

The Endocrine System

Chapter 12: The Endocrine System · Topic 1

Key Concept

The pituitary gland, often called the 'master gland,' controls other endocrine glands and secretes hormones like growth hormone.

The thyroid gland secretes thyroxine, regulating metabolic rate, with both hypo- and hyper-thyroidism causing health issues.

The pancreas secretes insulin and glucagon, regulating blood sugar levels, with insulin deficiency causing diabetes.

The adrenal glands secrete adrenaline, preparing the body for 'fight or flight' responses during stress or emergency situations.

Quick Revision Notes

- Pituitary gland: the 'master gland'.
- It controls other endocrine glands.
- Thyroid gland secretes thyroxine.
- Thyroxine regulates metabolic rate.
- Pancreas secretes insulin and glucagon.
- These regulate blood sugar levels.
- Insulin deficiency causes diabetes.
- Adrenal glands secrete adrenaline for 'fight or flight'.

Practice Questions

- 1 List the major endocrine glands and one hormone each secretes.
- 2 Explain why the pituitary is called the 'master gland'.
- 3 Discuss the effects of thyroxine imbalance.
- 4 Research the causes and effects of diabetes.
- 5 Explain the 'fight or flight' response.
- 6 Explain the endocrine system in your own words.