

POST DOCTORAL FELLOWSHIP

UKZN- ETH Project “Re-engineering informal construction through circular practices and models” – funded by (SNSF/NRF) LEAD AGENCY PROGRAMME

This Post Doctoral position on circular practices in informal construction is at the School of Social Sciences at the University of KwaZulu-Natal (Durban, South Africa) and will be conducted in collaboration with the Chair of Circular Engineering for Architecture at ETH Zurich.

We are seeking a highly motivated and qualified Post Doc researcher to join our team working on “re-engineering” informal construction and, in particular, looking at circular construction solutions to develop an inventory of reusable materials which can be used as a basis for the construction market for affordable and informal (self-built) housing. The successful candidate will be responsible for conducting research and developing methodologies for the creation and implementation of material passports in South African vulnerable communities living in deprived conditions.

Responsibilities:

- Conduct research on circular economy practices in informal settlements in Southern Africa and other developing countries;
- Co-design methodologies for the creation and implementation of material passports for reused and repurposed construction materials in low-income economies;
- Collaborate with local communities and authorities to co-produce knowledge and gather data on the availability and reuse of construction materials;
- Analyze data and develop a database of reusable materials for the construction market;
- Disseminate research findings through peer-reviewed publications and other dissemination events such as research symposia, seminars, and roundtable discussions;
- Engage with local and national authorities to inform policy on informal settlements and circular economy practices;

Requirements:

- PhD in Architecture, Engineering, Urban Planning, Housing, Development Studies or related fields. We welcome applications from candidates of all backgrounds who share our commitment to addressing the challenges of informal settlements and promoting circular economy practices in low-income economies.
- Strong research skills with experience in circular economy practices and material reuse;
- Knowledge of South African and other developing country contexts, particularly in relation to informal settlements and low-income housing;
- Excellent communication skills with the ability to collaborate with local communities and authorities;
- Proficiency in qualitative and quantitative research data analysis and database management;
- Strong organizational skills with the ability to manage multiple tasks and priorities;

- Experience in publishing research papers in peer-reviewed journals.

Fluency in spoken and written English is a requirement. The ideal candidate should be able to work in a team, take initiative, be results-oriented, organised, and creative. Software engineering skills, BIM experience, and knowledge of life cycle assessment (LCA) are a plus.

More specifically, key responsibilities of the Post-Doctoral fellow include:

- Contributing to the sustainable growth of the research project
- Supporting the development of contacts and relationships with colleagues in academic institutions, government organizations, and the wider research community
- Supporting effective participation in multidisciplinary research teams and partnerships
- Assisting with proposals and grant applications to undertake funded research
- Assisting in delivering research within specified budgets and to the deadline
- Supporting initiatives to promote the strategic objectives for the Re-engineering informal construction through circular practices and models” project
- Contributing to the discussion in circular economy in the built

environment field TERMS AND CONDITIONS OF FELLOWSHIP

- Appointment will be for 12 months and is renewable based on the availability of funding and performance.
- Applicant is not supposed to have another position whilst having this fellowship
- The appointment will be made in line with the University Guidelines/benchmarks are available on the University website.

MINIMUM REQUIREMENTS:

- Applicant needs to have completed the PhD no more than 6 years ago
- A detailed recent curriculum Vitae (CV)
- Letter of motivation indicating suitability for the position, area of specialization, and your understanding of the project (“Re-engineering informal construction through circular practices and models”)
- Example of single or co-authored academic work
- Certified copies of the Masters (MA) and Doctoral Degrees (Ph.D.)

The Fellowship consists of R200 000 (non-taxable stipend) plus R50 000 (contribution towards research costs and travel) per year. All relocation travel costs are at own expense of successful applicant. The position does not include accommodation which is to be met with the stipend.

Completed applications (combined in ONE PDF) may to be sent to Loggia@ukzn.ac.za

- The closing date for application is the 25th of May

University of KwaZulu-Natal is committed to Employment Equity to improve representativity within the Institution