

Ryan M Harrison

2115 Cloville Avenue
Baltimore, MD 21214
+1 443 257 5953

ryan.m.harrison@gmail.com
linkedin.com/in/rmharri
github.com/rmharrison

Wolfson College
Oxford OX2 6UD
+44 07523 229446

Education

University of Oxford (Oxford, UK) Expected 2014
DPhil in Biological Physics. Wolfson College.

- Molecular simulation of DNA
 - Spearhead automated testing initiative to reduce scientific and build errors.
 - Simulation software maintenance in **C++**; analysis suite in **Python**.
- Single-molecule fluorescence
 - Image processing and time series analysis with **MATLAB**.

Johns Hopkins University (Baltimore, MD) December 2009
Bachelor of Science in Biomedical Engineering; Minor in Economics. GPA: 3.26/4.00

- Treasurer, JHU Engineers without Borders (2006-2009)
 - Setup financial reporting structure for international engineering development organization with \$100k/yr turnover. Teams operating in 3 countries.

Danish Institute for Study Abroad (Copenhagen, Denmark) Fall 2009
International Business & Economics Program.

- Cultural immersion through homestay and language training (15–20 hrs/wk).

Skills

Languages:	Python , C++ , MATLAB
Toolchains:	Linux (<i>vim et al.</i>), Microsoft (<i>VisualStudio et al.</i>)
Versioning a must:	svn , git
Ask about:	Refactoring and testing scientific code. Experience in corporate Agile environment.

Software

NaturalMotion (Oxford, UK) Summer 2013

- Delivered specification and implementation of R&D project for the Morpheme procedural animation engine. Non-technical live-demo to key stakeholders.
- Agile development in **C++** with Microsoft toolchain.

Ginkgo BioWorks (Boston, MA) Jan – May 2010

- Developed **Django** and **Rails** apps for prototyping engineered biological systems.
- Software exceeded milestone payment requirements of industrial partner.

Ion Torrent Systems (Guilford, CT) Summer 2009

- Hardware tester to improve performance of next-gen DNA sequencer prototype.
- Wrote desktop **Pyjamas** app to track improvements in system performance.

Computational Proteomics Research Asst (Baltimore, MD) 2003 – 2007

- **C++** developer for Rosetta protein structure suite. Analysis tools with **Perl** and **R**.
- Mentored high school student with interest in protein structure prediction.

Training

Facebook London Hackathon Apr 2013

- Team of 3 developed distributed computing app in 24 hours. Honorable mention.

Saïd Business School Building a Business Course 2012/2013

- Coursework on start-up finance, legal and IP.

Honors

NIH Graduate Student Research Award (Travel Award)	2011
National Science Foundation Graduate Research Fellow (3 year, \$120k)	2010
Inductee, National Gallery for America's Young Inventors (\$5k)	2006
5th Place, Intel Science Talent Search (\$25k)	2005

Hobby

bow tie maker / allotment gardener / theater light tech