## THE ROLE OF ARTIFICIAL INTELLIGENCE AND EXPERT SYSTEMS IN THE IMPLEMENTATION OF ZIMASSET

## Paul Simbarashe Mupfiga and Stewart Fohlo Midlands State University, Zimbabwe

## **ABSTRACT**

This research was aimed at establishing how the Zimbabwean Government can use the concept of Artificial Intelligence & Expert Systems as a driver for implementing ZIMASSET. It will highlighted how Artificial Intelligence & Expert Systems can be used at each cluster, what benefits can be realized from integrating Artificial Intelligence & Expert Systems at each cluster and how Artificial Intelligence & Expert Systems can be integrated in the current government programs so as to enhance the implementation of ZIMASSET. The research adopted a descriptive, explanatory and exploratory research to draw conclusions from data collected & gathered information on using Artificial Intelligence & Expert Systems as a driver for implementing ZIMASSET. The findings of this research were used to recommend to the Zimbabwean Government how to adopt the concept of Artificial Intelligence & Expert Systems as a driver for implementing ZIMASSET and its benefits.

**Keywords:** Artificial Intelligence, Expert Systems, agent systems, robotics and information communication technology

## INTRODUCTION

Zimbabwe experienced a deteriorating economic and social environment since 2000 that was caused by illegal economic sanctions imposed by the Western countries. This resulted in a deep economic and social crisis characterized by a hyperinflationary environment, industrial capacity utilization of below 10% and an overall cumulative Gross Domestic Product (GDP) decline of 50% by 2008. To guide national development for the next five years, the Government has crafted a new economic blueprint known as the Zimbabwe Agenda for Sustainable Socio-Economic Transformation (Zim Asset).