

## **Request to Plan a Doctoral Program in Public Health Sciences by the University of North Carolina at Charlotte**

### **Introduction**

This is a request from the University of North Carolina at Charlotte for approval to plan a doctoral program in Public Health Sciences (CIP: 51.2207).

### **Program Description**

The Department of Public Health Sciences (PHS) (formerly the Department of Health Behavior and Administration) in the College of Health and Human Services (CHHS) proposes to develop a Ph.D. in Public Health Sciences at UNC Charlotte. The considerable strengths of our department are evident to support the development of a rigorous Ph.D. program in Public Health that is relevant to contemporary public health; consistent with the growth of UNC Charlotte's research programs; and aligned with needs of the region, the state, and the nation.

Our diverse faculty training in the core areas of public health, our teaching qualifications based on our experience teaching in the Health Services Research Doctoral program, and our anticipated Council on Education in Public Health accreditation as a Public Health program combine to provide PHS with a strong foundation in terms of both teaching and research that is essential to support a Ph.D. program. This proposed Ph.D. articulates with existing programs including the Health Services Research Ph.D. and the Health Psychology Ph.D., and is consistent with the goals of CHHS and the overall strategic plan for the University as outlined in UNC Tomorrow (<http://www.provost.uncc.edu/Reports/UNCTomorrow-Phase1.pdf>). The importance and relevance of this program are evident in two overarching goals identified in Healthy People 2010: 1) to increase quality and years of healthy life, and 2) to eliminate health disparities.

*The focus of the proposed Ph.D. in Public Health Sciences is to train researchers and professionals with skills essential to address contemporary public health problems at the individual, community and population levels with emphasis on social and behavioral factors related to the prevention and management of disease and disability.*

Public health is a broad field encompassing many disciplines, activities, and stakeholders, and is focused on serving entire populations from communities, cities, and counties, to states and nations. As early as 1920 public health was defined as “the science and art of preventing disease, prolonging life and promoting health and efficiency through organized community effort” (Turnock, 2004), and more recently as “fulfilling society’s interest in assuring conditions in which people can be healthy” (also Turnock citing IOM). Public health encompasses research in environmental and occupational health, biostatistics, epidemiology, social and behavioral health factors, and health policy. These five core areas form the basis for public health research and practice and are required teaching for any accredited public health school or program.

One of the core areas of public health, the behavioral sciences focus on understanding and influencing the social determinants that affect health behavior within populations, societies, and communities. Medicine is concerned with individuals and uses a biomedical approach to heal patients who have disease. "...Public health regards the community as its patient.... Public health focuses on preventing illness." (Schneider, 2006) As in other fields, public health researchers and practitioners use a biopsychosocial approach to health and illness. The *population* focus of public health, however, distinguishes the aims of public health activities and research from other disciplines, and spans across institutions, communities, geography, and culture in an effort to improve human health. Thus public health researchers and faculty come from diverse backgrounds in medicine, psychology, sociology, nursing, anthropology, geography, gerontology, and economics.

The ability to address social and behavioral factors across multiple levels requires a breadth and depth of methodological skills, which include basic quantitative approaches as well as qualitative techniques. An increasing focus of public health social and behavioral research is on community-based, participatory action research (CBPAR), acknowledging the need to have community participants establish public health priorities and approaches to developing and testing solutions to health problems (Minkler & Wallerstein, 2003). Multiple institutes within the National Institutes of Health have program announcements to solicit CBPAR proposals.

Public health by its very nature is interdisciplinary and includes scientists, practitioners, and community partners from a broad spectrum of disciplines and organizations working together to improve population health. As more and more health problems are recognized as stemming from social issues such as poverty and crime and as the prevention and treatment of those problems becomes the responsibility of the individual as well as the community the need for trained researchers in the social and behavioral sciences with a public health focus becomes even more critical (Centers for Disease Control and Prevention, 2006). Virtually every health issue in the U.S. has a behavioral component whether viewed from the level of either the individual, family, health care provider, or the larger health care system.

Nationally there are several trends in public health that demonstrate the need for more public health researchers trained in the social and behavioral sciences:

- There is a rapid shift in demographics in the United States. Our nation is aging rapidly as Baby Boomers reach age 65, and the birth rate hovers at the replacement rate. As a result, we have greater numbers of older adults who are living longer, but many have chronic diseases and experience years of living with disability.
- The rise in minority populations in the U.S. will drive an increased need for knowledge about cultural factors related to health and health behaviors as we adapt to the many immigrant populations settling in our cities and states. The immigrant and ethnic minority populations that currently reside in the U.S. are among the fastest growing population groups.
- Even while many infectious diseases associated with childhood are waning in the U.S., the spread of HIV/AIDS, tuberculosis, and sexually transmitted infections are all increasing in North Carolina, in the US, and abroad.

- The increased emphasis on addressing health disparities that occur among gender, racial and ethnic, and age subgroups within our society will necessitate more research that requires training in behavioral and social science methods.
- Increasingly, research supports the notion that it is the social construction of age, gender, race, and class that influences how individuals respond to health threats, not biology.
- Over one-third of deaths in 2000 were due to unhealthy behaviors (smoking, physical activity and diet, and alcohol consumption) (Mokdad, Marks, Stroup, & Gerberding, 2004, 2005). North Carolina ranks fifth in the nation for prevalence of youth obesity and almost two-thirds of adults are overweight or obese (NC Prevention Partners, 2008).

Doctoral students require immersion in disciplinary content and in the research environment. These goals are best accomplished through a research apprenticeship with faculty members who have ongoing research projects (American Academy of Health Behavior Work Group on Doctoral Research Training, 2005). Learning the research process cannot be accomplished solely in the classroom, and successful new Ph.D. graduates will have already had opportunities to design and conduct research, present research, and publish research; a rich and nurturing academic environment must be established to provide those opportunities.

### **UNC Tomorrow Relevance**

Health concerns were expressed across the State and Our Health (Rec. 4.5) indicates the need for increasing a wide range of health professionals across the State to deal with persistent health issues across the State.

### **Disciplinary Panel**

In addition to representatives of UNCC, there were representatives from ASU, ECU, UNC-CH and UNC-GA. Representatives from UNCC provided an overview of the proposed program in public health. A Ph.D. is proposed in Public Health Sciences rather than a DrPH. (Doctor of Public Health). The focus is to be on research with special attention to the behavioral sciences to understand the many factors that account for illness in populations and to find ways of mitigated those impacts on health.

This doctoral program will work cooperatively with two other doctoral programs at UNCC, Health Services Research and Health Psychology. Health Services Research is building a cadre of researchers capable of handling very large data sets which will be a necessary component of behavioral research. One issue that was raised was that the research profile of the faculty in this area would need to be raised.

### **Response**

At the time of the panel, while the grant amount was about \$800,000 a year, the program has \$6 to \$7 million in grant proposal out to agencies. The representatives made the case that they are prepared to provide the needed support to graduate students with a solid commitment to a support plan for the graduate students for five years.

**Student Demand**

It is reasonable to think that there will need to be more people trained broadly in public health to meet the changing needs of health care. While there are many people coming out of practitioner master's degrees in public health and related fields some careful analysis will need to be done to see if they will be attracted to this research area. The proposal recognizes that recruitment will have to be addressed

**Opportunities for Graduates of the Program**

Again it is quite reasonable to expect there to be a need for researchers with the skills to be found in this program given the direction national health care appears to be going. But more attention will need to be given to attempting to document the need and opportunities.

**Resource Implications**

The resource needs are typically specified more fully in the proposal for establishment. By the time the program is fully ramped up which would likely be at least six years from now, the estimated cost to be provided by State funding would be approximately \$600,000 dollars, or approximately \$120,000 per year over the five-year ramp up period.

**Issues to Address in Planning**

As the program is developed it will be wise to consult with the other two public health programs in the State. The level of grant funding needs to be address in relation to the intensive research dimension of the proposed program. It will also be important to give attention to the source of students and the kinds of opportunities they can expect.

**Recommendation**

The core focus on behavioral research would appear to fit well with the direction of national health policy where there will be more and more attention to finding out what causes populations to have certain maladies and attempting to remedy them, as well as large scale research attempts to show what is effective for cures. While there are two other public health doctoral programs, it does not appear unreasonable for UNC to consider a third one in this core health area.

The staff of the General Administration recommends that the Committee on Educational Planning, Policies, and Programs approve the request from the University of North Carolina at Charlotte to plan a doctoral program in Public Health Sciences.

**Approved to be Recommended for Planning to the Committee on Educational Planning, Policies, and Programs**




---

Senior Vice President for Academic Affairs

August 2, 2010

## General Information Template for Academic Program Review

**Degree Area and Level:**

PhD in Public Health Sciences (CIP 51.2207) at UNC Charlotte

**Addressing UNC Tomorrow:**

This degree program addresses all of the major findings in the UNC Tomorrow Report under Recommendation 4.5 Our Health.

**Role of Program in Relation to State and Regional Needs:**

According to the proposal, "Every public health school and program will need trained behavioral scientists in the discipline of public health. The federally acknowledged need for more researchers to investigate social and behavioral pathways to behavior change leading to effective interventions targeted at primary prevention is critical both nationally and in the state of North Carolina (NC Prevention Partners, 2008). We desperately need additional researchers to develop effective interventions and more public health academics to train practitioners on these intervention strategies. Additionally, the existing and impending deficits in all many areas of the health care workforce [nursing, family practice physicians, and geriatricians for example (Association of Academic Health Centers, 2008)] will place an increased burden on the need for primary and secondary prevention techniques that can be delivered by public health workers."

**US Labor Department Analysis:**

- *Summary* – No narrative provided for this cluster.
- *Summary Data* – Not relevant for the level of this proposed degree program.

**Availability of Program Statewide (Enrollment and Degrees Awarded in Last 3 Years):**

- *Public universities* – The UNCG program was approved by the BOG on 5/13/2005.

Enrollment			Academic Year					
			Fall 06	Spr 07	Fall 07	Spr 08	Fall 08	Spr 09
UNC-CH	Health Behavior and Health Education	DrPH	4	3	2	2	1	1
		PhD	46	39	44	41	37	36
UNCG	Community Health	DrPH	N/A	N/A	N/A	N/A	14	12

Number of Degrees Awarded in Selected Programs			Academic Year		
			2006-2007	2007-2008	2008-2009
UNC-CH	Health Behavior and Health Education	DrPH	0	0	0
		PhD	10	6	6
UNC-G	Community Health	DrPH	N/A	N/A	N/A

- *Private universities* – Not available.

**Available in Online or Distance Format from UNC institutions:**

Not available

**Available or not from Academic Common Market:**

Not available

# APPENDIX N

**UNC Charlotte Campus enrollment and degrees awarded in similar programs at the Doctoral level:**  
(Based on two CIP digits – 51 CIP is the summary group for Health Professions and Related Clinical Sciences under which Public Health Sciences is a program.) The below listed program was approved by the BOG on 05/13/2005.

Enrollment			Academic Year					
			Fall 06	Spr 07	Fall 07	Spr 08	Fall 08	Spr 09
UNC-C	Health Services Research	PhD	12	12	19	18	21	21

Number of Degrees Awarded			Academic Year		
			2006-2007	2007-2008	2008-2009
UNC-C	Health Services Research	PhD	N/A	N/A	1

**Campus Average of enrollment and degrees awarded in this degree area at the Doctoral level:**  
(Based on two CIP digits – 51 CIP is the summary group for Health Professions and Related Clinical Sciences under which Public Health Sciences is a program - over the last 3 Academic Years, Fall 2006-Fall 2009.)

Campus Average			
	Number of Active Programs	Enrollment per Semester	Degrees Awarded per Year
ECU	5	28	6
NCSU	1	43	8
UNCC	1	17	1 * in 2008-2009
UNC-CH	11	41	8
UNCG	3	15	3
Campus Average:		29	5

## UNC Charlotte Campus Degree Programs added in the past three years:

- Bachelor
  - BA Special Education, General Curriculum (03/20/2009)
  - BS Systems Engineering (09/07/2007)
  - BS Respiratory Therapy (05/11/2007)
  - BS Public Health (03/16/2007)
  - BA Japanese Studies (04/09/2010)
- Master
  - MUD Urban Design (06/13/2008)
  - MA Latin American Studies (02/09/2007)
  - MS Bioinformatics (05/11/2007)
  - MS Construction and Facilities Management (06/11/2010)
  - Master of Fire Protection and Administration (06/11/2010)
- Doctoral
  - PhD Nanoscale Science (01/12/2007)

## UNC Charlotte Degree Programs discontinued in past three years:

- Bachelor

## APPENDIX N

- BA Special Education (03/20/2009)
- *Master*
  - MEd Special Education, Cross-Categorical Disabilities (03/20/2009)
  - MEd Special Education, behavioral-Emotional Handicaps (03/20/2009)
  - MEd Special Education, Mental Handicaps (03/20/2009)
  - MEd Special Education, Learning Disabilities (03/20/2009)
  - MEd Special Education, Severe and Profound Handicaps (03/20/2009)
  - MA Art Administration (03/20/2009)
- *Doctoral*
  - N/A