**BBS 3217 Advanced concepts of cell biology and principles of microscopic analysis**

**Course description**

This course introduces participants to key concepts of cell biology and microscopic analysis. This is largely a practical course with most of the time spent in the laboratory.

**Course Objectives**

* To describe advanced concepts in cell biology and application of microscopy.

**Learning outcomes:**

At the end of the course students will be able use a microscope to study cell structures.

**Content outline**

* DNA/RNA melting, Hybridization and replication
* Protein Synthesis and degradation
  + Genome of prokaryotes, eukaryotes and viruses, Operon theory
  + Early-late genes, Control models in eukaryotes, Promoters
  + Repeat sequences

**Requirements:**

4 Weeks, 60 CH

**Mode of assessment**

Practical examination 40%

Final summative examination 60%