Search Costs, Outside Options, and On-the-Job Search

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Motivation

- When people ponder a career move they weigh **expected benefits and costs of job search**
- Evidence that workers are **imperfectly informed about their outside options**
  - Low-income workers underestimate how much they could earn at other employers (Jäger et al., 2021) and overestimate their position in income distribution (Hvidberg et al., 2020)
- **Lack good measures for search costs** and for perceptions of these costs
- **On-the-job search empirically relevant** but search behavior of employed workers studied relatively less
  - Each year in US $\approx$ 60% of new hires come directly from other jobs, $\approx$ 10% of workers makes a job to job transition
  - Job mobility important source of wage growth for workers

Search Costs, Outside Options, and Job Mobility

- How do beliefs about search costs, returns to search effort, and outside options relate to job mobility decisions of employed workers?
- Design an **online survey** and administer it to representative sample of **2,500 wage and salaried workers** in US
  - Elicit workers' beliefs about search costs – time, money, stress – returns to search effort, and outside options
  - Measure past, current and intended search behavior
- Study relation between beliefs and search intentions
  - Correlations
  - **Information experiments**: provide subset of respondents with
    - Accurate information on local and national **median wage** in their occupation
    - Information on **search costs** experienced by other respondents in sample who made a job-to-job transition

Preview of Results

- 3 main results:
  1. Heterogeneity in perceived search costs and returns to effort across demographic groups
     - Women expect higher costs and lower returns
     - Some evidence consistent with errors in perceptions
  2. Significant link between beliefs and search intentions
     - Workers perceiving lower outside options, lower returns to effort, and higher search costs less likely to search for new job
     - Time – especially time needed to look for job openings – more relevant than monetary search costs
  3. Information on costs has stronger effect on search intentions than info on wages
     - Information about median wage does not shift search intentions, while positive information on search costs is effective for women, more worried about search costs

Related literature

Survey Overview and Sample

Survey Overview

- **Target population**
  - **Wage and salaried** workers in **US**, age 20 to 64
- **Sample**
  - $\approx$ 2,500 respondents, representative of target population
  - Quotas on age, income, gender, race, education, census regions
  - Industry and occupation composition close to CPS ▸ Survey vs. CPS ▸ Occupations ▸ Industries
- Survey administered online in September 2022
  - Survey link distributed via professional survey company

\+ Follow-up two weeks after main survey
  - To measure persistence of treatment effect

- Time spent on survey: median 20 min, average 29 min

▸ Ensuring reasonable answers

Survey Outline

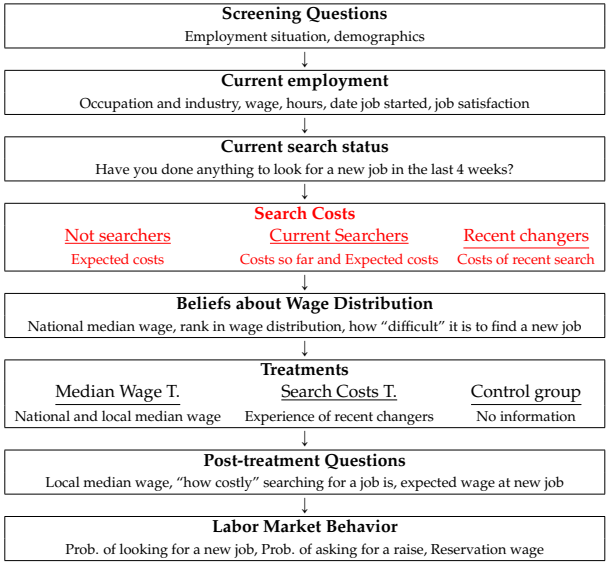
Exploiting Heterogeneity of Respondents in Sample

- **3 groups** of respondents in sample
  1. Recent job changers – changed jobs in last 12 months
  2. Current searchers – positive search activity in last 4 weeks
  3. Not searchers – everybody else
- Costs questions adapted for 3 groups
  - Realized costs for recent changers
  - Current and future expected costs for current searchers
  - Expected costs for not searchers
- Use **not searchers** to study role of **expectations** on propensity to search
- Use **recent changers who made an employment to employment transition** as **benchmark** and to compute statistics for search costs treatment

Sample composition

Beliefs about Search Costs and Returns to Effort

Survey Outline



Measuring Beliefs about Search Costs and Returns to Effort

Search Costs

1. **Time**
   - **Weeks** needed to find a new job

     "From the moment when you would start actively looking for job openings, until the moment you accept the new job offer"
   - **Hours** expected on **3 phases** of job search process:
     - Looking for job openings
     - Sending applications
     - Preparing for and doing job interviews ▸ Details
2. **Money** on job-search-related expenses
   - Job search "budget"
   - Concrete examples of cost items ▸ Details
3. **Stress** associated with job search
   - Likert scale from 1 *"Not stressful at all"* to 7 *"Extremely stressful"*

Measuring Beliefs about Search Costs and Returns to Effort (cont.)

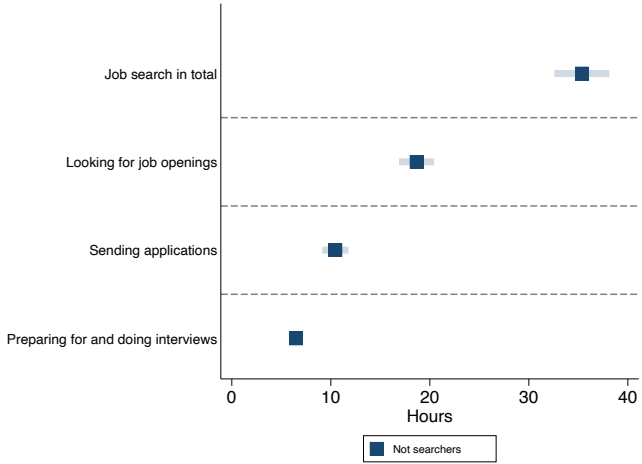
Returns to effort

- Expected applications' **success rate** = Expected number of job offers/expected number of job applications sent

Switching cost

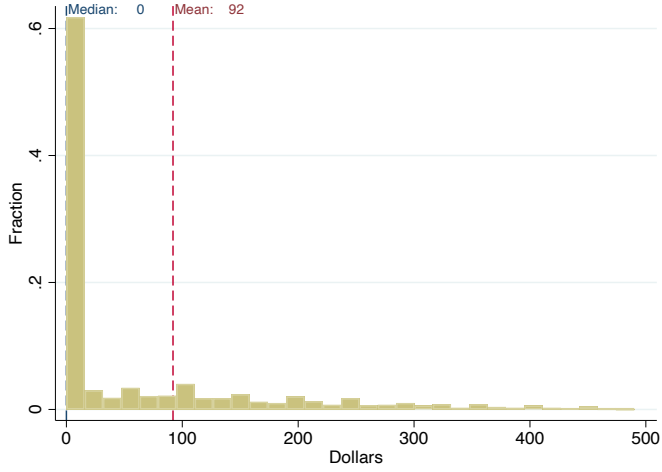
- Switching cost $\approx$ reservation wage $-$ current wage

Looking for Job Openings Expected to Be Most Time Consuming



▸ Medians ▸ Distributions ▸ Recent changers

Most Respondents Expect to Spend No or Little Money on Search



- Even larger mass at zero for realized costs ▸ Realized ▸ Mean and median by phase ▸ Weeks ▸ Success rate ▸ Stress ▸ Time per application

Heterogeneity in Expected Costs and Returns

	Exp. tot. hours (1)	Exp. weeks (2)	Exp. stress (3)	Exp. applications (4)	Exp. success rate (5)
Female	0.0405	0.260***	0.321***	0.112**	-0.295***
	(0.0521)	(0.0510)	(0.0514)	(0.0540)	(0.0513)
Age 20-39	-0.166***	-0.197***	0.0294	-0.0766	0.143**
	(0.0520)	(0.0508)	(0.0556)	(0.0560)	(0.0582)
College graduate	0.214***	0.438***	0.119**	0.146**	-0.136**
	(0.0565)	(0.0550)	(0.0556)	(0.0581)	(0.0555)
African American	-0.201**	-0.182**	-0.356***	-0.0348	0.268***
	(0.0806)	(0.0746)	(0.0951)	(0.0887)	(0.0944)
Hispanic/Latino Origin	-0.108	-0.0276	-0.00313	-0.0840	0.105
	(0.0873)	(0.0802)	(0.0967)	(0.0962)	(0.101)
High wage	0.200***	0.144**	-0.0454	-0.104	0.124*
	(0.0703)	(0.0647)	(0.0642)	(0.0646)	(0.0668)
Observations	1547	1548	1549	1548	1511

- Dependent variables standardized – mean 0, sd 1

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- **College graduates** expect to spend more hours and more weeks searching, expect the job search to be more stressful, and believe they would send more applications with lower returns in terms of job offers

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- **Women** expect to spend more weeks searching, believe the job search will be more stressful, think they will have to apply to more jobs, with lower returns in terms of job offers

Less Heterogeneity between Women and Men in Realized Costs

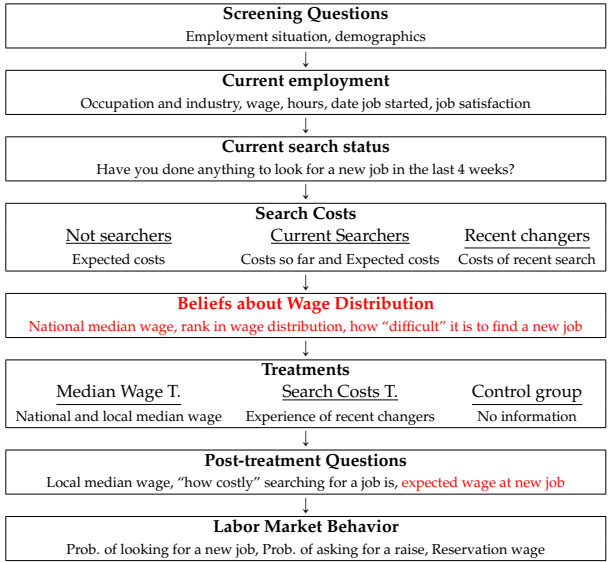
	Tot. Hours (1)	Weeks (2)	Stress (3)	Applications (4)	Success rate (5)
Female	-0.0859	0.110	0.0390	0.116	-0.192
	(0.158)	(0.158)	(0.159)	(0.166)	(0.162)
Age 20-39	-0.275	-0.361*	0.300*	-0.111	0.154
	(0.171)	(0.187)	(0.173)	(0.195)	(0.177)
College graduate	0.285*	0.508***	0.334**	0.280	-0.394**
	(0.154)	(0.151)	(0.161)	(0.174)	(0.170)
African American	-0.267**	-0.273*	0.169	-0.0128	-0.0356
	(0.133)	(0.147)	(0.261)	(0.130)	(0.213)
Hispanic/Latino Origin	-0.151	-0.275	-0.255	-0.279**	0.322
	(0.212)	(0.224)	(0.296)	(0.135)	(0.235)
High wage	-0.0269	0.217	-0.106	-0.0904	-0.0251
	(0.234)	(0.242)	(0.199)	(0.242)	(0.215)
Observations	168	168	168	168	165

- Dependent variables standardized, mean 0, sd 1
- Smaller and non-significant differences between women and men

Expected vs. Realized - Means by demographics

Beliefs about Outside Options

Survey Outline



Beliefs about Outside Options: Summary

- **Large heterogeneity** in misperceptions of **national median wage**
  - On average, people correct/overestimate ▸ Distribution
- Most respondents **overestimate own rank** in wage distribution
  - Evidence of "center bias" ▸ Distribution
- **Heterogeneity in expected wage change** from moving to new job
  - Expected wage change from moving to a new job, same occupation, found in max 3 months ▸ Question
  - 42% or respondents believe would earn the same, 16% believe would earn less ▸ Distribution
- **Women** more likely to **underestimate median wage** and **overestimate rank** in wage distribution ▸ Graphs
- Respondents who underestimate median wage and overestimate rank in distribution expect lower wage gain ▸ Regression

Beliefs and Search Intentions

Survey Outline

Beliefs and Search Behavior

Outcome variable

- Willingness to look for a (new) job in next 12 months

  "Over the next 12 MONTHS, what is the percent chance that you will look for a new job at a different employer? "

Beliefs about Outside Options and Returns Strongest Predictors of Search Intentions

	Prob. Looking for New Job
Exp. avg. time per application	-0.0184
	(0.0263)
Exp. avg. money per application	0.0605**
	(0.0296)
Exp. stress	0.0404
	(0.0264)
Exp. success rate	0.0685***
	(0.0258)
Exp. wage change in p.p.	0.323***
	(0.0249)
Reservation wage	-0.136***
	(0.0278)
Observations	1444
Adjusted R^2	0.260

- All variables standardized, coefficients represent partial correlations
- Controlling for current job satisfaction, skill fit with current job, demographics, SOC 2-digit occupation and industry fixed effects ▸ Intensive margin

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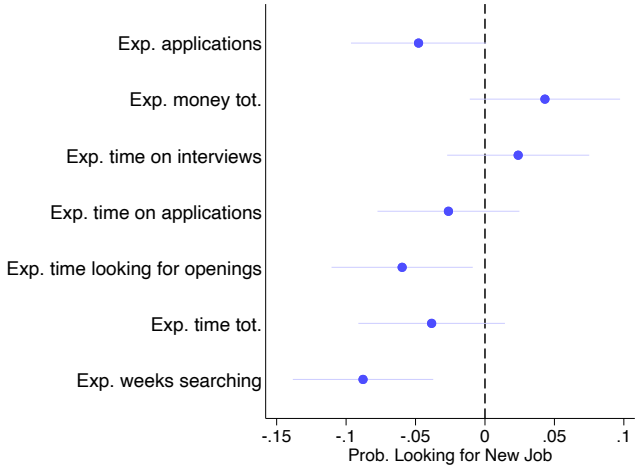
Time Looking for Openings Most Relevant Cost



→ Relevance of **information frictions** ▸ Are workers always searching?

Information Treatments

Survey Outline

Median Wage Treatment: Accurate Information on Median Wage

- Information on **national and local median wage** for respondents' occupation
  - Local area: Metropolitan area (MSA) or Micropolitan area where respondent lives
- 6-digit SOC occupation level
  - Electrical engineer, kindergarten teacher etc.
- Building on Jäger et al (2021) for Germany

Median Wage Treatment: Accurate Information on Median Wage

You previously said that you think the typical annual earnings of a **full-time worker in your occupation** in the United States are $30,000.

According to **official statistics** of the Bureau of Labor Statistics, the typical* annual earnings of a full-time worker in your occupation in the U.S. are $37,880

The typical* annual earnings of a full-time worker in your occupation in the **area where you live** are $36,850.

*By "typical annual earnings" we mean **median** annual earnings, that is the earnings of the employees in the middle of the wage distribution, such that half (50%) of all employees earn less or the same and the other half earn more.

Search Costs Treatment: Information on Search Costs

- Information on **weeks**, **hours**, and **money** it took other people in the same occupation to find a new job
- Statistics computed on recent changers in sample who found their new job while employed (E to E transition)
- Broad SOC occupation groups (condensed 2-digit groups)
  - Bayesian shrinkage to average costs across occupations to account for small group size

Search Costs Treatment: Information on Search Costs

You previously said that, if you decided to look for a new job at a different employer, it would take you 8 weeks and 50 hours of active search to find a new job, and that you expect to spend $0 on your search.

On average, **other people in the same occupation group** as you who have taken this survey and have **successfully changed job in the last 12 months** reported that their job search lasted **6 weeks**.

On average, they spent **31 hours** on their job search in total. This includes the time spent looking for job openings, preparing and submitting applications, and preparing for and doing interviews.

They did **not spend any money** on their job search.

Significant First Stage on Outside Options and Costs

	Local Median Wage Perc. Misp.	Job Search Time Consuming	Expected Wage Change New Job (in p.p.)
Median wage treatment x Underestimate wage	16.57***	0.0396	8.751***
	(2.631)	(0.0983)	(2.016)
Median wage treatment x Overestimate wage	-27.06***	0.105	0.235
	(4.269)	(0.0909)	(1.919)
Search costs T x Underestimate costs	-0.763	-0.0835	3.119*
	(4.007)	(0.0903)	(1.829)
Search costs T x Overestimate costs	6.380	-0.300**	2.320
	(5.314)	(0.120)	(2.569)
Underestimate wage	-54.61***	0.0609	-6.588***
	(3.036)	(0.0814)	(1.668)
Overestimate costs	-2.534	0.508***	-3.339**
	(2.766)	(0.0753)	(1.611)
Observations	2282	2206	2338
Control mean	11.61	4.77	12.01

- Separating between respondents who received an upward/downward signal on wage/costs
- Controlling for demographics, occupation and industry FE

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- T effect on under-estimators: 17 pp ↑ misperceptions of median wage, 9 pp (0.3 sd) ↑ expected wage gain
- T effect on over-estimators: 27 pp ↓ misperceptions of median wage, no effect on expected wage gain

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- T effect on over-estimators: ↓ 0.3 (0.22 sd) how time consuming job search is expected. No effect on expected wage gain
- Effect of Search Costs T and (partially) Median Wage T **persist in follow-up survey** 2 weeks later

▸ Histograms ▸ Follow-up

No Effect on Search Behavior in Overall Sample

	Prob. Looking for New Job
Median wage treatment x Underestimate wage	1.385
	(2.114)
Median wage treatment x Overestimate wage	1.635
	(1.921)
Search costs T x Underestimate costs	2.123
	(1.814)
Search costs T x Overestimate costs	4.089
	(3.035)
Underestimate wage	-0.969
	(1.733)
Overestimate costs	-4.533***
	(1.699)
Observations	1731
Control mean	33.20

Search Costs Treatment Effective on Women

	Prob. Looking for New Job
Panel A: Median Wage Treatment – Only respondents who underestimate wage	
Median wage T x Female	0.423
	(3.074)
Median wage T x Male	1.803
	(3.338)
Observations	615
Control mean	34.72
Panel B: Search Costs Treatment – Only respondents who overestimate costs	
Search costs T x Female	9.124**
	(4.418)
Search costs T x Male	-0.258
	(4.934)
Observations	290
Control mean	29.51

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- Search Costs T on women: ↑ probability to search by 9 pp (0.33 sd)

Conclusions

- **Time** main constraint when searching on the job
- **Heterogeneity** in perceived search costs and returns
  - Women expect higher costs and lower returns than men
  - Less heterogeneity in realized costs → part of gap may be driven by errors
- Beliefs about **outside options** and **returns to effort** strongest predictors of job search intentions
- **Information on costs** more effective at moving search intentions for more pessimistic groups than information on median wage

Implications

- **Expectations about costs and returns** should be taken into account when studying on-the-job search
  - Additional mechanism for cyclicality of employment to employment transitions
- **Errors in expectations** about costs and returns may discourage workers for seeking better employment opportunities
  - If they reduce mobility, these errors may **dampen workers' welfare** and increase **inequality** and **monopsony** power
- **Interventions** aimed at stimulating workers' mobility should also target expectations about search costs

Thank you!

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Appendix

Related Literature

- Small but growing literature on **workers beliefs**
  - Jäger et al. (2021): employed workers in Germany anchor outside options to their wage
  - Conlon et al (2018): beliefs updating in response to job offers
  - Rest of this literature focuses almost exclusively on unemployed workers: e.g., Mueller et al. (2021), DellaVigna et al. (2021)
- Evidence on **search behavior of employed workers**
  - NY Fed's Survey of Consumer Expectations, Fabermann et al. (2022): employed workers search less than unemployed workers but are more effective
- Evidence on **search costs**
  - Field interventions for unemployed workers and often in developing countries

    E.g., Belot et al. (2019); Abebe et al. (2021); Beam (2021); Ben Dhia et al. (2022)
  - Search costs recovered indirectly in labor-search models
  - No study elicits directly and quantifies search costs

My Contributions

1. Collect detailed data on **perceptions of search costs and returns to search effort** of **employed workers**, in addition to beliefs about outside options

2. Document **link between perceptions and on-the-job search intentions** correlationally and experimentally

Back

Ensuring Reasonable Answers

- Appeal to people's social responsibility
- Warn that "careless answers" will be flagged
- Attention checks at the beginning and during survey
- Interactive survey design
  - Help respondents visualize their answers
  - Flag potentially (very) weird answers
- Check time spent on separate questions and on survey overall
  - Drop bottom and top 1% in distribution of time on survey

Back

Sample Representative of Target Population

	Survey	CPS – March Supplement
Male	0.51	0.51
Age		
20-29 years old	0.20	0.22
30-39 years old	0.25	0.26
40-49 years old	0.23	0.23
50-64 years old	0.31	0.30
Household income		
<$30,000	0.10	0.10
$30,000-$59,999	0.22	0.21
$60,000-$89,999	0.20	0.19
⩾$90,000	0.48	0.50
4-year college degree or more	0.46	0.43
High-school degree or less	0.27	0.30
Hispanic/Latino origin	0.10	0.18
African American	0.12	0.13
Asian/Asian American	0.06	0.07
Married/living w. Partner	0.68	0.55
Sample size	2462	

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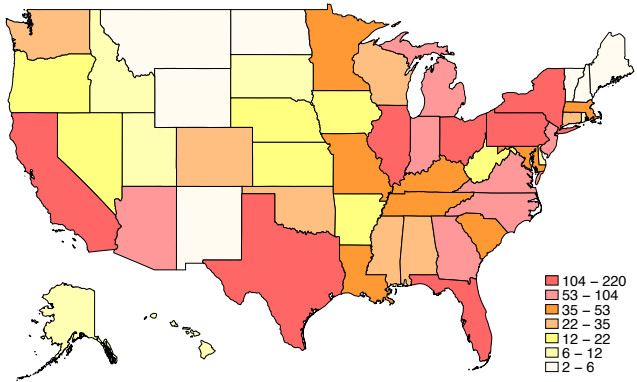
Number of Observations by State



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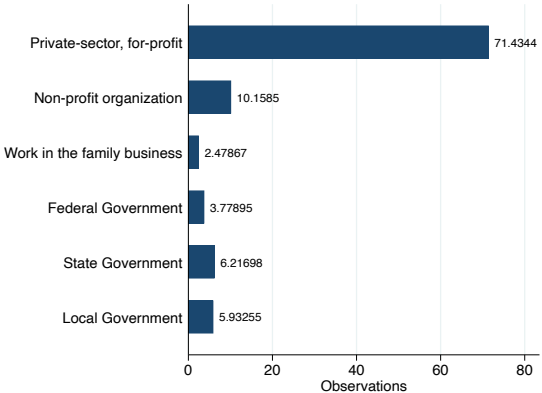
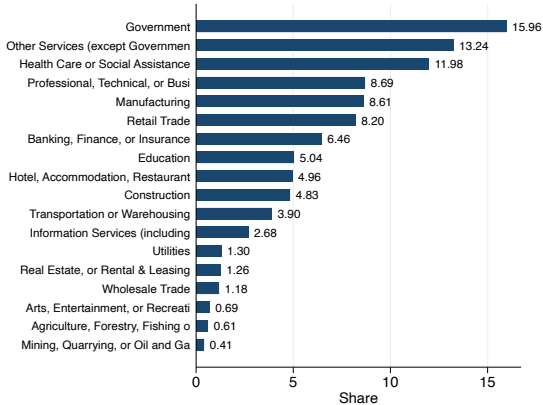
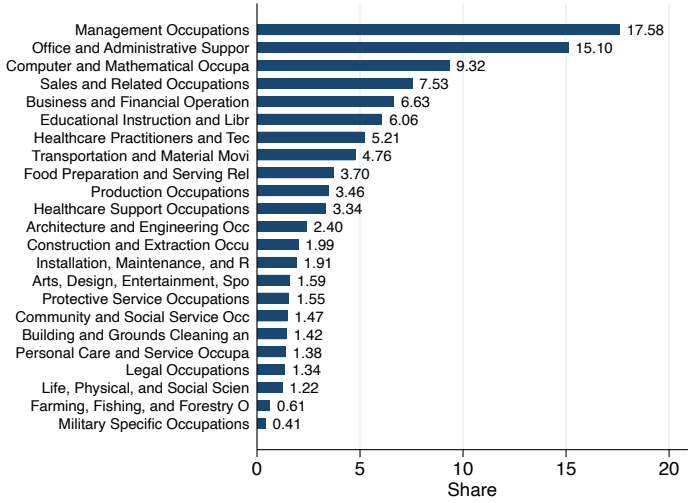
Employer Type and Industry





Back

SOC-2 Occupations



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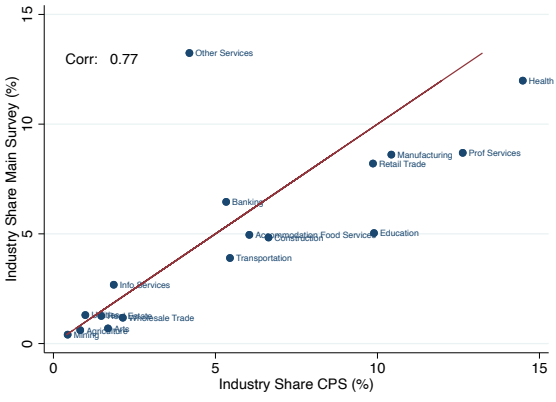
Labor Market Summary Statistics

	Mean	Median	P25	P75	Obs.
Work hours per week	39.08	40.00	36.00	42.00	2462
Gross annual earnings	75025.28	58411.50	36000.00	95000.00	2462
Gross hourly earnings	38.91	27.67	17.79	45.19	2462
Tenure at current job (in yrs.)	8.96	6.00	2.17	13.25	2462
Full-time employed	0.88	1.00	1.00	1.00	2462
Working at multiple jobs	0.15	0.00	0.00	0.00	2462
Working fully in-person	0.69	1.00	0.00	1.00	2462
Working remotely some time	0.19	0.00	0.00	0.00	2462
Active job searcher	0.22	0.00	0.00	0.00	2462
Passive job searcher	0.04	0.00	0.00	0.00	2462

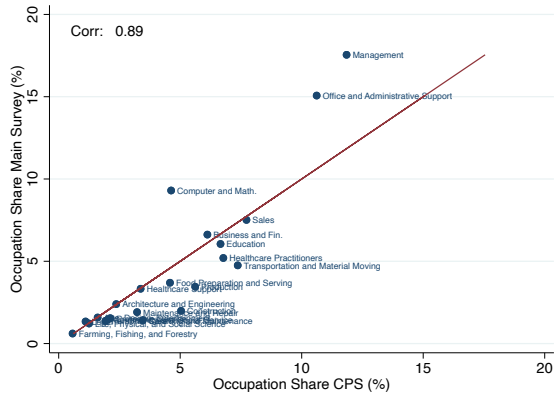
Back

Industry and Occupation Composition in Survey vs. CPS

(a) Industry



(b) Occupation



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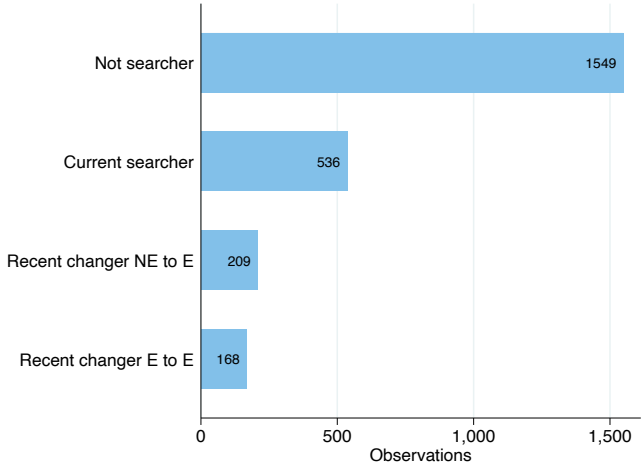
Sample Composition



Observables by group
Back

Characteristics by Group

	Not searchers	Current searchers			Recent changers – NE to E			Recent changers – E to E		
	Mean	Mean	Diff	P-value	Mean	Diff	P-value	Mean	Diff	P-value
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)
Male	0.53	0.52	-0.02	0.479	0.39	-0.15	0.000	0.41	-0.12	0.002
Age 20-39	0.36	0.60	0.24	0.000	0.71	0.35	0.000	0.61	0.25	0.000
High income	0.19	0.16	-0.03	0.134	0.05	-0.14	0.000	0.18	-0.01	0.750
4-year college degree or more	0.46	0.53	0.06	0.014	0.26	-0.21	0.000	0.46	-0.01	0.873
High-school degree or less	0.26	0.20	-0.06	0.006	0.43	0.17	0.000	0.32	0.06	0.141
Hispanic/Latino origin	0.08	0.15	0.07	0.000	0.11	0.03	0.151	0.10	0.02	0.453
African American	0.10	0.15	0.05	0.004	0.19	0.09	0.001	0.13	0.03	0.208
Married/living w. Partner	0.70	0.68	-0.02	0.400	0.51	-0.19	0.000	0.67	-0.04	0.350
Sample size	1549	536			209			168		

Back

Questions on Time Costs

Imagine you decided to look for a new job at a new employer now. We would like you to think about how you would approach this job search process and tell us about it.

Now consider the job search process split into three phases: looking for job openings; preparing and sending out job applications; preparing for and doing job interviews. If you were to look for a new job now, how much time do you think you would have to spend on each of these phases? Please answer the following questions giving us your best estimates.

How many hours do you think you would spend looking for job openings (including networking, if applicable)? Please do not include the time you would spend on applications and interviews.

How many job applications would you submit?

How many hours would you spend preparing and sending out applications, including drafting/updating your CV, writing cover letters, and submitting applications (online, by mail or in person).

How many hours do you think you would spend preparing for and doing interviews? Please also include the time you think you would spend commuting to and from the interview location if in person.

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Job Search Budget

Step 1

Do you think you would spend any money on your job search? Some examples of job-search related expenditures are subscription fees to job board websites, fees for employment agencies/head-hunters, mailing fees for applications, transportation to and from the location of the interviews, material or classes to prepare for interviews, new clothes. Yes; No; Unsure

Step 2

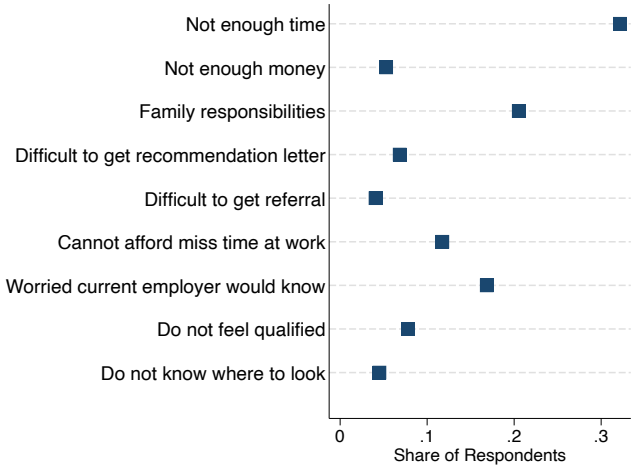
Please tell us how much **you think you would spend** on each of the following items if you were to look for a new job. Write 0 if you do not expect to spend anything.

If you expect to spend money on other items that you would consider related to your job-search but do not find them listed below, please report the amount in the field for "Other expenses" and tell us in a few words what these items are by writing in the box below.

Subscription fees for job board websites	$
Fees for employment agencies, head-hunters, or career services	$
Mailing fees and/or transportation costs to submit applications	$
New clothes for interviews (for instance, a new suit)	$
Material and/or courses to prepare for interviews	$
Transportation to and from locations of interviews	$
Other expenses related to the job search (please specify)	
	$
Total	$ 0

Back

What Would Make Looking for a New Job Difficult



- Main issues for not searchers: **not having enough time** or **having to take care of family responsibilities** ▸ Word Clouds ▸ Recent changers ▸ Back

What Made Looking for a New Job Difficult

Back

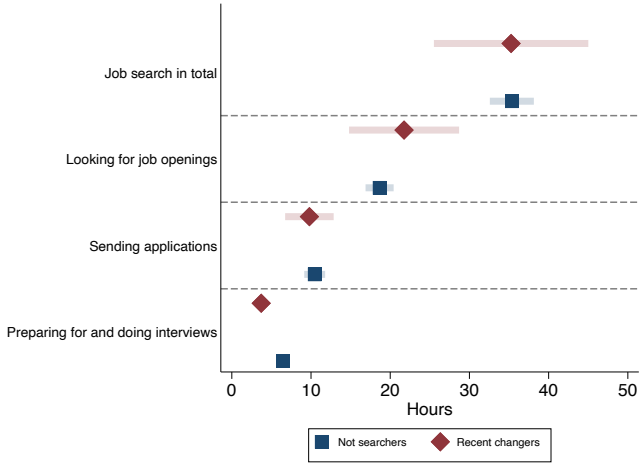
Word Clouds: What Makes Looking for a New Job Difficult?

(a) Not searchers vs. Current Searchers

(b) Recent Changers

Back

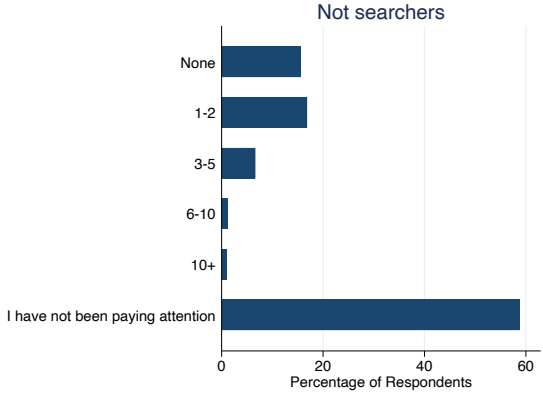
Looking for Job Openings Most Time Consuming Phase



Back

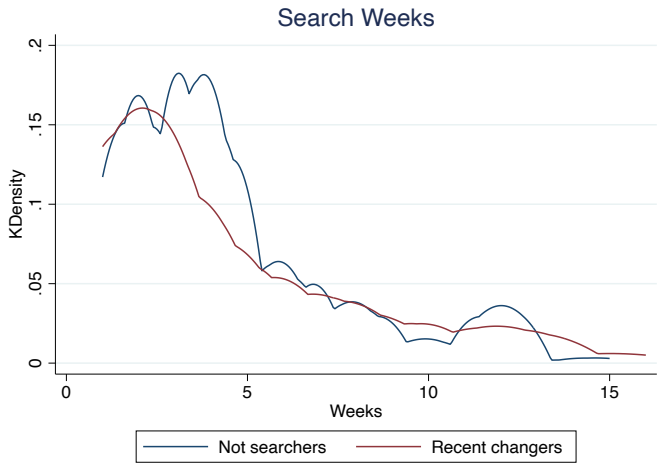
Do People Pay Attention to Job Ads?

"In the LAST 4 WEEKS, have you seen any ads for jobs at other employers that you would apply to [if you were looking for a new job]? How many?"



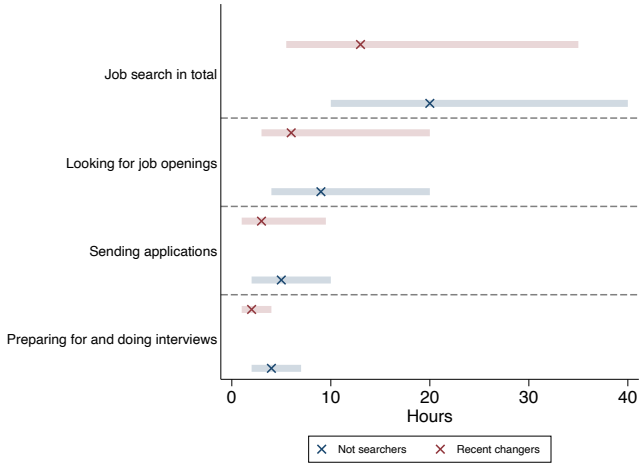
Back

Weeks Searching – Distributions



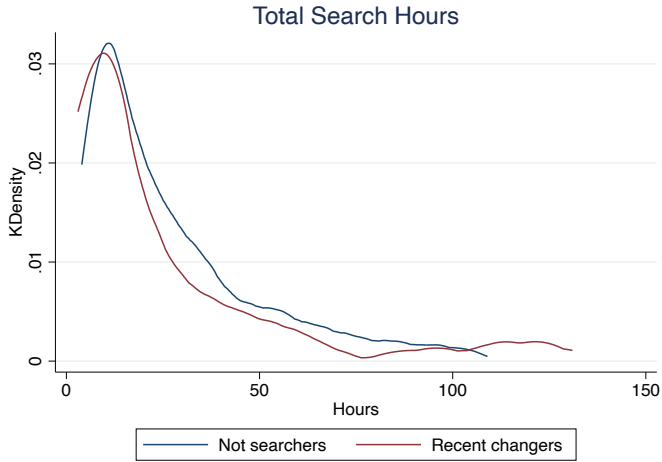
- Kernel density Back

Search Costs: Time – Median and IQ Range



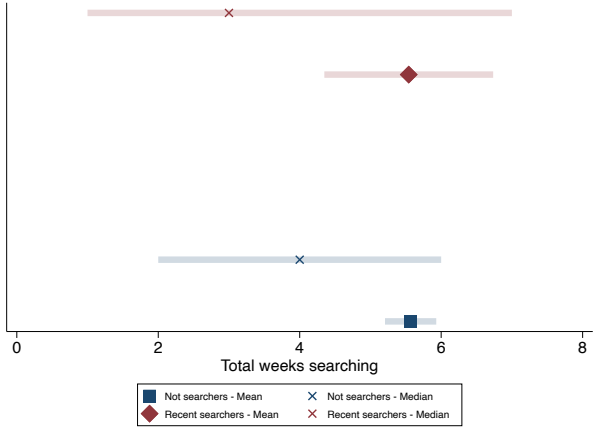
- Unconditional medians, p25 and p75 Back

Search Costs: Time – Distribution



- Kernel density Back

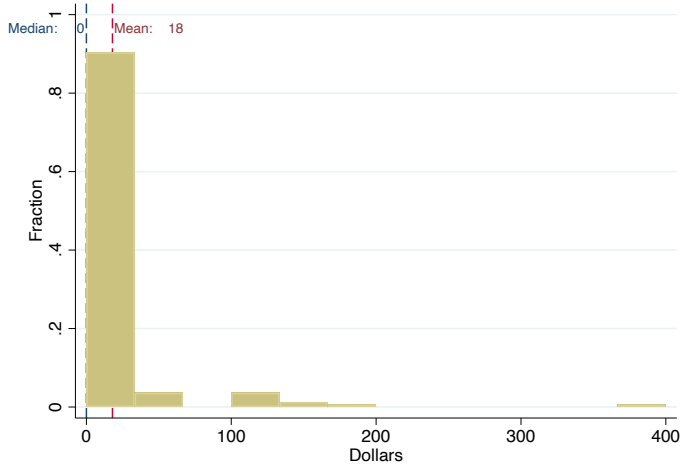
Weeks Searching



- Average expected weeks close to average realized. Median expected higher than median realized

▸ Distributions ▸ Back

Most Recent Changers Did Not Spend Any Money on Their Search



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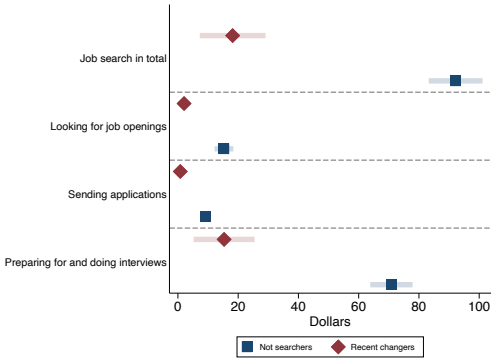
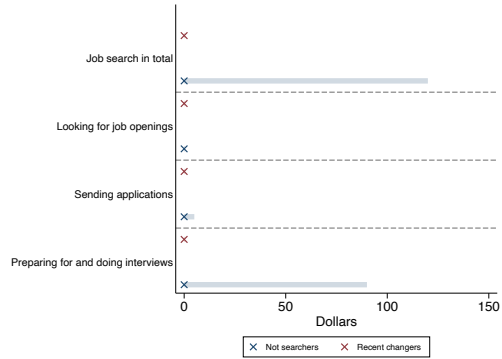
Money: Means and Medians

(a) Mean

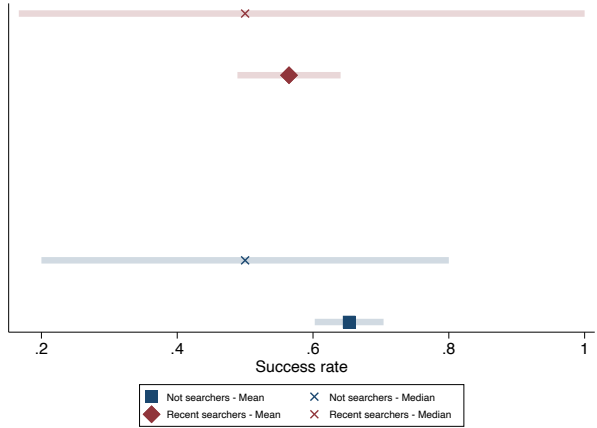


(b) Median and IQ Range



Back

Returns to Effort



- Expected applications' success rate mostly aligned with realized. Larger dispersion in realized

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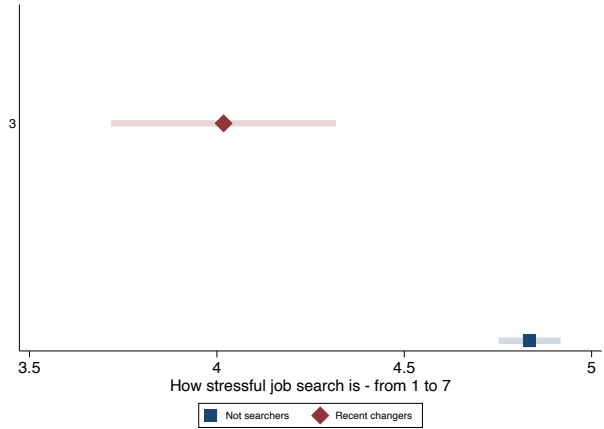
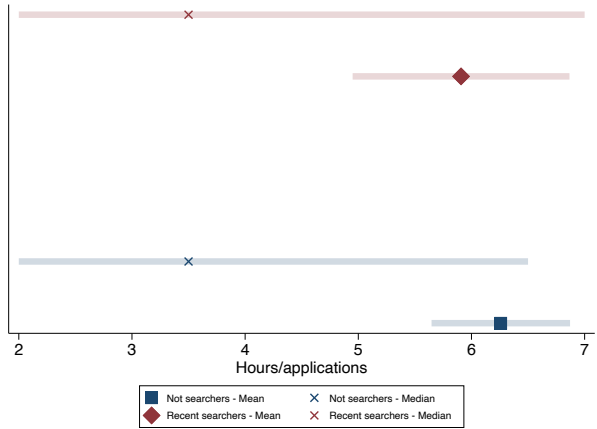
Stress


3
3.5
4
4.5
5
How stressful job search is - from 1 to 7
Not searchers
Recent changers

Back

Time per Application



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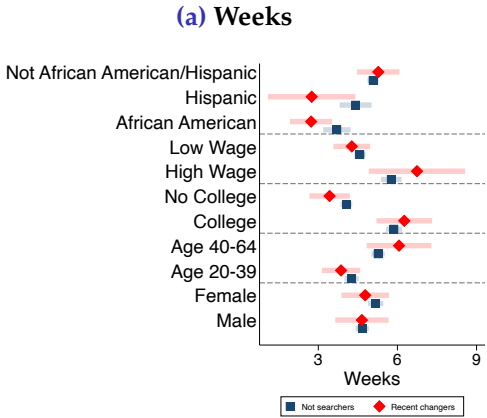
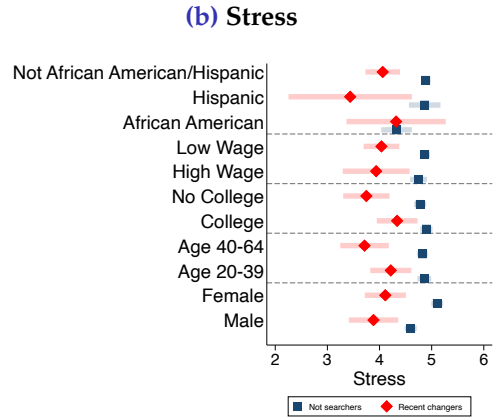
Expected vs. Realized



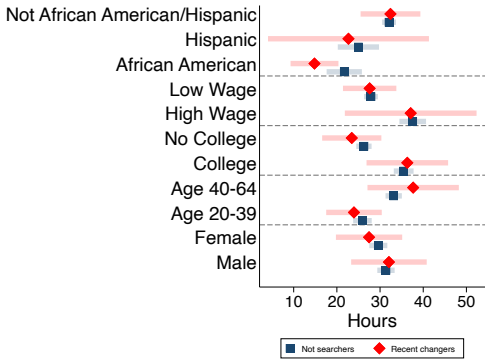


- Look at heterogeneity in perceived costs (not searchers) vs. heterogeneity in realized costs (recent changers)

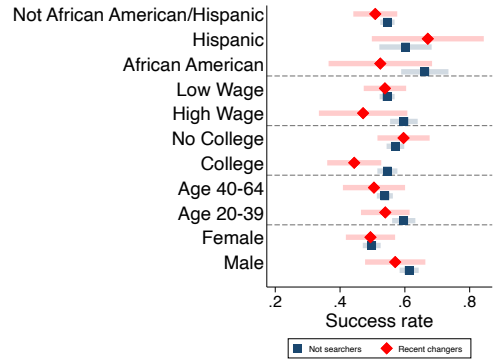
▸ Hours and Returns ▸ Back

Expected vs. Realized (Cont.)

(a) Hours



(b) Success Rate



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Measuring Perceptions of National Median Wage

Think about **all the employees in the United States** that work in the **same occupation as you and are employed full-time**. What do you think are their **typical annual earnings**, before taxes and other deductions, including commissions or tips, but excluding overtime and premium pay?

By typical annual earnings we mean **median annual earnings**, that is the earnings of the employees in the middle of the wage distribution, such that half (50%) of all employees in the U.S. earn less or the same in a year and the other half earn more.

$ 40,000 per year

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Measuring Perceptions of Local Median Wage

Think about all the employees in the area where you live that work in the same occupation as you and are employed full-time. What do you think are their typical annual earnings, before taxes and other deductions, including commissions or tips, but excluding overtime and premium pay? Remember that by typical annual earnings we mean median annual earnings, that is the earnings of the employees in the middle of the wage distribution, such that half (50%) of all employees in your occupation in the area where you live earn less or the same in a year and the other half earn more.

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Measuring Perceived Rank in Wage Distribution

Think about **all the employees in the United States** that work in the **same occupation as you**. Think about how their annual pay compares to your annual pay at your current job. What percentage of these employees receive a...
[Note that your answers must sum to 100]

Lower annual pay than you	0	%
Same annual pay as you	0	%
Higher annual pay than you	0	%
Total	0	%

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Question: Wage Change from Switching Job

Imagine that **you decided to leave your current job** and gave yourself **3 MONTHS to find a new job suitable for you** at another employer in the same occupation.

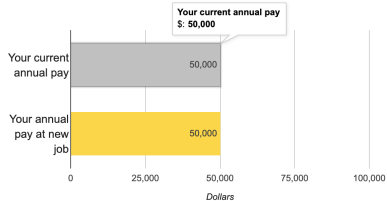
Do you think you would find a job that would offer you a lower, higher or the same annual pay, compared to what you currently earn at your job?

- Higher pay
- Same pay
- Lower pay

Question: Wage Change from Switching Job (cont.)

In the graph below, the grey bar represents your current annual pay in dollars. The yellow bar represents the annual pay that you would earn at that new job. **How much higher (in percent)** do you think your annual pay would be at the new job compared to your current annual pay?

Move the slider to select a percentage. As you move the slider the yellow bar will adjust to reflect your response.



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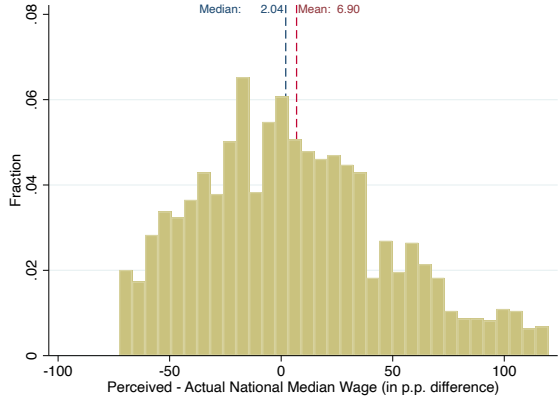
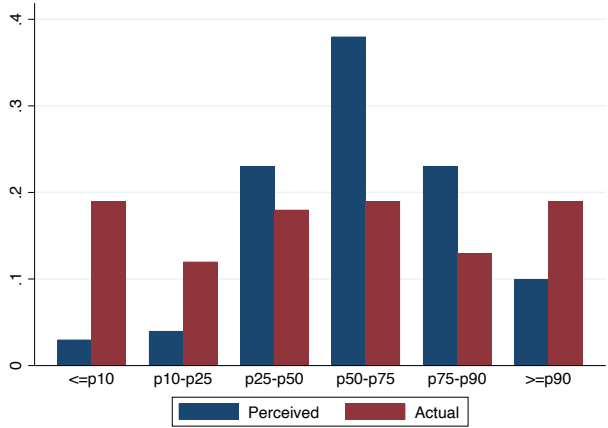
Large Dispersion in Perceived Median Wage



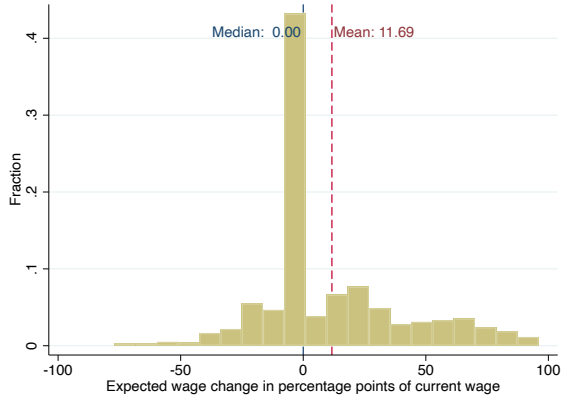
- On average, people correct/overestimate national median wage in their occupation. But large heterogeneity. People more accurate about local median wage ▸ Misperceptions local wage ▸ By group
- Anchoring: people think median wage is closer to their wage than it is the case ▸ Anchoring ▸ Back

Most People Overestimate their Position in the Wage Distribution



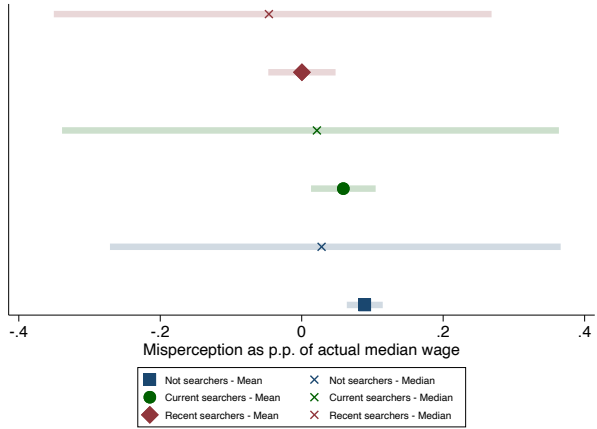
- "Center bias:" respondents in lower ranks likely to overestimate, those in higher ranks underestimate. Consistent with Hvidberg et al. (2020) for Denmark Back

Heterogeneity in Expected Wage Change from Switching Job



- 42% or respondents believe would earn the same, 16% believe would earn less
- Current searchers more optimistic about their wage gain ▸ By group ▸ Back

Recent Changers More Accurate about National Median Wage



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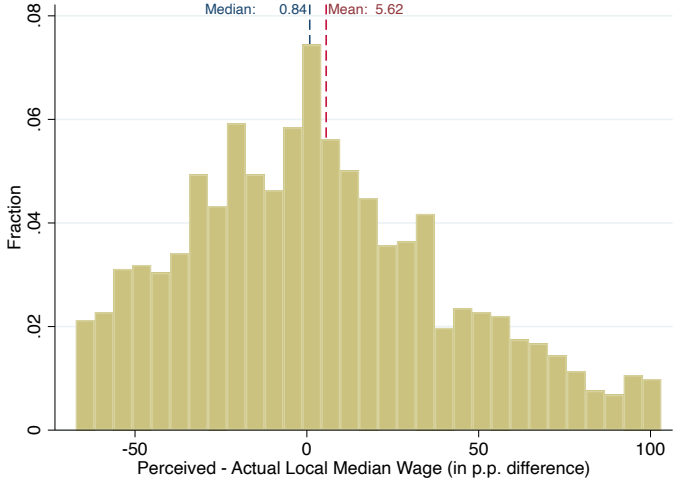
People More Accurate about Local Median Wage



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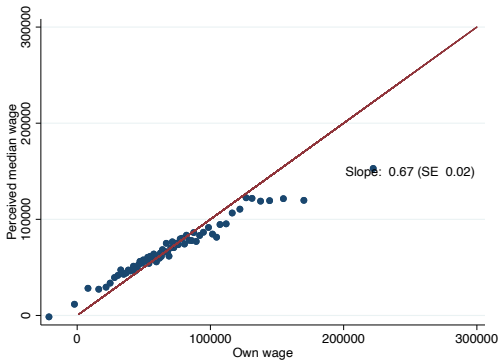
Anchoring: Perceived Median Wage vs. Own Wage



- Workers whose wage is actually below the median tend to underestimate the median wage. More so if not searchers
- Workers whose wage is actually above the median tend to overestimate the median wage
- Slope of true median wage on own wage: 0.28 (SE 0.03)
- Consistent with Jäger et al (2021) for workers in Germany

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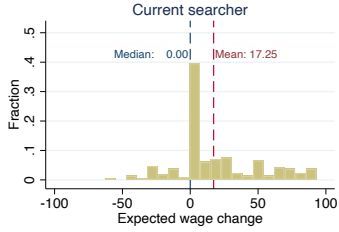
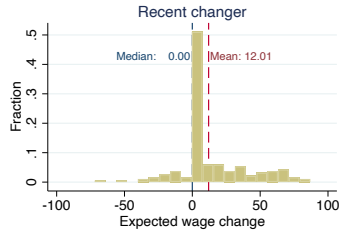
Not Searchers More Pessimistic about Wage Gain from Switching Job





In percentage points of current wage

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Perceptions of Wage Distribution and Expected Wage Change

	Expected Wage Change At New Job (1)
Misperception median wage (in %)	-3.082*
	(1.773)
Perceived - actual quartile	-1.899***
	(0.594)
Observations	2416
Mean	14.23

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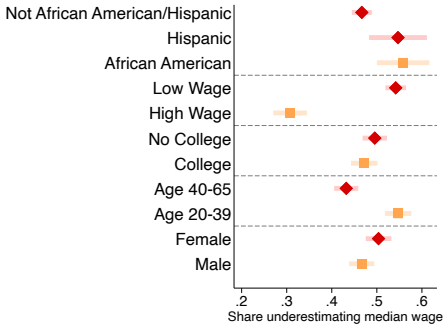
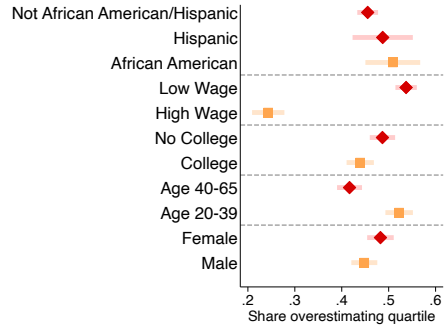
Women More Likely to Overestimate their Position

(a) National Median Wage



(b) Quartile in Wage Distribution



- Women, younger, African American and Hispanic respondents more likely to underestimate median wage and overestimate their quartile in wage distribution

▸ Regression tables ▸ Back

Outside Options and Respondents' Characteristics

	National Median Wage (p.p. misp.) (1)	Local Median Wage (p.p. mip.) (2)	Expected Wage Change At New Job (3)	Perceived - Actual Quartile (4)
Female	-0.0226	-0.0441*	-2.519	-0.0541
	(0.0206)	(0.0242)	(1.669)	(0.0574)
Age 20-39	-0.0712***	-0.0520**	10.35***	0.196***
	(0.0205)	(0.0247)	(1.716)	(0.0572)
College graduate	0.0727***	0.0207	3.809**	-0.115*
	(0.0219)	(0.0269)	(1.895)	(0.0623)
Married/Living with partner	0.0710***	0.103***	1.031	-0.134**
	(0.0207)	(0.0249)	(1.684)	(0.0602)
Has children <6yo	-0.00698	-0.0357	4.575**	0.0588
	(0.0267)	(0.0319)	(2.279)	(0.0765)
African American	-0.0635**	0.0105	4.858*	0.00846
	(0.0307)	(0.0391)	(2.518)	(0.0885)
Hispanic/Latino Origin	-0.00672	0.0705*	1.234	-0.0409
	(0.0332)	(0.0427)	(2.537)	(0.0925)
High wage	0.452***	0.402***	-0.0869	-1.147***
	(0.0262)	(0.0299)	(2.057)	(0.0613)
Observations	2430	1507	1549	2443
Mean	0.07	0.06	13.25	0.43

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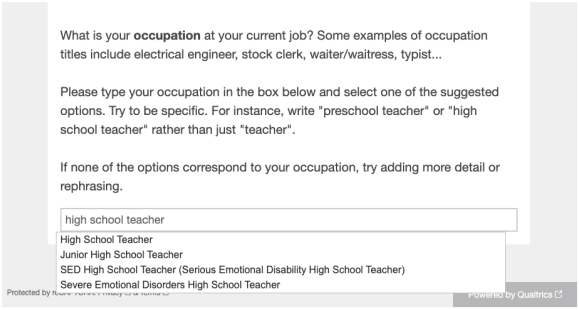
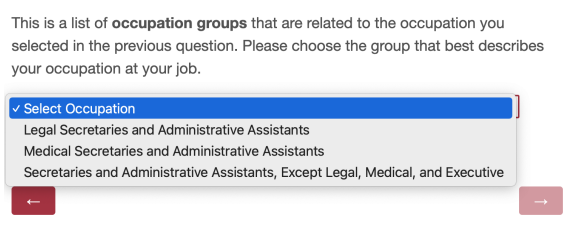
Asking about Occupation

(a) Step 1



(b) Step 2



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Ability of Covariates to Predict Treatment Status

	Control		Median Wage Treatment		Search Costs Treatment	
	Coefficient	P-value	Coefficient	P-value	Coefficient	P-value
Male	-0.034	0.083	0.006	0.756	0.028	0.099
Age 20-39	0.031	0.122	0.043	0.027	-0.074	0.000
4-year college degree or more	0.012	0.533	-0.034	0.083	0.021	0.214
High-school degree or less	0.031	0.165	-0.008	0.725	-0.024	0.217
High income	0.003	0.909	-0.041	0.104	0.038	0.105
Black/African American	-0.005	0.883	0.009	0.772	-0.004	0.873
Hispanic/Latino	-0.011	0.733	0.011	0.749	0.001	0.979
Married/living w. partner	-0.035	0.102	-0.030	0.148	0.065	0.000

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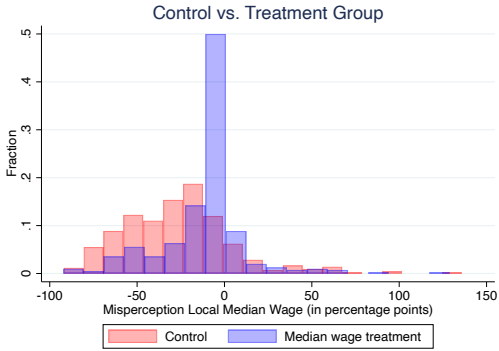
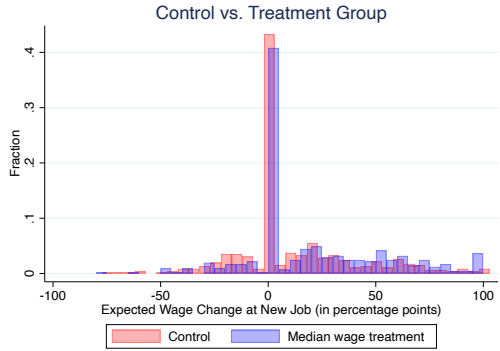
Median Wage Treatment: First Stage

(a) Median Wage



(b) Expected Wage Gain



Only respondents who overestimate median wage to begin with.

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Persistent First Stage Effect in Follow-up Survey

	Local Median Wage Perc. Misp.	Searching Time Consumimg	Expectd Wage Change New Job (in p.p.)
Median wage treatment x Underestimate wage	1.692	-0.00866	-0.969
	(5.053)	(0.130)	(2.737)
Median wage treatment x Overestimate wage	-9.063**	0.0788	3.570
	(4.343)	(0.119)	(2.511)
Search costs T x Underestimate costs	6.393	-0.185	2.187
	(6.023)	(0.124)	(2.751)
Search costs T x Overestimate costs	5.434	-0.272*	1.568
	(7.295)	(0.165)	(3.195)
Underestimate wage	-38.04***	0.0105	1.923
	(3.961)	(0.104)	(2.250)
Overestimate costs	0.103	0.531***	-3.289
	(3.726)	(0.0988)	(2.110)
Observations	1238	1239	1255
Control mean	13.63	4.63	9.94

- Follow-up survey 2 weeks after main survey. Recontact rate $\approx 55\%$
- Persistent effect of Search Costs T and Median Wage T on respondents who overestimate

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