Re: Two postdoctoral, one lab technician positions available in MRI gradient modelling and prototyping

I am opening two postdoctoral positions in my lab located at Athinoula A. Martinos Center for Biomedical Imaging in Charlestown, Massachusetts, as well as a lab technician position. The lab is part of the Massachusetts General Hospital, and postdocs have a joint appointment with Harvard Medical School.

POSTDOC POSITIONS: I am looking for hardware and computational modelling expertise (2 positions open). The successful candidates will have a background in mathematics, physics and/or engineering. Practical expertise with hardware development and/or complex computational modelling of biomedical system is necessary. A proven track record in publication is also required. Strong motivation to pursue a career in the field of biomedical imaging, preferably MRI, is also required. Both postdocs will be working on the design and construction of new MRI gradient systems and peripheral nerve stimulation mitigation. Below are some snapshots of our work in this area, see also our this recent publication for more information: Davids, Mathias, et al. "Optimization of MRI gradient coils with explicit peripheral nerve stimulation constraints." IEEE transactions on medical imaging 40.1 (2020): 129-142.

1) Computational modelling of peripheral nerve stimulation induced by MRI gradient coils.
2) Design and construction of MRI gradient coil prototypes.

LAB TECHNICIAN: To support the ongoing MRI gradient design and construction efforts in the lab, I am also looking for a motivated lab technician. Excellent CAD, 3D-printing and fabrication skills are essential. Experience with electronics and/or computational modelling is a plus.

Please contact me directly for more information,