

QUESTION ONE (30MARKS)

- a. Explain the following terminologies or phrases associated with the historical development of the construction industry **(10marks)**.
 - i. Project
 - ii. Pozzolan
 - iii. Early tar road
 - iv. Dovetail joint
 - v. Neolithic era
- b. Highlight three scenarios on how the current concept of out sourcing of construction labour from sub-contractors has negatively affected the welfare of the Kenyan construction worker **(4marks)**.
- c. Management was practiced by man since historic time. Highlight three major historical instances where management was applied prior to Classical and Neo-Classical theories of management evolving in the late 19th Century **(6marks)**.
- d. Briefly describe the eras that have historically shaped the evolution of the bridge construction system **(8marks)**.
- e. Briefly state major social concepts that ancient architecture was associated with **(2marks)**

QUESTION TWO (20MARKS)

- a. Briefly explain the following terms applied as styles in ancient architecture **(4marks)**.
 - i) Romanesque
 - ii) Gothic
- b. Briefly discuss the features of architectural styles mentioned in question (a) above **(12marks)**.
- c. Historical concept of tall buildings founded in America from 1849 has immensely contributed to the contemporary high-rise buildings that dot global sky lines.

- i) Highlight the concept of these tall buildings as they were historically known and the architect who was behind the innovation. **(2marks)**.
- ii) State the historical innovations that facilitated this concept **(2marks)**.

QUESTION THREE **(20MARKS)**

- a. Briefly discuss the features of the first Roman road including an explanation of its usefulness **(12marks)**.
- b. Discuss the historical contribution of Tresaquet, a French to the road construction system **(6marks)**.
- c. Discuss how Telford, a Scottish surveyor and engineer improved on Tresaquet's road construction technique **(2marks)**.

QUESTION FOUR **(20MARKS)**

The discovery of steel as a construction material revolutionized the construction industry.

- a. Discuss the historical development of steel as a construction material **(17marks)**.
- b. State properties of steel that gives it prominence in the construction industry **(3marks)**

QUESTION FIVE **(20MARKS)**

- a. Briefly state what materials of construction were used in construction before the advent of manufactured materials **(4marks)**.
- b. How did the historical shelters of the Aborigines compare with the historical African hut? **(6marks)**.
- c. Discuss the technologies of construction that were employed in the City of Manitoba with respect to log and light wood frame construction **(10marks)**.