

## Post-Doctoral Fellowship in Algorithm Development & Signal Processing

### Watertown, MA, United States

#### Description

BioSensics is a biomedical engineering firm specializing in wearable medical sensor and telehealth technologies. Our products find applications in elderly care, physical therapy, rehabilitation, neurology, and many other areas. We are seeking a candidate for a post-doctoral fellowship position in signal processing and algorithm development. This 1-2 year fellowship will focus on the development of algorithms for processing motion data acquired in natural living environments from patients with mobility limitations due to aging and/or neuromuscular disease. The fellow would be expected to work independently, publish results in relevant scientific journals, and contribute to writing at least one NIH Phase II SBIR/STTR or R21 grant during the fellowship. The fellow will report directly to Dr. Joseph Gwin, Vice President of Research and Development. The position can be tailored to candidates pursuing either a career in academia or in industry. For example, applicants interested in pursuing careers in industry could be given additional mentorship in technical writing and business development, while applicants interested in academia could be given additional mentorship in grantsmanship and research methods.

#### Desired Skills and Experience

- PhD in a relevant field
- Prior signal processing experience with examples of research performed independently
- Strong MATLAB and/or R skills
- Familiarity with signal processing concepts (filtering, time-frequency analysis, estimation theory, detection theory)
- Familiarity with MEMS accelerometers and gyroscopes a plus but not required
- Familiarity with machine learning a plus but not required
- Excellent verbal and written communication skills

#### Other

- **Must be eligible to be supported under an NIH Administrative Supplement to Promote Diversity in Research and Development Small Businesses-SBIR/STTR** (for more information see <https://grants.nih.gov/grants/guide/pa-files/PA-18-837.html>).

#### Position Summary

##### Location

Watertown, MA

##### Industry

Biomedical Engineering

##### Role

- Research Engineer
- Signal processing and algorithm development

##### Career Level

Post-doc

##### Apply

[careers@biosensics.com](mailto:careers@biosensics.com)

To apply send resume and cover letter to [careers@biosensics.com](mailto:careers@biosensics.com)