



## 1

**ENERGY PRODUCTION AND THE THREE ENERGY SYSTEMS**  
(Textbook pages 96–106)**1 Key Terms and Definitions**

Define the key terms below in your own words.

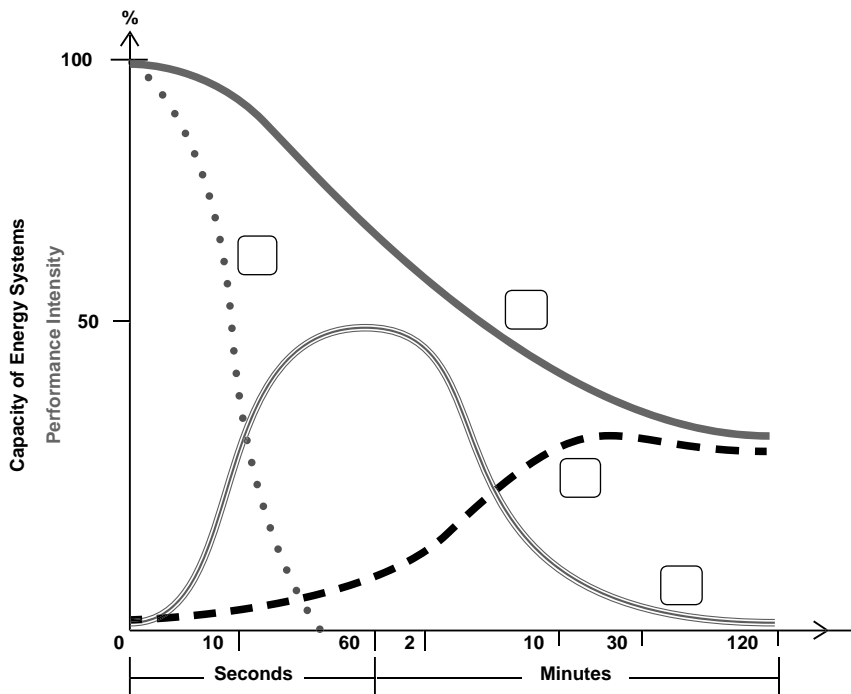
Key Term	Definition
adenosine diphosphate (ADP)	
adenosine triphosphate (ATP)	
aerobic metabolism	
anaerobic alactic	
anaerobic glycolysis	
anaerobic lactic	
anaerobic metabolism	
anaerobic threshold	
ATP re-synthesis	
Cori cycle	



enzyme	
glycogenesis	
glycolytic system	
high energy (immediate) phosphate system	
Kreb's cycle	
lactic acid	
lactic acid system	
maximal aerobic power ( $\dot{V}O_2$ max)	
mitochondria	
oxidative phosphorylation	
oxygen system	
pyruvate	

## 2 The Energy Systems

The graph below outlines the role of the three energy systems during all-out activities of different duration. Label each curve using the **word bank** provided. Then provide another name that is used for each of the three energy systems.



### Word Bank

- 1 high energy phosphate system
- 2 lactic acid system
- 3 oxygen system
- 4 performance intensity

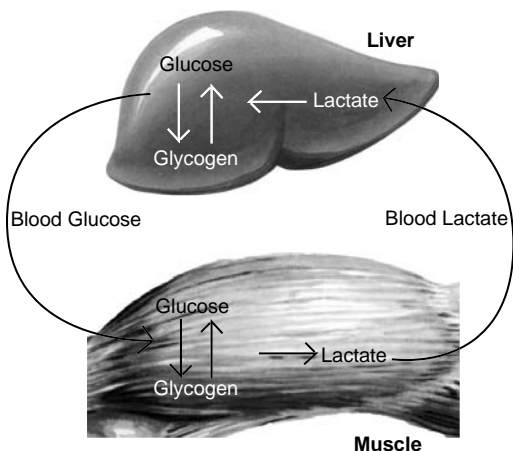
1 \_\_\_\_\_

2 \_\_\_\_\_

3 \_\_\_\_\_

## 3 The Cori Cycle

Describe the Cori cycle, and explain why it is important for the maintenance of skeletal muscle function.



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