

## **Post-Doctoral Research Position in Innovation Physics**

The Mechanical Engineering Science Department of the UNIVERSITY OF JOHANNESBURG seeks to appoint a Post-Doctoral Research Fellow at its Auckland Park Kingsway Campus in the field of particle physics, nuclear physics, modern detectors, high performance computing, simulation (especially Geant4), digital twins, machine learning, big data analytics, also the business aspects, new applications, innovation, commercialisation, IP generation and protection, working in interdisciplinary teams together with venture capitalists and customers, in an African innovation and entrepreneurial context. The successful candidate will be exposed to the full process of innovation, with an opportunity to participate in benefit sharing by being involved in one of the following: IP Creator, IP Enabler, IP Contributor. The particular case here is the use of Accelerator based activation, Positron Emission Technology (PET) and high energy Xray Transmission (XRT) in Diamond Mining. You would join a very agile, competitive and competent team, with excellent technology and business partners.

The duration of the Post Doc funding is up to three years but renewable annually based on mutual agreement. There is an opportunity to be involved in teaching and student supervision for candidates who would like to develop this aspect of their CV.

Applications are welcomed. Please send your CV and two reference letters to the address below.

Requirements: A completed PhD degree in Engineering or Physics with a strong aptitude for coding in C++ and Python. Experience with Geant4 is an important additional skill. The review of applications will begin immediately and continue until the position is filled.

Enquiries: Prof SH Connell mail: shconnell@uj.ac.za

Web sites <a href="http://www.uj.ac.za">https://panip.febe.uj.ac.za</a>