



Background

Public health is the science and practice of promoting health and preventing disease in communities. Public health workers accomplish these objectives through education, the promotion of healthy behaviors, the prevention and control of communicable diseases, and surveillance of environmental hazards. The ability of public health practitioners to protect human populations from health threats can be enhanced through partnerships with professionals and institutions focused on business, agriculture, medicine, and environmental sciences.

Public health and food safety are significant concerns at the community, state, national, and global levels. Over the past decade, the traditional mission of the public health workforce has been expanded. All public health professionals, including those employed in agriculture and veterinary medicine, are now expected to be prepared for and responsive to large-scale public health emergencies, such as: bioterrorism threats; natural disasters; global outbreaks of food borne illness, endemic or emerging infectious diseases; and the societal burdens associated with chronic debilitating diseases attributable to increased consumption of nutrient-poor foods with high levels of sugar and saturated fats, and reduced physical activity.

To make students aware of the importance of public health and to fill the anticipated growth in the public health workforce, we developed an online introductory survey course in public health, a summer immersion experience, and an accelerated path to the MPH. This was a collaborative effort supported by the USDA HEC grants program under a three-year award to Kansas State University and three Kansas community colleges. These partners committed to deliver the new online survey course within one year post-funding.

Intro to Public Health/SURPH Timeline

USDA HEC Grant Submitted	Feb '08
USDA Shares Intent to Fund HEC Grant	May '08
Director Undergraduate Public Health Hired	May '08
USDA HEC Grant Award Start Date	Sept '08
Kick-Off meeting with Community Colleges	Sept-Oct '08
Initial Meeting Course Development Team	Nov '08
Instructional Designer Engaged	Dec '08
Course Approved at K-State, JCCC, KCKCC	Jan-Mar '09
First SURPH class recruited	April-May '09
Evaluation Instruments Developed	Spring '09
Logo/Website/Promotional material	Spring '09
Course/SURPH hybrid offered	June-Aug '09
On-line PH Course offered JCCC, KCKCC	Fall '09, Spring '10
On-line PH Course offered at K-State	Spring '10
On-line PH Course offered through Edu-Kan	Fall '10

Collaborative Development of Introduction to Public Health Course

Course intended to stimulate student interest in aspects of public health and encourage them to pursue related career pathways. Also could be used for continuing and professional education of public health workers having field experience but lacking formal education and training.

Course Development Process:

1. Define public health and what discipline encompasses
 - Public health professional is "a person educated in public health or a related discipline who is employed to improve health through a population focus"
 - One Health concept emphasized (linkages among human, animal and environmental health)
2. Identify course development team
 - Expertise in biology, public health, veterinary science, kinesiology, law enforcement, and food science and safety
 - Four participating institutions
 - Supported by work-for-hire experts in instructional design, videography, and graphic arts
3. Modular curriculum design
 - Seven-module construct works for semesters or quarters
 - Learning objectives developed for each module
 - Overview and Basic Principles
 - Epidemiological Principles
 - Population Health
 - Disease and Disabilities: Determinants, Burdens, and Interventions
 - Healthcare and Public Health Systems
 - Emerging Topics in Public Health
 - Careers and Future Directions in Public Health
 - Shared project stylebook
 - Facilitated distributed operations for team
 - Evolving document that would change as needed
4. Module content
 - 2-3 slideshow lectures
 - Reading and discussion assignments
 - Case study
 - Flashcards
 - Quizzes
 - Support for term paper / project
 - Optional videos and field trips

Initial assessment outcomes:

Students reported increased familiarity with and knowledge of public health topics. Interest in completing degree in related field.

Summer Undergraduate Residency in Public Health (SURPH)

- Summer experience intended to help students transition from community colleges to university
- Engages students in practicum and hands-on experiences in public health fields including infectious disease, food safety/security, physical activity, and nutrition
- Will target students who are first generation to college, have financial need, and are members of racial/ethnic groups historically underrepresented in public health
- Intended to reinforce students' interest in public health topics and encourage them to major in one of the related topic areas
- ONE HEALTH KANSAS grant provides full scholarships
- Possible extension to metro areas for place-bound students

Student quotes from assessment:

"SURPH has opened my eyes into the wide range of public health. It has influenced personal choices as far as physical fitness and nutrition, and it has also made me aware of the flaws of certain systems in the United States such as healthcare."

"I really enjoyed meeting and working with public health officials from a variety of areas."

Accelerated BS/MPH Program Development

Provides exceptional undergraduates with the opportunity to obtain both a Bachelor of Science and a Master of Public Health degree in a shorter time than typically required to earn a BS plus an MPH if both degrees are pursued separately.

Proposed by MPH program in conjunction with participating undergraduate programs in:

- Animal Sciences & Industry
- Athletic Training
- Biochemistry
- Biology
- Dietetics
- Food Science & Industry
- Human Nutrition
- Kinesiology
- Life Sciences
- Microbiology
- Psychology

Programs will adhere to existing policies and procedures for concurrent Bachelor/Master/Graduate Certificate programs

- Students can take up to 9 hours for graduate credit in courses numbered in the 500, 600, and 700 sequences to be used toward both degrees
- Students apply and are provisionally admitted to MPH program and Graduate School in their junior year
- Upon completion of the bachelor's degree, students fully admitted to the Graduate School and MPH program
- Program effective Fall 2010

BS/MPH Timeline

Director Undergraduate Public Health invited to MPH Coordinating Committee	Sept '08
Pathways PD's meet with Graduate Dean and MPH Director re: BS/MPH	Jan '10
Proposal drafted by MPH program, approved by participating undergraduate departments and MPH graduate faculty	Feb-Mar '10
Formal proposal approved by Graduate Council and Faculty Senate	Mar-Apr '10
Undergraduate programs can begin to admit students	Fall '10



Acknowledgements

We gratefully acknowledge support from USDA HEC grant 2008-38411-19052 as well as the Kansas Health Foundation, the K-State College of Veterinary Medicine, and K-State Olathe.

