# HTI 305 Ethnography in Human-Computer Interaction Fall 2017 Syllabus

Class Time: Tuesdays and Thursdays 8:00-9:50 a.m. Class Location: A224 Science

Professor:

Katie Stern, MFA (call me Katie or Professor Stern) Office Phone: (715) 346-4145

Office Hours:

Mon. & Wed. 8:00-9:15 a.m.

Office Location: B239 Science Bldg.

Mon. & Wed. 11:00 a.m. - 12:30 p.m.

Email: kstern@uwsp.edu

Tuesdays 10:00-11:00 a.m.

Course Description: Observation, interviewing, and other research methods used in the User Experience project life cycle. Includes cognitive walkthroughs and development of personas, scenarios, and ethnographic approaches in Human-Computer Interaction.

Rationale and Need for This Course: The User Experience project life cycle is now the industry-standard process for designing and developing new devices that interact with humans; including computers, mobile devices, medical and industrial devices, and robotics. The first step of that life cycle is to develop an understanding of the needs of end user. This course is designed to teach industry-standard methods of interviewing and observing potential end users of new products considering those products' goals.

Most of this course will be taught face-to-face. The online component will consist of video reviews of interviews and observations conducted by students as part of larger assignments. These reviews can be completed online and asynchronously, giving all students the opportunity to learn from each other's interviewing/observing experiences. Having these skills will allow students to meet industry standards upon graduation from the HTI major.

**CNMT Department Program Competencies** 

Faculty members at UW-Stevens Point have developed a set of CNMT Department-wide program competencies that define the educational goals of any major within the CNMT Department. The faculty members teaching courses in the HTI major went further and defined the educational goals of graduates from the HTI Major. No single HTI course can cover all the HTI Major competencies, but together the required and elective courses within the major meet all the competencies.

# HTI Major Competencies:

Computing and New Media Technologies faculty members at UW-Stevens Point have developed a set of program competencies that define the educational goals of the CNMT Department and the HTI Major itself. No single HTI course can cover all the HTI Major competencies, but the combined courses within the major meet all these goals. This course is designed to help you meet the following HTI Major competencies:

- 1. Technical Knowledge & Skills: Achieve an industry-standard entry level of competence in tools and techniques used in human-technology interaction (aligns with Enduring Understandings #1-5 below)
- 2. Design Knowledge and Skills: Achieve an industry-standard level of knowledge and skills in humancentered design and assessment of digital media (aligns with Enduring Understandings #1 and 5 below)
- 3. Interdisciplinary Knowledge and Skills: Demonstrate an ability to contribute to, and act as the end user's advocate across, all disciplines involved in a professional digital development team (aligns with Enduring Understandings #1, 3, and 4 below)
- 4. Contextual Knowledge & Values: Demonstrate the ability to identify and shape digital artifact development based on human-centered cultural, technical, and ethical issues (aligns with Enduring Understandings #1, 2, 3, and 4 below)
- 5. Personal Communication Skills: Demonstrate industry-standard communication skills throughout all phases of the digital artifact development process; including research, stakeholder interactions, results presentations, and team problem solving in both distance and face-to-face environments (aligns with Enduring Understandings #1 and 2 below)

Enduring Understanding 1: Ethical practice of Participatory/Action Research supports the planning, development, and production of anything new, helping to ensure successful projects and save your client money.

### **Learning Outcomes for EU1:**

- Students will pass the CITL Institutional Research Board (IRB) Guideline requirements for the UW-Stevens Point campus before conducting interviews and observations during the first week of class.
- Students will become familiar with the requirements for conducting human research through the UW-Stevens Point campus, including the process for obtaining permissions for interviews, observations, and recordings.
- Students will compare the ideas of a client for a new or changing product with the results of their own Participatory/Action Research.

Enduring Understanding 2: Soft skills including professional conduct, active listening, and teamwork are highly valued in business settings.

# Learning Outcomes for EU 2:

- Students will take the Meyers-Briggs Personality Type Indicator (MBTI) personality assessment offered through the University and will meet with a certified MBTI counselor to review the results.
- Students will demonstrate an awareness of emotional intelligence by critiquing staged video interviews and determining the best action to take given the situation.
- Students will demonstrate professional-level conduct by attending class/offsite observations at the scheduled places and times and keep all interviews/observations confidential outside of this course's classroom settings.
- Students will visually read the body language of people in a training video and identify the emotion(s) being displayed by the people in that video. Students will demonstrate teamwork skills by role playing and/or documenting emotionally neutral responses to common teamwork issues

Enduring Understanding 3: Careful and purposeful visualization of ideas and information work together with text to help people more thoroughly grasp a concept.

## Learning Outcomes for EU 3:

- Students will create page layouts for personas and scenarios that meet industry standards and guidelines.
- Students will evaluate observations derived from ethnographic studies, identify touchpoints and possible challenges, and represent those issues in the visual/written form of personas and scenarios.
- These visual documents will become part of a report to the clients.

Enduring Understanding 4: Human research takes many forms and can be conducted both in person and online.

#### Learning Outcomes for EU 4:

- Students will become familiar with several styles of human research, including (but not restricted to) face-to-face observation, interviewing, online videos, and online surveys
- There are pros and cons to every form of human research. Students will demonstrate a basic understanding of the pros and cons of each of the research methods used during the semester.

Enduring Understanding 5: Even great design does not sell itself. Designers must have excellent selling and interpersonal skills backed with factual user analyst information for solid presentations.

## Learning Outcomes for EU 5:

- Students will become familiar with verbal and non-verbal skills used to lead and persuade people
- Students will report research findings to the professor and class with industry-standard verbal and nonverbal communication skills
- By the end of the semester, students will have developed recorded reports of their research for submission to the client
- All statements and recommendations will be backed up with user research findings/photographs/videos and, when appropriate, online/textbook references.
- Students will deliver personas and scenarios based on the research and prototypes previously completed.

TAKE NOTE: You MUST pass the CITI Certification by 8:00 a.m. Tuesday, Sept. 12th to remain in the class. Students who have not passed this certification by that date will be dropped from the class. CITI Certification – all individuals conducting human subject research projects reviewed by the UWSP IRB boards—including faculty, staff, students, affiliated personnel – will be required to successfully complete CITI's HSR basic course or show evidence of having done so elsewhere within the last 3 years. Information on the CITI program can be found at <a href="https://www.citiprogram.org/index.cfm?pageID=1">https://www.citiprogram.org/index.cfm?pageID=1</a>

For faculty, staff, and students who will be engaging in research that is **Social-Behavioral-Educational (SBE)** in nature, a total of 10 modules are now mandatory and the associated quizzes must be completed with a minimum score of 80%. A total of 2 supplemental modules must be selected and completed from 19 options, and the associated quizzes must be completed with a minimum score of 80%. It is requested that the supplemental modules selected correspond with the individual's research interests. There is 1 elective module available to complete, which is completely optional.

#### Camera Requirements:

- Students will be required to use a digital camera with video capabilities, or a video camera capable of taking still images, during the semester. A cell phone will do.
- The UWSP Help Desk in the basement of the LRC has cameras that can be checked out for 48 hours. Ask for cameras owned by the CNMT Department.

## Online and Listening Device Requirements:

- You will be assigned Lynda.com videos and other online tutorials to be completed online. Bring a listening device capable of being plugged into a USB port to every class.
- You may be required to take part in asynchronous online chats and discussions, and live online conferences during the semester. You will receive instruction in each of these activities.

## **Outside Activity Requirements:**

Students will be interviewing other students, faculty, and/or academic staff members this semester. This will require up to 10 hours of time outside of class. We will coordinate observation and interview times with clients, and those may take place during weekdays, evenings, or weekends. Students are not expected to miss other classes or work to attend these events.

#### **Grading Policy:**

Assignments will be graded according to the following criteria:

• TIMELINESS. This class is built around the concept that collaborating on projects and assignments is critical to the understanding of the User Experience project life cycle. Assignments must be available to be shared during class times. Assignments handed in any time later than the beginning of the class period it is due will result in a loss of 10% of the available points. Assignments handed in more than five weekdays late will not be graded.

- IRB Training. Students must pass the IRB training during the first full week of class. Students who have not completed this activity by 8:00 a.m. on Tuesday, Sept. 12<sup>th</sup> will not be allowed to continue in the class.
- Professional Conduct. Active, POSITIVE participation in discussions regarding student or client work. Harsh, negative comments about student work, clients/staff, or interviewees stated in or outside of class, written or verbal, online or offline, will not be tolerated, can result in a reduction of one full grade for your final semester grade, and may be reported to the Dean of Students for disciplinary action.
- Confidentiality. This semester you will be working with students, faculty, staff, and a community corporation (Skyward). It is imperative that you keep all correspondence within the confines of this class. There can be no discussion of the projects, interviews, or observation results outside of the class. Discussing the results of class activities outside the specified confines of this class can result in a grade of F for the semester, and/or additional disciplinary action by the UWSP Administration.
- Projects involving interviewing and observations will be assessed for depth of detail and analysis. You will
  find that taking careful notes and other documentation rewards you with higher grades for projects
  that involve interviews and observations. Assessment of interviews will also include evaluations of
  questions asked and follow-up information requested. Producing superficial, obvious observations will not
  be as highly rewarded.

#### Attendance

Because we meet only twice per week, attendance is very important. In the past, students who have skipped classes do not earn high (or even passing) grades because they aren't familiar with the standards and expectations of the professor. Be sure to keep up with assignment due dates.

# **Grading of Major Projects**

Projects will be graded according to the criteria set for each project. A grade criteria sheet will be made available to students when each project is announced. All projects will carry the same weight for grading. No single project will be any more valuable than other projects. If you don't hand in a project within the required period of time, you will receive a 20% drop in score for every weekday the project is late. Note that a grade of zero will severely affect your grade average! Projects handed in more than five weekdays late will not be graded.

The grading rubric for the course is as follows:

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Α
        = 94-100% of all available points.
       = 90-93.99%
A-
B+
       = 87-89.99\%
В
       = 84-86.99%
       = 81-83.99\%
B-
C+
       =78-80.99\%
C
       = 75-77.99%
       = 72-74.99%
C-
D
       =69-71.99\%
       = <69%
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#### Final Exam

The final exam for this course is 8:00-10:00 a.m. Monday, December 18<sup>th</sup> in A224 Science Building. All projects must be completed by the end of the final exam period.

# Student Academic Standards and Disciplinary Procedures

UWSP has specific guidelines regarding student rights and responsibilities in class and on campus explained at <a href="https://www.uwsp.edu/dos/Pages/Academic-Concerns%20for%20Students.aspx">https://www.uwsp.edu/dos/Pages/Academic-Concerns%20for%20Students.aspx</a>
Student academic standards and disciplinary procedures are explained at <a href="https://www.uwsp.edu/dos/Pages/Academic-Misconduct.aspx">https://www.uwsp.edu/dos/Pages/Academic-Misconduct.aspx</a> and <a href="https://www.uwsp.edu/dos/Documents/AcademicIntegrityBrochure.pdf">https://www.uwsp.edu/dos/Documents/AcademicIntegrityBrochure.pdf</a>

In an Emergency:

- In the event of a medical emergency, call 911 or use the red emergency phone located to the right of the pendulum in the 2nd floor hallway of the Science Building. Offer assistance if trained and willing to do so. Guide emergency responders to victim.
- In the event of a tornado warning, proceed to the lowest level interior room without window exposure on the first floor lavatory in the Science Building. If time or space do not allow, go to A224 or A225 Science Building or remain in the hallways around those classrooms. See <a href="http://www.uwsp.edu/rmgt/Pages/em/procedures/other/floor-plans.aspx">http://www.uwsp.edu/rmgt/Pages/em/procedures/other/floor-plans.aspx</a> for floor plans showing severe weather shelters on campus. Avoid wide-span rooms and buildings.
- In the event of a fire alarm, evacuate the building in a calm manner. Meet at the far end of the new science building currently under construction. The Ministry Medical Center will be across the street from where we would meet. Notify the professor or emergency command personnel of any missing individuals.
- Active Shooter Run/Escape, Hide, Fight. If trapped hide, lock doors, turn off lights, spread out and remain quiet. Follow instructions of emergency responders.
- Watch the Active Shooter video at: https://campus.uwsp.edu/sites/rmgt/campus/SitePages/Shots%20Fired%20-%20Lightning%20Strikes.aspx
- See UW-Stevens Point Emergency Management Plan at <a href="www.uwsp.edu/rmgt">www.uwsp.edu/rmgt</a> for details on all emergency response at UW-Stevens Point.

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**Disability Services** 

For information on **accommodations** available to students with disabilities, visit the Office of Disability Services in room 609 Learning Resource Center (715-346-3365) or their website: <a href="http://www.uwsp.edu/disability/Pages/default.aspx">http://www.uwsp.edu/disability/Pages/default.aspx</a>. The registration process is a complex and lengthy one (2-3 weeks). Start the process now by contacting Disability Services at 715-346-3365 or emailing <a href="mailto:datctr@uwsp.edu">datctr@uwsp.edu</a> and/or by completing the <a href="mailto:Request for Services.pdf">Request for Services.pdf</a>

Information on assistive technology can be found at: http://www.uwsp.edu/disability/Pages/assistiveTechnology.aspx

# **CNMT 100 CS Principles Schedule**

Fall 2017

	Unit 1	The Internet	
9/5/2017	1.1	Personal Innovations	
	1.2	Sending Binary Messages	
9/7/2017	1.3	Sending Binary Messages with the Internet Simulator	
	1.4	Number Systems	
9/12/2017	1.5	Binary Numbers	
	1.6	Sending Numbers	
9/14/2017	1.7	Encoding and Sending Formatted Text	
	1.8	The Internet is for Everyone	
9/19/2017	1.9	The Need for Addressing	
	1.10	Routers and Redundancy	
9/21/2017	1.11	Packets and Making a Reliable Internet	
	1.12	The Need for DNS	
9/28/2017	1.13	HTTP and Abstraction on the Internet	13
	1.14	Practice PT - The Internet and Society	
	Unit 2	Digital Information	
9/30/2017	2.1	Bytes and File Sizes	
9/30/2017	2.1	Text Compression	
10/5/2017	2.2	Encoding B&W Images	
10/5/2017	2.3 2.4	Encoding Color Images	
10/7/2017	2.5	Lossy Compression and File Formats	
10///2017	2.6	Practice PT - Encode an Experience	
10/12/2017	2.7	Introduction to Data	
10/12/2017	2.7	Finding Trends with Visualizations	
10/14/2017	2.9	Check Your Assumptions	
10/14/2017	2.10	Good and Bad Data Visualizations	
10/19/2017	2.10	Making Data Visualizations	
10/19/2017	2.11	Discover a Data Story	
10/21/2017	2.12	Cleaning Data	
10/21/2017	2.13	Creating Summary Tables	14
	2.14	Practice PT - Tell a Data Story	
	2.15	Fractice F1 - Tell a Data Story	
	Unit 3	Algorithms and Programming	
10/26/2017	3.1	The Need for Programming Languages	
	3.2	The Need for Algorithms	
10/28/2017	3.3	Creativity in Algorithms	
	3.4	Using Simple Commands	
11/2/2017	3.5	Creating Functions	
	3.6	Functions and Top-Down Design	
11/4/2017	3.7	APIs and Using Functions with Parameters	

	3.8	Creating Functions with Parameters	
11/9/2017	3.9	Looping and Random Numbers	9
	3.10	Practice PT - Design a Digital Scene	
	Unit 4	Big Data and Privacy	
11/11/2017	4.1	What is Big Data	
	4.2	Rapid Research - Data Innovations	
11/16/2017	4.3	Identifying People with Data	
	4.4	The Cost of Free	
11/18/2017	4.5	Simple Encryption	
	4.6	Encryption with Keys and Passwords	
11/23/2017	4.7	Public Key Cryptography	
	4.8	Rapid Research - Cybercrime	8
	4.9	Practice PT - Big Data and Cybersecurity Dilemmas	
	Unit 5	Building Apps	
11/30/2017	5.1	Introduction to Event-Driven Programming	
	5.2	Multi-Screen Apps	
12/2/2017	5.3	Building an App: Multi-Screen App	
	5.4	Controlling Memory with Variables	
12/7/2017	5.5	Building and App: Clicker Game	
	5.6	User Input and Strings	
12/9/2017	5.7	If-statements unplugged	
	5.8	Boolean Expressions and "if" Statements	
12/14/2017	5.9	"If-else-if" and Conditional Logic	
	5.10	Building an App: Color Sleuth	
12/16/2017	5.11	While Loops	
	5.12	Loops and Simulations	
	5.13	Introduction to Arrays	
	5.14	Processing Arrays	
12/16/2017	5.15	Functions with Return Values	
	5.16	Building an App: Canvas Painter	16
	5.17	Practice PT - Create Your Own App	
			60