

Cover Letter

Dr Johannes Matthias Heinrich
72 Burton Rd,
Camberwell, London,
SW9 6TQ



+49 170 40 10 30 8



johannes.m.heinrich@gmail.com

London, December 5, 2019

Hiring Manager
DeepMind Technologies Limited
5 New Street Square
London, EC4A 3TW

Dear Hiring Manager,

Inspired by DeepMind: The Podcast I visited the company website and was excited to find an open position as Science Researcher. I am a postdoctoral physicist with a passion for Python and automation, and a deep interest in AI. Hereby I would like to apply for this position.

After obtaining my diploma in 2013 in theoretical condensed matter physics I briefly worked in the industry, while looking for groups working on quantum simulations of condensed matter systems. I joined the quantum matter group in Ulm, where I developed interest in ion trapping and went on to fill a Marie Curie early stage researcher position as PhD student at Laboratoire Kastler Brossel in Paris.

My PhD project was the foundation of a complex experiment aimed at more accurately measuring the proton to electron mass ratio. The tasks included design and operation of the experimental hardware, next to implementing control software. As part of a network I reported at multiple international conferences and training schools about status and prospects of the project.

I joined the ion trapping group at Imperial College to implement a new experiment for investigation of quantum gate properties. My approach to interface experimental hardware was quickly picked up by the group, and I used it among other things to automate the bake-out setup for ultra high vacuum creation. Furthermore, I co-supervised a master project to interface a high-end camera for individual ion state detection.

My passion for soft- and hardware also expands to my private life, where I implement evolutionary algorithms to tackle different problems, and work with hardware such as the raspberry pi. I am also an avid board game player, and try to combine these interests in projects, like a webcam based dice reader for Settler of Catan.

I am fascinated by the impact advanced automation, robotics and artificial intelligence has on human society. This influence will only grow and I want to be part of it. General artificial intelligence has the potential to contribute in finding solutions to humanity's biggest challenges, and DeepMind is at the frontier of that development. The position as Science Researcher in your company offers an exciting possibility to join this development. With my diverse background in physics and my programming knowledge I am confident being able to quickly contribute towards the goals of DeepMind, while having the perfect conditions to develop as a scientist.

As of November 2019 the new setup at Imperial College demonstrated functionality, and I am looking for a new challenge in the field of automation, robotics and machine learning.

Thank you very much for considering my application.

Yours sincerely,