

# PubH 6102, Section 320

Issues in Environmental and Occupational Health  
 Fall Semester 2018

## COURSE & CONTACT INFORMATION

**Credits:** 2 credits

**Meeting Day(s), Time, and Place:** This course is entirely web-based, delivered via Moodle at <http://moodle.umn.edu>.

**Course Dates:** September 4-December 12, 2018

Contact Type	Contact Information	Role	When to Contact
Instructor	Petrona Lee, PhD <a href="mailto:leex3143@umn.edu">leex3143@umn.edu</a> 612-625-2899	Primary instructor for this course	Questions or concerns about the class, course content, assignments, deadlines, etc.
Teaching Assistant	Yuka Ekyalongo <a href="mailto:yadat001@umn.edu">yadat001@umn.edu</a>  Julie Hottinger <a href="mailto:hott0004@umn.edu">hott0004@umn.edu</a>	Assigns grades and provides individual feedback on assignments and quizzes.	Questions or concerns about the class, assignments, deadlines, etc.
Technical Support	Technical support options are available on the SPH website. <a href="https://z.umn.edu/sphquickhelp">https://z.umn.edu/sphquickhelp</a>	Troubleshoots technical issues related to the course site or course content.	Technical issues with the course site, media, quizzes or assignments.

Please save this contact information to your computer or print it. That way, you can still contact us in the event that you have difficulty connecting to the Internet or accessing the syllabus.

### Communication in Online Courses

Communication is especially important in an online course. The course site announcement forums/discussions and email will be used to communicate with students. You are responsible for reading all course-related emails sent to your University email account and contacting us in a timely manner with any questions you may have. We strongly recommend that you check your U of M email daily. Our goal is to respond to emails within 24 hours, Monday-Friday (allow for additional time on weekends).

## COURSE DESCRIPTION

This course is an introduction to the field of Environmental and Occupational Health (EOH), the impact of environmental and occupational hazards on individuals and communities, both domestic and global, the approaches taken to address EOH issues at the community level, and the domestic and global challenges that must be overcome to ensure success in dealing with EOH issues. Students will be able to identify issues that fall under the caption of "Environmental Health", the role we as humans play in negatively modifying our environment, the challenges we face in undoing some of our imprints on the environment and that each one has a role in keeping planet earth a little better than we found it.

Students will review scientific literature to learn about interventions for environmental health problems, and practice identifying environmental health problems and interventions in their communities. The focus of this course will be on the interaction between humans and the environment and how this interaction affects human health.

## COURSE PREREQUISITES

Public health [MPH or MHA or certificate] student or health journalism MA major or nursing MS student or instr consent. NO CREDIT granted for ENV HEALTH major students or non-majors who have taken 6101.

## COURSE GOALS & OBJECTIVES

Upon completion of the course, students will be able to:

1. Articulate basic concepts in environmental health and public health, and convey an understanding of their value and importance to the public, policy makers, and other interested parties;
2. Identify major sources of environmental and occupational hazards, the ways in which humans are exposed to them, and the major human health effects from exposure to these hazards;
3. Describe the impact of environmental and occupational hazards on human population, in both developed and developing countries.
4. Discuss how intervention strategies such as education, engineering and enforcement may be implemented to prevent or minimize environmental and occupational hazards;
5. Discuss how various countries are addressing some of the major environmental and occupational health challenges.
6. Discuss local history, community demographics, cultural, political, and administrative issues, and their impact on environmental or occupational health issues and solutions;
7. Examine and evaluate the programs that are in place to address environmental and occupational health problems at the local (community or individual organization) level;
8. Analyze the nature of environmental and occupational health problems in broader context through systematic research using scientific literature, press sources, and consultations with key persons, organizations, and agencies.

## METHODS OF INSTRUCTION AND WORK EXPECTATIONS

### Students must:

1. Check the Course Outline/Weekly Schedule for due dates of assignments and online discussions;
2. It is crucial that all students work on the same lesson at the same time so that the conversations and lessons learned receive the widest audience among the enrolled students, i.e. it must be a simultaneously shared experience.
3. Follow the Course Outline/Weekly Schedule to ensure that all coursework is completed by the due dates. TAs may participate in the online discussions during the week that the discussion is due, and will document completion of assigned work. We will monitor your progress online throughout the semester.

Students are expected to complete assignments and ask questions and seek clarifications when topics or concepts are unclear.

### Communication

Students may email the course instructor or the teaching assistants. **All email correspondence between students and instructor about the course must be through the official University of Minnesota email system.** Emails to the TAs and Instructor will be answered within 24 hours, Monday-Friday. Emails on the weekends will take longer for a response. If you have an issue, please don't wait until the last minute to contact TAs or Instructor. In most cases you will get a response within 24 hours.

For all communications with your instructor or TA, **please add PUBH 6102** in the subject line. This gives your message top priority and for the instructor to know which class you are in.

Approximately 135 hours of student effort, on average, will be required for a student to achieve an average grade. Students will spend time reading online content and completing online activities (55 hours), reviewing online resources, and completing offline assignments (80 hours). The due dates of assignments will be indicated on the Course Outline/Weekly Schedule. It is the student's responsibility to check the Course Outline/Weekly Schedule and stay on schedule. **No individual notices will be sent to students regarding assignment due dates.**

### Evaluation Criteria

Your online assignment and quiz grades will be posted in the online grade book. Click on "**My Grades**" in the course tools section of the course home page to see your grades. **All quizzes, exams or activities must be completed by due dates as listed above, except where PREVIOUS permission has been given for alternative postings.**

All assignments, quizzes and exams should be completed by 11:55 pm (Central time) on the dates described in the Course Outline/Weekly Schedule.

### Assignments

The assignments are mini researches that allow you to use interactive maps, websites etc. to get deeper insights into each module. Some of these are fun activities that we hope will engage you while you learn. **The assignments have specific due dates (see Course Outline/Weekly Schedule below), and will be available throughout the entire semester.**

### Exams

The three exams for the course will be online. The exams for the course will be available for one week. *Specific dates are available in the Course Outline/Weekly Schedule below.* Exam 1 is based primarily on the Air, Water and Food lessons. Exam 2 is based primarily on the Land, Climate Change, Housing and Workplace lessons, and Exam 3 will be partly based on Pests, Infectious Diseases and Chronic Diseases, but may also require you to apply information learned from the entire course. You will be allowed **90 minutes** to

complete each exam.

The exam questions are multiple choice, true/false, matching and short answer, and short papers. You must complete the full exam in one session; you cannot start the exam, stop, and restart at a later time.

### **Extra Credit**

You may receive up to 10 points extra credit by writing a short paper on a current outbreak. You may do this at any time during the semester, but it must be turned in by due date listed below.

### **Professional Conduct**

Students are expected to perform as professionals. Please refrain from using profanity in any and all communications in this course. Any work that contains profanity shall not be graded and will be returned to be corrected. This will be counted as a missed assignment/quiz/paper, etc. The student will be allowed to re-do the work, however, if this is after the due date, it will be penalized as outlined in the syllabus.

### **Course Workload Expectations**

PubH 6102 is a 2 credit course. The University expects that for each credit, you will spend a minimum of three hours per week attending class or comparable online activity, reading, studying, completing assignments, etc. over the course of a 15-week term. Thus, this course requires approximately 90 hours of effort spread over the course of the term in order to earn an average grade.

This course is entirely online. Therefore, time you would otherwise be in class will be incorporated into work for the course in the form of online discussions, lectures, etc.

### **Technology**

You will use the following technology tools in this course. Please make yourself familiar with them. Training is available at <http://lynda.umn.edu> and <https://it.umn.edu/service-details/self-help-guides>

- *Email*
- *Word*
- *Internet browser*
- *Moodle*

### **Learning Community**

School of Public Health courses ask students to discuss frameworks, theory, policy, and more, often in the context of past and current events and policy debates. Many of our courses also ask students to work in teams or discussion groups. We do not come to our courses with identical backgrounds and experiences and building on what we already know about collaborating, listening, and engaging is critical to successful professional, academic, and scientific engagement with topics.

In this course, students are expected to engage with each other in respectful and thoughtful ways.

In group work, this can mean:

- Setting expectations with your groups about communication and response time during the first week of the semester (or as soon as groups are assigned) and contacting the TA or instructor if scheduling problems cannot be overcome.
- Setting clear deadlines and holding yourself and each other accountable.
- Determining the roles group members need to fulfill to successfully complete the project on time.
- Developing a rapport prior to beginning the project (what prior experience are you bringing to the project, what are your strengths as they apply to the project, what do you like to work on?)

In group discussion, this can mean:

- Respecting the identities and experiences of your classmates.
- Avoid broad statements and generalizations. Group discussions are another form of academic communication and responses to instructor questions in a group discussion are evaluated. Apply the same rigor to crafting discussion posts as you would for a paper.
- Consider your tone and language, especially when communicating in text format, as the lack of other cues can lead to misinterpretation.

Like other work in the course, all student to student communication is covered by the Student Conduct Code (<https://z.umn.edu/studentconduct>).

## COURSE TEXT & READINGS

The recommended text below can provide supplemental material to the learning modules. The text is not required, but is a valuable resource. The text can be obtained through online booksellers such as Amazon or Barnes and Noble. All other learning materials will be available online, through the course Moodle site.

- Our Global Environment: A Health Perspective, by Anne Nadakavukaren. The book is published by: Waveland Press, Inc., Long Grove, IL. 6th edition (2000) ISBN 1-57766-402-7 OR 7th edition (2011), ISBN 1-57766- 686-0.

It is good practice to use a citation manager to keep track of your readings. More information about citation managers is available at <https://www.lib.umn.edu/pim/citation>.

## COURSE OUTLINE/WEEKLY SCHEDULE

This course has specific deadlines. All coursework must be submitted via the course site before the date and time specified on the site. **Note: assignments are due by 11:55pm CST unless indicated otherwise.**

Week	Topic	Activities/Assignments
<b>Week 1</b> 9/4 – 9/9	<ul style="list-style-type: none"> <li>• Introduction</li> </ul>	<ul style="list-style-type: none"> <li>• Read <b>Syllabus</b> and <b>Getting Started and Finding Help</b></li> <li>• Familiarize yourself with the course and Moodle format</li> <li>• <b>Introduction Module</b></li> <li>• Complete Introductions post (<b>due 9/10</b>)</li> <li>• Begin <b>Definitions Journal Activity</b></li> </ul>
<b>Week 2</b> 9/10 – 9/16	<ul style="list-style-type: none"> <li>• Air</li> </ul>	<ul style="list-style-type: none"> <li>• <b>Air Module</b></li> <li>• Group Discussion: Air (<b>due 9/17</b>)</li> <li>• Individual Assignment: Air (<b>due 9/17</b>)</li> </ul>
<b>Week 3</b> 9/17 – 9/23	<ul style="list-style-type: none"> <li>• Water</li> </ul>	<ul style="list-style-type: none"> <li>• <b>Water Module</b></li> <li>• Group Discussion: Water (<b>due 9/24</b>)</li> <li>• Individual Assignment: Water (<b>due 9/24</b>)</li> </ul>
<b>Week 4</b> 9/24 – 9/30	<ul style="list-style-type: none"> <li>• Food</li> </ul>	<ul style="list-style-type: none"> <li>• <b>Food Module</b></li> <li>• Group Discussion: Food (<b>due 10/1</b>)</li> <li>• Individual Assignment: Food (<b>due 10/1</b>)</li> </ul>
<b>Week 5</b> 10/1 – 10/7	<ul style="list-style-type: none"> <li>• Exam 1</li> </ul>	<ul style="list-style-type: none"> <li>• <b>Exam 1</b> (covers Air, Water and Food Modules, <b>due 10/8</b>)</li> </ul>
<b>Week 6</b> 10/8 – 10/14	<ul style="list-style-type: none"> <li>• Land</li> </ul>	<ul style="list-style-type: none"> <li>• <b>Land Module</b></li> <li>• Group Discussion: Land (<b>due 10/15</b>)</li> <li>• Individual Assignment: Land (<b>due 10/15</b>)</li> </ul>
<b>Week 7</b> 10/15 – 10/21	<ul style="list-style-type: none"> <li>• Climate Change</li> </ul>	<ul style="list-style-type: none"> <li>• <b>Climate Change Module</b></li> <li>• Group Discussion: Climate Change (<b>due 10/22</b>)</li> <li>• Individual Assignment: Climate Change (<b>due 10/22</b>)</li> </ul>
<b>Week 8</b> 10/22 – 10/28	<ul style="list-style-type: none"> <li>• Housing</li> </ul>	<ul style="list-style-type: none"> <li>• <b>Housing Module</b></li> <li>• Group Discussion: Housing (<b>due 10/29</b>)</li> <li>• Individual Assignment: Housing (<b>due 10/29</b>)</li> </ul>
<b>Week 9</b> 10/29 – 11/4	<ul style="list-style-type: none"> <li>• Workplace</li> </ul>	<ul style="list-style-type: none"> <li>• <b>Workplace Module</b></li> <li>• Group Discussion: Workplace (<b>due 11/5</b>)</li> <li>• Individual Assignment: Workplace (<b>due 11/5</b>)</li> </ul>
<b>Week 10</b> 11/5 – 11/11	<ul style="list-style-type: none"> <li>• Exam 2</li> </ul>	<ul style="list-style-type: none"> <li>• <b>Exam 2</b> (covers Land, Climate Change, Housing and Workplace Modules, <b>due 11/12</b>)</li> </ul>
<b>Week 11</b> 11/12 – 11/18	<ul style="list-style-type: none"> <li>• Pests</li> </ul>	<ul style="list-style-type: none"> <li>• <b>Pests Module</b></li> <li>• Group Discussion: Pests (<b>due 11/19</b>)</li> <li>• Individual Assignment: Pests (<b>due 11/19</b>)</li> </ul>
<b>Week 12</b> 11/19 – 11/25	<ul style="list-style-type: none"> <li>• Environmental Determinants of Infectious Diseases</li> </ul>	<ul style="list-style-type: none"> <li>• <b>Infectious Diseases Module</b></li> <li>• Group Discussion: Infectious Diseases (<b>due 11/26</b>)</li> <li>• Individual Assignment: Infectious Diseases (<b>due 11/26</b>)</li> </ul>
<b>Week 13</b> 11/26 – 12/2	<ul style="list-style-type: none"> <li>• Environmental Determinants of Chronic Diseases</li> </ul>	<ul style="list-style-type: none"> <li>• <b>Chronic Diseases Module</b></li> <li>• Group Discussion: Chronic Diseases (<b>due 12/3</b>)</li> <li>• Individual Assignment: Chronic Diseases (<b>due 12/3</b>)</li> </ul>

<b>Week 14</b> 12/3 – 12/9	<ul style="list-style-type: none"><li>• <b>Current Issues</b></li></ul>	<ul style="list-style-type: none"><li>• For <b>Extra Credit</b>, write a short paper on a recent outbreak (due 12/10)</li></ul>
<b>Week 15</b> 12/10 – 12/16	<ul style="list-style-type: none"><li>• <b>Exam 3</b></li></ul>	<ul style="list-style-type: none"><li>• <b>Exam 3</b> (covers Pests, Infectious Diseases and Chronic Disease Modules, due 12/17)</li></ul>

## SPH AND UNIVERSITY POLICIES & RESOURCES

The School of Public Health maintains up-to-date information about resources available to students, as well as formal course policies, on our website at [www.sph.umn.edu/student-policies/](http://www.sph.umn.edu/student-policies/). Students are expected to read and understand all policy information available at this link and are encouraged to make use of the resources available.

The University of Minnesota has official policies, including but not limited to the following:

- Grade definitions
- Scholastic dishonesty
- Makeup work for legitimate absences
- Student conduct code
- Sexual harassment, sexual assault, stalking and relationship violence
- Equity, diversity, equal employment opportunity, and affirmative action
- Disability services
- Academic freedom and responsibility

Resources available for students include:

- Confidential mental health services
- Disability accommodations
- Housing and financial instability resources
- Technology help
- Academic support

## EVALUATION & GRADING

Grades will be determined by the following:

<b>Assignments and Quizzes</b>	<b>Points</b>	<b>Percent of Final Grade</b>
Introduction	10	2.5
Weekly group discussion assignments (10 assignments @ 10 points)	100	25.0
Definitions Journal Reflection	10	2.5
Weekly individual assignments (10 @ 10 points, drop 2 lowest)	80	20.0
Exam 1	70	17.5
Exam 2 Part 1 Exam 2 Part 2	20 40	15
Exam 3 Part 1 Exam 3 Part 2	20 50	17.5
Total points	400	100%
Current Issues Paper (Extra Credit)	10	

View the University's Uniform Grading Policy and Grading Rubric Resource at <https://z.umn.edu/gradingpolicy>

### Grading Scale

The University uses plus and minus grading on a 4.000 cumulative grade point scale in accordance with the following, and you can expect the grade lines to be drawn as follows:

<b>% In Class (Points)</b>	<b>Grade</b>	<b>GPA</b>
95 - 100% (380+ points)	A	4.000
90 - 94% (360-379 points)	A-	3.667
87 - 89% (348-359 points)	B+	3.333
83 - 86% (332-347 points)	B	3.000
80 - 82% (320-331 points)	B-	2.667
77 - 79% (308-319 points)	C+	2.333
73 - 76% (292-307 points)	C	2.000
70 - 72% (280-291 points)	C-	1.667
67 - 69% (268-279 points)	D+	1.333
60 - 66% (240-267 points)	D	1.000
< 60% (<240 points)	F	

- A = achievement that is outstanding relative to the level necessary to meet course requirements.
- B = achievement that is significantly above the level necessary to meet course requirements.
- C = achievement that meets the course requirements in every respect.
- D = achievement that is worthy of credit even though it fails to meet fully the course requirements.
- F = failure because work was either (1) completed but at a level of achievement that is not worthy of credit or (2) was not completed and there was no agreement between the instructor and the student that the student would be awarded an I (Incomplete).
- S = achievement that is satisfactory, which is equivalent to a C- or better
- N = achievement that is not satisfactory and signifies that the work was either 1) completed but at a level that is not worthy of credit, or 2) not completed and there was no agreement between the instructor and student that the student would receive an I (Incomplete).

Evaluation/Grading Policy	Evaluation/Grading Policy Description
<p><b>Scholastic Dishonesty, Plagiarism, Cheating, etc.</b></p>	<p>You are expected to do your own academic work and cite sources as necessary. Failing to do so is scholastic dishonesty. Scholastic dishonesty means plagiarizing; cheating on assignments or examinations; engaging in unauthorized collaboration on academic work; taking, acquiring, or using test materials without faculty permission; submitting false or incomplete records of academic achievement; acting alone or in cooperation with another to falsify records or to obtain dishonestly grades, honors, awards, or professional endorsement; altering, forging, or misusing a University academic record; or fabricating or falsifying data, research procedures, or data analysis (As defined in the Student Conduct Code). For additional information, please see <a href="https://z.umn.edu/dishonesty">https://z.umn.edu/dishonesty</a></p> <p>The Office for Student Conduct and Academic Integrity has compiled a useful list of Frequently Asked Questions pertaining to scholastic dishonesty: <a href="https://z.umn.edu/integrity">https://z.umn.edu/integrity</a>.</p> <p>If you have additional questions, please clarify with your instructor. Your instructor can respond to your specific questions regarding what would constitute scholastic dishonesty in the context of a particular class-e.g., whether collaboration on assignments is permitted, requirements and methods for citing sources, if electronic aids are permitted or prohibited during an exam.</p> <p>Indiana University offers a clear description of plagiarism and an online quiz to check your understanding (<a href="http://z.umn.edu/iuplagiarism">http://z.umn.edu/iuplagiarism</a>).</p>
<p><b>Late Assignments</b></p>	<p>In order to receive a passing grade (A, B, C, or S) all work must be completed and turned in no later than the due date assigned.</p> <p>You are responsible for checking the Course Outline/Weekly Schedule for exact due dates and times. <b>WORK WILL NOT BE ACCEPTED AFTER THE LAST DAY OF THE SEMESTER</b> except in extraordinary situations, and only with a prior written agreement between the instructor and the student!</p>
<p><b>Makeup Work for Legitimate Reasons</b></p>	<p>If you experience an extraordinary event that prevents you from completing coursework on time and you would like to make arrangements to make up your work, contact your instructor within 24 hours of the missed deadline if an event could not have been anticipated and at least 48 hours prior if it is anticipated. Per University policy, legitimate reasons for making up work may include:</p> <ul style="list-style-type: none"> <li>• illness</li> <li>• serious accident or personal injury</li> <li>• hospitalization</li> <li>• death or serious illness within the family</li> <li>• bereavement</li> <li>• religious observances</li> <li>• subpoenas</li> <li>• jury duty</li> <li>• military service</li> <li>• participation in intercollegiate athletic events</li> </ul> <p>Because this course is entirely online and all materials are available to students from the first day of the term, we expect students to plan accordingly if travels or access to internet will cause them to miss a deadline. Note that our deadlines are generally set for 11:55 p.m. CST, so traveling to a different time zone will require additional planning. Further, circumstances that qualify for making up missed work will be handled by the instructor on a case-by-case basis; they will always be considered but not always granted. For complete information, view the U of M's policy on Makeup Work for Legitimate Absences (<a href="http://z.umn.edu/sphmakeupwork">http://z.umn.edu/sphmakeupwork</a>).</p>
<p><b>Extra Credit</b></p>	<p>See above for extra credit Current Issues paper.</p>
<p><b>Saving &amp; Submitting Coursework</b></p>	<p><b>Documents that students submit are considered final;</b> students may not submit more than one version or draft of each assignment.</p>

**Technical Issues with  
Course Materials**

You are expected to submit all coursework on time and it is your responsibility to ensure that your work is submitted properly before the deadline.

If you experience technical difficulties while navigating through the course site or attempting to submit coursework:

- Go to Quick Help: <http://z.umn.edu/sphquickhelp>.
- Connect with the appropriate person or office within 30 minutes of the problem's occurrence.
  - Provide as much information as possible, so the tech team can best help you as soon as possible.
  - You can expect a response within 1-2 business days to help resolve the problem.

## CEPH COMPETENCIES

Competency	Learning Objectives	Assessment Strategies
<b>4. Interpret results of data analysis for public health research, policy of practice</b>	<ul style="list-style-type: none"> <li>Identify most relevant air pollutants and their respective sources</li> <li>Understand how occupational health issues are tracked</li> </ul>	<ol style="list-style-type: none"> <li>In-Class Activity: Compare air quality data from different cities, regions and countries and determine reasons for similarities and differences</li> <li>In-Class Activity: Describe the relevant sources of data used in tracking occupational health data, and evaluate their respective value in determining policy</li> </ol>
<b>6. Discuss the means by which structural bias, social inequities and racism undermine health and create challenges to achieving health equity at the organizational, community and societal levels</b>	<ul style="list-style-type: none"> <li>Define, for use during the semester, Global Health, Social Determinants of Health and Environmental Justice</li> <li>Apply the definition created at the beginning of class to determine the relevance of each of these terms to the daily topic</li> </ul>	<ol style="list-style-type: none"> <li>In-Class Activity: As a class propose and edit the definitions of these terms we will use during each week during the course</li> <li>In-Class Activity: Identify the way in which each of these terms is applicable to the topic of discussion</li> <li>Cornerstone Activity: Apply these terms in describing the Public Health successes and failures experienced in the Flint Water Crisis</li> </ol>
<b>12. Discuss multiple dimensions of the policy making process, including the role of ethics and evidence</b>	<ul style="list-style-type: none"> <li>Understand basic policy framework for providing a healthy working environment</li> </ul>	In-Class Activity: Describe the role that International/national governments, employers, unions and consumers have in determining labor policy
<b>13. Propose strategies to identify stakeholders and build coalitions and partnerships for influencing public health outcomes</b>	<ul style="list-style-type: none"> <li>Determine the appropriate entities responsible for controlling labor policies, and what power they wield</li> </ul>	In-Class Activity: Describe the role that International/national governments, employers, unions and consumers have in determining labor policy
<b>19. Communicate audience-appropriate public health content, both in writing and through oral presentation</b>	<ul style="list-style-type: none"> <li>Identify the major routes of transmission of infectious diseases, and the environmental factors controlling them.</li> </ul>	In-Class Activity: Write a tweet informing an audience you identify about the cause(s)/concern of an infectious disease
<b>22. Apply systems thinking tools to a public health issue</b>	<ul style="list-style-type: none"> <li>Determine factors controlling how we ensure an adequate supply of potable water</li> </ul>	In-Class Activity: Design a water supply for a rural village where the water must be carried from the source to the home by hand.