

SECTION A – MULTIPLE-CHOICE QUESTIONS**Instructions for Section A**

Answer **all** questions in pencil on the answer sheet provided for multiple-choice questions.

Choose the response that is **correct** or that **best answers** the question.

A correct answer scores 1; an incorrect answer scores 0.

Marks will **not** be deducted for incorrect answers.

No marks will be given if more than one answer is completed for any question.

Unless otherwise indicated, the diagrams in this booklet are **not** drawn to scale.

Take the value of g to be 9.8 m s^{-2} .

Question 1

An alternating voltage source is rated at 12.0 V RMS.

What are the corresponding peak and peak-to-peak voltages?

	Peak voltage	Peak-to-peak voltage
A.	34.0	17.0
B.	17.0	34.0
C.	17.0	8.5
D.	8.5	17.0

Question 2

Two charges, $10 \mu\text{C}$ and $100 \mu\text{C}$, are 1.0 cm apart.

The force between them is

- A. $9.0 \times 10^{-2} \text{ N}$
- B. 9.0 N
- C. $9.0 \times 10^2 \text{ N}$
- D. $9.0 \times 10^4 \text{ N}$