University of Wisconsin at Madison Undergraduate Geography Colloquium (Geography 565) Fall Semester 2017

Instructor: Bill Gartner Office: 115D Science Hall Phone: 890-3816 Email: wgartner@wisc.edu Office Hours: Tu 2:30 - 3:30; W 1:00 - 2:00 Time: Tu Th 1:00-2:15 PM Place: 444 Science Hall Final: Public Presentation on Tuesday, Dec 12th Credits: 3 Class Number: 53330

Course Synopsis

The ultimate objective of this class is for you to produce a high quality final project that showcases your skills as a geographer to a potential employer or a graduate program. The Geography Undergraduate Colloquium will: (1) provide you with a format to apply various geographic theories, techniques, and practices; (2) help you acquire the skills necessary to design and implement a geographic research project in a group setting; (3) enhance your critical reasoning and analytical skills; (4) advance your knowledge of a specific geographic sub-field; and (5) further develop your written, oral, and visual communication skills. The Undergraduate Geographic Colloquium differs from most lecture classes in that participants will meet these objectives by designing and implementing an original research project. One often comes to appreciate the study of "earth as home" through geographic practice. This class provides you with that opportunity.

The Nature of Capstone Courses

The Geography Undergraduate Colloquium (Geography 565) is the capstone course for the major. Capstone courses provide a self-directed and integrated learning opportunity. However, they do not do so in the traditional sense as there is no systematic presentation of new theories, techniques, or topics. Rather, the capstone class is a vehicle for you to apply prior course work, knowledge, skills, and experiences to a geographic problem of your choosing. Thus, the capstone course is the culminating educational experience of your undergraduate career. Your capstone projects are also integral to departmental self-assessments. Your interests, knowledge, and skills are important to our program!

Research Groups and Class Projects

Participants will work in research groups consisting of 3 or 4 students throughout the semester. Each group will design and implement a geographic research project that centers on the collection and analysis of primary data. Primary data consists of a series of facts that are observed or collected directly from first-hand experience. Past research groups have generated primary data sets from observing people, observing places and landscapes, collecting stories (eg interviews and oral histories), conducting surveys, researching archival materials, performing textual or visual analysis, mapping, creating an original GIS layer, field sampling with laboratory analyses, and many other data collection techniques.

You may research any topic of geographic interest, although the project must be approved by the

instructor. Please keep in mind that the project must be completed in one semester.

Most final projects take the form of a written research paper, typically consisting of a paper with more than 50 pages of text plus figures, tables, bibliography, and appendices. You may also produce a digital project, such as an interactive map or documentary film, accompanied by a shorter written paper (see below).

Texts and Readings

There is no "cookbook" for geographic research and so there is no textbook for this class. All required and recommended readings are posted on *Canvas*. Please note that all projects, except for physical geography projects, must cite the following books in your literature review and your final paper:

Booth, Wayne C., Gregory G. Colomb, and Joseph M. Williams. 2008. *The Craft of Research, Third Edition*. Chicago : University of Chicago Press.

Clifford, Nicholas, Shaun French, and Gill Valentine, editors. 2010. *Key Methods in Geography, Second Edition*. Los Angeles: Sage.

Gregory, Derek, Ron Johnston, Geraldine Pratt, Michael Watts, and Sarah Whatmore, editors. 2009. *The Dictionary of Human Geography, Fifth Edition*. Chichester: Wiley-Blackwell.

In addition, you must cite the pertinent set of methodology papers posted on *Canvas* in both your literature review and your final papers. Please make an appointment with me if you are planning a physical geography project, as I have an alternate set of readings for physical geographers.

Assignments, Due Dates, and Grading

The department expects our undergraduates to construct valid geographic arguments and be able to present them in written, oral, and visual formats. Your grade, therefore, will be based on a series of writing assignments, oral presentations, and an original graphic that will be folded into your final project at the end of the semester. As detailed below, you will earn points individually and in conjunction with your research group.

Your final letter grade is determined by a computer algorithm, often termed "Jenks optimal breaks", that places students into groups based on the total number of points earned throughout the semester. The Jenks algorithm analyzes a histogram and places individuals into groups, or "bins", such that point variation within each group is minimized and the distance between bins is maximized on a number line. In a conventional lecture course, I set the Jenks algorithm to place individuals into one of seven bins that correspond to one of the seven conventional UW-Madison letter grades. One of the most gratifying aspects of teaching Geography 565 over the past few years, however, has been the excellence of our undergraduates and their projects.

Therefore, for Geography 565, the Jenks optimal breaks algorithm will place similar point scores into one of *three* groups. The group with the highest set of scores will have earned an "A" and the group with next highest set of scores will have earned an "AB". Typically, those in the third group will have earned a "B". However, anyone in the left-hand tail of the histogram will receive a grade of "BC" or less.

Student Peer Evaluations and the Adjustment of Final Grades

Teamwork is increasingly the norm in private and public sector employment. Group research projects foster the intellectual and social skills necessary for individuals to thrive in a collaborative environment. However, this is only true if everyone equitably contributes to the group project. Regardless of your point total, *individual grades may be significantly adjusted on the basis of student peer evaluations at the end of the semester*. In the past, I have raised or lowered individual grades by upwards of two full letter grades based on student peer evaluations that have aligned with my personal observations of an individual's performance.

Research Group Assignments

Most points earned throughout the semester are from assignments related to the group research project.

Group Project Assignments (200 Points)

I will provide guides and additional information for each major assignment below. All written assignments are graded for both content and style. Each individual assignment is a first draft of a section in your final paper. You are expected to edit and revise these sections for your final paper. The final paper must also have an abstract.

- (1) Project Research Question (20 pts) September 19th
- (2) Introduction, Literature Review, and Methods (40 pts) October 26th
- (3) Revised Introduction plus Data Results & Analysis (40 pts) November 21st
- (4) Final Paper with Abstract (100 pts) December 17th

The Writing Center (<u>http://www.writing.wisc.edu/</u>), located in Helen C White, and the Writer's Handbook (<u>http://www.writing.wisc.edu/Handbook/index.html</u>) are indispensable resources for this class. Consult them often.

Oral Presentations (75 points)

All research groups will make two 12-15 minute oral presentations: (1) an oral defense of the proposed project and (2) a public presentation of the final project. The proposed project defense is based on the introduction, literature review, methods sections of your group project. The final project presentation

will emphasize the results, analysis, and discussion sections of your project. Each research group will develop a rotation strategy so that every member is on stage for both presentations. Oral presentations are graded for both content and delivery.

- (1) Project Proposal Defense (25 pts) October 24th or 26th
- (2) Public Presentation of Project Results (50 pts) December 12th

Original Graphic (50 points total)

Every research group must produce an original graphic. Examples of original graphics include maps, drawings, line art, illustrations, graphs, diagrams, infographics or another visual medium approved by the instructor. Your original graphic will be graded on the basis of content and design. Since effective design is an iterative process, you are expected to document the design process for this assignment, as detailed in then assignment instructions. The UW Design Lab (<u>http://designlab.wisc.edu/)</u> in College Library is an excellent resource for graphic design

- (1) Original Graphic Draft November 14th
- (2) Original Graphic Final December 7th

Individual Assignments

In addition to the group research project, you will also earn points individually through exercises, attendance, and participation.

Exercises (50 points)

There are two individual exercises. While students will complete these assignments individually, your individual efforts can be incorporated into Group Project Assignment Two. I will provide detailed instructions for each exercise. Individual written assignments are graded for both content and style.

(1) Research Question and Theory Exercise (25 pts) - September 26th

(2) Annotated Bibliography Exercise (25 pts) - October 12th

Attendance and Participation (25 points)

Regular attendance and participation is expected. In order to accommodate the large number of projects, we have extended evening class periods during oral presentations. *Attendance is mandatory for all oral presentations*. Chronic absenteeism during class time will result in a lowered or failing grade for the course. You are also expected to share your research and your insights during class activity periods. Points for attendance and participation will be awarded as follows:

1) What is Geography? (5 pts) - September 5th

- 2) Project Topic Idea (5 pts) September 7th
- 3) Extended Class Time Attendance (15 pts total) October 24th and 26th, December 12th

Grading Summary

Your final grade is calculated by your relative rank with respect to your classmates. Ranks are calculated from the total number of points earned over the semester as follows:

| Final Project Assignments | 200 points |
|------------------------------|------------------|
| Oral Presentations | 75 points |
| Original Graphic | 50 points |
| Individual Exercises | 50 points |
| Attendance and Participation | <u>25 points</u> |

Total Possible Score: 400 Points

Again, final letter grades may be significantly modified on the basis of peer evaluations from your research group members.

Digital Capstone Projects

Students have produced digital products as part of their capstone projects, including documentary films, interactive maps, interactive websites, and original GIS layers. *All digital products must be accompanied by a written paper that includes a title, an abstract, an introduction, a literature review, and a conclusion.* The digital project itself generally substitutes for the data results and analysis section in a conventional written research paper. *All digital projects must address a research question and include an analysis of your primary data.* Digital projects that merely collect primary data are not satisfactory. Please note the following requirements for digital projects:

Interactive Map or Website: Your approach to the project should follow the general guidelines for the *Interactive Cartography & Geovisualization* course (Geography 575). Please submit a link to your interactive map or website, the source code, a section that documents and critiques all data sources, a section that documents the design principles and decision-making in your project, and screen-shots of the interface and the data results as part of your final paper. Please remember that your interactive map or website must address a research question and that you must answer the research question in the conclusion of your paper.

<u>Original GIS Layer</u>: Your approach to the project should follow the general guidelines for the *GIS Applications* course (Geography 578). All GIS projects must include an original GIS data layer as well as a conceptualization and implementation diagram. All GIS projects must incorporate qualitative and/or quantitative spatial analysis into the research design. <u>Film Documentary</u>: The weather changes all too quickly in Wisconsin and you should start shooting your stock footage immediately. Your project defense and paper should include a rough draft of a storyboard. Your final paper should include a final version of your storyboard and a 4-6 page script as well as screenshots from your film. You may use the storyboards for your original graphic. Do not underestimate the amount of time that is required for post-production editing! Please remember that your film must address a research question and that you must answer the research question in the conclusion of your paper and your film.

If you plan on producing a digital product, please make an appointment with me so that I can provide you with additional information and so that we can discuss the details of your project.

Additional Class Resources

You are strongly encouraged to take advantage of the following resources:

1) The Writing Center (<u>http://www.writing.wisc.edu/</u>) and the Writers Handbook (<u>http://www.writing.wisc.edu/Handbook/index.html</u>)

2) The UW Design Lab (<u>http://designlab.wisc.edu/</u>)

Note: I've listed these resources twice for a reason!!!!

Class Policies

* Readings, assignments, the class schedule, and any other component of the course may be amended by the instructor at any time.

* Chronic absenteeism may result in a lower or failing grade for the course at the discretion of the instructor.

* I will not accept late assignments unless you have an excused absence or made prior arrangements with me. I well understand the difficulties of balancing school, work, and family concerns. Please talk to me ahead of time if you have obligations that necessitate flexibility.

* There is no extra-credit.

* Academic misconduct, such as cheating or plagiarism, may result in a lower or failing grade for the course. A failing grade will be given to any plagiarized assignment. It is your responsibility to become familiar with the rules of academic misconduct, and your rights to due process, according to UW Administrative Code 14. Both an overview of academic misconduct and detailed information concerning UW Administrative Code, Chapter 14 are available at http://www.students.wisc.edu/doso/academic-integrity/

* If you need special accommodations or have a developmental disability, please contact me by phone, email, or come to my office. The McBurney Disability Resource Center provides resources for students with disabilities. Please see http://www.mcburney.wisc.edu/ or call 263-2741.

* The University of Wisconsin-Madison and the Department of Geography are dedicated to a safe, supportive and non-discriminatory learning environment. It is the responsibility of all students to familiarize themselves with University policies concerning special accommodations, misconduct, discrimination, sexual harassment, and disruptive behavior. For details, please see Chapter 14 of the UW Administrative Code cited above and the resources posted at the Office for Equity and Diversity website at http://www.oed.wisc.edu/.



Source: Watterson, Bill. 2012 (1989). The Complete Calvin and Hobbes, Book Two, page 324. Kansas City: Andrews McMeel Publishing.

| Week | Date | Class Schedule | Readings | |
|------|-------|--|---|--|
| 1 | 9/5 | No Class - Semester Starts 6 September | | |
| | 9/7 | What is Geography? | | |
| 2 | 9/12 | Group Formation & Project Topics | Booth et al 2008: 1-67; Clifford et al 2010: 3-15 | |
| | 9/14 | The Research Question: Theory and Method | Shaw et al 2010; Human Geography Dictionary: choice | |
| 3 | 9/19 | The Research Question: Theory and Method | Theory Readings: Choice | |
| | 9/21 | Research Ethics and CITI Certification | Clifford et al 2010: 35-48 | |
| 4 | 9/26 | Writing Literature Reviews | Booth et al 2008: 68-102; Clifford et al 2010: 16-34 | |
| | 9/28 | Primary Data Collection Methods I | Clifford et al 2010: choice | |
| 5 | 10/3 | Primary Data Collection Methods II | Methods Readings choice | |
| | 10/5 | Primary Data Collection Methods III | | |
| 6 | 10/10 | Primary Data Collection Methods IV | | |
| | 10/12 | Oral Presentations: A PowerPoint on PowerPoint | | |
| 7 | 10/17 | Interview and Survey Focus Group Presentations | Clifford et al 2010: 77-88 and 440-452. | |
| | 10/19 | Interview and Survey Focus Group Presentations | | |
| 8 | 10/24 | ** Proposal Defense ** | | |
| | 10/26 | ** Proposal Defense ** | | |
| 9 | 10/31 | No Class, Data Collection or Group Consult | | |
| | 11/2 | No Class, Data Collection or Group Consult | | |
| 10 | 11/7 | No Class, Data Collection or Group Consult | | |
| | 11/9 | No Class, Data Collection or Group Consult | | |
| 11 | 11/14 | Data Analysis I | Analysis Readings choice; Clifford et al 2010: choice | |
| | 11/16 | Data Analysis II | | |
| 12 | 11/21 | Data Analysis III | | |
| | 11/23 | No Class: Thanksgiving Recess | | |
| 13 | 11/28 | Geographic Arguments and Logical Fallacies | Booth <i>et al</i> 2008: 103-151 | |
| | 11/30 | Geographic Arguments and Logical Fallacies | Booth <i>et al</i> 2008: -171-270 | |
| 14 | 12/5 | Class Activity: Findings and Analysis | | |
| | 12/7 | Class Activity: Findings and Analysis | | |
| 15 | 12/12 | ** Final Presentations ** | | |

Class Schedule (**___** = Extended Evening Class Time)

| Week | Date | Assignment Due | Assignment Type | Points |
|------|-------|---|-----------------|---------------------|
| 1 | 9/5 | | | |
| | 9/7 | What is Geography? | Individual | 5 |
| 2 | 9/12 | Research Idea Board Post | Individual | 5 |
| | 9/14 | | | |
| 3 | 9/19 | Research Question & Group Frm | Group | 20 |
| | 9/21 | | | |
| 4 | 9/26 | RQ & Theory Exercise | Individual | 25 |
| | 9/28 | | | |
| 5 | 10/3 | | | |
| | 10/5 | | | |
| 6 | 10/10 | | | |
| | 10/12 | Annotated Bibliography | Individual | 25 |
| 7 | 10/17 | | | |
| | 10/19 | | | |
| 8 | 10/24 | Proposal Defense (Oral) | Group | 25 (+10 attendance) |
| | 10/26 | 1) Proposal Defense (Oral) 2) Paper: Intro, Lit Rev, Methods | Group | See above 40 |
| 9 | 10/31 | | | |
| | 11/2 | | | |
| 10 | 11/7 | | | |
| | 11/9 | | | |
| 11 | 11/14 | Original Graphic: Draft | Group | See below |
| | 11/16 | | | |
| 12 | 11/21 | Revised Intro, Data Results & Analysis | Group | 40 |
| | 11/23 | | | |
| 13 | 11/28 | | | |
| | 11/30 | | | |
| 14 | 12/5 | | | |
| | 12/7 | Original Graphic: Final | Group | 50 (includes draft) |
| 15 | 12/12 | Final Presentation (Oral) | Group | 50 (+5 attendance) |
| | 12/17 | Final Paper with Abstract | Group | 100 |