## Short Course in Mathematical Modelling of Infectious Diseases 5 – 7 January 2006

## **PROGRAMME**

Time	Day 1 (5 January)	Day 2 (6 January)	Day 3 (7 January)
09:00 - 10:00	Introduction: Anatomy of an infectious disease epidemic (Dr. Gabriel LEUNG)	Developing models and evaluating public health interventions (Dr. Azra GHANI)	Individual-based models: pandemic influenza containment (Dr. Steven RILEY)
10:00 - 11:00	A refresher in mathematics (Dr. HO Lai-ming)	Estimating the basic reproductive number (Prof. Marc LIPSITCH)	Anti-microbial resistance (Prof. Marc LIPSITCH)
11:00 - 11:30	Break		
11:30 - 12:30	A first model: SEIR (Part 1) (Dr. Steven RILEY)	Vector-borne diseases (Dr. Steven RILEY)	Mathematical models for the within-host dynamics of pathogens (Dr. Azra GHANI)
12:30 - 14:00	Lunch		
14:00 - 15:00	A first model: SEIR (Part 2) (Dr. Steven RILEY)	The health economics of infectious disease (Dr. Gabriel LEUNG)	Outbreak team exercise (I) (All speakers)
15:00 - 15:30	Break		
15:30 - 16:30	Case study 1: Influenza in a boarding school	Case study 2: Age heterogeneity (Prof. Marc LIPSITCH)	Outbreak team exercise (II)
16:30 - 17:30	(Dr. Joseph WU)	Case study 3: STI mixing patterns (Dr. Azra GHANI)	× /