

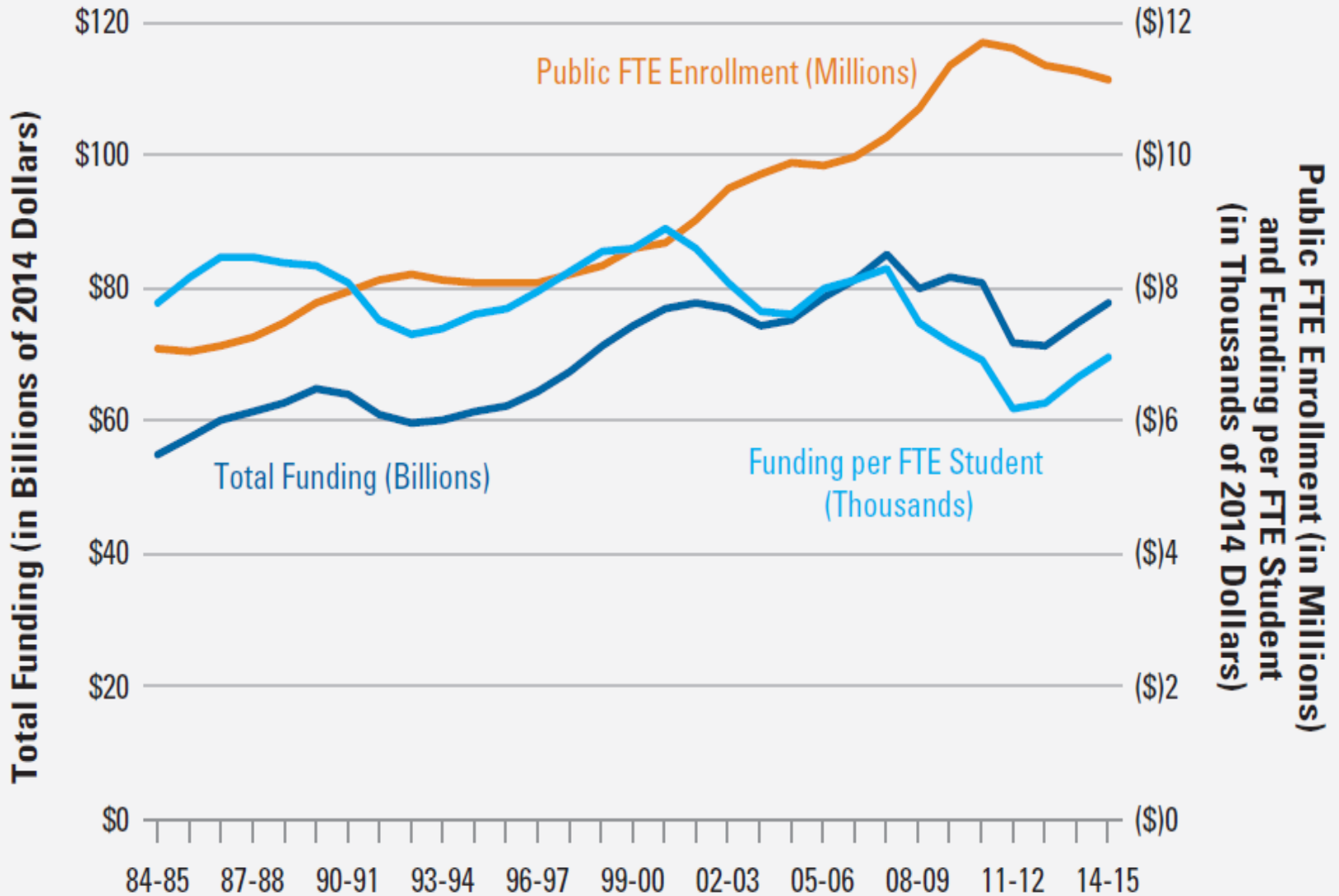


# An Experimental Study of the Value of Postsecondary Credentials in the Labor Market

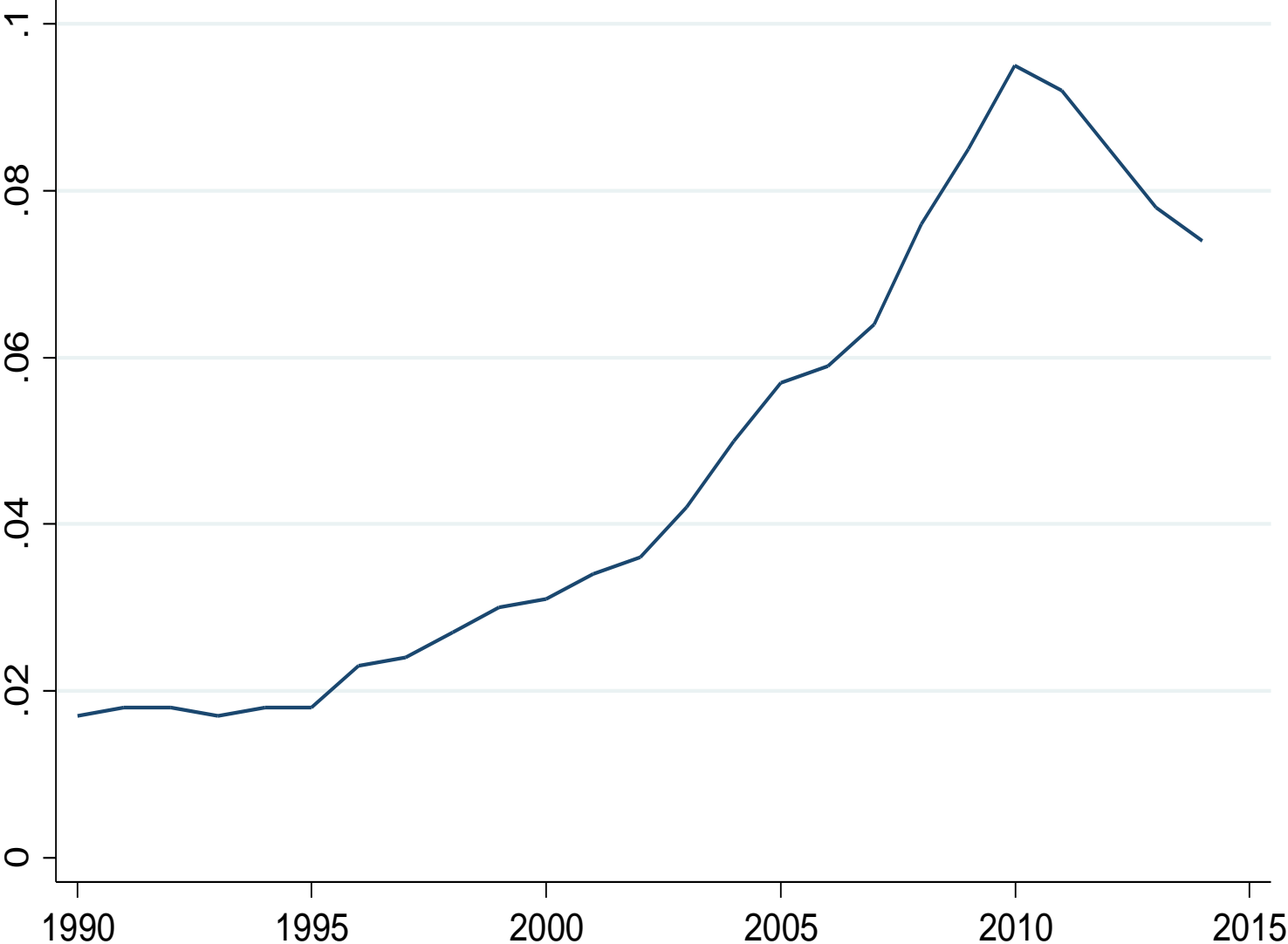
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**FIGURE 14B** Total and Per-Student State and Local Funding for Higher Education in 2014 Dollars and Public FTE Enrollment, 1984-85 to 2014-15

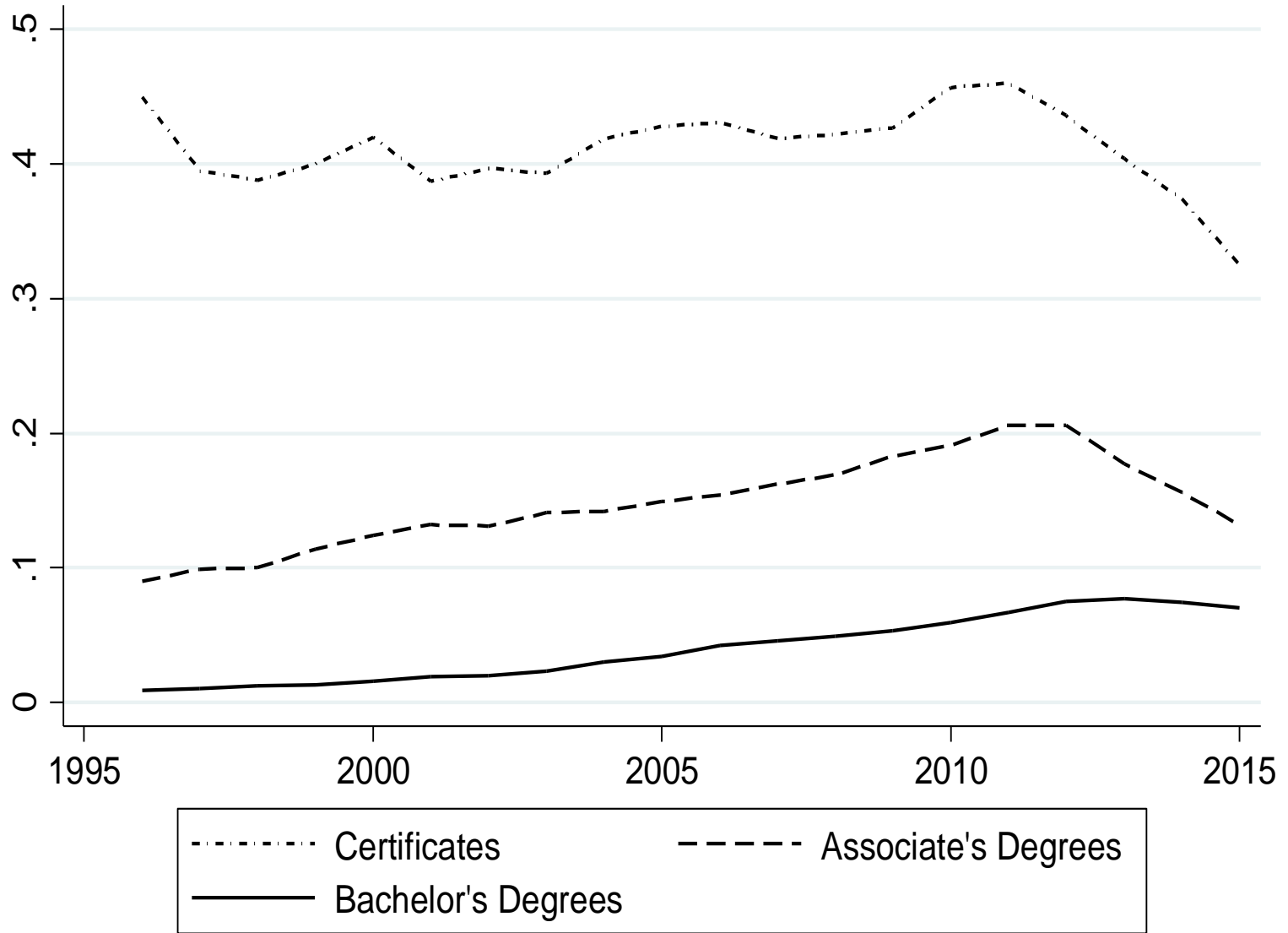


# Share of Total Fall Enrollment in For-Profits



Source: Digest of Education Statistics

# Share of All U.S. Degrees Granted by For-Profit Colleges



Source: Digest of Education Statistics

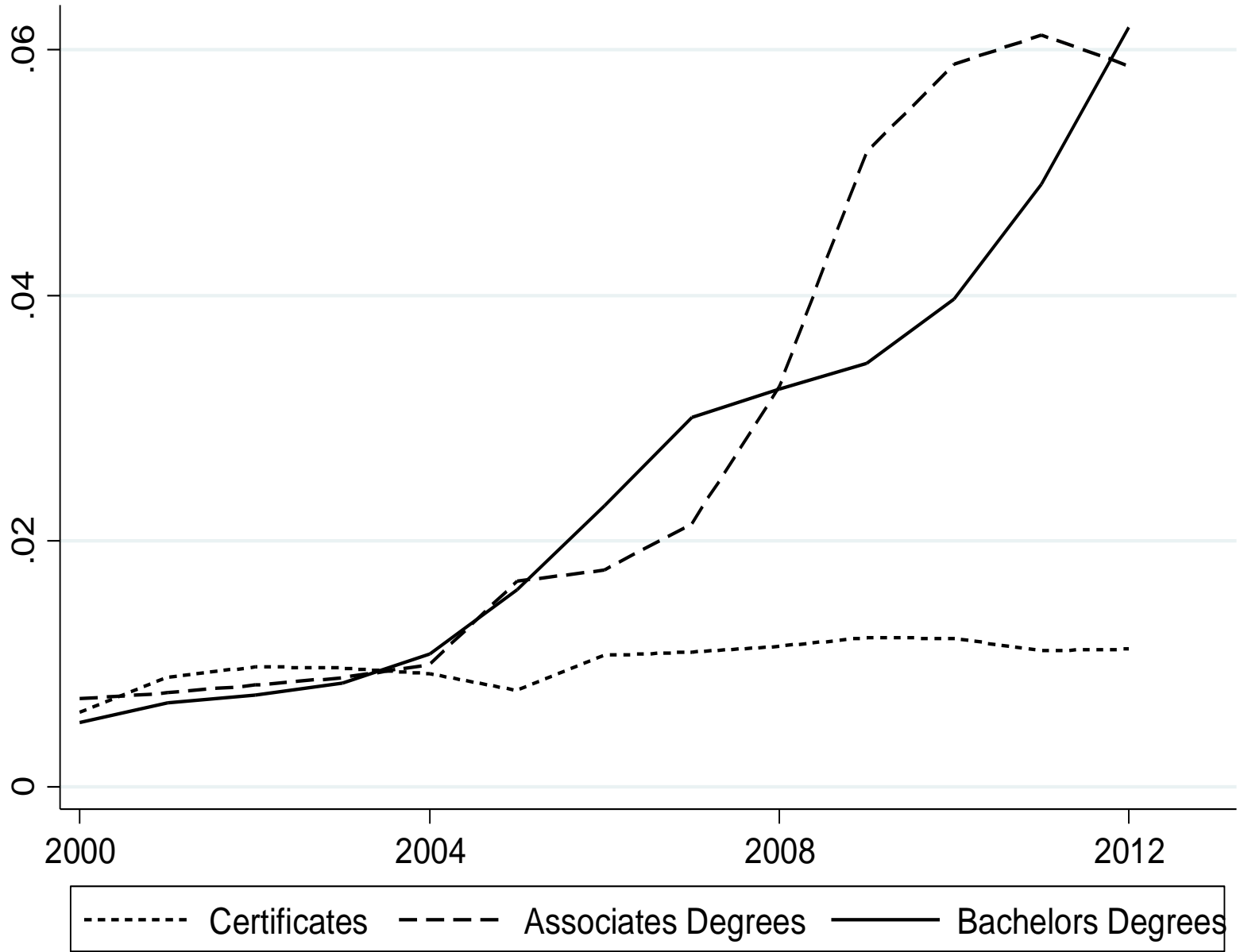
# Labor market returns to for-profit degrees

- For-profit colleges are:
  - Responsible for about 20-25 percent of growth in postsecondary enrollment since 2000
  - Much more expensive than public institutions
  - Heavily reliant (>75%) on Federal Title IV financial aid
- Studies of labor market returns to FPs are complicated by:
  - Student sorting
  - Strategic entry of FPs across labor markets and program offerings
  - Counterfactual - compared to local publics, other FPs or nothing at all?

# For-Profits and Online Education

- Not MOOCs, but degrees offered entirely online
  - For-profits account for one sixth of BA growth since 2000
- Publics getting into the game (UMUC, ASU, PSU, Cal State)
- Online a close substitute for degrees from less selective institutions (Hoxby 2014)
  - Lower cost (maybe) – what about quality?

# Share of all awards given by "online only" institutions



# A Resume Audit Study (Deming, Yuchtman, Abulafi, Goldin and Katz (2016 *AER*))

- We send resumes with randomly assigned postsecondary credentials to real employers
  - 5 of largest labor markets (NY, Chicago, LA, Miami, SF Bay)
  - Large online job board (32k new vacancies per day, 20% of JOLTS)
  - Business and Allied Health (two largest occupation groups by far)
  - Public vs. for-profit vs. HS only (no degree)
  - Certificates, AAs and BAs
  - Selective vs. less-selective publics
  - Primary online vs. “brick-and-mortar” for-profits



# Key *External* Validity Issues

1. Do graduates actually apply for jobs this way?
  - Placement services at several large FPs link graduates to this job site
2. Do our resumes look like the resumes of *real job-seekers*?
  - We use past work histories of real applicants who subsequently attended the schools in our sample
3. Are these jobs *good outcomes*?
  - Link to job attributes + exclude commission-based jobs

**Table 1 -Occupations and Sample Job Titles**

<b>Occupation Category</b>	<b>Degree Required</b>	<b>Sample Job Titles</b>	<b>Share of All FT Vacancies</b>
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**Business**

Accounting / Finance	None or AA	Payroll Manager, Billing / Collection Specialist	0.111
	BA	Business Analyst, Accountant (non-CPA)	

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Customer Service / Sales / Marketing	None or AA	Customer Care Rep, Sales Associate	0.344
	BA	Account Executive, Product Representative	

**Table 1 -Occupations and Sample Job Titles**

<b>Occupation Category</b>	<b>Degree Required</b>	<b>Sample Job Titles</b>	<b>Share of All FT Vacancies</b>
<b>Allied Health</b>			
Medical Assistant - Admin	None or Cert	Medical Biller, Medical Secretary	0.050
Medical Assistant - Clinical	None or Cert	Medical Assistant, Clinical Support	0.036
Practical/Vocational Nursing	Cert	Licensed Practical Nurse	0.012
Pharmacy Technician	Cert	Pharmacy Technician	0.011

# What schools are in the sample?

- For-profits
  - At least half of FP resumes in business from largest online schools
    - Phoenix, Strayer, Kaplan, DeVry, Ashford, Colorado Tech, American Public U, American Intercontinental
  - Other half of business and all health degrees local
- Publics
  - Local two-years, and four-year publics of varying selectivity (i.e. Cal State and UC)

# What else did you include on the resumes?

- Drawn from occ-degree-MSA searches of real work histories in a large online resume bank (Indeed.com)
- Local HS diploma, common skills (e.g. MS Office)
- Race and gender signaled through names

# How did you apply to jobs?

- Search once per day and identify eligible jobs
  - Record job info (title, firm name, salary, etc.)
- Randomly assign name, college, work history etc. to 4 different resumes
  - Resume randomizer program (Lahey and Beasley 2009)
  - Randomly assign race, gender *across* vacancies (e.g. 4 WMs, 4 WFs)

# Experimental Design

## Degree

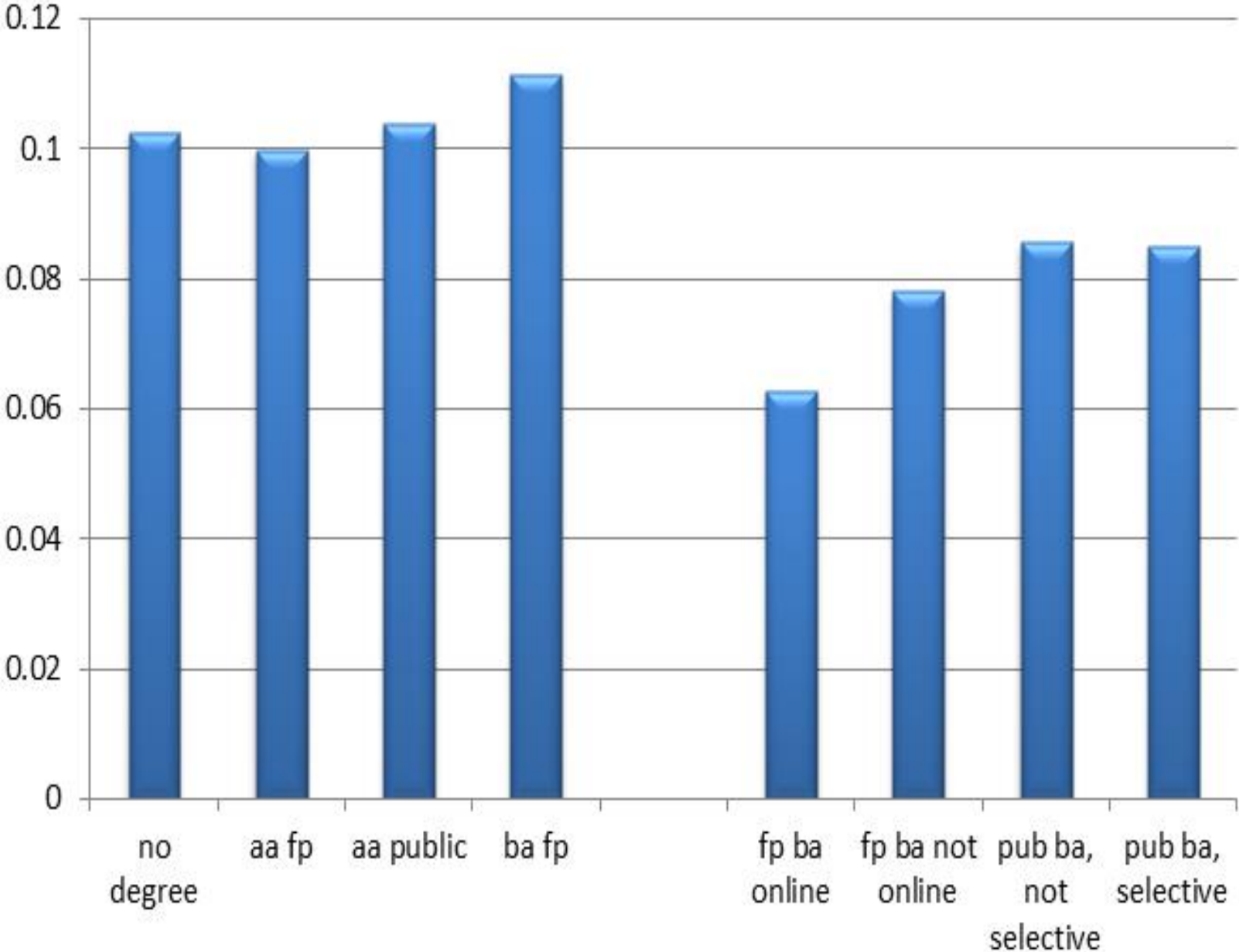
### Occupation Required Resume Structure

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Business	None	1: HS only
		2: For-profit AA
		3: Public AA
		4: For-profit BA
Business	BA	1: BA, public, not selective
		2: BA, public, selective
		3: BA, for-profit, online
		4: BA, for-profit, in-person (if avail.)

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# Callback rates for business jobs





**Table 5 - Results for business jobs that require a bachelor's degree**

	(1)	(2)	(3)
For-Profit (BA)	-0.019*** [0.005]	-0.020*** [0.005]	
For-Profit BA, Online			-0.021*** [0.006]
For-Profit BA, Local			-0.007 [0.012]
Selective Public BA			0.001 [0.010]
White male	-0.014 [0.020]		
Nonwhite female	-0.010 [0.019]		
Nonwhite male	0.002 [0.020]		
NS Public BA Callback Rate	0.091	0.091	0.091
Observations	4,100	4,100	4,100
Vacancy Fixed Effects		X	X

# Experimental Design

Occupation	Degree Required	Resume Structure
Allied Health	None	1: Public Certificate 2: For-Profit Certificate 3: HS only (but 1 yr relevant wk exper.) 4: HS only
	Certificate	1: Public Certificate 2: Public Certificate 3: For-Profit Certificate 4: For-Profit Certificate

# Callback rates for health jobs

# Summary of Results

1. For business jobs that do not require a degree, all resumes (including no degree) are *equally likely* to receive a callback.
2. For-profit BA 22 percent *less* likely to receive a callback than an identical resume with a non-selective public degree.
  - Lowest callback rates for large, rapidly growing online FPs. Employers do not appear to value these degrees very highly.
3. 57 percent higher callback rate for public certs in home health aide / medical assistant jobs.
  - No diff in cert required jobs (LPN, pharmacy tech); often require licensure.

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