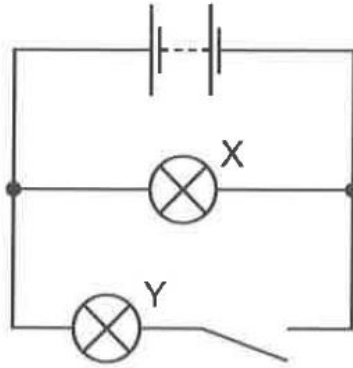


- 15** A battery is connected to two lamps X and Y as shown.



With the switch open, lamp X has normal brightness.

The switch is now closed and lamp Y lights up. Lamp X is seen to be dimmer than before the switch was closed.

Why does lamp X become dimmer?

- A** Some current in X originally is used to supply Y.
- B** The internal resistance of the battery increases.
- C** The terminal potential difference of the battery decreases.
- D** The working voltage of lamp Y is greater than that of lamp X.

