Course Syllabus

Classroom: Health Sciences D209 (directions)

Time: Wednesdays 1:30pm-2:20pm

Instructor: David Whitney, Biostatistics PhD student

- email: davidw19@uw.edu
- office hours: by appointment

Description: BIOST/STAT 111 is a one-credit (C/NC) lecture series designed to introduce undergraduate students to careers in Biostatistics and Statistics.

Selected topics will be presented by faculty and senior graduate student biostatisticians and statisticians from the University of Washington and local research institutions including the Fred Hutchinson Cancer Research Center (FHCRC). Some will lead you in activities designed to teach biostatistical or statistical concepts. Most will describe a research area where they have worked to solve a scientific or other problem. The lectures are intended to provide an overview of the varied nature of the field.

Learning Objectives: By the end of the course, students should be able to list, describe and discuss current issues and approaches to research and practice in Biostatistics/Statistics.

Grading: There are ten lectures/sessions in this course. A questionnaire including three questions will be given out at the beginning of each lecture, and will need to be handed back to the instructor at the end of the lecture. Satisfactory completion of a quiz requires at least two correct answers. To receive credit for this course, the student must satisfactorily complete at least 8 of the quizzes. This provides some leeway to compensate for a missed lecture should a student be unable to attend due to illness or otherwise. There are no exams for this course.

Policies: We encourage all students to actively participate in the lecture and to commit to showing respect to each other during lectures by avoiding behaviors that might be offensive or distracting to other in the room or to the speaker. With that in mind:

- plan to arrive on time (before the lecture begins);
- plan to attend the lecture until the end of the talk;
- avoid conversations with classmates when the speaker is presenting his/her work;
- turn off all cell phones or set them to vibrate before the lecture begins.

Access and Accommodations: Your experience in this class is important to me. If you have already established accommodations with Disability Resources for Students (DRS), please communicate your approved accommodations to me at your earliest convenience so we can discuss your needs in this course.

If you have not yet established services through DRS, but have a temporary health condition or permanent disability that requires accommodations (conditions include but not limited to; mental health, attention-
related, learning, vision, hearing, physical or health impacts), you are welcome to contact DRS at 206-543-8924 or uwdrs@uw.edu or disability.uw.edu. DRS offers resources and coordinates reasonable accommodations for students with disabilities and/or temporary health conditions. Reasonable accommodations are established through an interactive process between you, your instructor(s) and DRS. It is the policy and practice of the University of Washington to create inclusive and accessible learning environments consistent with federal and state law.

**Academic Integrity:** Students at the University of Washington (UW) are expected to maintain the highest standards of academic conduct, professional honesty, and personal integrity.

The UW School of Public Health (SPH) is committed to upholding standards of academic integrity consistent with the academic and professional communities of which it is a part. Plagiarism, cheating, and other misconduct are serious violations of the [University of Washington Student Conduct Code (WAC 478-121)](http://www.washington.edu/cssc/for-students/student-code-of-conduct/). We expect you to know and follow the university’s policies on cheating and plagiarism, and the [SPH Academic Integrity Policy](http://sph.washington.edu/students/academicintegrity/). Any suspected cases of academic misconduct will be handled according to University of Washington regulations. For more information, see the [University of Washington Community Standards and Student Conduct website](http://www.washington.edu/cssc/).

**Course Concerns:** If you have any concerns about the class or your instructor, please see me about these concerns as soon as possible. If you are not comfortable talking me or not satisfied with the response that you receive, you may contact the Department of Biostatistics Associate Director of Academic Affairs (biostgp@uw.edu). If you are still not satisfied with the response that you receive, you may contact the Department of Biostatistics Chair (bchair@uw.edu). You may also contact the Graduate School at G-1 Communications Building, by phone at 206-543-5139 or by email at raan@uw.edu.

**Tentative Schedule of Upcoming Speakers:** Please note that this schedule is subject to change at any time throughout the quarter. The second half of the lecture schedule will be posted shortly.

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<thead>
<tr>
<th>Week</th>
<th>Date</th>
<th>Speaker</th>
<th>Topic</th>
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<tbody>
<tr>
<td>1</td>
<td>3/28</td>
<td>David Whitney</td>
<td>PhD Student, Biostatistics</td>
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<tr>
<td></td>
<td></td>
<td></td>
<td>Course introduction and some concepts in applied statistics</td>
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<tr>
<td>2</td>
<td>4/4</td>
<td>Johanna Lampe</td>
<td>Full Member and Associate Division Director, FHCRC</td>
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<td>Studying the complexities of diet-cancer connections</td>
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<tr>
<td>3</td>
<td>4/11</td>
<td>Phuong Vu</td>
<td>Biostatistical research in air pollution studies</td>
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Katherine Tan

**PhD candidate, Biostatistics**

4/18

Using machine-learning on radiology reports to help understand low back pain

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Jim Hughes

**Professor, Biostatistics**

4/25

The story of circumcision and HIV

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Timothy Thornton

**Professor, Biostatistics**

5/2

Leveraging ancestry in genetic association studies for new insights in human health

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Mauricio Sadinle

**Assistant Professor, Biostatistics**

5/9

Population Size Estimation of Human Rights Violations

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Arjun Sondhi

**PhD Student, Biostatistics**

5/16

To be announced

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Arend Voorman

**Bill & Melinda Gates Foundation**

5/23

The Global Polio Eradication Initiative

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David Whitney

**PhD Student, Biostatistics**

5/30

Course review & discussion

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**Course Summary:**
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<thead>
<tr>
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<th>Details</th>
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<td>Lecture 1 in-class quiz  (<a href="https://canvas.uw.edu/courses/1130137/assignments/4185342">https://canvas.uw.edu/courses/1130137/assignments/4185342</a>)</td>
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