The MR Technology and Use Design Group, led by Jim Pipe in Mayo Clinic's Department of Radiology, has openings for several positions. Our team is collaboratively designing a comprehensive set of technologies for rapid, spiral-based MR imaging, along with the design of a next-generation MRI scanner and innovative approaches for its use.

We are looking for individuals with skills and strong interest in one or more of the following areas - relevant experience in MRI and a PhD in engineering or related field are required.

**Non-Cartesian methods development.** Non-Cartesian pulse sequence methods, design of computationally efficient algorithms for parallel imaging and constrained reconstruction, dynamic imaging, etc.

**Scanner Optimization:** B0 mapping and off-resonance correction, B1 mapping, system characterization and correction, measurements and correction with a field camera (Skope)

**Software Design:** Includes work with our ongoing development of the Graphical Programming Interface (GPI) software project for algorithm design ([www.gpilab.com](http://www.gpilab.com) & [github.com/gpilab](http://github.com/gpilab)), and design the software framework behind a new MR Scanner interface

**Comparative Effectiveness, process optimization, clinical studies**

**Facilities and Environment:** Scan development will primarily occur on Philips 3T and 1.5T systems dedicated to research, and our lab will be housed in the new Discovery Square building ([onediscoverysquare.com](http://onediscoverysquare.com)), part of a ~$5 billion dollar catalyst investment in the city of Rochester ([dmc.mn](http://dmc.mn)). We **Mayo is ranked the #1 hospital in the USA**, and Rochester is a beautiful small (but rapidly growing) town, consistently ranked as one of the best places to live in the USA. It is an easy, family-friendly place to live, and just a one hour drive south of Minneapolis.

**If interested**, please send an email with CV to pipe.james@mayo.edu.