

COURSE OUTLINE: POPULATION HEALTH

Course coordinator: Maarten Bijlsma

Instructor: Various

Start date: November 16, 2020

End date: November 27, 2020

Location: Online Course. Link tba

Course description

This two-week course introduces key substantive and methodological topics in population health. Each week will start with three lectures on substantive areas, and end with two lectures on methodological approaches and innovations. Substantive areas include mortality trends, differentials by socio-economic status, early life influences on adult health, and health behaviors. Methodological lectures cover methods for estimating or assessing causal effects, multistate modeling and advances in forecasting.

Organization

The course will be offered online. Each day covers one topic, and is taught by an expert in that specific topic. The format of the lecture day varies depending on the topic and the instructor. Each day, the lectures are held as a live session, or a pre-recorded lecture is offered for the specific topic, or both. Pre-recorded lectures will be made available at least 48 hours before the corresponding live session. In general, students should expect to spend about 6-8 hours per day on the course (lectures, discussions, readings, exercises).

Detailed Schedule

Week 1

16 Nov: Live Session 16:00-20:00 CET

Instructor: Enrique Acosta

Topic: Mortality trends

17 Nov: Live Session 16:00-20:00 CET

Instructor: Mine Kuehn

Topic: Family and health

18 Nov: Live Session 16:00-20:00 CET

Instructor: Jo Mhairi Hale

Topic: Intersectionality, cumulative disadvantage, & health

19 Nov: Live session 16:00-19:00 CET

Instructor: Christina Bohk-Ewald

Topic: Forecasting mortality

20 Nov: Live session 16:00-20:00 CET

Instructor: Tim Riffe

Topic: Health expectancies and multistate modeling

Week 2

23 Nov: Live session 16:00-20:00 CET

Instructor: Nicolas Todd

Topic: Early life exposures and health

24 Nov: Pre-recorded lecture and live session 16:00-17:00 CET

Instructor: Joshua Wilde

Topic: Population health in low and middle-income countries

25 Nov: Pre-recorded lecture and live session 18:00-19:00 CET

Instructor: Yana Vierboom

Topic: Health behaviors

26 Nov: Pre-recorded lecture and live session 16:00-20:00 CET

Instructor: Peter Eibich

Topic: Causality I: Conditioning on unobservables

27 Nov: Live session 16:00-20:00 CET

Instructor: Maarten Bijlsma

Topic: Causality II: Conditioning on observables

Course prerequisites

Some lectures may include a lab component. Students are expected to have basic knowledge of R and Stata. Participants need a laptop or desktop computer with the latest versions of R and RStudio installed. Instructions on how to download and install R can be found in “A (very) short introduction to R” by Torfs and Brauer (2014):

<https://cran.r-project.org/doc/contrib/Torfs+Brauer-Short-R-Intro.pdf>.

If you don't have sufficient knowledge about R, you can use the following websites to familiarize yourself with the program:

<https://swirlstats.com>

<https://www.coursera.org/course/rprog>.

<https://stats.idre.ucla.edu/r/>

Examination

There will be no final exam at the end of the course. Students will be graded based on attendance and active participation in all seminars.

General readings

To be announced. Instructors will typically assign one or two core readings, and several optional readings to develop a deeper understanding of the topic. The readings will be made available with the course materials.