

5. Explain why it is important that the left ventricle is larger and has thicker walls than the right ventricle.

6. What blood vessels must be cut when removing a heart during a transplant operation?

7. What blood vessels must be cut when removing the heart and lungs together during a transplant operation?

8. Which operation, (1) heart only or (2) heart and lungs together, should be simpler in terms of the number of vessels to be cut and resealed?

Chapter 5 Maintaining Balance In Organisms

Chapter Goals

I can understand that...

- living systems detect and respond to changing conditions to maintain homeostasis;
- all organisms have mechanisms for regulating internal conditions such as temperature and pH;
- regulatory mechanisms may be chemical, physiological, behavioral, or a combination of these; and
- maintaining homeostasis requires the interactions of many organ systems.