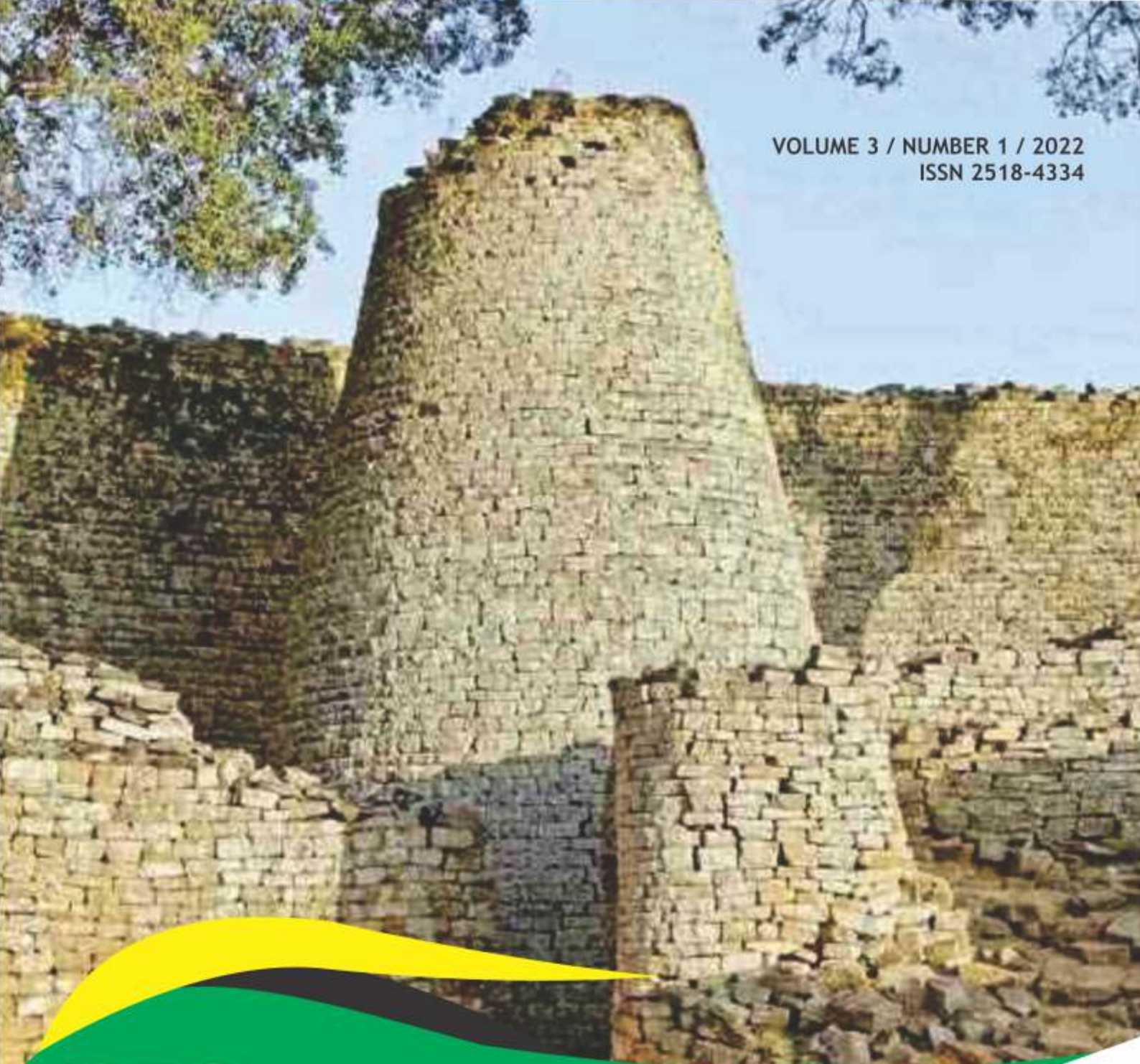


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## EDITORIAL

This issue of *Dzimbahwe Journal of Multi-Disciplinary Research* follows Volume 2 Number 1 of 2017. Unforeseen publication challenges and complications of the Covid-19 pandemic slowed down activities. As Postgraduate Studies and Publications Department we celebrate this production, *Dzimbahwe Journal of Multi-Disciplinary Research* Volume 3, Number I and would wish to assure contributors that there shall be a publication annually. Journal operations have been revised to align with the recently introduced Heritage based Education 5.0, a shift from Education 3.0, a philosophy that previously guided Zimbabwean education. Education 5.0 concerns itself with 5 pillars of education that are Teaching, Research, Community Engagement, Innovation and Industrialisation. This issue also marks the point at which the journal becomes an online journal. Driven by revamped publications and editorial policies, as well as revised editorial and advisory boards, there is a promise of rigour, efficiency, compliance and relevance.

This issue contains seventeen articles which are grouped into sections. Section A deals with research in Agriculture and Natural Sciences while Section B caters for articles in education in the era of Covid-19. Section C contains articles on trade and commerce while Section D carries articles on gender based violence.

### SECTION A: AGRICULTURE AND NATURAL SCIENCES

In a paper they have entitled ‘Chisumbanje vertisols’ potential as a feed additive in beef feedlot rations: A systematic review’, Maredza, Chigede, Manyanga, Hungwe and Muvhuringi contest that besides their excellent cation exchange capability, clays have unique physical and chemical properties that make them ideal as animal feed additives. These researchers go on to state that global use of various clays and commercial derivatives as feed additives has sparked interest in using vertisols in cattle feedlot rations. In this particular research set out to assess the potential efficacy of bentonite/smectite clays as feed additives in beef feedlot rations, the conclusion is that the inclusion of clay in diets of cows results in a higher rumen pH, a scenario ideal for the rumen microflora.

The article ‘Potential risk factors for avian pathogenic *Escherichia coli* (APEC) transmission in Southern African chicken flocks: A review’ by Marumure raises a health concern. The article notes that avian colibacillosis, caused by avian pathogenic *Escherichia coli* (APEC), appears



to be of increasing concern in both poultry and human health in Southern Africa, but no conclusive studies on the potential risk factors associated with its spread in the region have been conducted. The research sought to assess the potential risk factors in light of APEC transmission. Anthropogenic factors, poultry housing conditions, access to contaminated water and feed, exposure of poultry to viral or other pathogens, and proximity of poultry farms to other poultry farms or other animals, have all been identified as potential risk factors.

Nhara, in 'Phenotypic characterisation of indigenous goats in Chiredzi resettlement areas' phenotypically characterises goats and their production environment in Chiredzi resettlement areas. This study concluded that goats in Chiredzi resettlement areas were mainly short eared small horn breeds, and were adapted to harsh conditions. However, she proposes molecular characterisation to quantify breed type and genetic erosion.

Mudzengi, in her article 'Assessment of alien invasive plant species along a distance gradient from dip tanks in a Highveld Area' establishes an inventory of alien plants around dip tanks. Results indicated proliferation of alien species such as *Lantana camara*, *Oxalis latifolia*, *Tagetes minuta*, *Cassia rotundifolia*, *Richardia scabra*, *Bidens pilosa* and *Datura stramonium*. along a distance gradient from the dip tanks. She recommends early management of invasive species in order to curb serious long-term adverse impacts, as these species can alter soil edaphic properties, out-compete indigenous species, and change ecosystem functions, ultimately leading to rangeland degradation.

In his article entitled 'Efficacy of paw paw (*Carica papaya*) leaf extracts on growth of *Fusarium* wilt of coffee' Chidoko established a trial to evaluate the efficacy of paw paw leaf extracts on *Fusarium* growth under laboratory conditions. The results showed that *C. papaya* possesses essential elements which can be harnessed in the management of *Fusarium* wilt of coffee. The findings of this study can be used as a foundation for the use of biocontrol agents in the management of *Fusarium lateritium* of coffee.

In their article, 'Evaluating cured manure (Bokashi) as an agroecological climate resilience strategy in crop production in Gutu District of Zimbabwe,' Gwatirisa, Gombera, Chaduka, Bonyongwe and Mungani explored the use of cured manure (Bokashi) and its awareness among smallholder farmers in Gutu District, Zimbabwe. Three treatments (cured manure, non-cured

manure and ordinary soil) were experimented in four nutritional gardens under peas and rape crops. Recommendations for Bokashi cured manure use are suggested.

## **SECTION B: EDUCATION**

Machibaya's article entitled 'Indigenous basils for women ailments: A case of women in Chivi Central District of Masvingo Province, Zimbabwe' focuses on the types of indigenous basils common among Shona women in Chivi Central District of Masvingo Province, Zimbabwe. Findings of this study showed that in Chivi Central, elderly women are well versed with medicines for most common diseases of women. The women are knowledgeable and are assisting fellow women with herbs in the community. The study concludes by highlighting ways of making sure that these IKS are not only for the elderly but are shared across all age groups for the benefit of every member and all generations, and for the development of the society. Machibaya proposes that it is best for all women regardless of age to share this precious knowledge for the benefit of everyone in the society and the nation at large, and should be used to generate income for women.

In 'Practices that support effective inclusive teaching practice supervision: voices from the grassroots in primary and secondary schools in Masvingo District,' the contributor, Mahanya, observes that supervision of university specialist trainee teachers for learners with disabilities is assumed to be a professional service involving relevant specialised knowledge. The article recommends that the Ministry of Primary and Secondary Education, in partnership with university specialist teacher training institutions should hold training workshops to equip all school leaders with requisite supervision skills that will help them understand leadership roles in inclusive education.

In 'An evaluation of the adapted Population, Experience, Results, Method (PERM) framework towards formulating main research questions and topics for qualitative studies in teacher education', Mpofo evaluates the usability of a PERM framework in formulating research questions and topics for qualitative studies in teacher education. The framework was adapted from the Population/Patients, Exposure, Outcomes (PEO) framework which has successfully been used in formulating research questions and topics in health education. The results showed that although the adapted PERM framework has benefits and limitations, it is capable of formulating research questions and topics for qualitative studies in teacher education. The



author recommends that the usability of the PERM framework be further tested for wider application and that it be adopted in teacher education research studies.

Washaya's article 'Plagiarism and its effects on the quality, credibility and integrity of student research at GZU', explores the existence of academic dishonesty as it impacts on the ability to write assignments and research projects by Great Zimbabwe University students from Gary Magadzire School of Agriculture. He concluded that students plagiarized and might not be aware of the consequences of such behaviour. Therefore, there is a need for training on plagiarism in order to at least enlighten both students and staff that plagiarism is an academic offense, and efforts to stamp out the behaviour are critical.

Mupfiga in 'Experiences of university hospitality students on work related learning during the time of COVID-19 in Zimbabwe,' observes that the Covid-19 pandemic created the largest disruption on education systems including Work Related Learning (WRL) due to accompanying restrictions. Similarly, the hospitality industry was severely affected by the pandemic because it is highly dependent on people travelling and being physically present, as opposed to other industries that permit serving clients remotely. The article recommends interventions to be crafted by universities together with other critical stakeholders to ensure that WRL remains relevant and effective during and post the pandemic.

The article 'The dawn of Education 5.0 Philosophy: Implications on pedagogics of musical arts education in universities, Zimbabwe,' by Zinhuku asserts that musical arts education has a critical role to play in the realisation of the Education 5.0 trajectory. This study sought to examine how musical arts education in universities can align with Education 5.0 and deliver tangible goods and services in their creative space. Observations are that there is a scarcity of information concerning strategies and ideas on how music education in universities can align with the new Heritage Based Education 5.0 ideology. The research proposes a model which may be implemented on how universities may improve the music education output in order to effectively contribute to Education 5.0 implementation.

Manyanga in 'The influence of Covid-19 pandemic on academic performance of university students in Zimbabwe,' assesses challenges affecting the performance of students at tertiary institutions in Masvingo and their social wellbeing due to Covid-19 induced lockdowns.

The article by Mabika and Maireva titled ‘Education 5.0 in the face of Covid-19: Zimbabwe Higher Education Institutions’ response two years on’ focuses on how Covid-19 propelled institutions into blending online, distance and face-to-face teaching. This research observes that the transition was sudden and difficult because of challenges of infrastructure, connectivity and lack of funding. The study recommends that blended learning be strengthened.

Chigede in ‘The effectiveness of virtual agricultural sciences training during Covid-19 lockdown in Zimbabwe’ researches on the coming of the COVID-19 pandemic which disturbed the normal flow of training in higher learning institutions. He says that COVID-19 was easily spread by close contact hence governments had to enact legislation to protect the public by prohibiting congregation. This resulted in virtual learning, a method that is difficult for hands-on training skills, as in the case of agricultural sciences. Chigede notes that there is paucity of information with regards to effectiveness and challenges confronting program specific requirements hence the need to assess effectiveness of the virtual classroom on agricultural sciences.

### **SECTION C: TRADE AND COMMERCE**

Chidoko in ‘Policies governing trade of maize in Zimbabwe and the effect on production and trade volume’ carried out a qualitative study that focuses on policies on maize production and subsequent trade volumes in Zimbabwe for the period 2009 to 2020. His analysis took the form of comparison of the pre and post policy implementation situations, and inferences on effectiveness. The study found out that Zimbabwe has well developed policies that deal with the production and trade of the said crop. However, despite well-developed policies and subsequent trade, the country continues to import the bulk of its food for local consumption due to implementation challenges that render the whole effort of policy formulation ineffective.

### **SECTION D: GENDER BASED VIOLENCE**

Ruombwa and Nyawo in ‘Gender based violence of employees at the workplace in Zimbabwe: Experiences from survivors,’ note that sexual gender based violence among employees in employment in the public sector and private sector continues to rear its ugly head with disturbing frequency. It is proposed that Zimbabwe comprehensively address the phenomenon of sexual gender based violence and sexual harassment because it is a barrier to the right to

access equal rights, the right to equal dignity, the right to equal opportunities and the right to non-discrimination.