AS.280 (PUBLIC HEALTH STUDIES)

Courses

AS.280.101. Introduction to Public Health. 4 Credits.
This course provides an overview of the field of public health. Topics include the major causes of morbidity and mortality; the socioeconomic, behavioral, and environmental factors that affect health; the analytical methods used in the field; the role of government in protecting the public's health; key features of the U.S. health care system; and current challenges in the field. The course also introduces students to the basic conceptual models and approaches that are central to public health practice. This course is restricted to freshmen. Your enrollment may be withdrawn at the discretion of the instructor if you don't meet one of those criteria.
Distribution Area: Social and Behavioral Sciences
AS Foundational Abilities: Writing and Communication (FA1), Citizens and Society (FA4)
Writing Intensive

AS.280.120. Lectures on Public Health and Wellbeing in Baltimore. 1 Credit.
An introduction to Urban Health with Baltimore as a case study: wellbeing, nutrition, education, violence and city-wide geographic variation. Lectures by JH Faculty, local government/service providers and advocates.
Prerequisite(s): Students who have taken AS.280.320 are not eligible to take AS.280.120.
Distribution Area: Social and Behavioral Sciences
AS Foundational Abilities: Citizens and Society (FA4)

AS.280.140. Social Inequality and the Public's Health. 1 Credit.
In epidemiology, public health scientists use quantitative and analytic tools examine to the distribution of disease across the population and to identify the various factors that shape these patterns. This course will explore how epidemiologic tools can be used to interrogate the social and structural factors that create health disparities in society. Students will learn about key social determinants of health (including class, race, and gender), the various pathways by which social experiences "get under the skin" to impact physiologic disease states, and how epidemiologists investigate these processes through population-based research. Students will leave the course with an understanding of the ways public health professionals and community members alike can use this public health research to develop policies and programs that protect the health of vulnerable groups and reduce inequality.
Distribution Area: Quantitative and Mathematical Sciences, Social and Behavioral Sciences
AS Foundational Abilities: Citizens and Society (FA4), Ethics and Foundations (FA5)

AS.280.161. Applications of Biological Concepts in Public Health. 3 Credits.
This course explores the basic biology concepts relevant to public health. Case studies will be used to examine key scientific principles and their application. This course is designed for public health students who are not intending to pursue a career in natural sciences or medicine. This course satisfies the Public Health Studies Biology requirement, but does not satisfy Pre-Med requirement. All freshman must have taken or be currently enrolled in AS.280.101 to register. Department Approval Required.
Prerequisite(s): AS.020.151
Distribution Area: Natural Sciences
AS Foundational Abilities: Writing and Communication (FA1), Science and Data (FA2), Projects and Methods (FA6)
Writing Intensive

AS.280.225. Population, Health and Development. 3 Credits.
This course will cover the major world population changes in the past century as well as the contemporary situation and projections for this century. Topics include rapid population growth, the historical and continuing decline of death and birth rates, contraceptive methods as well as family planning and child survival programs, population aging, urbanization, population and the environment and the demographic effects of HIV/AIDS and Covid.
Distribution Area: Social and Behavioral Sciences
AS Foundational Abilities: Citizens and Society (FA4), Ethics and Foundations (FA5)

AS.280.314. Truth, Evidence, and Influence: Case Studies in Public Health. 3 Credits.
This course examines the roles of science, media, politics and business in our society and explores how these spheres interact to influence our health. We will develop a conceptual framework that illustrates these relationships by analyzing historical and current case studies in public health, including HIV/AIDS, COVID-19, gun violence, climate change, and the opioid epidemic. We will discuss the nature of "evidence" and how it is used by various entities and actors to advance their interests, sometimes obscuring the truth. Students will write reflections on course materials, participate in classroom discussion, and undertake independent and group projects.
Prerequisite(s): AS.280.101; AS.280.350
Distribution Area: Social and Behavioral Sciences
AS Foundational Abilities: Citizens and Society (FA4), Democracy (FA4.1), Ethics and Foundations (FA5)

AS.280.320. Seminar on Public Health and Well-being in Baltimore. 3 Credits.
This course presents a perspective on changing the health and wellbeing of residents of Baltimore and those who work in Baltimore. Seminar combines lectures from AS.280.120 with additional readings and discussion to more deeply address urban health issues. The course will allow students to develop fellowship or project proposals and/or to focus course reports on work they are doing or would like to do related to health and wellbeing. If you register for this course do NOT register for AS.280.120.
Prerequisite(s): Students who have taken AS.280.120 are not eligible to take AS.280.320.
Distribution Area: Social and Behavioral Sciences
AS Foundational Abilities: Citizens and Society (FA4)
This course will focus on mind-body practices and their place in public health. We will learn about different mind-body practices and talk about it/how mind-body practices can help ameliorate the national burden of disease. We will also learn how to identify evidence based practices (EBPs) in public health and learn the core components of designing EBPs. We will then combine what we learned about mind-body practices and designing EBPs to create programs that lessen the burden of disease. The mind-body portion of this course is experiential and will include the practice of meditation, yoga, other mindfulness exercises. You will also be asked to reflect on these practices through journaling.
Prerequisite(s): AS.280.101
Distribution Area: Natural Sciences
AS Foundational Abilities: Citizens and Society (FA4), Ethics and Foundations (FA5)

AS.280.335. The Environment and Your Health. 3 Credits.
This course surveys the basic concepts underlying environmental health sciences (toxicology, exposure assessment, risk assessment), current public health issues (air, water- and food-borne diseases) and global health threats (climate change, designing healthy communities, and environmental justice).
Prerequisite(s): AS.280.101 OR AS.270.103
Distribution Area: Natural Sciences
AS Foundational Abilities: Science and Data (FA2), Projects and Methods (FA6)

AS.280.336. HIV/AIDS Policy, Politics and Ordinary Lives in Southern Africa. 3 Credits.
Distribution Area: Social and Behavioral Sciences
AS Foundational Abilities: Culture and Aesthetics (FA3), Citizens and Society (FA4)

AS.280.337. Community Partnership: Theory and Engagement. 3 Credits.
Distribution Area: Social and Behavioral Sciences
AS Foundational Abilities: Culture and Aesthetics (FA3), Citizens and Society (FA4)

AS.280.340. Fundamentals of Health Policy & Management. 3 Credits.
Through lectures and small group discussions, students will develop a framework for analyzing health care policy problems and gain familiarity with current issues including managed care, Medicare and the uninsured. Public Health Studies majors have first priority for enrollment. Your enrollment may be withdrawn at the discretion of the PHS if you are not a PHS major.
Prerequisite(s): AS.280.101
Distribution Area: Social and Behavioral Sciences
AS Foundational Abilities: Citizens and Society (FA4), Ethics and Foundations (FA5)

AS.280.345. Public Health Biostatistics. 4 Credits.
Using problem-based learning focusing on public health topics, students learn to describe & summarize data, make inferences regarding population parameters, & test hypotheses. Recommended Course Background: Four years of high school math.
Prerequisite(s): Statistics Sequence restriction - Students who have completed any of these courses may not register: EN.553.211 OR EN.553.230 OR EN.553.310 OR EN.553.311 OR EN.553.420 OR EN.553.421 OR EN.553.430 OR EN.553.413
Distribution Area: Quantitative and Mathematical Sciences
AS Foundational Abilities: Science and Data (FA2)

AS.280.346. Introduction to R Programming for Public Health. 1 Credit.
Formerly known as Advanced Biostatistics Laboratory, a complementary course to 280.345, Public Health Biostatistics, this course teaches R programming skills necessary for conducting independent data analyses, beyond those presented in the main course. No programming experience is necessary, but a willingness to learn independently and work with other students is indispensable.
Prerequisite(s): AS.280.345
Distribution Area: Quantitative and Mathematical Sciences
AS Foundational Abilities: Science and Data (FA2)

AS.280.347. Health Data Analysis Practicum. 3 Credits.
Students will learn to formulate precise scientific and policy questions, design exploratory and confirmatory statistical analyses to address the questions, conduct appropriate analyses using the statistical package R, and communicate their findings through graphical and tabular displays that are presented in writing and in person. The course will be run in a seminar style in which students conduct data analysis to present to one another in one meeting per week. Evaluation will be through class participation and a final project in which students will analyze their own data set to address a question of their choice. Students need to have taken an introductory statistics course at the level of AS.280.345 (Public Health Biostatistics) and must have some experience using the statistical software R to perform basic analyses.
Distribution Area: Quantitative and Mathematical Sciences
AS Foundational Abilities: Science and Data (FA2)

AS.280.350. Fundamentals of Epidemiology. 4 Credits.
A practical introduction to epidemiology focusing on the principles and methods of examining the distribution and determinants of disease morbidity and mortality in human populations.
Prerequisite(s): AS.280.101
Distribution Area: Quantitative and Mathematical Sciences
AS Foundational Abilities: Science and Data (FA2)

AS.280.355. Introduction to Social and Behavioral Determinants of Health. 3 Credits.
Introduces students to a social ecological perspective of population health; Explains key theories and models of health behavior; Describes social and behavioral factors affecting health outcomes; Illustrates the role of factors such as racism, income inequality, social norms, culture, communication and psychological constructs in health outcomes; Demonstrates applications of these theories and models in health behavior research and intervention.
Prerequisite(s): AS.280.101
Distribution Area: Social and Behavioral Sciences
AS Foundational Abilities: Citizens and Society (FA4), Ethics and Foundations (FA5)

AS.280.365. Public Policy, Politics and Public Health. 3 Credits.
This course is composed of lectures on issues that impact the arena of public health and public policy, viewed through a health equity lens. With real-life examples of public health and public policy issues and practices in Baltimore and around the country, this course will provide real-life experiences in the fields of public health and public policy. Throughout the course a major effort will also be made to expose students to the wide array of opportunities that are available to those pursuing a career in public health.
Prerequisite(s): AS.280.101
Distribution Area: Social and Behavioral Sciences
AS Foundational Abilities: Citizens and Society (FA4), Ethics and Foundations (FA5)
**AS.280.366. Politics and Public Health. 3 Credits.**
This course will examine the role of politics in Public Health. It will cover the legislative process at the local, state and federal level, as well as the role of the executive branch/administrative agencies in implementing new policies. The course will also discuss ways that those involved in the public health arena can influence legislation, policy and budgets as part of the political process.

**Prerequisite(s):** AS.280.101
Distribution Area: Social and Behavioral Sciences
AS Foundational Abilities: Citizens and Society (FA4), Ethics and Foundations (FA5)

**AS.280.379. Designing the Future: Health and Aging. 3 Credits.**
Designing the Future: Health and Aging is a course developed for students with a multidisciplinary and/or public health background and interest who are eager to learn new approaches that can be applied in a variety of settings. Students will be introduced to an overview of the public health impact of an aging society as well as design frameworks and methods (i.e. human centered design, co-design, social design) that can be applied to deal with complex problems impacting health and aging. They will apply parts of design frameworks to public health issues and explore purpose-driven innovations that integrate considerations of community-based and service learning and user experiences. Between group projects that include community partners and individual work, students will be involved in diverse activities including engaging in basic research (primary and secondary data collection and review), reframing problems, ideation or collective brainstorming and developing and testing concept prototypes. Grades are based on class participation, completion of group project, group presentation and papers.

**Prerequisite(s):** Students who are enrolled in or have taken AS.280.389 cannot take AS.280.379.; AS.280.101 must be completed prior to registering for AS.280.379.
Distribution Area: Social and Behavioral Sciences
AS Foundational Abilities: Citizens and Society (FA4)

**AS.280.380. Global Health Principles and Practices. 3 Credits.**
Global health addresses the staggering global disparities in health status, drawing on epidemiology, demography, anthropology, economics, international relations and other disciplines. We review patterns of mortality, morbidity and disability in low and middle income countries, starting with malnutrition, infectious diseases and reproductive health, and continuing to an emerging agenda including mental health, injury prevention, surgical care, chronic diseases, and health impacts of climate change. Gender, health systems and health workforce challenges, and career trajectories in global health are also discussed. Recommended course background: Minimum of one prior course in Public Health.
Distribution Area: Social and Behavioral Sciences
AS Foundational Abilities: Citizens and Society (FA4)

**AS.280.389. Medicine for the Greater Good: Community Engagement's Role in Health Systems. 3 Credits.**
The goal of this course is to introduce students to the importance and value of partnerships between medical/health institutions and community organizations to improve community and neighborhood health outcomes. This course will discuss how community engagement can assist in population health concerns and challenges faced in clinical settings through the promotion of community health. Discussed through the viewpoints of a health system and clinician, the how and why of community engagement will be explored, centering on how to create a medical-community relationship, executing engagements and projects, and measuring vital outcomes to reaffirm these partnerships’ significance. This course will combine lectures, class discussions, and services learning. Students, in teams, will complete 40 hours of service learning outside of class time for a community-based organization. This course qualifies as a PHS Upper Level Elective. Students cannot register for this course and AS.280.379.

**Prerequisite(s):** Students who took or are taking AS.280.379 are not permitted to take AS.280.389.; AS.280.101 must be completed prior to registering for AS.280.389.
Distribution Area: Social and Behavioral Sciences
AS Foundational Abilities: Citizens and Society (FA4), Ethics and Foundations (FA5)

**AS.280.390. Power, Positionality, and Social Change: Theories and Methods of Community Partnerships. 3 Credits.**
In this course, students will discuss the importance of history, contexts, and structures of power that influence community partnerships addressing social determinants of health. We will explore sociological, educational, and organizational theories and methodologies to frame community engagement practices that center community voices and redistribute power dynamics in partnerships aimed at improving community health. This course is valuable to students who want to prepare themselves for engaging communities collaboratively, through anti-oppressive lenses. By the course’s conclusion, students should have an understanding of how to account for and address the systems, history, and positions of power that affect the success and anti-oppressive outcomes of community projects that address social determinants of health.

**Prerequisite(s):** AS.280.101
Distribution Area: Social and Behavioral Sciences
AS Foundational Abilities: Citizens and Society (FA4), Democracy (FA4.1)

**AS.280.399. Service-Learning in Baltimore for Community Health, Justice and Well-Being. 3 Credits.**
This course introduces students to a social structural, justice orientation to public health, with an emphasis on service learning in Baltimore City. Through lectures, class discussions, reflection practices and experiential learning, students will gain an understanding of education, healthcare, housing and other sectors as social determinants of health. The course draws on a social ecological framework and highlights the role of relationships and policies in impacting community resources foundational to health and well-being. Students will choose a community-based organization according to their interests and schedule and, working in teams, complete 45 hours of service-based learning. Grades are based on class participation, completion of a service learning project, group presentation, and papers. Open to Junior Public Health Studies majors and, space permitting, to others upon permission of instructor. This course qualifies as a PHS upper elective; however, it does not satisfy the PHS Applied Experience requirement.
Distribution Area: Social and Behavioral Sciences
AS Foundational Abilities: Citizens and Society (FA4)
AS.280.472. Sex and Syndemics. 3 Credits.
This course delves into the interplay between intimacy, sexual health, stigma, syndemics, STIs, and vulnerable populations, with a special emphasis on LGBTQ+ communities in the United States. Syndemics, the co-occurrence of multiple health problems, interact synergistically within specific social contexts, magnifying their impact. Through a comprehensive exploration of epidemiological principles, research methods, and case studies, students will gain a deep understanding of the challenges faced by communities in optimizing their sexual health. This is a Gordis Teaching Fellowship course. Priority registration is given to Public Health Studies majors. Other students will be permitted to register as space allows. 
Prerequisite(s): AS.280.350
Distribution Area: Quantitative and Mathematical Sciences, Social and Behavioral Sciences
AS Foundational Abilities: Science and Data (FA2), Citizens and Society (FA4)

AS.280.473. Access to Essential and Emerging Health Technologies in Low and Middle-Income Countries. 3 Credits.
This course introduces students to different actors in the access to medicine ecosystem and mechanisms by which health technologies like medicines, vaccines, and diagnostics can be made more available to individuals in low- and middle-income countries (LMICs). Students will learn how health technologies are developed and examine case studies for expanding access to pharmaceutical products including through pricing techniques, licensing, and expanding local manufacturing capacity. Using this knowledge, they will develop the tools to make stakeholder-specific recommendations aimed at making health technologies more accessible in LMICs, culminating in a final policy memo and presentation. The intention of this course is not to make students in the topics covered in each session—all of which could comprise their own course or series of courses—but rather to increase competency across a range of topics and actors to help students envision where they may fit in the access to medicine space. This is a Gordis Teaching Fellowship course. Priority registration is given to Public Health Studies majors. Other students will be permitted to register as space allows.
Prerequisite(s): AS.280.340
Distribution Area: Social and Behavioral Sciences
AS Foundational Abilities: Citizens and Society (FA4)

AS.280.474. A Consultation: Assessing the Value of Public Health Intervention. 3 Credits.
Health systems are built on healthcare services and public health interventions designed, funded, and implemented by a myriad of actors, from governments to multilateral organizations and NGOs. These stakeholders of the system regularly assess whether a new program or intervention, fueled by technological or knowledge advances, is a worthwhile investment. They must weigh the benefits, costs, and relevance of a new program against other health programs, but also against other societal investments such as education and infrastructure. Funding, people, and time are limited: health programs must be evaluated, compared, and prioritized. This course will ask students to act as consultants hired by a government or a private organization, to comprehensively evaluate a public health intervention. They will be provided with all the tools and knowledge needed to evaluate the costs, the effectiveness, and the social impact expected for this intervention. They will then reflect on how their assessment fits within contemporary debates on public health funding and governance, including concerns about ethics and the decolonization of global health. Students may showcase the final product of this course as part of their portfolio for their future endeavors, including applying for consulting jobs. Course background in Microeconomics is highly recommended. This is a Gordis Teaching Fellowship course. Priority registration is given to Public Health Studies majors. Other students will be permitted to register as space allows.
Prerequisite(s): AS.280.340 AND AS.280.345
Distribution Area: Social and Behavioral Sciences
AS Foundational Abilities: Citizens and Society (FA4), Ethics and Foundations (FA5)

AS.280.475. LGBTQ+ Health. 3 Credits.
This course examines the health disparities and determinants of health that impact the health of LGBTQ+ populations. Students will gain familiarity with key epidemiological reports, behavioral and social science theories/frameworks, intervention studies, and scientific debates concerning the factors influencing the health disparities experienced by LGBTQ+ populations. The readings and discussions will be approached from the perspective of social, policy, and cultural contexts, providing insights into the unique challenges and experiences faced by LGBTQ+ communities globally. This is a Gordis Teaching Fellowship course. Priority registration is given to Public Health Studies majors. Other students will be permitted to register as space allows.
Prerequisite(s): AS.280.240
Distribution Area: Social and Behavioral Sciences
AS Foundational Abilities: Citizens and Society (FA4)
**AS.280.476. Seminar in Malariology: Past, Present and Future Solution. 3 Credits.**

This 3-credit course provides an overview of one of the leading infectious causes of death worldwide. While nominally a class in malariology, this course aims to enhance each student’s comfort interpreting and presenting scientific literature, essential for a career in any academic discipline. Following a month-long overview of malaria, we will focus on reading and presenting scientific literature in the field of malariology. Special attention will be paid to work on malaria vaccines. Students will be guided through proper reading and presentation of scientific literature throughout this course. At the end of the term, students will complete a final paper and presentation proposing a novel solution to one of the challenges to malaria treatment and elimination discussed in this course. No previous knowledge of malaria is required or expected. Coursework in Cell Biology, Immunology, Biochemistry, and Genetics are all helpful but not prerequisites for this course. This is a Gordis Teaching Fellowship course. Priority registration is given to Public Health Studies majors. Other students will be permitted to register as space allows.

**Prerequisite(s):** AS.280.101 AND AS.280.240 AND AS.020.151

**Distribution Area:** Natural Sciences, Social and Behavioral Sciences

**AS Foundational Abilities:** Citizens and Society (FA4), Ethics and Foundations (FA5)

**AS.280.477. Disability Justice and Public Health. 3 Credits.**

This course is designed to introduce undergraduate students to disability justice and its applications to public health. Students will learn the history and principles of disability justice, critique models and definitions of disability, and evaluate the inclusion and exclusion of disabled people in public health research, programs, and policies. Students will also develop a deeper awareness of disability justice and its importance to understanding issues of health disparities and inequities affecting disabled people across the life course. This course will require students to critically reflect on their own beliefs, values, and attitudes as they tackle topics of eugenics, oppression, and stigmatization of multiply marginalized disabled people with a life course perspective. This course will center the artistic, academic, and advocacy work of queer and trans disabled people of color. Students will participate in class discussions, write brief posts about assigned content, submit reflections, and complete a final project. Prior knowledge of disability studies is not required. This is a Gordis Teaching Fellowship course. Priority registration is given to Public Health Studies majors. Other students will be permitted to register as space allows.

**Prerequisite(s):** AS.280.355 OR AS.230.341

**Distribution Area:** Social and Behavioral Sciences

**AS Foundational Abilities:** Citizens and Society (FA4), Ethics and Foundations (FA5)

**AS.280.478. Communicating Climate Change: Creative Approaches for Action. 3 Credits.**

Effective communication is imperative in reaching time-sensitive goals in reducing the effects of climate change. Using the framework of persuasive communication and behavior change theory, the course will provide a practice-based opportunity for students to apply their knowledge to develop their own climate communication campaigns. Students will gain familiarity with issues in historical approaches of climate approaches, understand audiences navigating climate misinformation, and social and behavioral theories of change, with an emphasis on arts-based approaches to climate communication. Through lectures, seminars, screenings, and workshops, the course will culminate with an applied assignment of students’ original creative climate communication pieces. This is a Gordis Teaching Fellowship course and instructor approval is required. All students interested are encouraged to request approval; those with a public health background will be strongly considered for approval.

**Distribution Area:** Social and Behavioral Sciences

**AS Foundational Abilities:** Citizens and Society (FA4)

**AS.280.495. Honors In Public Health - Seminar. 3 Credits.**

Using lectures, oral presentations, and writing assignments, this seminar is designed to assist Public Health Studies majors in writing a senior thesis. Students will formulate their topics, develop research skills, and address issues of professional ethics. Participating in this seminar is required for students pursuing honors in Public Health Studies. Permission Required. Classes will be held at Bloomberg School of Public Health.

**Distribution Area:** Social and Behavioral Sciences

**AS Foundational Abilities:** Writing and Communication (FA1), Science and Data (FA2), Projects and Methods (FA6)

**Writing Intensive**

**AS.280.499. Honors in Public Health. 3 Credits.**

A research methods seminar to prepare students doing honors in Public Health Studies. Permission Required.

**Distribution Area:** Social and Behavioral Sciences

**AS Foundational Abilities:** Writing and Communication (FA1), Science and Data (FA2), Projects and Methods (FA6)

**Writing Intensive**

**AS.280.500. Applied Experience-Public Health. 1 - 2 Credits.**

Perm. Req’d, Public Health Majors Only. This is a supervised, hands-on experience working with public health professionals. Students will complete 80 hours of applied work and will submit a synthesizing assignment at the end of the term. Students completing their AE in the current semester will be enrolled in Section 2. Students whose time will roll over to an additional grading period will be enrolled in Section 1. Please contact your PHS Advisor for complete details.

**Prerequisite(s):** You must request Independent Academic Work using the Independent Academic Work form found in Student Self-Service: Registration, Online Forms.

**AS Foundational Abilities:** Citizens and Society (FA4), Projects and Methods (FA6)

**AS.280.502. Internship-Public Health. 1 Credit.**

Permission Required. S/U only.

**Prerequisite(s):** You must request Independent Academic Work using the Independent Academic Work form found in Student Self-Service: Registration, Online Forms.

**AS Foundational Abilities:** Citizens and Society (FA4)
AS.280.506. Research in Public Health. 1 - 3 Credits.
Permission Required.
**Prerequisite(s):** You must request Independent Academic Work using the Independent Academic Work form found in Student Self-Service: Registration, Online Forms.
AS Foundational Abilities: Citizens and Society (FA4)

AS.280.595. Special Studies in Public Health. 1 Credit.
**Prerequisite(s):** You must request Independent Academic Work using the Independent Academic Work form found in Student Self-Service: Registration, Online Forms.
AS Foundational Abilities: Citizens and Society (FA4), Projects and Methods (FA6)