

ALEXANDER BELL

EDUCATION

- Harvard University** Cambridge, MA
- Graduate Fellowship, Economics Department *2014-present*
 - Inequality & Social Policy Fellow, Malcolm Weiner Center for Social Policy *2015-present*
 - Health & Aging Economics Fellow, NBER *2016-2017*
- Brown University** Providence, RI
- ScB in Computer Science and Economics, magna cum laude and with honors *Class of 2013*
 - GPA 3.94/4.0 • OΔE Honors in Economics • Gordon Lindsay Prize for Outstanding [Thesis](#)

PAST EMPLOYMENT

- Harvard Lab for Economic Applications to Policy** Cambridge, MA
Pre-Doctoral Fellow *June 2013 - Fall 2014*
- Based out of IRS. Contributed primarily to [Equality of Opportunity Project](#). Worked most closely with with Raj Chetty and Nathan Hendren.
- Brown University** Providence, RI
- Teaching Assistant, Econ. 1530: Health, Hunger & the Household in Developing Countries* *Spring 2013*
- Graded Stata problem sets and weekly reading responses for class of 20
 - Held computer sections and office hours for problem sets
- Teaching Assistant, Comp. Sci. 1270: Database Management Systems* *Fall 2012*
- Collaborated with professor and co-TAs to draft and grade homeworks, projects, tests for class of 80 students; held weekly office hours
- The Brown Daily Herald** Providence, RI
News Editor (2011-12), Writer (2009-11). Authored more than 90 articles and managed staff writers.
- Antitrust Division, Bureau of Economics, Federal Trade Commission** Washington, DC
Summer Research Assistant *Summer 2012*
- Investigated effects of merges on pharmaceutical companies' R&D outcomes
 - Authored and presented 30-page [Introduction to Python for Economists](#), with applications to web scraping and textual analysis such as regular expressions
- Office of the Chief Economist, US Patent & Trademark Office** Alexandria, VA
Summer Research Assistant *Summer 2011*
- Analyzed effect of growing patent application backlog on innovation and, in the process, discovered a behavioral response to a policy change (topic of senior thesis)

RESEARCH PAPERS

- The Lifecycle of Inventors** (w/ R. Chetty, X. Jaravel, N. Petkova, and J. van Reenen)
- Working paper available:
http://scholar.harvard.edu/files/ambell/files/2016_06_14_patents.pdf
 - We use administrative records on the population of individuals who applied for or were granted a patent between 1996 and 2014 to characterize the lives of more than 1.2 million inventors in the United States. We show that children of low-income parents are much less likely to become inventors than their higher-income counterparts (as are minorities and women). Decompositions indicate that this income-innovation gap can largely be accounted for by differences in human capital acquisition while children are growing up. We establish the importance of exposure effects during childhood by showing that growing up in an area with a high innovation rate in a particular technology class is associated with a much higher probability of becoming an inventor specifically in that technology class. Using an event study methodology, we show that inventors' financial returns to innovation are very skewed and uncertain at the start of their career. While our analysis does not directly identify the causal mechanisms that drive innovation, our descriptive findings shed light on which types of policy tools are likely to be most effective in sparking innovation. In particular, our findings suggest that extensive margin policies drawing more talented individuals from low-income families into innovation have great potential.

Team-Specific Capital and Innovation (w/ X. Jaravel and N. Petkova)

- Working paper available: http://papers.ssrn.com/sol3/papers.cfm?abstract_id=2669060
- We establish the importance of team-specific capital in the typical inventor's career. Using administrative tax and patent data for the population of US patent inventors from 1996 to 2012 and the premature deaths of 4,714 inventors, we find that an inventor's premature death causes a large and long-lasting decline in their co-inventor's earnings and citation-weighted patents (-4% and -15% after 8 years, respectively). We rule out firm disruption, network effects and top-down spillovers as primary drivers of this result. Consistent with the team-specific capital interpretation, the effect is larger for more closely-knit teams and primarily applies to co-invention activities.