**Name:** ………………………………………………..………**Adm No**: ….…………**Class:** ………… **Candidate’s Sign**: ………...............**Date:** ………………………………............................................

**OPENER EXAMS**

**TERM 3 2023**

**FORM ONE PHYSICS**

1. Define the term physics. (1 mark)

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2. Explain briefly the first aid measure that should be taken in case of . (2 marks)

 a) Cut

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 b) Poisoning

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3. State any two branches of physics. (2 marks)

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4. Briefly explain how physics relates with biology. (2 marks)

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5. State any 3 effects of force. (3 marks)

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6. State any three safety laboratory rules. (3 marks)

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7. a) What are the reading indicated by arrows P1, P2 and P3 on the metre diagram

 not drawn to scale. (3 marks)



 P1 ……………………………………….. P2 ………………………………………….. P3 …………………………………………

 b) State the three steps followed when using a metre rule. (3 marks)

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8. Express the following as shown

 a) 0.5m2 to cm2. (2 marks)

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 b) 20 cm2 to m2. (2 marks)

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9. a) What is volume state it SI unit. (2 marks)

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 b) Find the volume of a sphere whose radius is 3.0 cm. (3 marks)

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10. a) Differentiate between mass and weight. (3 marks)

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|  Mass | Weight |
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 b) Define the term density and state it SI unit. (2 marks)

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c) The mass of an empty density bottle is 20.g. Its mass when filled with water is

 40.0g and when filled with liquid x is 50.0g

 Calculate the density of liquid x if the density of water is 1000 kgm-3. (3 marks)

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11. a) A body weighs 120 N in air and 80N submerged in water . Calculate the upthrust acting on the body. (2 marks)

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 b) State and explain two factors that affect surface tension. (3 marks)

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12. a) A boy weighs 50 Kg. If his weight is 1000 N in a certain planet calculate the

 gravitational strength of the planet. (3 marks)

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 b) Large mercury drops form oval balls on a glass slide. Explain. (2 marks)

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13. a) Define the term pressure. (1 mark)

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 b) A force of 100N, was applied to an area of 100cm2. What is the pressure

 exerted in Nm-2. (4marks)

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