

## **GRSC6028 Biological Safety**

### **Content:**

This course covers the theoretical and practical aspects of working safely with biological materials. Topics to be discussed include:

- laboratory acquired infections;
- recognizing and assessing biological hazards in the laboratory;
- classification of microorganisms according to hazard and levels of containment;
- relevant legislation in Hong Kong and a brief comparison with other countries;
- good microbiological practice and universal precautions;
- E.coli and molecular biology;
- work with virus vectors;
- appropriate equipment and facilities;
- emergency procedures and an introduction to biosecurity, dual use technology and bioterrorism.

### **Organization:**

The module comprises twelve hours of class time (two hours per week for six weeks). Classes will include lectures, video demonstrations and some in-class discussion.

### **Enrollment:**

There is no assumption that students will be familiar with concepts in biosafety or the management of risks prior to their enrollment. There is no limit on the number of students that can enroll. In the academic year 2013-14, this course will not be offered.

### **Assessment:**

Pass/Fail: there is no exam but students will carry out a risk assessment for their own work (50%) and complete an assignment (50%) they choose from a selection of relevant topics.

### **Outcome:**

At the end of the course, students should have a basic understanding of the principles that govern safe work with biological materials. They should be able to identify the major sources of biological hazards, assess the risks involved and determine the appropriate controls.