

請按照題號順序作答，免抄題目，答案需寫在答審卷上。

1. Many endocrine glands produce multiple hormones. Choose *two hormones* from column B that are secreted by each gland listed in column A. (20%)

**Column A**

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\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

- (1) Adrenal gland
- (2) Neurohypophysis of pituitary gland
- (3) Ovaries
- (4) Pancreas
- (5) Thyroid gland

**Column B**

- (a) Antidiuretic hormone
- (b) Calcitonin
- (c) Cortisol
- (d) Estrogen
- (e) Glucagon
- (f) Insulin
- (g) Norepinephrine
- (h) Oxytocin
- (i) Progesterone
- (j) Thyroid hormone

2. Please compare the paired terms. (40%)

- A. Euchromatin vs Heterochromatin
- C. Rotifera vs Nematoda
- E. Gametes vs Zygotes
- G. Nucleus vs Ganglion
- I. Brachiopoda vs Echinodermata

- B. Endoskeleton vs Exoskeleton
- D. Cilia vs Flagella
- F. Axon vs Dendrites
- H. RBC vs WBC
- J. White matter vs Gray matter

3. Please explain why cardiovascular diseases are the leading cause of death in the United States & most other developing nations. (10%)

4. List & describe briefly the similarities & dissimilarities for the five immunoglobulins (Ig). (10%)
5. Please explain how the nervous system & hormones regulate kidney functions ? (10%)
6. Define the biological magnification & greenhouse effect. (10%)