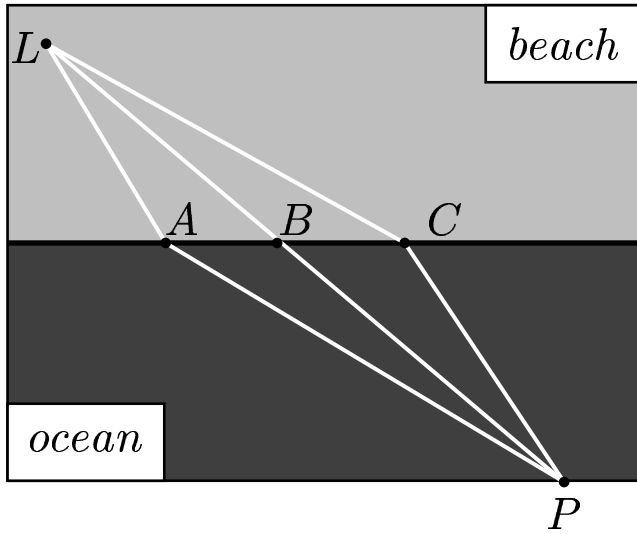


Given: A boy is at the lodge L on the beach. He must rescue a drowning girl in the water at P .



Among the three paths illustrated which path is closest to the least time?

- A) $L \rightarrow A \rightarrow P$.
- B) $L \rightarrow B \rightarrow P$.
- C) $L \rightarrow C \rightarrow P$.
- D) All of the above.

The boy runs faster than he swims. It minimizes the time required when the boy covers more distance on the beach than in the water. The least time path should satisfy Snell's law. From the sketch, among the three paths illustrated, the path which passes through C should be closest to the least time path. Answer **C**.

35.08-02'Least Time 2004-3-24