits, and application of active transportation with diverse perspectives, cultures, and professions
- Be considered burgeoning experts in active transportation planning and design

### **Teaching and Learning Methods**

This course will be strengthened by active and imaginative discussions, preparation by students, real world applications and challenges, and project work. Students who are engaged, empathic, open-minded, critical, and imaginative, and who work diligently to discuss, complete homework, and present their findings will succeed in this course. For the most part, this course will include lectures by the instructor, discussions with fellow classmates and the instructor, presentations by students, regular assessments, and analysis and application of case studies. It will likely follow the following format:

- Discussion and recap of homework, readings, and the previous week's content at the beginning of class
- Time for selected students to present, as desired and/or assigned through Canvas or in-person invitations
- Two breaks (roughly every hour)
- Introduction of new material and lecture by instructor; discussion
- Field work, as weather permits
- Individual and group project work
- Index card "minute papers" at the end of each class (students will include what is important to them or what they learned, as well as what they didn't understand and/or what that the instructor can explain better next week) – Students must bring their own index cards to class

### **University Policies**

1. ***The Americans with Disabilities Act.*** The University of Utah seeks to provide equal access to its programs, services, and activities for people with disabilities. If you will need accommodations in this class, reasonable prior notice needs to be given to the Center for Disability Services, 162 Olpin Union Building, 801-581-5020. CDS will work with you and the instructor to make arrangements for accommodations. All written information in this course can be made available in an alternative format with prior notification to the Center for Disability Services.
2. ***Addressing Sexual Misconduct.*** Title IX makes it clear that violence and harassment based on sex and gender (which includes sexual orientation and gender identity/expression) is a civil rights offense subject to the same kinds of accountability and the same kinds of support applied to offenses against other protected categories such as race, national origin, color, religion, age, status as a person with a disability, veteran's status or genetic information. If you or someone you know has been harassed or assaulted, you are encouraged to report it to the Title IX Coordinator in the Office of Equal Opportunity and Affirmative Action, 135 Park Building, 801-581-8365, or the Office of the Dean of Students, 270 Union Building, 801-581-7066. For support and confidential consultation, contact the

Center for Student Wellness, 426 SSB, 801-581-7776. To report to the police, contact the Department of Public Safety, 801-585-2677 (COPS).

### **Course Policies**

*General Expectations: “Planning for Bicycling and Walking” will be a fun course, but its subject matter is also of utmost importance. Dedicate yourself to learning. Those who come to class with open minds, questions, comments, opinions, and respectful discourse will succeed.*

*Attendance & Punctuality: One absence or two late arrivals allowed if combined with discussion between student and instructor. Please do not treat attendance and punctuality lightly. Dedicate yourself not only to physical, but also intellectual, attendance.*

*Participation: It is expected that all students will participate fully in discussions, in-class and out-of-class assignments, and engage the instructor and their fellow students. For information about how the use of laptops, cell phones, and other devices will influence participation and learning, see the “Electronics in Class” policy below.*

*Expectations of Student Work Outside of Class: It is expected that all students will apply and foment in-class learning with related research and application outside of our three-hour class period on Thursdays. Opportunities for out-of-class work will include assigned research and homework, as well as opportunities for professional development, learning, and study.*

*Food & Drink: Due to the time of day of our class, light food and drink will be allowed. It is recommended that students eat dinner before class because hot foods and entire meals will not be allowed, so as to minimize distraction from smells and noises. If specific dietary needs and circumstances necessitate discussion with the instructor, please arrange for such an opportunity prior to the first class.*

*Electronic Devices in Class: It is expected that students use their electronic devices in ways and during times that do not distract from the course’s purpose or the possibility for their own or their peers’ learning experience. Electronic devices may be used for research, note-taking, class participation, and utilizing and referring to course materials. Personal or social use of electronic devices (i.e. social media, text messaging, calls, etc.) may be done during breaks and before and after class, but not during classroom instruction.*

*Canvas: All out-of-class course assignments, assessments, reflections, readings, and announcements will be included on Canvas. Some other pertinent course information may not be included on Canvas and will only be available in class. If absences are inevitable, materials will be provided to the student via this or other means, as arranged by the student with the instructor.*

*Student Names & Personal Pronouns: Class rosters are provided to the instructor with each student’s legal name as well as “preferred first name”. The instructor will honor you by referring to you with the name and pronoun that you prefer. Please advise the instructor of any name or pronoun changes (and update CIS). If you need assistance getting your preferred name on your University ID card, please visit the LGBT Resource Center, Room 409, in the Olpin Union Building, or email [bpeacock@sa.utah.edu](mailto:bpeacock@sa.utah.edu) to schedule a time.*

Non-English or Non-Native English Speakers (Las personas que no hablan inglés como su primer idioma; 不会说英语作为他们的第一语言的人): If you are an English language learner, please be aware of campus resources that can help you: the Writing Center (<http://writingcenter.utah.edu/>); the Writing Program (<http://writing-program.utah.edu>); and, the English Language Institute (<http://continue.utah.edu/eli>).

Grading: Assignments will typically be graded promptly through Canvas. Should grading be significantly delayed, the instructor will inform the students in class and/or through Canvas or email. For information on policies and percentages, see "Grading Policy" for more information.

Course Communication: The main form of communication for this class will be through Canvas by using the messaging system or via email at [thomasomillar@gmail.com](mailto:thomasomillar@gmail.com). You can use the Canvas messaging system by clicking on the inbox link in the top right corner of the Canvas course page and then composing a new message to the instructor. Assignments *must be* submitted through the Canvas assignment, not via email. If I know that you are having a problem, I can help you much better; please ask.

### **Grading Policy (Evaluation Methods & Criteria)**

Student work will be completed on time for full credit. Any late work that is completed and turned in within one week of the original due date will receive 75% of the score assigned to it. Any late work turned in after one week will receive 50% of its score. Due dates and times will be specified in class and/or on Canvas.

All group work will be graded based on individual (~75%) as well as group effort (~25%). The approximately 25% of the grade assigned to group work will be based on the instructor's impressions of the group's dynamic as well as feedback from each member of the group.

### *Grading Scale*

100 - 94% = A 93 - 90% = A-	Excellent performance, superior achievement (outstanding work)
89 - 87% = B+ 86 - 83% = B 82 - 80% = B-	Good performance, substantial achievement (work that is above average)
79 - 77% = C+ 76 - 73% = C 72 - 70% = C-	Standard performance and achievement (passing grade; work that meets the standard requirements in all aspects)
69 - 67% = D+ 66 - 63% = D 62 - 60% = D-	Substandard performance and achievement (not passing; work that meets the standard requirements in some aspects)
59% & below = E	Unsatisfactory performance and/or achievement (failed; work insufficient to merit any credit)

- 1. Final Group Projects and Presentations (Planning and Design)** **300**  
*225 points for individual work and 75 points for group's work*  
In small groups with diverse skills, students will build upon their mid-term group work by completing a final project that includes and improves on the planning pieces from the mid-term (plan writing, data analysis, GIS for a particular geography) and introducing accompanying and related design components (engineering, implementation, construction for a particular project) for an area or project selected by each group and approved by the instructor earlier in the semester. Projects will include digitally-prepared written and design components, interim reports, as well as a presentation to the class.
- 2. Mid-Term Group Projects and Presentations (Planning or Design)** **200**  
*150 points for individual work and 50 points for group's work*  
Similar to the final group projects, mid-term projects will include one half of the final project components and will focus on the planning side of both planning and design (required for the final group projects). This will allow the groups to follow an iterative planning and design process and allow more time to become comfortable with lesser-known design standards and processes. Projects will include digitally-prepared written or design components, interim reports, as well as a presentation to the class.
- 3. Online Reflections (OR) (12 total) – 25 points each** **300**  
These will act as your out of class homework, in addition to group project work. Reflections will be individual and personal, based on readings, observations, class discussions, videos, and other media and opportunities for learning. Each week will include one reflection. Each reflection may include multiple sources and required readings or visual learning opportunities. Students may be asked to share their online reflections as a short presentation at the beginning of class.
- 4. In-Class Discussion Participation** **125**  
12.5% of the overall course grade is dedicated to each pupil's participation in class, both with the instructor and with other students. Active participation in discussions, debates, and other small group activities will garner students full points. Not engaging in discussions, being distracted by or distracting with electronic or other devices, or distracting other students in any way will result in at least a partial loss of points.
- 5. In-Class "Minute Papers" (15 total) – 5 points each** **75**  
Students will complete index card "minute papers" at the end of nearly every class (except the mid-term and final group project presentation classes, 10/4 and 12/13). In these "minute papers", students will include what is important to them or what they learned, as well as what they didn't understand and/or what that the instructor can explain better next week. Index cards will not be provided and, in order to participate, students must bring their own index cards to class each week.

## Course Schedule, Selected Readings, and Assignments

*(All assigned readings and assignments to be completed **before** the corresponding week's class [see "Dates"; reading selection instructions and complete PDFs will be posted on Canvas])*

#	Class	Topics/Discussions	Dates	Selected Readings From...	Assignments
1	8/23	Introductions, Campus Walking Tour, Course Concepts, Material Overview, Land Use and Transportation Connections	8/16-8/23	- Syllabus	- Pre-course survey - Bring index cards - Assigned videos
2	8/30	Land Use (cont.), Public Health, Project Team Assignments	8/23-8/30	- "Planning and Policy Models for Pedestrian and Bicycle Friendly Communities in New York State" - Healthy Eating Active Living Cities Campaign "Be a City with Healthy Land Use Policies" - APA "Metrics for Planning Healthy Communities" - "Designed to Move: Active Cities"	- OR - Meet as groups; develop preliminary mid-term group project ideas
3	9/6	<i>Bicycle Tour and Field Work: meet at 349 South 200 East, SLC (4:30 – 6:00)</i>  Plan Writing, Formatting, Best of Plan Examples (6:00 – 7:00)	8/30-9/6	- "Denver Vision Zero Action Plan" - "Seattle Bicycle Master Plan" - "Salt Lake City Pedestrian & Bicycle Master Plan" - Atlanta Regional Commission "Walk, Bike, Thrive!"	- OR
4	9/13	Programs & Policies, Support Facilities	9/6-9/13	- ALR "Moving Toward Active Transportation: How Policies Can Encourage Walking and Bicycling" - USDOT "Encourage and Promote Safe Bicycling and Walking" Webpage - APBP "Essentials of Bike Parking"	- OR - Mid-term group project approval

5	9/20	Funding and Implementation Strategies  *Guest Instructor	9/13-9/20	- "Bicycle and Pedestrian Funding, Design, and Environmental Review: Addressing Common Misconceptions" - "Pedestrian and Bicycle Funding Opportunities: USDOT Transit, Highway, and Safety Funds" Table - Trailnet "Slow Your Street: A How-to Guide for Pop-up Traffic Calming" - People for Bikes "Quick Builds for Better Streets: A New Project Delivery Model for U.S. Cities"	- OR
6	9/27	Usage and Safety Data Collection and Interpretation; Economics, Benefits, Evaluation and Performance Measures, Preparation for Mid-Term Group Projects	9/20-9/27	- "Charles River Basin Pedestrian and Bicycle Study: Non-Motorized Bridge & Pathway User Counts" - SGA "Safer Streets, Stronger Economies" - NYCDOT "Measuring the Street: New Metrics for 21 <sup>st</sup> Century Streets" - SF Bicycle Coalition "Annual Report"	- OR - First draft of mid-term group projects (peer review)
7	10/4	<b>MID-TERM Group Project Presentations</b>	9/27-10/4	- No Reading	- Projects and presentations - Mid-term course survey
8	10/11	<b>FALL BREAK</b>	10/4-10/11	- No Reading	
9	10/18	Part 1: Design Standards, User Types (4 Types; 880 Cities)  *Guest Instructor	10/11-10/18	- FHWA "Road Diet Informational Guide" - NYCDOT "Street Design Manual" - NACTO <i>Urban Bikeway Design Guide</i> and <i>Urban Street Design Guide</i>	- OR - Meet as groups; develop preliminary final group project ideas
10	10/25	Part 2: Design Standards, User Types (4 Types; 880 Cities), Universities	10/18-10/25	- ADA & PROWAG - MUTCD Ch 9	- OR

11	11/1	"Best of" Infrastructure, Importance of Networks, Rural and Small Town Contexts	10/25-11/1	- FHWA "Noteworthy Local Policies That Support Safe and Complete Pedestrian and Bicycle Networks" - FHWA "Small Town and Rural Multimodal Networks" Guide	- OR - Final group project approval
12	11/8	Transportation Equity	11/1-11/8	- LAB "Engaging More Women in Bicycling" - WHO "Measuring the Age Friendliness of Cities: A Guide to Using Core Indicators"	- OR
13	11/15	Maintenance, Winter Climates, Walking Tour	11/8-11/15	- Minneapolis "Pedestrian and Bicycle Winter Maintenance Study" and "Supplemental Report on Sidewalk Snow and Ice Control" - Alta Planning + Design "Winter Bike Lane Maintenance"	- OR - First draft of final group projects (peer review)
14	11/22	<b>THANKSGIVING</b>	11/15-11/22	- No reading	
15	11/29	Transit Integration, Bike Share, First and Last Mile Connections	11/22-11/29	- UTA "First/Last Mile Strategies Study" - NACTO "Bringing Equitable Bike Share to Bedford-Stuyvesant"	- OR
16	12/6	Political Will and Processes, Preparation for Final Group Projects	11/29-12/6	- United States Conference of Mayors "New Menino Survey of Mayors Reveals Top Priorities for Cities Across the Country"	- OR
17	12/13	<b>FINAL Group Project Presentations</b>	12/6-12/13	- No Reading	- Projects and presentations

*Note: This syllabus is meant to serve as an outline and guide for our course. Please note that it may be modified with reasonable notice to you. The "Course Schedule, Selected Readings, and Assignments" section may also be modified to accommodate the needs of our class. Any changes will be announced in class and posted on Canvas in advance.*