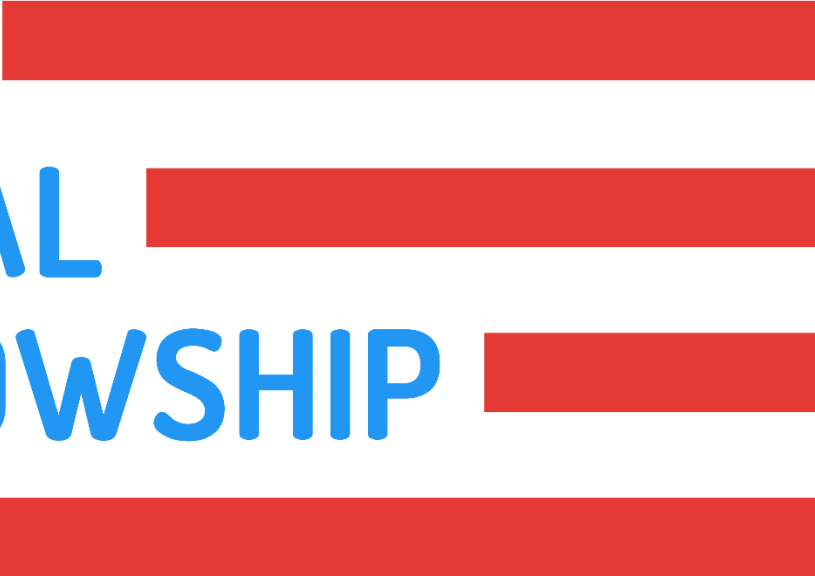


CIVIC DIGITAL FELLOWSHIP



The views expressed here are those of the author and not necessarily those of the Census Bureau. All data have been reviewed to ensure privacy and confidentiality.

Linking Census with Third Party Data: The Case of Federal Research Funding

Andrea Chen

Informatics, University of Washington

Data Scientist, Civic Digital Fellow

United States Census Bureau

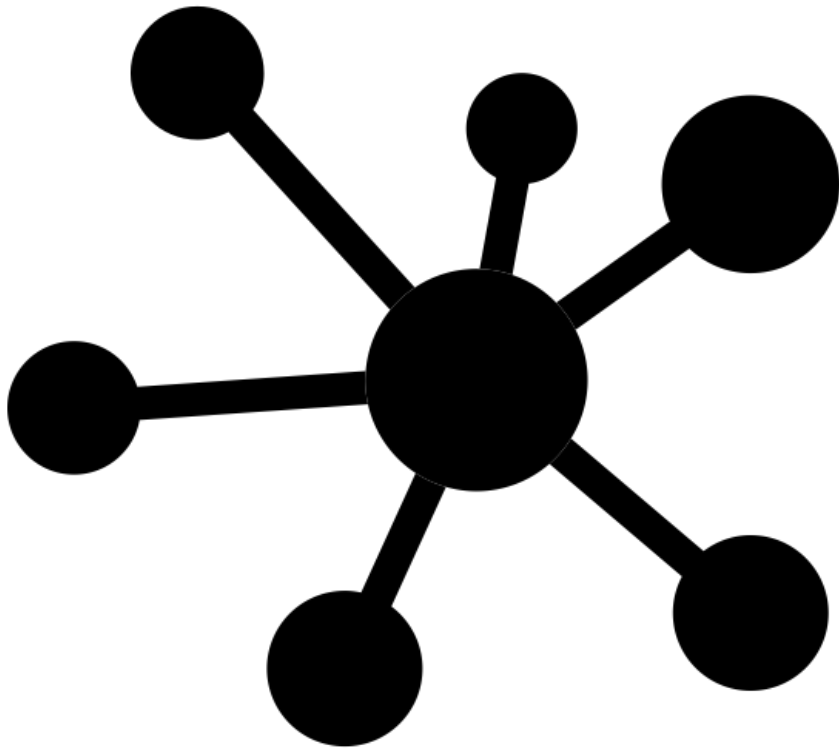
Mentor: John Cuffe, CBDRA

Project Overview

How can the
Census use data
from external
sources?



Project Overview

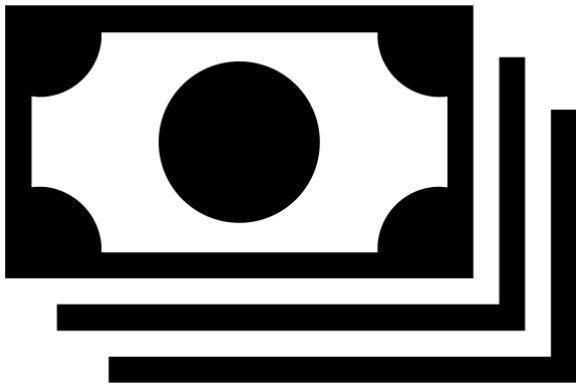


Census Center for Big
Data Research and
Applications

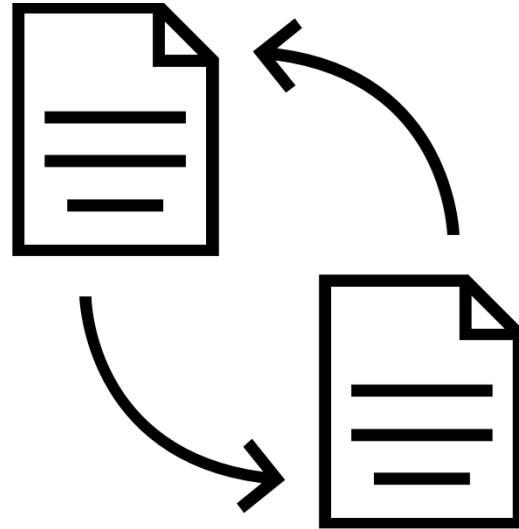
Innovation Measurement
Initiative

Project Impact

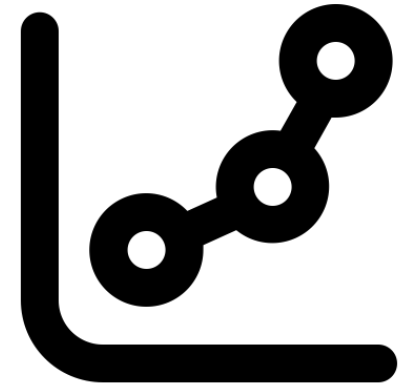
Reduce costs of
re-producing
existing statistics



Increase accuracy
of the data

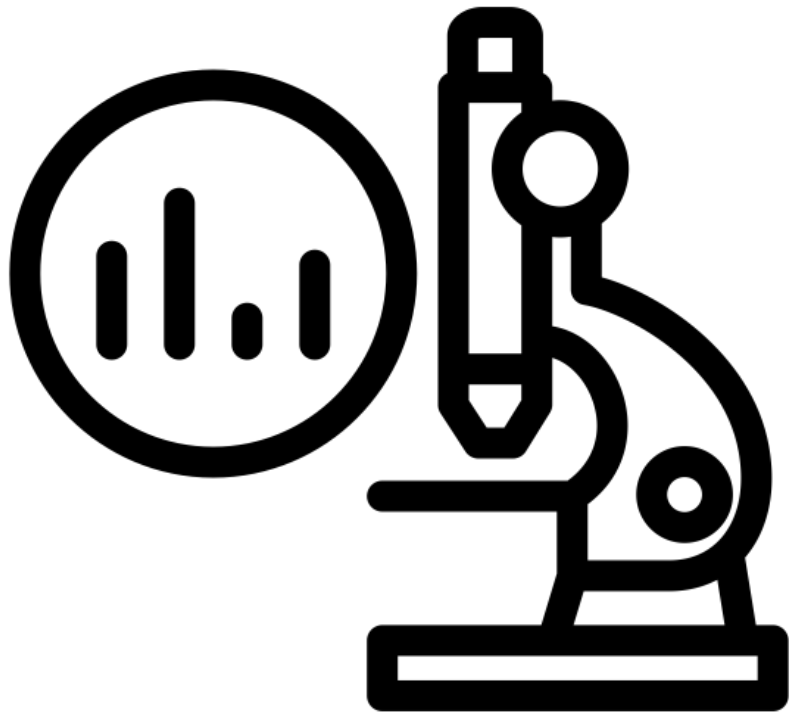


Produce new
statistics and
economic indicators



\$18 billion

Research Question



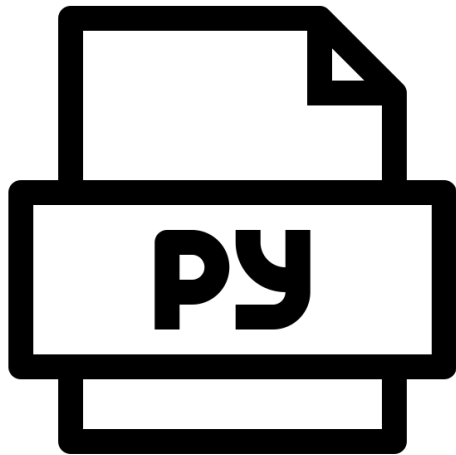
What is the economic impact of research spending?

What are the career outcomes of students paid by research grants?

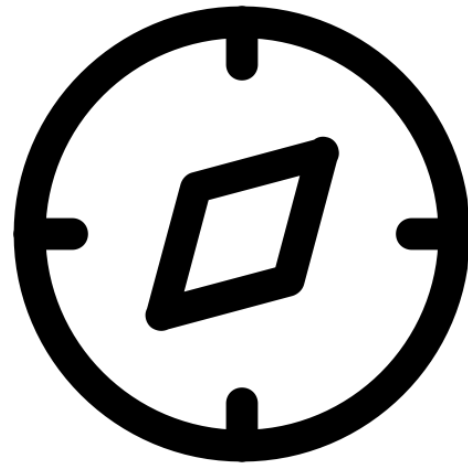
Are undergrads who receive research grants more or less likely to work at young firms?

Technologies Incorporated

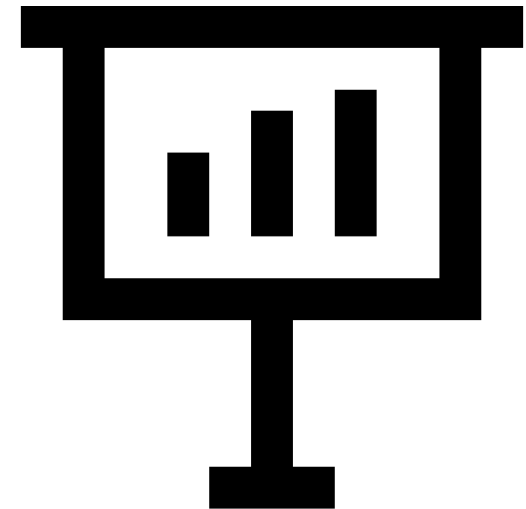
Utilized Python and its packages



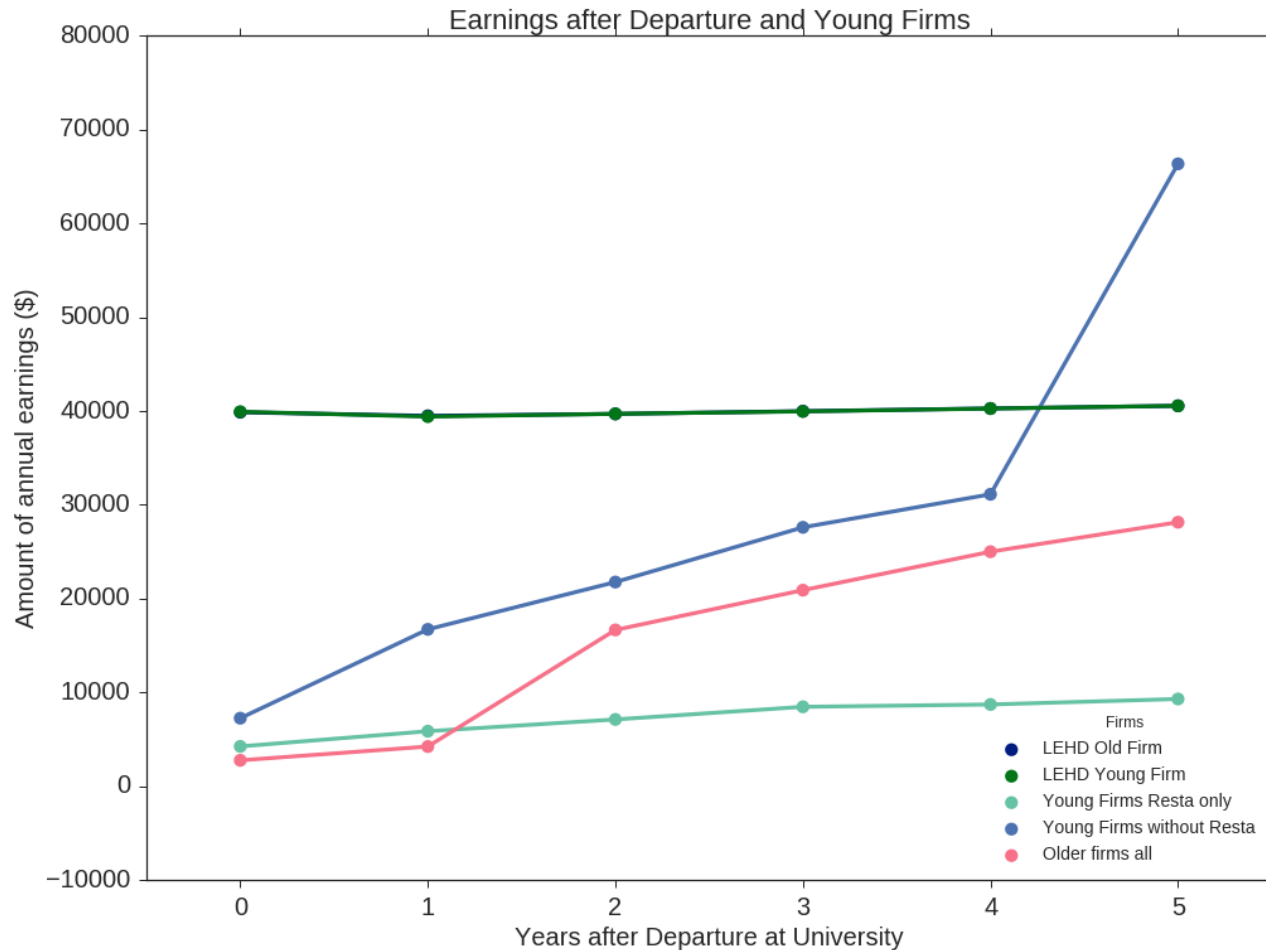
Explored data with pandas and numpy



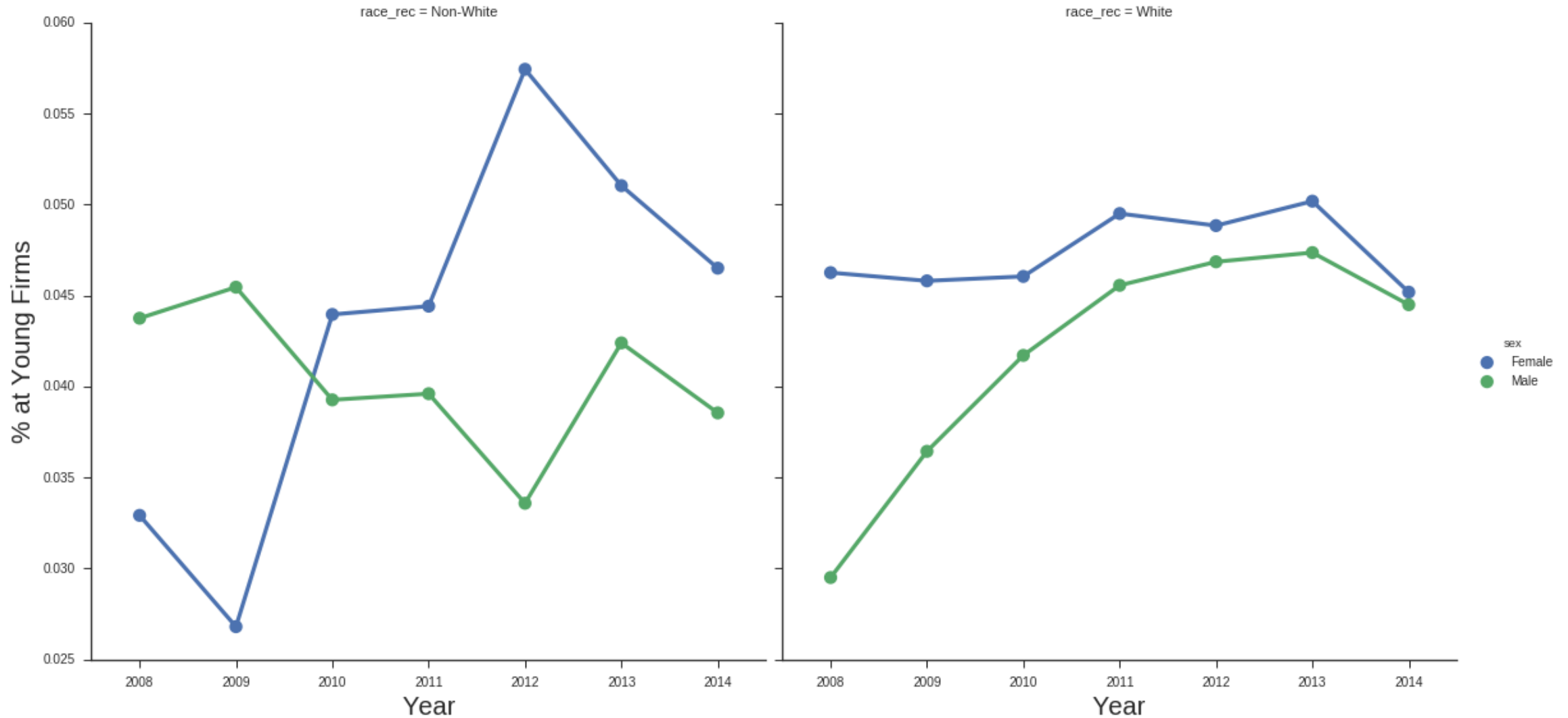
Visualized the data with seaborn and matplotlib



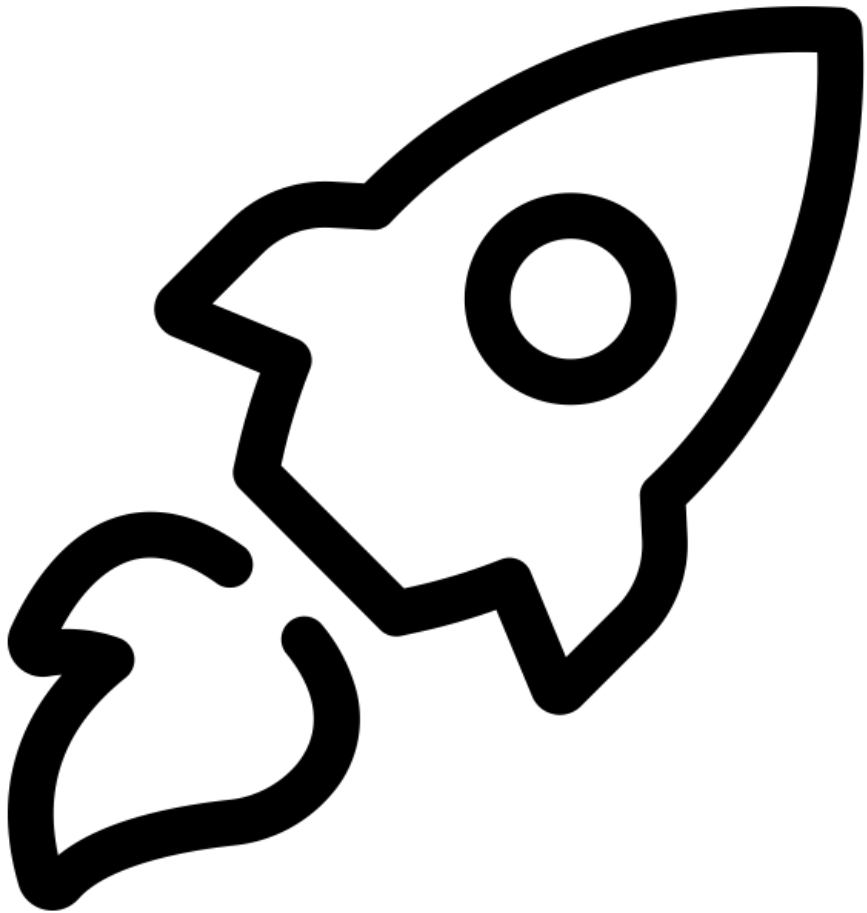
Earnings at a young firm tend to grow at a faster rate.



More women tend to be at young businesses.



Concluding Discoveries



Real data is incredibly complex and messy

Data security was always a top priority throughout my research at the Census

Be bold and ask questions

Thank you!

John Cuffe

Shawn Roberts

Sudip Bhattacharjee

Ann Wittenauer

Jeff Meisel

William Wisniewski

Adria Thomas

Contact Information

Andrea Chen, Civic Digital
Fellow

University of Washington

abchen@uw.edu

John Cuffe, Researcher

Center for Big Data Research
and Applications

john.cuffe@census.gov