## **UNIVERSITY COLLEGE LONDON**

## University of London

## **EXAMINATION FOR INTERNAL STUDENTS**

For The Following Qualification:-

B.Sc. (Intercal)

**Genetics C201: Human Embryonic Development** 

COURSE CODE

: GENEC201

UNIT VALUE

: 0.50

DATE

: 28-APR-04

TIME

: 14.30

TIME ALLOWED

: 3 Hours

# HUMAN EMBRYONIC DEVELOPMENT – GENEC201 28<sup>th</sup> April 2004

There are two sections to this exam.

The short answer section makes up 25% of the mark for this paper.

The essay section counts for 75% of the mark (25% each essay).

#### Section 1 - SHORT ANSWER SECTION

This section makes up 25% of your exam mark.

- 1. Write short notes on ALL of the following:
  - a. gametogensis
  - b. gastrulation
  - c. embryo folding
  - d. brain development
  - e. heart development
  - f. developmental genes

### **Section 2 - ESSAY SECTION**

Answer three essays from this section (25% each). Each essay counts as 25% of the examination.

- 1. Describe the in vitro development of an embryo from the zygote to the blastocyst stage.
- 2. Outline male and female infertility. What treatments can be used to help these patients achieve a pregnancy and what recent advances have been made?
- 3. Write an essay on implantation and the development of the placenta.
- 4. Describe the normal and abnormal development of the kidney, emphasising the genes that are involved.
- 5. Describe the normal and abnormal development of the lungs, emphasising the genes that are involved.
- 6. Describe the normal and abnormal development of the gut, emphasising the genes that are involved.

**END OF PAPER**