

# Translational and Clinical Investigation, Graduate Certificate

## Requirements

The graduate Certificate in Translational and Clinical Investigation requires 17 s.h. of graduate credit and may be completed in one year. Certificate requirements include didactic coursework, clinical research preceptorships, and clinical research seminar participation.

The Department of Epidemiology and the Institute for Clinical and Translational Science (ICTS) offer the certificate for clinicians who seek advanced training in clinical methodology and applied patient-oriented research skills. The certificate program is open to individuals who hold a doctoral-level degree in a clinical discipline (e.g., MD, DO, DDS, PhD, PharmD, DVM), are practicing academic clinicians, and are admitted as graduate students to the College of Public Health or are enrolled in a basic or health science doctoral program at the University of Iowa. Other admission requirements are similar to those for the MS program in epidemiology.

The Certificate in Translational and Clinical Investigation requires the following coursework.

## Required Courses

Course #	Title	Hours
All of these:		
BIOS:4120	Introduction to Biostatistics	3
EPID:4400	Epidemiology I: Principles	3
EPID:5500	Introduction to Clinical Epidemiology	3
EPID:6950	Clinical Research Ethics	2

## Electives

Course #	Title	Hours
6 s.h. from these:		
BIOS:6210/ IGPI:6210	Applied Survival Analysis	3
BIOS:6310/ IGPI:6310/ STAT:6550	Introductory Longitudinal Data Analysis	3
BIOS:6610/ IGPI:6610	Statistical Methods in Clinical Trials	3
BIOS:7600/ IGPI:7600	Advanced Biostatistics Seminar	0-3
CBH:5235	Community-Based Participatory Research	3
CBH:5305	Evaluation: Approaches and Applications	3
CBH:6205	Designing and Implementing Interventions	3
DPH:6004	Principles of Oral Epidemiology	0-3

EPID:5214	Meta-Analysis of Epidemiologic Studies	3
EPID:5560	Biomarkers in Epidemiology	3
EPID:5610	Intermediate Epidemiology Data Analysis With SAS and R	3
EPID:5570	Zoonotic Diseases	3
EPID:5600	Introduction to Epidemiology Data Management and Analysis	3
EPID:6000	Independent Study in Epidemiology	arr.
EPID:6100	Writing a Grant Proposal	3
EPID:6150	Writing for Medical Journals	1
EPID:6330	Global Nutrition Policy	2-3
EPID:6350	Nutritional Epidemiology	2
EPID:6360	Nutrition Intervention in Clinical Trials Research	2
EPID:6370	Nutrition Intervention in Research Lab	3
EPID:6400	Epidemiology II: Advanced Methods	4
EPID:6510/ OEH:6520	Injury Epidemiology	3
EPID:6550/ GHS:6550	Epidemiology of Infectious Diseases	3
EPID:6560	Hospital Epidemiology	2
EPID:6600	Epidemiology of Chronic Diseases	3
EPID:6655/ BIOS:6650/ IGPI:6650	Causal Inference	3
EPID:6900	Design of Intervention and Clinical Trials	3
EPID:6910	Pharmacoepidemiology and Comparative Effectiveness Research	3
EPID:6950	Clinical Research Ethics	2
EPLS:5165/ PSQF:5165	Introduction to Program and Project Evaluation	3
HMP:5315	Health Information Systems	2-3
HMP:5410	Health Economics I	3
HMP:7550	Cost Effectiveness and Decision Analysis	3
HMP:7960	Analytic Issues in Health Services Research I	3
HMP:7965/ PHAR:7331	Analytic Issues in Health Services Research II	3
PCOL:5136	Pharmacogenetics and Pharmacogenomics	1
PHAR:5310	Health Services Research Seminar	1-2
PHAR:5350	Introduction to Research Methods	3
PHAR:6305	Foundation Literature in Health Services Research	arr.
SEES:3110/ GHS:3111	Geography of Health	3
TBM:5001	Introduction to Translational Biomedicine	3

## Academic Plans

### Sample Plan of Study

Sample plans represent one way to complete a program of study. Actual course selection and sequence will vary and should be discussed with an academic advisor. For additional sample plans, see MyUI.

### Translational and Clinical Investigation, Graduate Certificate

Course	Title	Hours
<b>Academic Career</b>		
<b>Any Semester</b>		
The graduate certificate in translational and clinical investigation requires 17 s.h. of graduate credit.		
<b>Hours</b>		<b>0</b>
<b>First Year</b>		
<b>Fall</b>		
BIOS:4120	Introduction to Biostatistics	3
EPID:5500	Introduction to Clinical Epidemiology	3
Certificate: translational and clinical investigation elective course <sup>a</sup>		3
<b>Hours</b>		<b>9</b>
<b>Spring</b>		
EPID:4400	Epidemiology I: Principles	3
EPID:6950	Clinical Research Ethics	2
Certificate: translational and clinical investigation elective course <sup>a</sup>		3
<b>Hours</b>		<b>8</b>
<b>Total Hours</b>		<b>17</b>

<sup>a</sup> See the General Catalog for list of approved courses.