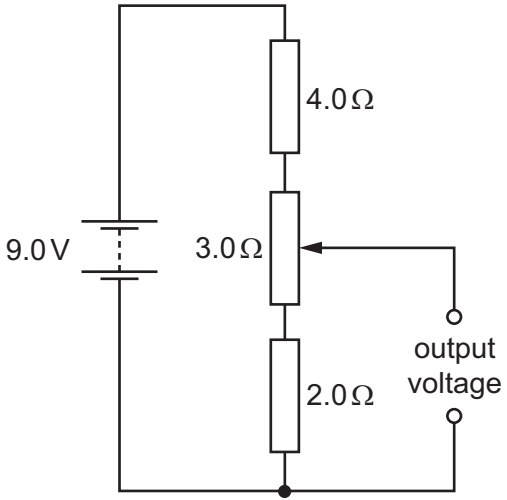
36 A potential divider circuit consists of fixed resistors of resistance 2.0 Ω and 4.0 Ω connected in series with a 3.0 Ω resistor fitted with a sliding contact. These are connected across a battery of e.m.f. 9.0 V and zero internal resistance, as shown.



What are the maximum and the minimum output voltages of this potential divider circuit?

	maximum voltage / V	minimum voltage / V
A	4.0	2.0
B	5.0	2.0
C	9.0	0
D	9.0	2.0