

SURGICAL AND INTERVENTIONAL SCIENCES (PH.D.)

Offered by: Surgery (Faculty of Medicine and Health Sciences)

Degree: Doctor of Philosophy

Program Description

The Ph.D. in Surgical and Interventional Sciences focuses on the field of surgery and interventions. The program emphasizes research that involves innovative surgical techniques, patient management strategies, and the application of new technological advances in the medical field.

Note: For information about Fall 2025 and Winter 2026 course offerings, please refer to Visual Schedule Builder. A technical issue is causing the "Terms offered" field to incorrectly report "this course is not currently offered" for many courses in the Course Catalogue.

Thesis

A thesis for the doctoral degree must constitute original scholarship and must be a distinct contribution to knowledge. It must show familiarity with previous work in the field and must demonstrate ability to plan and carry out research, organize results, and defend the approach and conclusions in a scholarly manner. The research presented must meet current standards of the discipline; as well, the thesis must clearly demonstrate how the research advances knowledge in the field. Finally, the thesis must be written in compliance with norms for academic and scholarly expression and for publication in the public domain.

Required Courses (3 credits)

Expand allContract all

Course	Title	Credits
EXSU 700	Comprehensive Examination.	0

And:

3 credits from the following:

Expand allContract all

Course	Title	Credits
EDPE 575	Statistics for Practitioners.	3
EPIB 507	Biostats for Health Sciences.	3
EXSU 606	Statistics for Surgical Research.	3

Complementary Courses (12 credits)

6 credits from the following:

Expand allContract all

Course	Title	Credits
EDPH 689	Teaching and Learning in Higher Education.	3
EXMD 634	Quantitative Research Methods.	3
EXSU 500	Artificial Intelligence in Medicine .	3

EXSU 601	Knowledge Management 1.	3
EXSU 602	Knowledge Management 2.	3
EXSU 603	Surgical Education Foundations.	3
EXSU 619	The Hospital Environment.	3
EXSU 620	Surgical Innovation 1.	3
EXSU 621	Surgical Innovation 2.	3

And 6 credits at the 500 level or higher in the student's specialty, selected in consultation with the Research Supervisory Committee.