



MASINDE MULIRO UNIVERSITY OF SCIENCE AND TECHNOLOGY

OFFICE OF THE DIRECTORATE OF RESEARCH AND POSTGRADUATE SUPPORT (DRPS)

14TH MULTIDISCIPLINARY INTERNATIONAL CONFERENCE

DATE: 19TH – 21ST MAY 2021

VENUE: VIRTUAL

GUEST SPEAKERS



Prof. Asenath Jerotich Sigot is a Professor of Nutritional Sciences at Masinde Muliro University of Science and Technology (MMUST). She has served in various administrative and academic capacities rising through the ranks to become the Deputy Vice Chancellor, Academic and Students Affairs of Masinde Muliro University of Science and Technology from 2007 to 2013. She was also appointed by the Ministry of Education as Acting Vice Chancellor in the same institution in 2013 and 2019 respectively. Prof. Sigot has initiated three major research projects on Indigenous Vegetables, Micro-algae Spirulina and Mushroom Cultivation and Utilization. Currently, her major emphasis is on Mushroom and Spirulina value addition that has resulted in the development of new products. Prof. Sigot teaches both Undergraduate and Postgraduate students and has supervised several Masters and

PhD candidates. She has published mostly in the area of nutritional sciences and has won several awards.



Prof. (Eng.) Sibilike K. Makhanu is a Professor of Civil Engineering at Masinde Muliro University of Science and Technology (MMUST). He has, in the past, served as the Deputy Vice Chancellor (Administration and Finance) of MMUST. He is a Professional Engineer and a member of several renowned engineering professional bodies. Prof. (Eng.) Makhanu has published on a wide range of subjects in the engineering discipline. His research interest is in hydropower development, materials for low-cost housing and modelling of dynamic systems. He has taught at various universities in Kenya and has served as an external examiner for undergraduate and postgraduate programmes in many local and international universities. He is currently serving as the African expert representative on the International Advisory Panel for the ICCEE2022 Virtual Platform International Conference scheduled for 6-7 January 2022 at Universiti Tunku Abdul Rahman, Malaysia.



Prof. Wycliffe W. Njororai Simiyu graduated with a PhD from Kenyatta University. He has served as the Athletics Director and the Chairperson of the Department of Exercise, Recreation and Sports Sciences at Kenyatta University. He moved to the USA and initially taught at Wiley College where he served as the Coordinator of the Physical Education program. He, then, moved to the University of Texas at Tyler where he currently serves as Professor and Interim Chairperson of the Department of Health and Kinesiology in the spring semester of 2013. He has published widely in the area of sports and physical activity. He has won various awards for exemplary teaching. He has also won an outstanding scholar award by the Africa Association for Health, Physical Education, Recreation, Sports and Dance at Wiley College and an outstanding faculty leadership award at the University of Texas at Tyler. He has delivered keynote addresses in Nairobi, Kenya; Federation of African University Sports (FASU); Wuhan and Xiamen, China; McGill University, Canada; and in several places in the USA.



Justin Sheffield is a Professor of Hydrology and Remote Sensing at the University of Southampton, UK. His research is on fundamental and applied research on large-scale hydrology and its interactions with climate variability and change. He has published extensively on hydrological extremes, climate change, and hydrological processes from catchment to the global scale, and on the application of research to natural hazards impacts reduction, and water and food security particularly in developing regions, including monitoring and prediction systems. He has received several awards including the Prince Sultan Bin Abdulaziz International Prize for Water for research work on drought monitoring and prediction, and the Plinius Medal of the European Geosciences Union in for outstanding multi-disciplinary research and applications in hydrological hazards. Most recently, he was named as the 2019 Robert E. Horton Lecturer in Hydrology by the American Meteorological Society for advancing hydrologically coherent analyses of drought across time and space scales, and for pioneering the development of integrated drought monitoring tools for food-insecure countries.



Prof. Yunde Zhao is the Director of Plant Biology- Food & Fuel for the 21st Century in the Department of Cell and Developmental Biology at the University of California San Diego (UCSD) in the United States of America. Prof. Zhao recently joined *frontiers* in plant sciences as a field Chief Editor. His research is centred on developing gene-editing technologies and elucidation of molecular mechanisms of suxin biosynthesis and signalling. He is leading a group that invented ribozyme-based guided RNA production; a gene-editing tool. His transgene killer CRISPR (TKC) technology enables efficient isolation of edited transgene-free plants.



Dr Abdoul A. Oubeidillah research interests are in water resources particularly in surface hydrology, hydro-informatics, hydro-climatology, and hydrological modelling. Before joining UTRGV, he held various research positions at different institutions including NOAA National Water Centre, where as an Associate Scientist, he was involved in the development and implementation of the first ever US National Water Model for streamflow real-time observations and forecasting over the

continental US as part of the US Government initiative to make the country a weather-ready nation. At Oak Ridge National Laboratory, as a postdoctoral researcher in the Environmental Sciences Division, he developed a hydrological model for the entire conterminous US to research the effects of climate change and their impact on the national hydropower energy sector. Dr Oubeidillah also worked as a consultant for international projects funded by USAID, the US Army, and the World Bank.



Eng. Carey Francis Mbaraka is the Chief Executive Officer of the Kenya Association of Bus Manufacturers (KABM). He is also the Managing Director of its trading arm - KABM Services Ltd- an inspection company designated by the Government of Kenya to provide conformance assessment services in vehicle design and manufacturing in the automotive sector. A professional engineer with twenty three (23) years of experience, Eng. Mbaraka has worked in

various organizations in the automotive sector in Kenya. He is a member of the Technical Committee (TC 122) on road transport vehicles at the Kenya Bureau of Standards and the Standards Committee at the Kenya Accreditation Service (KENAS). Eng. Mbaraka is also the Chairperson of the Technical Harmonization Committee (THC) on Vehicle Technology and Engineering at the African Organization for Standardization (ARSO). He is registered with the Engineers Board of Kenya (EBK) and is also a corporate member of the Institute of Engineers of Kenya (IEK).



Joshua Gilbert is a passionate advocate for indigenous people, conservation and the environment. He is revolutionising the way we talk about agriculture and indigenous issues in Australia and uses indigenous wisdom and values, alongside environmental and agricultural knowledge, to shape modern society. Professionally, he works as a Senior Consultant with PwC's Indigenous Consulting. For his advocacy, he has recently been recognised as the Australian Geographic Young Conservationist of the Year, the NSW Office of Environment and Heritage's Young Sustainability Champion and the Foundation for Young Australians' Local Legend Award.



Prof. Dr med. Thomas Schrader studied Medicine at the Charité, Universitätsmedizin Berlin and Medical Informatics at the Beuth-Hochschule Berlin. He worked at the Institute of Pathology at Charité in the Digital Pathology working group. While there, he supervised various telepathology projects and was head of the project "OpEN.SC" (Open European Nephrology Science Centre) funded by the German Research Foundation. Since 2009, he is a Professor of Applied Informatics focusing on medical informatics at the Brandenburg University of Technology. He teaches telemedicine, eHealth, computer-assisted medicine, digital signal and image processing, and assistance systems. His research focuses on data quality in medical data repositories, prospective risk analysis in medical environments, motion analysis, and eHealth.



Prof. Patrice Sanou is Emeritus Professor in space technology. He is an Expert with AfSTAG/DRR (African Union) and the Principal GEO (Group on Earth Observation). He is also the General Director ISESTEL and the Coordinator GMES & Africa (African Union) in Burkina Faso. He coordinates SERVIR-WA/NASA (USAID) Burkina Faso and Co-chairs GEO/Land Degradation Neutrality/ UNCCD. Prof. Sanou is the Chairperson of Francophone high education institutions in space technologies (African Union). He is also a GIS lecturer IPD/AOSGeomatics in the Geography Department of Université Joseph Ki-Zerbo (GEOCFID).



Prof. Bockline Omedo Bebe is a Professor of Livestock Production Systems. He is the acting Deputy Vice Chancellor for Research and Extension at Egerton University. Prof Bebe has accomplished outstanding milestones in academic, research, extension, consultancy services and linkages locally and internationally. He is a member of the International Advisory Board of the Centre of Excellence in Food Security of the University of the Western Cape (UWC) and the University of Pretoria (UP), South Africa ((DSI-NRF -CoE-FS). He is listed among the top 500 most cited authors in Africa. He has published papers in international peer-reviewed journals and contributed to various book chapters. He has supervised several PhD and Masters students and is active in teaching and supervising postgraduate research projects. He is a scientific reviewer to many international journals and scientific conferences. His research interests are in adaptation and mitigation of climate change and the role of livestock in circular bio-economy. He has won and successfully implemented dozens of collaborative research projects and consulted for the Government of Kenya, the East African Community and the World Bank. He has authored /co-authored key policies.



Group.

Prof. Dr Hans-Peter Piorr is an agricultural economist at the University for Sustainable Development (HNE) in Eberswalde. He is a member of the Energy Advisory Board of the Ministry for Economic Affairs and European Affairs (MWE) in Brandenburg. He also sits on the Advisory Board on Bio-economy of the Berlin-Brandenburg State Working