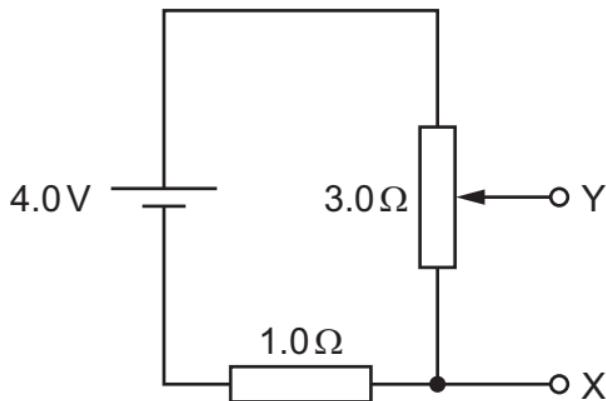


- 38 A cell of electromotive force (e.m.f.) 4.0 V and negligible internal resistance is connected to a fixed resistor of resistance  $1.0\Omega$  and a potentiometer of maximum resistance  $3.0\Omega$ , as shown.



Which range of potential differences can be obtained between the terminals X and Y?

- A 0V to 3.0V
- B 0V to 4.0V
- C 1.0V to 3.0V
- D 1.0V to 4.0V