

CV of Dr. Peter Cherop

PETER TUMWET CHEROP, PhD, EBK, IEK

C/o School of Engineering and Built Environment
Department of Mechanical and Industrial Engineering
Masinde Muliro University of Science and Technology
P.O. Box 190-5010, Kakamega, Kenya
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1. PERSONAL DETAILS

Name	Peter Tumwet Cherop
Nationality:	Kenyan
Gender	Male
Qualifications	PhD, MSc, BSc
Profession	Senior Lecturer/Researcher/Engineer
Languages	English, Kiswahili, Russian
ID No./Passport No.	22849635/AK0629787
Driving Licence	Licensed Driver
Marital Status	Married

2. PROFILE

An experienced Researcher, Lecturer, Manager, Leader, and Engineer with **over fifteen (15) years** of experience more than **six (6)** of which have been in Management and Leadership. Looking forward to gaining more skills, through own initiative in order to keep up with increasing professional challenges and demand for efficiency.

3. EDUCATION BACKGROUND

Date	Qualification	Institution
2016-2019	Doctor of Engineering (DEng)	Durban University of Technology, South Africa
2007-2009	Master of Science in Chemical Engineering	Mendeleev University of Chemical Technology, Russia
2003-2007	Bachelor of Science in Chemical Engineering	Mendeleev University of Chemical Technology, Russia
2002-2003	University Preparatory Course	Tver State Technical University, Russia
1998-2001	Kenya Certificate of Secondary education	Chavakali High School, Kenya
1997	Kenya Certificate of Primary education	Cheptais Primary School, Kenya
1990-1996	Primary School Education	Kipsis Primary School, Kenya

4. PROFESSIONAL MEMBERSHIP

Professional Body	Abbreviation	Membership Number
Engineers Board of Kenya	EBK	B5948
Institution of Engineers of Kenya	IEK	G5142

5. WORK EXPERIENCE SUMMARY

SN	Year	Position	Place of Employment
1.	Dec 2023 to date	Associate Dean	School of Engineering and Built Environment Masinde Muliro University of Science and Technology, Kenya
2.	Nov 2023 to date	Senior Lecturer/Researcher	Mechanical & Industrial Engineering Masinde Muliro University of Science and Technology, Kenya
3.	Aug 2019 - Nov 2023	Chairperson of Department	Mechanical & Industrial Engineering Masinde Muliro University of Science and Technology, Kenya
4.	April 2012 - Oct 2023	Lecturer/Researcher	Mechanical & Industrial Engineering Masinde Muliro University of Science and Technology, Kenya
5.	April 2016 - Dec 2018	Lecturer/Researcher	Durban University of Technology, South Africa
6.	Sept 2011 - April 2012	Part-time Lecturer	Taita Taveta University College, Kenya
7.	Aug 2011 - March 2012	Projects Coordinator	Maleta Cyclic distillation
8.	Oct 2010 - Aug 2011	Process Engineer	Athi River Mining Ltd. (ARM), Kenya
9.	Aug 2009 - July 2010	Process Engineer	Lafarge Voskresensk Cement Plant, Russia
10.	Sept 2007 - June 2009	Graduate Assistant	Mendeleev University of Chemical Technology, Russia
11.	Sept 2008 - July 2010	Teacher of English	EF Education First, Moscow, Russia
12.	Aug 2007 - Oct 2007	Clerical Officer	Kenyan Embassy, Moscow, Russia

6. WORK EXPERIENCE DETAILS

6.1. Associate Dean, School of Engineering and Built Environment, Masinde Muliro University of Science and Technology, Kenya

(Dec 2023 to date)

Duties and responsibilities:

- ✓ Deputizing the Dean in articulating a leadership vision and strategic plan for evaluating academic programs and curricula with program committees, faculty, staff and students
- ✓ Providing oversight and support for national wide student recruitment and retention activities;
- ✓ Providing leadership in development, implementation and review of school academic programs
- ✓ Playing key leadership role in capacity building of the school's faculty
- ✓ Assisting the Dean in managing teaching and learning resources in the school
- ✓ Supervising overall teaching, learning and examinations in the school
- ✓ Providing leadership in research, innovation and community outreach programs
- ✓ Playing oversight role in acquisition of adequate facilities and equipment for teaching and learning
- ✓ Facilitating interactions and developing supportive interdisciplinary relationships between Schools
- ✓ Providing mentorship and advisement to faculty
- ✓ Interacting with alumni to raise funds for the School and university and enhancing the reputation of the School
- ✓ Overseeing the establishment of academic and research collaborations between the school and other universities/ institutions
- ✓ Providing leadership in mobilization of resources for the school
- ✓ Inspecting facilities and equipment for teaching and learning
- ✓ Chairing regular school board meetings in the absence of the Dean
- ✓ Processing students for graduation
- ✓ Performing any other relevant duties as assigned by the Dean, DVC and VC.

6.2. Senior Lecturer, Masinde Muliro University of Science and Technology, Kenya

(Nov 2023 to date)

- ✓ *Undergraduate Courses taught/teaching:* Fluid mechanics, Thermodynamics, Industrial Pollution and Control, Heat and Mass Transfer, Extractive Metallurgy, Biomass Energy
- ✓ *Postgraduate Courses taught/teaching:* Advanced Fluid mechanics, Research Methods, Industrial Pollution Control

Duties and responsibilities:

- ✓ Providing academic leadership in the Department
- ✓ Teaching undergraduate and postgraduate students.
- ✓ Preparing and administering examinations.

- ✓ Supervising undergraduate students undertaking projects
- ✓ Developing and Reviewing Engineering Curricula
- ✓ Providing mentorship to students as they prepare to join the industry
- ✓ Advising students during their study period on social and career matters.

6.3. Chairperson of Department, Mechanical and Industrial Engineering, Masinde Muliro University of Science and Technology, Kenya

(April 2019 - Nov 2023)

Duties and responsibilities:

- ✓ Supervised teaching, learning and research in the Department
- ✓ Served as Chief Examinations Officer of the Department
- ✓ Established academic and research collaborations between the Department and other partners
- ✓ Ensured quality standards of teaching and research
- ✓ Developed links with practical attachment sites to ensure quality teaching
- ✓ Provided leadership in development, implementation and review of Departmental Academic Programs
- ✓ Recommended procurement of adequate facilities and equipment for teaching and learning
- ✓ Inspected facilities and equipment for teaching and learning
- ✓ Member of University Committees and other bodies
- ✓ Admission and registration of students in the Department
- ✓ Facilitated of inter/intra Departmental student transfer
- ✓ Chaired Departmental Board meetings
- ✓ Member of University Senate
- ✓ Processed of students' marks and results
- ✓ Processed students for graduation
- ✓ Handled students and staff grievances
- ✓ Advised and counselled students
- ✓ Participated in scholarly and academic activities

6.4. Lecturer, Masinde Muliro University of Science and Technology, Kenya

(April 2012 - Oct 2023)

- ✓ *Undergraduate Courses taught/teaching:* Fluid mechanics, Thermodynamics, Industrial Pollution and Control, Heat and Mass Transfer, Extractive Metallurgy, Biomass Energy
- ✓ *Postgraduate Courses taught/teaching:* Advanced Fluid mechanics, Research Methods, Industrial Pollution Control

Duties and responsibilities:

- ✓ Taught undergraduate and postgraduate students.
- ✓ Prepared and administering examinations.
- ✓ Supervised undergraduate students undertaking projects
- ✓ Developed and Reviewing Engineering Curricula
- ✓ Provided mentorship to students as they prepare to join the industry

- ✓ Advised students during their study period on social and career matters.

6.5. Lecturer, Durban University of Technology, South Africa

(April 2016 - Dec 2018)

- ✓ *Courses:* Chemical plant, Transfer processes, Unit operations

Duties and responsibilities:

- ✓ Taught Bachelor of Technology and Diploma students.
- ✓ Set and administered examinations.
- ✓ Marked practical reports
- ✓ Held one-on-one student consultations
- ✓ Supervised Bachelor of Technology students' projects

6.6. Part-time Lecturer, Taita Taveta University College, Kenya

(September 2011-April 2012)

Duties and responsibilities:

- ✓ Taught Undergraduate students.
- ✓ Prepared and administered examinations.

6.7. Maleta Cyclic distillation (August 2011-March 2012)

Duties and responsibilities

- ✓ Projects Coordinator

Reconstruction of distillation columns to:

- ✓ increase productivity
- ✓ improve reliability of plant operations
- ✓ save on energy of production
- ✓ improve product quality
- ✓ increase product yield
- ✓ enhance the environment

6.8. Process Engineer, Athi River Mining Ltd. (ARM), Kenya

(October 2010 -August 2011)

Duties and responsibilities:

- ✓ Assisted in commissioning of new production units,
- ✓ Monitored modifications and upgrades.
- ✓ Ensured the plant was run with parameters and design that minimize gas emissions to the atmosphere.
- ✓ Troubleshoot emerging problems during operations.
- ✓ Conducted periodic checkups within the plant to ensure ineffective and old equipment was serviced/replaced
- ✓ Calculated Energy and mass balances and identified ways of minimizing fuel/power consumption without interfering with the quality of cement.

- ✓ Took gas/material flows measurements, identified inleaks and recommended possible solutions.
- ✓ Authorised inspections of cement plant unit operations by other departments.
- ✓ Prepared daily production reports for evaluation purposes.

6.9. Process Engineer, Lafarge Voskresensk Cement Plant, Russia.

(August 2009 - July 2010)

Duties and responsibilities:

- ✓ Monitored the operation of Ball mills, Coal mills, Cement mills and Precalcined kiln in the plant field and on computerized process control system.
- ✓ Liaised with the quality control department to ensure quality clinker/cement was produced.
- ✓ Worked hand in hand with other plant engineers to ensure efficient running of the plant.
- ✓ Recommended possible ways of minimizing energy consumption within the plant

6.10. Graduate Assistant, Mendeleev University of Chemical Technology, Russia (September 2007- June 2009)

Duties and responsibilities:

- ✓ Designed and ran experiments on behalf of my supervisor.
- ✓ I was responsible for data entry and analysis for the department and prepared presentations of this material during departmental meetings.
- ✓ Took part in undergraduate student consultation and assisted where necessary.

6.11. Teacher of English, EF Education First, Moscow, Russia

(September 2008 - July 2010)

Duties and responsibilities:

- ✓ Taught English
- ✓ Translated and interpreted a wide range of material from English to Russian and vice-versa
- ✓ Proofread already translated material
- ✓ Interpreted English to Russian and Russian to English at workshops and exhibitions

6.12. Clerical Officer, Kenyan Embassy, Moscow, Russia

(August 2007 - October 2007)

Duties and responsibilities:

- ✓ Opened, sorted and distributing incoming mails
 - ✓ Responded to emails and phone calls
 - ✓ Operated photocopiers, scanners and computers
 - ✓ Maintained and updated the database and filing systems
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7. PUBLICATIONS IN REFEREED JOURNALS

1. W. Angano, C. Wekesa and **P. T. Cherop**, "Algorithm for Run-of-the-River Hydropower Siting Based on Slope Gradient and Waterway Length-to-Head Ratio", IEEE PES/IAS PowerAfrica, **Under Review**
2. **P. T. Cherop**, S. L. Kiambi and P. Musonge, "Kinetics of Granulated Waste Tyre Pyrolysis via Thermogravimetry and Model-Free Methods", European Journal of Engineering and Natural Sciences, Vol. 3 (1), pp. 96-102, **2019**. ISSN: 2458-8156
3. **P. T. Cherop**, S. L. Kiambi and P. Musonge, "Non-isothermal model-free and model-fitting kinetics of tyre crumb pyrolysis", The Journal of Solid Waste Technology and Management, Vol. 45 (2), pp. 121-130, **2019**. ISSN: 1088-1697
4. **P. T. Cherop**, S. L. Kiambi and P. Musonge, "Modelling and optimisation of oxidative desulphurisation of tyre-derived oil via central composite design approach", Green Processing and Synthesis - De Gruyter, Vol. 8 (1), pp. 451-463, **2019**. ISSN: 2191-9550
5. **P. T. Cherop**, S. L. Kiambi and P. Musonge, "Kinetic study of non-isothermal co-pyrolysis of tyre crumb with eucalyptus sawdust", International Journal of Environment and Waste Management, Vol. 21 (2-3), pp. 184-200, **2018**. ISSN: 1478-9868
6. E. K. Kosgey, S. L. Kiambi and **P. T. Cherop**, "Analysis of potassium nitrate purification with recovery of solvent through single effect mechanical vapor compression", South African Journal of Chemical Engineering, Vol. 24, pp. 1-7, **2017**. ISSN: 1026-9185
7. **P. T. Cherop**, S. L. Kiambi and E. K. Kosgey, "Effect of Non-Ionic Cellulose Ethers on Properties of White Portland Cement", International Journal of Applied Engineering Research, Vol. 12 (10), pp. 2502-2508, **2017**. ISSN: 0973-9769
8. **P. T. Cherop**, S. L. Kiambi and E. K. Kosgey, "Influence of vinyl acetate-ethylene copolymer on early-age ettringite formation and behavior in OPC/CAC/hemihydrate gypsum binder system: A case of higher CAC content than OPC content in the binder", International Journal of Applied Engineering Research, Vol. 12 (1), pp. 11-21, **2017**. ISSN: 0973-9769

CONFERENCE PAPERS

9. E.K. Kanda, **P. T. Cherop**, J. Owuor, V.O. Lutta and E. Nandasaba, "Knowledge, Attitudes and Perceptions on Wastewater Re-Use in Kenya", 14th International Multi-Disciplinary Conference", 19-21 May **2021** – MMUST, Kenya.
10. B.W. Sabuni, N. Mburu, M. M. Mukolwe, **P. T. Cherop** and J. Owuor, "Tailoring Engineering Curriculum to Align Training to Industry and Development Needs in Kenya", 14th International Multi-Disciplinary Conference", 19-21 May **2021** – MMUST, Kenya.
11. B. Sabuni, **P. Cherop**, J. Owuor and M. Mukolwe "Effect of Covid-19 Pandemic on Engineering Education in Kenya: A Case of Masinde Muliro University of Science and Technology", STEM Education International Conference (STEMEIC2020)", 25-27 November **2020** – MMUST, Kenya
12. **P. T. Cherop**, "Gasification of biomass: A review of the effect of process conditions", "in Proceedings of Sustainable Research and Innovation Conference", **2020**, pp. ISBN: 2079-6226

13. P. Sakwa, **P. T. Cherop** and M.P. Ochuro, "Design of a sensor operated smart greenhouse", 13th Multi-disciplinary International Conference", 19-21 June **2019** – MMUST, Kenya.
14. **P. T. Cherop**, "Effect of process parameters and conditions on waste tyre pyrolysis products yield: A review", 13th Multi-disciplinary International Conference", 19-21 June **2019** – MMUST, Kenya
15. **P. T. Cherop**, "Study of sulphur removal in waste tyre pyrolysis oil using hybrid design", "in Proceedings of Sustainable Research and Innovation Conference", **2020**, pp. 101-104. ISBN: 2079-6226
16. M. Moyo, **P. T. Cherop**, K. Kanny, T. P. Mohan, S. Kiambi and P. Musonge, "Kinetics of non-isothermal degradation of poly lactic acid films", "in Proceedings of Advances in Composites, Biocomposites and Nanocomposites", **2018**, Vol. 3, pp. 378-391. ISBN: 978-1-919858-30-2
17. **P. T. Cherop**, S. Kambi and P. Musonge, "Central composite design approach in the study of oxidative desulphurisation of waste tyre pyrolysis fuel". GPE-6th International Congress on Green Process Engineering 3-6 June **2018** – Toulouse, France
18. **P. T. Cherop**, S. L. Kambi and P. Musonge, "Kinetics of granulated waste tyre pyrolysis via thermogravimetry and model-free methods", "in Proceedings of 3rd International Conference on Environmental Science and Technology", **2017**, pp. 58-63. ISBN: 978-605-83575-7-0
19. **P. T. Cherop**, S. Kambi and P. Musonge, "Kinetics of granulated scrap tyre pyrolysis via thermogravimetry", "in Proceedings of Sustainable Research and Innovation Conference", **2017**, pp. 150-155. ISBN: 2079-6226

8. SUPERVISION OF POSTGRADUATE STUDENTS

SN	Student	Level	Topic	Status
1.	Patrick Munialo	PhD	Modelling of Energy generation from Open Non-equilibrium Steady State Thermodynamic Systems	Graduated in 2023
2.	Reuben Tum	Masters	Co-Digestion of a Mixture of Cow Dung and Maize Stalk Residues and its Influence on Biogas Production	Thesis write-up
3.	Bonface Otedo	Masters	Hydrodynamic Analysis of Fluidized Bed Dryer for Improved Thermal Efficiency in Tea Factories Using ANSYS TM	Data Collection
4.	Griffin Mabong	Masters	Artificial Intelligence-Based Walk-Through Demonstrative Programming of Industrial Robots for Smart Manufacturing	Data Collection

5. Benard Ronoh **Masters** Determination of Combustion Properties of Blended Briquettes of Sawdust, Maize Stacks and Coffee Husks **Data Collection**
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9. EXAMINATION OF THESES AND DISSERTATIONS

SN	Student	Level	Topic	Year Examined
1.	Stephen Shitabuleh	Masters	The Structural Behavior of Concrete filled Bamboo Columns under Axial Compression	Examined in 2020
2.	Daniel Kotieno	Masters	Effect of Blending Sand from Different Sources on Strength of Concrete: Case of Western Kenya	Examined in 2023
3.	Tabitha Soo	Masters	Investigation of the Structural Performance of Portland Pozzolana Cement in Concrete: A Case of Kakamega County	Examined in 2023

10. SUPERVISION AND EXECUTION OF PROJECTS

SN	Project	Place	Year	Status
1.	Solar PV System	MMUST	2023-2023	Completed
2.	Herbal Sauna Project	MMUST	2020-2021	Completed
3.	Saniboath Project	MMUST	2020-2021	Completed
4.	Construction of Multi-purpose Hall	MMUST	2012 -2014	Completed

11. MENTORSHIP

1. Jeremy Omaye. **Scholarship (top candidate)** for “Master of Science in Sustainable Energy Transitions”, Strathmore University (2022)
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12. MEMBERSHIP IN EDITORIAL BOARDS

1. Editorial Board Member, “Journal of Advances in Environment and Energies”. ISSN: 2833-6046
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13. MANAGEMENT AND LEADERSHIP POSITIONS HELD

1. **Chairperson of Department**, Department of Mechanical and Industrial Engineering, Masinde Muliro University of Science and Technology, Kenya (**August 2019 to date**)
2. **Examinations and Timetabling Coordinator**, Faculty of Engineering, Masinde Muliro University of Science and Technology, Kenya (**August 2015- February 2016**)

3. **Acting Dean**, School of Engineering and the Built Environment, Masinde Muliro University of Science and Technology, Kenya (13th July-4th August 2023, 20th-22nd October 2020, 30th September-2nd October 2020, 12th - 15th October 2015,)
 4. **Projects Coordinator**, Department of Mechanical and Industrial Engineering, Masinde Muliro University of Science and Technology, Kenya (February 2019 – February 2020)
 5. **Quality Assurance Officer**, Department of Mechanical and Industrial Engineering, Masinde Muliro University of Science and Technology, Kenya (June 2013 - January 2016)
 6. **Industrial Attachment Coordinator**, Department of Mechanical and Industrial Engineering, Masinde Muliro University of Science and Technology, Kenya (August 2014 - January 2016)
 7. **Coordinator, PSSP**, School of Engineering and the Built Environment, Masinde Muliro University of Science and Technology, Kenya (February 2019 to date)
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14. COMMUNITY ENGAGEMENT

1. Member of the Elgon Young Professionals (EYP), Mt. Elgon, Bungoma County, Kenya
 2. Patron, Mt. Elgon University Students Association (MTEUSA), Masinde Muliro University of Science and Technology Branch
 3. Associate Board Member of the Elgon Centre for Education (ECE), Mt. Elgon, Bungoma County, Kenya
 4. Involvement in School mentorship programs in Mt. Elgon, Bungoma County, Kenya
 5. Member, Kipsis Arrows Football Club, Mt. Elgon, Bungoma County, Kenya
 6. Member, Cheptais Villa Football Club, Mt. Elgon, Bungoma County, Kenya
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15. PHILANTHROPY AND COMMUNITY ACTIVITIES

1. Sponsorship of Awards, 17th Graduation Ceremony, Masinde Muliro University of Science and Technology, Kenya (December 2021)
 2. Participated and contributed in Mater Heart Run, Kakamega, Kenya (11th June 2022)
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16. RESEARCH FUNDING AND ADMINISTRATION OF GRANTS

1. Solar Photovoltaic Potential in MMUST as an Entry Point Towards Green Energy Adoption (2021). Funding Agency: Masinde Muliro University of Science and Technology-COVID-19 Response. Grant Value: **Ksh 450,000**. Principal Investigator: James Owuor, Co-investigators; **Peter Cherop**, Edwin Kanda, Bernadette Sabuni.
2. Ground Water Quality Assessment in Webuye, Bungoma County, Kenya (2021). Funding Agency: Masinde Muliro University of Science and Technology-Research Fund. Grant Value: **Ksh 450,000**. Principal Investigator: Willis Awandu, Co-investigators; **Peter Cherop**, Micah Mukolwe, Edwin Kanda, Umulkher Ali, Evans Nandasaba, Valery Lutta, Collins Siganga.

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3. Integrated Solid Waste Management Practices in Kakamega Municipality (2021). Funding Agency: Masinde Muliro University of Science and Technology-Research Fund. Grant Value: **Ksh 450,000** Principal Investigator: Edwin Kanda, Co-investigators; **Peter Cherop**, Micah Mukolwe, Umulkher Ali, Willis Awandu, Elizabeth Msee, Valery Lutta, Evans Nandasaba.
 4. Mole Eradication Cow Urine Solution and Development of a Bioreactor Unit for Generation of the Solution (2020). Funding Agency: Masinde Muliro University of Science and Technology-Research Fund. Grant Value: **Ksh 400,000**. Principal Investigator: Stanley Omuterema, Co-investigators; **Peter Cherop**, Danstone Baraza, Peter Kuloba.
 5. Using The Water Poverty Index to better Plan for Community Water Service Provision in Kakamega County, Kenya (2020). Funding Agency: Masinde Muliro University of Science and Technology-Research Fund. Grant Value: **Ksh 1000,000**. Principal Investigator: Edwin Kanda, Co-investigators; **Peter Cherop**, Micah Mukolwe, John Obiri, Valery Lutta.
 6. Innovative Wastewater Management Technology in the face of Covid-19 Pandemic (2020). Funding Agency: Masinde Muliro University of Science and Technology-Research Fund. Grant Value: **Ksh 1000,000**. Principal Investigator: John Obiri, Co-investigators; **Peter Cherop**, Edwin Kanda, James Owuor, Valery Lutta.
 7. Herbal Sauna Project (2020). Funding Agency: Masinde Muliro University of Science and Technology-COVID-19 Response. Grant Value: **Ksh 600,000**. Principal Investigator: James Owuor, Co-investigators; **Peter Cherop**, Maurice Omolo and Edwin Kanda
 8. Saniboath Project (2020). Funding Agency: Masinde Muliro University of Science and Technology-COVID-19 Response. Grant Value: **Ksh 400,000**. Principal Investigator: Edwin Kanda, Co-investigators; **Peter Cherop**, James Owuor.
 9. An Integrated Renewable Energy System for Sustainable Development in Kenya (2020). Funding Agency: Masinde Muliro University of Science and Technology-Research Fund. Grant Value: **Ksh 1000,000**. Principal Investigator: Edwin Kanda, Co-investigators; **Peter Cherop**, Henry M. Barasa and James Owuor.
 10. Kinetic Modelling of Scrap Tyre Pyrolysis and Oxidative Desulphurisation of Tyre-derived Oil (2016-2019). Funding Agency: South Africa National Research Foundation (NRF) in collaboration with The World Academy of Sciences (TWAS)- Grant number: 99785. Grant Value: **ZAR 360,000**. Principal Investigator: **Peter Cherop**.
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17. RESEARCH INTERESTS

Energy, Waste management, Pyrolysis, Pollution control, Environmental engineering, Cement Technology.

18. THESES AND DISSERTATIONS

1. Kinetic Modelling of Scrap Tyre Pyrolysis and Oxidative Desulphurisation of Tyre-derived Oil (PhD Thesis: 2019)
 2. Research on the Causes of Cement Corrosion due to delayed Ettringite Formation (Master's Thesis: 2009)
 3. Production of Sulphate-resistant Cements (Undergraduate Project: 2007)
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19. AWARDS AND SCHOLARSHIPS

1. **Top Doctoral Student** in the Faculty of Engineering and the Built Environment, Durban University of Technology (Based on 2017 research outputs, Dec 2017)
 2. **PhD Scholarship:** *National Research Foundation*, Durban University of Technology (Jan 2016 - Dec 2018)
 3. Emerged top in chemistry contest, Chavakali High School (Aug 2001)
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20. WORKSHOPS, TRAINING AND SEMINARS ATTENDED

1. Training on “**Gasification, Catalysis and CHEMCAD Software for Chemical Processes**” at Masinde Muliro University of Science and Technology, Kenya (20th - 24th November 2023)
2. Training on “**Productivity Mainstreaming for Committee Members and Cost Center Heads**” at Golf Hotel, Kakamega, Kenya (7th - 10th November 2023)
3. Training on “**Module Development and e-Learning**” at Golf Hotel, Kakamega, Kenya (23rd - 25th October 2023)
4. Workshop on “**KENET Research Outreach Engagement Forum**” at Sarova Imperial Hotel, Kisumu, Kenya (31st May 2023)
5. Workshop on “**Review of Strategic Plan 2022/2023 - 2026/2027 for Masinde Muliro University of Science and Technology**” at Kisumu Hotel, Kisumu, Kenya (19th - 20th Jan 2023)
6. Workshop on “**Redefining Engineering Curriculum for Industrial Development**”, supported by the Royal Academy of Engineering (UK), at Golden Gates Hotel, Nyeri, Kenya (30th April 2021)
7. Workshop on “**Industry Collaboration for Development Research**” at Bishop Nicholas Stam Pastoral Centre, Kakamega, Kenya (26th February 2021)
8. Workshop on “**Engineering Curriculum Review Through Industry-Academic Linkages to support Knowledge Transfer and Sharing**”, supported by the Royal Academy of Engineering (UK), at BestWestern Hotel, Kisumu, Kenya (14th -15th January 2021)
9. Workshop on “**Development and Negotiation of Cost Centre Performance Contract**” at Bishop Nicholas Stam Pastoral Centre, Kakamega, Kenya (19th October 2020)
10. Training on “**Financial and Procurement Management**” at Kisumu Hotel, Kenya (11th - 13th March 2020)
11. Training on “**Enterprise Resource Planning (ERP)**” at Masinde Muliro University of Science and Technology, Kenya (June 2019)

12. Training on “**British Council Researcher Connect**” Training, at Acacia Premier Hotel, Kisumu, Kenya (11th -13th February 2019)
 13. Workshop on “**Performance Contracting Awareness**” at Masinde Muliro University of Science and Technology, Kakamega, Kenya (9th November 2015)
 14. Workshop on “**Masinde Muliro University of Science and Technology Curricula vetting**” at Kamadep Guest House, Kenya (24th - 26th September 2014)
 15. Stakeholders meeting aimed at developing a Bachelor of Technology in Mechanical and Production Engineering Curriculum for Kisii University at Egerton University ARC hotel, Kenya (11th June 2014)
 16. Workshop on “**Engineering Curriculum Review**” at Masinde Muliro University of Science and Technology, Kenya (15th - 16th May 2014)
 17. Training Workshop on “**Curriculum Development, Review, Implementation and Accreditation for Public Universities in Kenya**” at Masinde Muliro University of Science and Technology, Kenya (23rd - 24th January 2014)
 18. Workshop on “**Emerging trends in cement Technology**” at Mendeleyev University, Russia (5th - 8th May 2008)
 19. Attended a workshop on “**Global warming**” at Mendeleyev University, Russia (13th - 16th March 2007)
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21. COMMITTEES SERVED IN

1. **Member**, Committee on Innovative Financing Options, Masinde Muliro University of Science and Technology (W.e.f. Oct 2023)
2. **Member**, university Solar Photo Voltaic Energy Project Implementation Committee, Masinde Muliro University of Science and Technology (W.e.f. Jan 2023)
3. **Chairperson**, Tender Evaluation Committee on Mechanical and Electrical Installations at the Proposed Engineering and TVET Complex, Masinde Muliro University of Science and Technology (Nov - Dec 2022)
4. **Chairperson**, Tender Evaluation Committee on Supply, Delivery, Installation, Testing and Commissioning of Structured Cabling and CCTV Surveillance at the Proposed Engineering and TVET Complex, Masinde Muliro University of Science and Technology (Nov - Dec 2022)
5. **Chairperson**, Quotation Evaluation Committee on Supply and Delivery of Laboratory and Teaching Materials, Masinde Muliro University of Science and Technology (May - June 2022)
6. **Chairperson**, Quotation Evaluation Committee on Supply, Delivery, Installation and commissioning of Equipment and Teaching Materials, Masinde Muliro University of Science and Technology (May - June 2022)
7. **Chairperson**, Tender Evaluation Committee on Supply, Delivery, Installation and commissioning of Teaching Equipment, Masinde Muliro University of Science and Technology (September - November 2021)

8. **Member**, Senate Ad Hoc Committee to Investigate Main Examination Irregularities for Semester II 2021/2022 Academic Year, Masinde Muliro University of Science and Technology (September - November 2021)
9. **Member**, Technical Committee to carry out an evaluation and Audit of African Development Bank (ADB) HEST Project Equipment, Masinde Muliro University of Science and Technology (November 2019 - February 2020)

22. SHORT COURSES

1. Meeting Management Course, Chicago Institute of Business (June 2015)
2. 10 Soft Skills You Need, Chicago Institute of Business (June 2015)
3. Virtues Project International (VPI) Training at Masinde Muliro University of Science and Technology, Kenya (11th December 2014)

23. SKILLS AND EXPERTISE

23.1. Technical Skills

- ✓ Analytical and problem-solving skills.
- ✓ Written and verbal communication skills.
- ✓ Able to work under minimum supervision.
- ✓ Team Worker, Teachable attitude and ready to learn new ideas.

23.2. Computer and ICT Skills

- ✓ *Installation of Operating Systems:* MS Windows
- ✓ *Engineering Applications:* Design Expert, Minitab ChemCAD, Edraw Max, MATLAB and Aspen-Plus
- ✓ Familiarity with AutoCAD
- ✓ *Microsoft Applications:* MS Word, MS Excel, MS PowerPoint, Outlook
- ✓ Excel as an Engineering tool
- ✓ Referencing and Management Tools

24. LANGUAGES

Language	Speaking	Reading	Writing
English	Excellent	Excellent	Excellent
Swahili	Excellent	Excellent	Excellent
Russian	Good	Good	Good

25. HOBBIES AND INTERESTS

- ✓ Football
 - ✓ Reading
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26. REFEREES

1. Dr. James Owuor

Chairperson, Department of
Electrical and Communication
Engineering
Masinde Muliro University of
Science and Technology
E-mail: jayimbo@gmail.com

2. Prof. Zachary Siagi

Chairperson, Department of
Mechanical and Production
Engineering
Moi University of Science and
Technology
E-mail: siagizach@gmail.com

3. Prof. Sammy L. Kiambi

Professor, Department of
Chemical Engineering
Vaal University of Technology,
South Africa.
E-mail: sammyk1@vut.ac.za