



**MAASAI MARA UNIVERSITY  
REGULAR UNIVERSITY EXAMINATIONS  
2022/2023 ACADEMIC YEAR  
FIRST YEAR SECOND SEMESTER**

**SCHOOL OF ARTS, HUMANITIES, SOCIAL AND  
CREATIVE ARTS  
BACHELOR OF ARTS IN COMMUNITY  
DEVELOPMENT**

**COURSE CODE: CMD 1209-1  
COURSE TITLE : INTRODUCTION TO PROJECT  
MANGEMENT**

**DATE:**

**TIME**

---

**INSTRUCTIONS TO CANDIDATES**

- *Answer question ONE (compulsory) and any other TWO questions.*
- *Question one carries 20 marks*
- *All other questions carry 15*

## **QUESTION ONE**

**Read the following case study and answer the questions that follow.**

Steel, the most recycled industrial material in the world, was produced through highly energy intensive methods. Though the energy used to produce steel has been reducing since the 1960s, it consumed 6% of all the power generated in the world, and accounted for 6.7% of all the CO<sub>2</sub> emissions. The European Union was targeting to cut its emissions to 80 – 95% of the 1990 levels by 2050 through the adoption circular economy and was looking at closing the loop of product lifecycles through recycling and reuse. As far as the steel industry was concerned it was looking at increasing the efficiency of production, and redesign processes to reduce CO<sub>2</sub> emissions. In this direction, in 2004, eight steel makers in Europe along with Europe 48 universities and research organizations formed a consortium Ultra-Low Carbon Dioxide Steelmaking (ULCOS. The main objective of ULCOS was to identify technologies and processes to help reduce carbon emissions, ensure energy efficiency, and achieve flexibility in the selection of raw materials in the steel industry. The consortium decided to bring improvements to the steel making process and looked at several ways to bring changes in the way steel was manufactured in an economically and environmentally viable manner. In this direction, European unit of India-based steel major Tata Steel was chosen to execute the € 75 million project to develop a new technology. This resulted in HIsarna steelmaking process, which consisted of two different processes, one from metal and mining company Rio Tinto and another from Tata Steel. The process was developed and tested at Tata Steel's IJmuiden plant in the Netherlands. After several years of experiments and trial runs HIsarna was successful in reducing the carbon footprint in steel production by 20%. By capturing the pure CO<sub>2</sub> that was generated during the process, the carbon footprint could be 80% smaller. "HIsarna's results show we can make a significant contribution to improving the sustainability of steel production with this Tata Steel technology. The development of this technology forges our ambition to become a steel company which is sustainable in all respects," 2 said Hans Fischer, Chief Executive Officer and Chief Technical Officer of Tata Steel's European operations. The steel makers were of the view that HIsarna technology would prove to be a game changer in the steel industry, pave the way for sustainable steel production globally and also offer solutions to challenges like increasing pollution, growing CO<sub>2</sub> and greenhouse gas emissions, and climate change.

## **Required**

- a) What are the roles and responsibilities of the project manager of TATA Steel Plant towards reduction on air pollution? **(5 Marks)**
- b) Explain some of the constraints on completion of project carried out by the TATA Steel's European operations. **(6 Marks)**
- c) Giving examples, explain the dimensions of project feasibility analysis carried out by the TATA Steel Company towards combating greenhouse gas emissions. **(6 Marks)**
- d) Risk analysis is a very important exercise in project management, citing examples from the above case, highlight areas where risk analysis been carried out. **(3 Marks)**

## **QUESTION TWO**

- a) Explain what is meant by stakeholder management and describe how the project manager ensures stakeholder co-operation. **(9 Marks)**
- b) Explain the Tetrad principle and highlight how it impacts project implementation. **(6 Marks)**

## **QUESTION THREE**

- a) As a project manager, explain any three approaches that you would apply to mitigate project Risks. **(9 Marks).**
- b) Evaluate three common reasons that may lead to project failure. **(6 Marks).**

## **QUESTION FOR**

- a) You have been appointed as a Project Officer in your village. Explain your major roles as a community development worker in any society **(10 Marks)**
- b) Explain why it is essential to conduct project evaluation **(5 Marks)**

## **QUESTION FIVE**

A logical framework facilitates effective project planning, implementation, monitoring and evaluation. Using a specific project, discuss the logical framework approach. **(15 Marks)**

**//END**