## BINDURA UNIVERSITY OF SCIENCE EDUCATION

## **FACULTY OF SCIENCE EDUCATION**

## SCIENCE AND MATHEMATICS EDUCATION DEPARTMENT

**CHE112** 

History and Philosophy of Chemistry

× AUG 2024

Programme:

**HBScEdCH** (Block Release)

**Duration:** 

3Hours

**Total Marks** 

100

## Instructions to Candidates

- 1. Answer any 3 questions.
- 2. Each question should start on a fresh page.
- 3. Relate your answers and examples to the Zimbabwean Context.
- 4. Each question carries 100 marks.
- 1. Explore how the concept of empiricism has been applied in the generation of chemical knowledge?
- 2. To what extent does the interplay between idealism and instrumentation shape our understanding of reality and knowledge in the fields of science, technology, and philosophy
- 3. Discuss the factors that have led to the reemergence of indigenous knowledge systems in recent years.
- 4. Explain how advancements in chemistry have shaped and continue to shape society
- 5. a) How does the nature of science, as a systematic and evidence-based inquiry, differ from the way indigenous knowledge systems traditionally acquire and transmit knowledge?
  - b) Discuss the strengths and limitations of each approach in understanding and explaining the natural world.

**End of Examination Paper**