



WHERE IDEAS GROW WINGS

RESEARCH AND INNOVATION NEWSLETTER

JULY TO DECEMBER 2025



Prof. G. Mugumbate

Pro-Vice Chancellor – Research,
Innovation, and Industrialisation

“Our work reflects a clear shift towards research that is collaborative, practical, and responsive to real economic and social needs.”

PRO-VICE CHANCELLOR RESEARCH, INNOVATION AND INDUSTRIALISATION'S REMARKS

I am pleased to share this edition of our Research and Innovation Newsletter, which captures the energy, commitment, and thoughtful work taking place across our institution. Research and innovation continue to sit at the centre of who we are and what we stand for, shaping ideas, informing decisions, and delivering solutions that matter to society and industry alike.

In a world that is changing quickly and often unpredictably, our academics, innovators, and postgraduate students have shown remarkable resilience and creativity. The work featured in this issue speaks to more than academic achievement; it reflects a clear shift towards research that is collaborative, practical, and responsive to real economic and social needs.

I am especially encouraged by the growing alignment between our research priorities, national development goals, and industry expectations. This alignment strengthens the relevance of our work, opens doors to meaningful partnerships, and helps ensure that ideas developed in our laboratories, offices, and communities find their way into practical application.

As an institution, we remain committed to supporting this journey by strengthening research capacity, improving systems and infrastructure, and creating space for innovation to grow. I encourage our researchers to continue publishing with purpose, protecting their intellectual contributions, exploring opportunities for commercialisation, and mentoring those who will carry this work forward.

I would like to thank all contributors featured in this edition, as well as the many colleagues who quietly support research and innovation behind the scenes. Your efforts are shaping our institutional reputation and laying a strong foundation for the future.

I invite you to engage with this newsletter, celebrate the achievements shared, and be inspired to collaborate, innovate, and continue pushing the boundaries of knowledge.

Prof. G. Mugumbate

Pro-Vice Chancellor – Research, Innovation, and Industrialisation



Professor G. Mehlana
Executive Director
Research and Innovation Division

EXECUTIVE DIRECTOR'S NOTE

The second half of 2025 has been a period defined by strategic growth, national impact, and rising global visibility for Midlands State University's (MSU) Research and Innovation Division.

This edition highlights our key milestones: the vibrant Research, Innovation and Industrialisation Expo; regional and continental awards affirming our leadership; and groundbreaking collaborations that cement our role as a hub for applied research.

Our SARIMA Regional Excellence Award for Innovation Management testifies to MSU's expanding ecosystem, while global honours in chemistry and continental recognition for student innovators reflect the depth of talent within our community.

Across faculties, transformative research continues to advance. From climate and health collaborations to bioinformatics breakthroughs, engineering-led industrialisation, and digital transformation in education, our scholars are generating knowledge that shapes national development and contributes to Africa's future.

The Division has also deepened engagement through benchmarking visits, capacity-building workshops, ethics campaigns, and new regional and international partnerships. Our commitment to research integrity, industry-facing talent, and innovation-led enterprise has never been stronger.

Through our growing portfolio of podcasts, induction programmes, start-up incubations, and faculty-driven innovations, we are cultivating a university-wide culture of inquiry, creativity, and real-world impact. As MSU celebrates 25 years of excellence, our vision remains clear: to drive research that transforms communities, accelerates industrialisation, and positions Zimbabwe firmly within global knowledge economies.

To every researcher, innovator, partner, and supporter, thank you for your dedication. Together, we continue to turn ideas into impact.

"Innovation is not an event; it is our identity. At MSU, we rise by creating."

EDITORIAL NOTE

As Midlands State University celebrates 25 years of excellence, this edition of the Research and Innovation Division Newsletter reflects a university firmly focused on impact. The achievements highlighted here demonstrate a clear shift from research as inquiry to research as action, advancing national development, industrialisation and global engagement.

From award-winning innovations and high-impact research to strategic partnerships and student-led breakthroughs, the Division continues to strengthen an ecosystem where ideas are translated into practical solutions. These milestones affirm MSU's commitment to Education 5.0 and to research that is ethical, relevant and responsive to societal needs.

Most importantly, this edition celebrates people – researchers, innovators, students and partners – whose collective effort drives the University's growing influence regionally and internationally.

As you read on, the message is clear: at MSU, innovation is purposeful, research is impactful, and the future is being actively shaped.



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MAJOR MILESTONES

MSU Celebrates Six Awards at Presidential Innovation Fair

Midlands State University (MSU) affirmed its role as a leading innovation hub, winning six awards at the 3rd Presidential Innovation Fair.

The event, held on December 11, 2025, in Harare, focused on “Innovation for economic growth: From prototype to commercialisation.”

His Excellency President Cde. Dr. E.D. Mnangagwa set the tone, urging innovators to be globally competitive and emphasising the critical need to commercialise research.

This vision was echoed by officials who described the fair as a direct platform connecting innovators with investors.

MSU's award-winning achievements included:

- **Dr. N. Zinyama:** 2nd Place, Women Innovator, for groundbreaking breast cancer therapy research.
- **Industry-Academia Collaboration:** 2nd Place for co-developing the **Duraisiphala 263** ICT platform with government and university partners.
- **Mr. Landel Lunga:** 2nd Place, Student Innovator, for eco-friendly production of ferric and ferrous sulphate from scrap metal.
- **Mr. T.C Madzokere:** 2nd Place, Mining Category, for novel nano-engineered

reagents for mineral processing.

- **Institutional Excellence:** 3rd Place, recognising MSU's overall research and development ecosystem.
- **Mr. A. Chindedza:** 3rd Place in the competitive innovation business pitching segment.

These collective awards underscore MSU's commitment to advancing a knowledge economy and nurturing impactful innovators.





MSU Research, Innovation and Industrialisation Expo 2025: Transforming Ideas into Impact

MSU reaffirmed its position at the forefront of national innovation by hosting the 2025 Research, Innovation and Industrialisation Expo on 5 September 2025.

Transforming the Gweru Main Campus into a hub of intellectual exchange, the event, themed 'Transformative Research and Innovation at 25: Innovating Today, Sustaining Tomorrow,' attracted a diverse delegation of academics, industry leaders, researchers, students, and government officials who explored pathways to scale the University's innovations for national development.

The 2025 Expo reaffirmed MSU's role as a national powerhouse, demonstrating how academic rigour, industrial collaboration, and visionary leadership are building a blueprint for a prosperous Zimbabwe.



RESEARCH, INNOVATION AND INDUSTRIALISATION EXPO AWARDS

Best Exhibition Stand

- 1st – Faculty of Science and Technology
- 2nd – Ministry of Environment, Climate and Wildlife.
- 3rd – Chinhoyi University of Technology

Recognition For Innovations/Projects That Were Recognised Nationally

- Chemcay Solutions
- Coal Tar
- Silverpure–Waste Management
- NerdIQ–Chemistry Lab Virtual Reality
- Drug Discovery Research Group–Anti-malaria Drug Development
- Mbira Deze–Mr Almon Moyo
- Pathology Centre

Mentorship Award: Honours an individual who has excelled in guiding students (MPhil and DPhil) or junior researchers

- 1st– **Professor Langtone Maunganidze** – Faculty of Social Sciences
- 2nd– **Dr Enard Mutenheri** – Faculty of Business Sciences
- 3rd– **Dr Prestige Tatenda Makanga** – Faculty of Built Environment, Art and Design

Best Innovator Award: Honours an individual, student or staff member who has developed a groundbreaking innovation that has the potential for commercialisation

- 1st– **Actor Zonde** for patenting and commercialising a method for modifying coal tar using nanoparticles.
- 2nd– **Andrew Chindedza** for the development of modularised electrolytic units used in producing chemicals for wastewater treatment
- 3rd– **Dr Teclar Usai** for developing a wide range of food products using indigenous fruits

Best Female Innovator Award: Honours a female innovator whose work demonstrates creativity and potential real-world impact

- 1st– **Dr Winmore Kusena** for developing a wide range of cosmetic products
- 2nd– **Dr Teclar Usai** for developing food products using indigenous fruits
- 3rd– **Stacey Mtetwa** for developing Silver Pure for organic waste treatment

6. Best Early Career Research Award

Awarded to a promising researcher in the early stages of their career.

- 1st – **Dr Prestige Makanga**: Investigates how physical and social environments affect maternal and infant health, characterising exposures such as air pollution, heat, and healthcare access.
- 2nd – **Mr Oshneck Mupepi**: Maps environmental hazards,

RESEARCH, INNOVATION AND INDUSTRIALISATION EXPO AWARDS



land-use change, and agricultural vulnerability in Zimbabwe's arid regions using GIS and remote sensing to inform climate adaptation strategies.

3rd – Dr Fanuel Songwe: Integrates biotechnology with immunology and diagnostics, exploring combined Plasmodium immunotherapy and chemotherapy to inhibit tumour growth in models.

7. Most Creative Arts Showcase

Awarded for outstanding artistic innovation in visual, performing, or digital arts.

1st – Mr Paul Dumisani Bajila: The Ubuntu Prize for Neo-African Choral Composition.

2nd – Dr Betty Shoko: Textile Waste Management.

3rd – Ms Agnes Nombembe: Digitisation of Folktales.

8. Best Female Researcher Award

Celebrates outstanding research contributions by a female academic.

1st – Professor Chipo Hungwe: Examines the lived experiences of vulnerable groups, including women with disabilities, older adults and migrants, to expose inequalities and inform inclusive policy.

2nd – Dr Piwai Tshuma: Develops advanced MOF-based catalysts to capture and convert CO₂ into valuable chemicals, offering scalable green-chemistry solutions.

3rd – Dr Chipo Mutongi: Researches knowledge management, strategic leadership and organisational learning, exploring frameworks to enhance institutional effectiveness and SME growth.

9. Most Impactful Innovation Award

Recognises an innovation with potential for tangible societal, industrial or academic impact.

1st – Faculty of Science and Technology: Development of modified coal tar for road surfacing.



RESEARCH, INNOVATION AND INDUSTRIALISATION EXPO AWARDS

2nd — Andrew Chindedza: Modular electrolytic units for producing wastewater treatment chemicals.

3rd — Almond Moyo: Mbira Deze.

10. Most Impactful Research Award

Recognises researchers who have significantly advanced knowledge or practice in their field.

1st — Professor Mark Matsa: A leading scholar in climate change, disaster risk and community resilience, with over 60 Scopus-indexed publications providing critical insights into adaptation and sustainable livelihoods.

2nd — Professor Mambo Moyo: Focuses on developing affordable, efficient electrochemical solutions for clean water and green technologies.

3rd — Professor Cosmas Parwada: Advances soil science and sustainable agriculture, deepening understanding of soil fertility and climate impacts to support resilient food systems.

11. Best Innovative Faculty Award

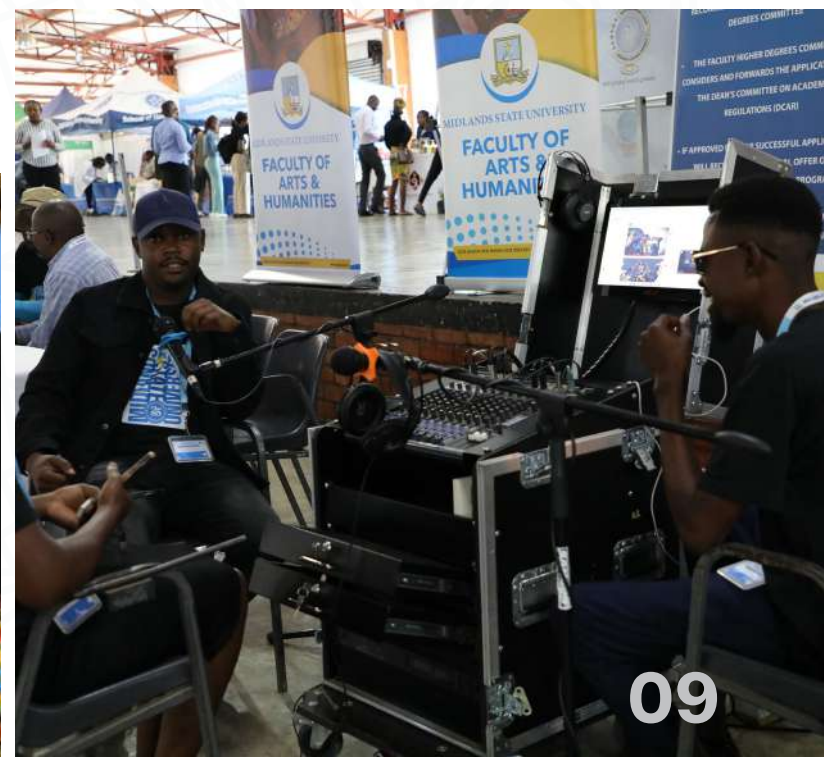
Recognises a faculty demonstrating outstanding innovation in teaching, research or community

engagement.

1st — Faculty of Science and Technology: Leads MSU's innovation output with nationally impactful projects, including modified coal tar, commercialised natural juices, a chemical manufacturing unit, vehicle number plate production, and numerous start-up ventures.

2nd — Faculty of Social Sciences: Produced over 200 Scopus-indexed outputs since 2023 and drives development through partnerships with Midlands Province, BEAT AFRIKA, Chikomba RDC, and the Gweru Residents Forum.

3rd — Faculty of Engineering and Geosciences: Expands global reach through an MoU with VIT-AP University (India) and collaborations with 15 Belarusian universities. Advances key projects, including the Holy Cross wastewater treatment plant, black granite beneficiation, and the new Mutoko Campus, with impactful research in mineral beneficiation and renewable energy.



AWARDS AND RECOGNITION

MSU's Team HiveFive Wins Third Place at National Econet E-novate Expo

Midlands State University's innovations earned national recognition as Team HiveFive secured Third Place at the 2025 EcoCash Hackathon held under the theme "Building Youth-Centric Financial Solutions".

Competing against teams from six universities, the MSU team – Takudzwanashe Mahachi, Tanaka Chiwenga, Boitumelo Ngwenya, Vimbainashe Mandaza, and Julius Tamangani – developed HiveFund, a digital finance solution that integrates EcoCash APIs to promote youth financial inclusion, savings, entrepreneurship, and financial literacy.

The project was celebrated for its strong technical execution, creativity, and practical relevance.

This achievement reflects MSU's commitment to nurturing holistic students and advancing applied research through structured mentorship within the University's innovation ecosystem.



MSU Triumphs at Midlands and Zimbabwe Agricultural Shows

MSU earned significant recognition at two major national events in August 2025, underscoring its leadership in innovation and sustainability.

At the Midlands Agricultural Show, MSU was awarded Overall Best Tertiary Institution and Top Government Department, while the Campus Radio placed third in the Commercial Small-to-Medium Communications category.

MSU also won the Best Overall Stand for the university's climate-smart exhibition and attracted visits from His Excellency, President Cde. Dr. E.D. Mnangagwa and the Guest of Honour, President M. C. Ramaphosa.

The Faculty of Agriculture, Environment and Natural Resources Management received three further sectoral awards for agricultural innovation.

These accolades demonstrate MSU's commitment to translating research into real-world impact.



MSU Wins Prestigious SARIMA Regional Excellence Award

In September 2025, MSU received the Regional Excellence Award for Organisational Growth in Innovation Management at the Southern African Research and Innovation Management Association (SARIMA) Annual Conference in Cape Town.

This award recognises MSU's outstanding progress in building innovation capacity, advancing commercialisation, and driving a sustainable regional ecosystem anchored on Education 5.0.



Students Crowned National Biotechnology Champions

Third-year Bioinformatics and Biotechnology students Elias Fambayi and Mpho Langalaga were named national champions at the inaugural National Biotechnology Authority Expo.

They won the Best Oral Presentation Award for their research, "Rational Design of a Multi-Epitope-Based Lassa Fever Vaccine," showcasing the application of computational methods to global health challenges.

Professor Gift Mehlana Honoured with Global Chemistry Award

Professor Gift Mehlana, Acting Executive Director of Research and Innovation, was awarded the 2025 TWAS-Atta-ur-Rahman Award in Chemistry in Rio de Janeiro on 2 October 2025.

Presented by The World Academy of Sciences, the award honours exceptional scientific contributions and mentorship from developing nations.

Professor Mehlana dedicated the accolade to the MSU community, stating it proves that "world-class science can thrive even in resource-limited environments."



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Incubated Start-Up NerdIQ Wins Continental Accolades

NerdIQ Technologies, a start-up incubated at the MSU Innovation Hub, won two honours at the African Excellence Awards 2025: Most Innovative EdTech Solutions Company and App Developers of the Year.

The founders credited the MSU innovation ecosystem for nurturing their work in creating technology-driven education tools for African learners.

STRATEGIC ENGAGEMENTS

MSU & NMB Bank Ignite AI Hackathon to Power Zimbabwe's Digital Future

MSU partnered with NMB Bank and its tech subsidiary XPlug to host a high-energy AI-Driven Hackathon on 18 September 2025.

Under the theme “Loyalty Reimagined,” MSU’s top tech minds competed to design intelligent customer-engagement solutions using AI and location data.

Vice Chancellor Professor V.N. Muzvidziwa opened the event, hailing it as “the ignition of ideas.” Stemming from a strategic MoU, the hackathon aimed to accelerate digital innovation, nurture talent, and identify scalable projects.



University of Zambia Benchmarks MSU Innovation Hub

MSU hosted a delegation from the University of Zambia for a benchmarking visit to the Innovation Hub from 21 to 22 August 2025.

The engagement strengthened academic linkages and explored pathways for joint research, co-innovation, and shared incubation models, underscoring MSU’s role as a regional collaboration hub.

The winners were:

- 1st: Smart Rewards (Takudzwa Mahachi & Nonokai Siziba) – USD 1,500
- 2nd: Bank Loyalty System (Tinotenda Murinye) – USD 1,000
- 3rd: AI-Powered Voice Transaction Manager App (Talent Chigwagwa & Anopa S. Maisiri) – USD 500



MSU Advances Partnerships at India–Zimbabwe Business Conclave

Senior MSU leaders joined a high-level national delegation at the CII India–Zimbabwe Business Conclave in New Delhi in August 2025.

The Conclave served as a strategic platform to explore collaborations in energy, digital innovation, health sciences, and higher education modernisation.

MSU held bilateral meetings with leading Indian institutions, including the Institute of Management Technology (Hyderabad) and Amity University, discussing curriculum co-development, joint research, and digital learning partnerships.

The delegation also identified potential partners for laboratory equipment and innovation ecosystem development during technology exhibitions.

The India–Zimbabwe Business Conclave opened strategic pathways for MSU to advance innovation, research collaboration, and higher education modernisation through global partnerships

MSU Hosts Benchmarking on Medical and Animal Research Ethics

The Research and Innovation Division hosted two key engagements to strengthen research integrity:

A two-day benchmarking exercise with the Medical Research Council of Zimbabwe (MRCZ), focusing on ethical standards for human and animal subjects in clinical research.

An awareness campaign with the National Animal Research Ethics Committee (NAREC), building capacity for ethical animal-based research.

These initiatives reinforce MSU's commitment to a research culture that meets national and international ethical standards.

Young Scientists Represent MSU at Prestigious Lindau Nobel Laureate Meeting

Ms. Mercy Chaparadza and Ms. Lendly Moyo from the Catalysis and Porous Materials Research Group made history as the first Zimbabweans selected for the Lindau Nobel Laureate Meeting in Germany.

Joining over 600 global young scientists and Nobel Laureates, they gained frontier insights into climate change, sustainable chemistry, and AI in science.

Their participation elevates MSU's international research profile and opens new avenues for collaboration.

Researchers Gain Expertise at International Drug Discovery Workshop

Two researchers from MSU's Drug Discovery and Informatics Group participated in the RAFIKI International Preclinical Drug Discovery Workshop at Stellenbosch University.

The intensive programme provided hands-on training in the entire preclinical pipeline, from computer-aided drug design to assay development.

The participants described it as an "empowering opportunity" to advance therapeutic innovation for Africa's health priorities.



CAPACITY BUILDING INITIATIVES

The Research and Innovation Division Deepens Reach at Zvishavane Campus

In August, the Research and Innovation Division conducted a two-day awareness campaign at the Zvishavane Campus, engaging staff and students from the Faculties of Engineering and Geo-Sciences and Arts and Humanities.

Held with faculty leaders and Research and Innovation Liaison Officers (RILLOs), the campaign outlined the Division's support framework, focusing on incubation, grant facilitation, business development, consultancy, and commercialisation pathways to strengthen the research-to-market pipeline.

New Cohort of Innovators Inducted

A two-day Induction Training Workshop was hosted in October 2025 to onboard a new cohort of resident and staff innovators into the MSU ecosystem.

The workshop covered the incubation process, product development, intellectual property, commercialisation, and market readiness.

Six new projects were successfully incubated, advancing the University's innovation-driven entrepreneurship.

University Strengthens Research Mentorship Culture

MSU reinforced its commitment to research excellence through a hybrid capacity-building session focused on strengthening its institutional mentorship programme.

The session connected senior academics with emerging researchers to build productive mentor-mentee partnerships.

The Acting Deputy Director for Research and Innovation, Dr Chitima, emphasised mentorship as a "dynamic cycle of learning" essential for academic progression.

This initiative supports MSU's vibrant research culture, reflected in its rise to 18th place in the 2024 Times Higher Education Sub-Saharan Africa Rankings, and builds a stronger foundation for impactful research.



RESEARCH COMMUNICATION AND MEDIA

Showcasing MSU Research Through Podcasts

The Research and Innovation Division launched a podcast series to amplify the reach and impact of the University's research.

This platform features in-depth conversations with MSU scholars, highlighting groundbreaking work in climate resilience, public policy, education innovation, environmental science, and social transformation.

The series bridges academia and the public, sharing insights on climate adaptation, educational reform, public health, and social justice.

It affirms MSU's role as a thought leader and strengthens evidence-based knowledge sharing.

Researchers interested in being featured are encouraged to register through the Research Management Office.

Contact:
Research Manager

Phone: +263 773 632 815

Email- kusenaw@staff.msu.ac.zw

Join the platform that tells the MSU research story—one voice at a time.



FACULTY RESEARCH HIGHLIGHTS

Faculty of Education Drives Digital Transformation

The Faculty of Education reinforced its leadership in technology-enabled learning by hosting two landmark events.

The STEM Leadership and Strategy Symposium, themed “Pioneering a Digital Future,” united government ministers, tech leaders and educators to advance STEM in Zimbabwe.

In partnership with Clark University (USA) and Nelson Mandela University (South Africa), it equipped teachers with practical AI, robotics and coding skills. Pro-Vice Chancellor Professor G. Mugumbate stated MSU is “igniting a revolution” in education.

Building on this, the faculty hosted the 2nd International Conference on African Education under the theme “Reshaping Education in the 21st Century.”

The conference explored ethical AI integration and digital inclusion, featuring a keynote from ZIMCHE CEO Professor P. K. Dzvimbo. The launch of four new faculty-authored books and the recognition of former Executive Deans marked key milestones.





New Research Group Addresses Climate and Health Link

MSU launched the Climate, Environment and Health Research Group, a multidisciplinary alliance between the Faculty of Built Environment, Art and Design and the Faculty of Medicine and Health Sciences.

Partners include CeSHAAR Zimbabwe and the London School of Hygiene and Tropical Medicine.

The group addresses critical links between climate change and maternal health.

At the launch, Professor A. B. Thomas presented data on climate-related maternal mortality, and CeSHAAR donated server hardware to enhance MSU's computational research capacity.



Tugwi Mukosi Institute Hosts Heritage and Innovation Lecture

The Tugwi Mukosi Multidisciplinary Research Institute (TMMRI) hosted a public lecture on "Leveraging Heritage-Based Education 5.0."

Keynote speaker Dr. Misheck Sibanda, retired Chief Secretary to the President and Cabinet, emphasised that national transformation requires an education system rooted in heritage and practical application.

Pro Vice Chancellor Professor Moebisi Maphosa reaffirmed MSU's commitment to this vision.



Social Sciences Faculty Convenes National Land Governance Dialogue

The Faculty of Social Sciences, through its Centre for Public Policy and Devolution (CPPD), hosted the National Land Governance Conference with Transparency International Zimbabwe.

Under the theme “Land Governance in Zimbabwe – Institutions, Policies and Practices,” it gathered policymakers, academics and traditional leaders to shape equitable and sustainable land administration reforms.



Language Institute Champions Indigenous Heritage

The Midlands State University National Language Institute (MSUNLI) advanced its mandate to promote Zimbabwe's 16 official languages.

It hosted the 2nd National Language Indaba on “Mother Tongue Revitalisation in the Digital Era,” convening scholars and policymakers.

Research projects included developing ChiBarwe orthography and documenting Shangani and Khoisan languages. MSUNLI also expanded its professional translation and interpretation services for government and NGOs.



WALL OF FAME

Professor Gift Mehlana: Pioneering Materials for a Sustainable Future

Professor Gift Mehlana, Acting Executive Director of Research and Innovation and President of the Zimbabwe Chemical Society, is a distinguished materials chemist whose work exemplifies MSU's leadership in applied science.

His research focuses on designing novel porous materials, especially Metal Organic Frameworks (MOFs), for applications in catalysis, sensing, biomedical science, and environmental remediation.

He is particularly driven by sustainable solutions, such as capturing and converting greenhouse gases into valuable products like formic acid and methanol.

Under his leadership, MSU's materials chemistry group has gained international recognition, supported by grants from the Royal Society and the African Academy of Sciences.

A graduate of the University of Cape Town (PhD) and MSU (BSc), he is a widely published author and collaborator. His recent TWAS Atta-ur-Rahman Award in Chemistry (2025) affirms his status as one of Africa's leading scientific minds.

"Our goal is to create science that responds to real-world problems and builds a sustainable future for our communities."



Innovator Spotlight: Takudzwanashe Mahachi – The Mind Behind “Golden Finger” Faculty of Business Sciences | Data Science and Informatics

Faculty of Business Sciences | Data Science and Informatics

Level 3.2 student Takudzwanashe Mahachi is revolutionising campus operations with Golden Finger, a smart campus management system.

It integrates biometric authentication, smart ID cards, and NFC technology into one platform, unifying exam attendance, lecture tracking, dining hall management, and asset tracking.

The system automates processes, enhances security and data accuracy, and provides administrators with actionable insights, serving as a scalable model for a digitally connected campus.

Innovator Spotlight: Sakhile Damu – Sakhy’s Organic Soaps Community Innovator

Sakhile Damu, a community innovator at the MSU Innovation Hub, runs Sakhy’s Organic Soaps. Her enterprise produces eco-friendly, chemical-free soaps from organic oils and herbs, championing biodegradable ingredients and ethical production.

Her vision includes expanding her skincare line and pioneering sustainable packaging, reflecting MSU’s commitment to green entrepreneurship.

Rejoice Moyo: Turning Plastic Waste into Power Chairperson, Department of Mining Engineering

Staff innovator Rejoice Moyo leads the groundbreaking Re-Joule Project, which converts non-biodegradable plastic waste into high-purity synthetic fuels (diesel, kerosene, petrol, LPG) using advanced pyrolysis technology.

This initiative addresses Zimbabwe’s plastic pollution crisis and positions MSU as a leader in circular economy solutions, showcasing scalable, homegrown energy innovation.

LOOKING AHEAD

Advancing Innovation, Strengthening Impact

As MSU enters a new phase of growth, the Research and Innovation Division will deepen its national footprint by consolidating current strengths and pursuing new frontiers in research, commercialisation, and collaboration.

We will build on recent successes by enhancing support for innovators, streamlining incubation pathways, and strengthening our commercialisation ecosystem.

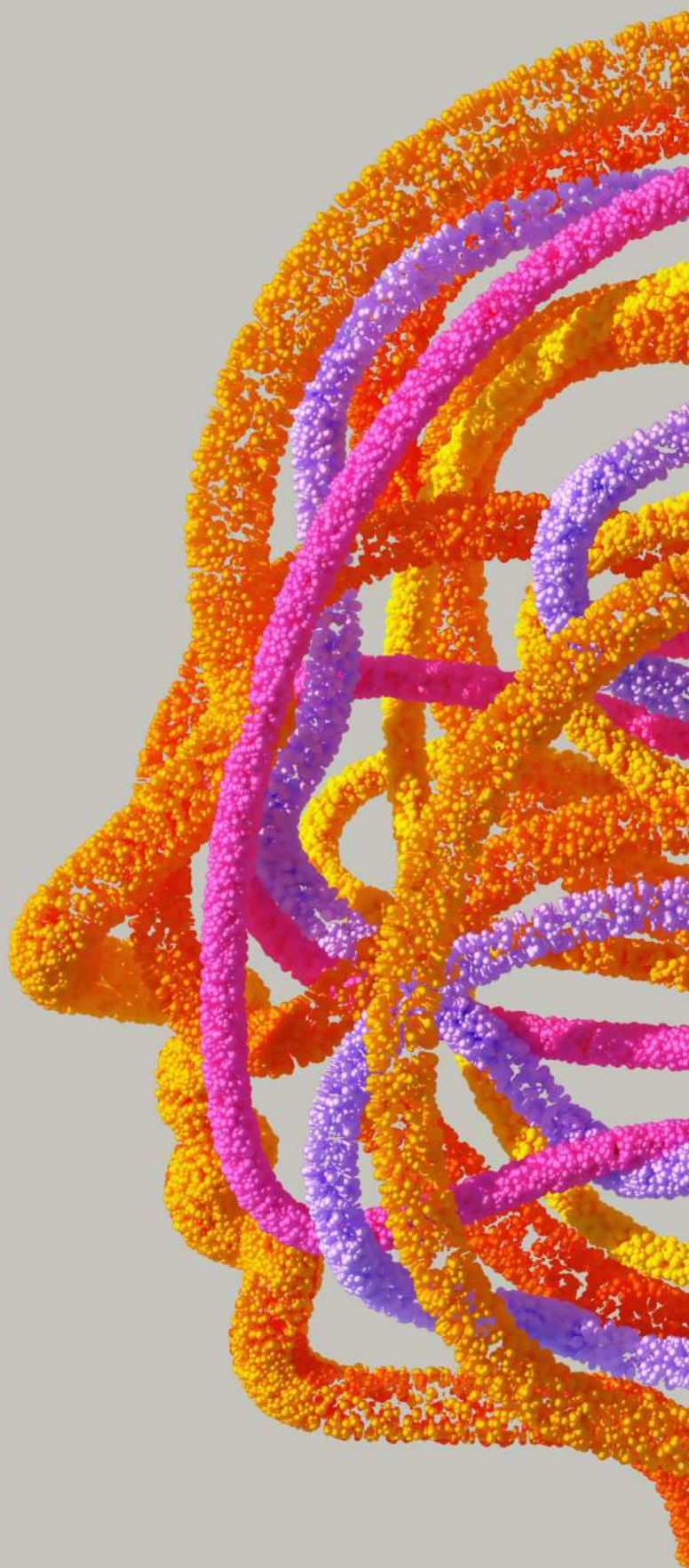
Key priorities include expanding industry-linked projects, refining intellectual property management, and advancing market-ready prototypes from across the University.

The Division will further emphasise interdisciplinary research clusters aligned with national priorities, climate resilience, public health, digital transformation, and value addition of indigenous resources to anchor MSU's contributions to policy, socio-economic development, and sustainability.

We remain committed to nurturing talent through targeted training, mentorship, and grant facilitation to empower our community in scaling their ideas, while deepening strategic partnerships to expand networks and solidify MSU's role as a regional innovation leader.

MSU's research and innovation ecosystem is accelerating—driven by people, powered by ideas, and committed to transforming communities and industries.

Innovation today. Impact tomorrow.







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