

*The University Of Sussex International Summer School*

**GENERAL CHEMISTRY 2 - SUMMER 2010**

Course Text: Chemical Principles, The Quest for Insight P. W. Atkins & L. Jones W.H.  
Freeman and Co., 4<sup>th</sup> Ed., 2007

Ancillary Texts: Basic Chemical Thermodynamics E. B. Smith  
Imperial College Press, 5<sup>th</sup> Ed., 2005  
General Chemistry L. Pauling  
Dover Press

**Week 1**  
Tues Chemical equilibria  
Wed Chemical equilibria  
Thur Acid and base equilibria  
Fri Review and exam

**Week 2**  
Mon Aqueous equilibria  
Tues Electrochemistry  
Wed Empirical chemical kinetics  
Thurs Chemical kinetics  
Fri Review and exam

**Week 3**  
Mon Transition state theory  
Tues Nuclear chemistry  
Wed Descriptive chemistry of the main group elements  
Thurs Descriptive chemistry of the transition elements  
Fri Review and exam

**Week 4**  
Mon Organic chemistry  
Tues Functional groups in organic chemistry  
Wed Organic chemistry and mechanism  
Thurs Final examination

Workshops Weeks 1-3 Tuesday, Thursday 1-3  
Week 4 Tuesday, Wednesday 1-3

Labs Week 1 Wed 1pm-5pm  
Weeks 2-3 Mon, Wed 1pm-5pm  
Week 4 Mon 1pm-5pm

**Assessment** 3 Weekly examinations 1 hr 20%  
4 Weekly problem sets 10%  
Lab 20%  
Final exam 2h 50%

- Practice problems will be liberally distributed after enrolment and during the course.