Discussion: Understanding the Economic Impact of COVID-19 on Women by Claudia Goldin

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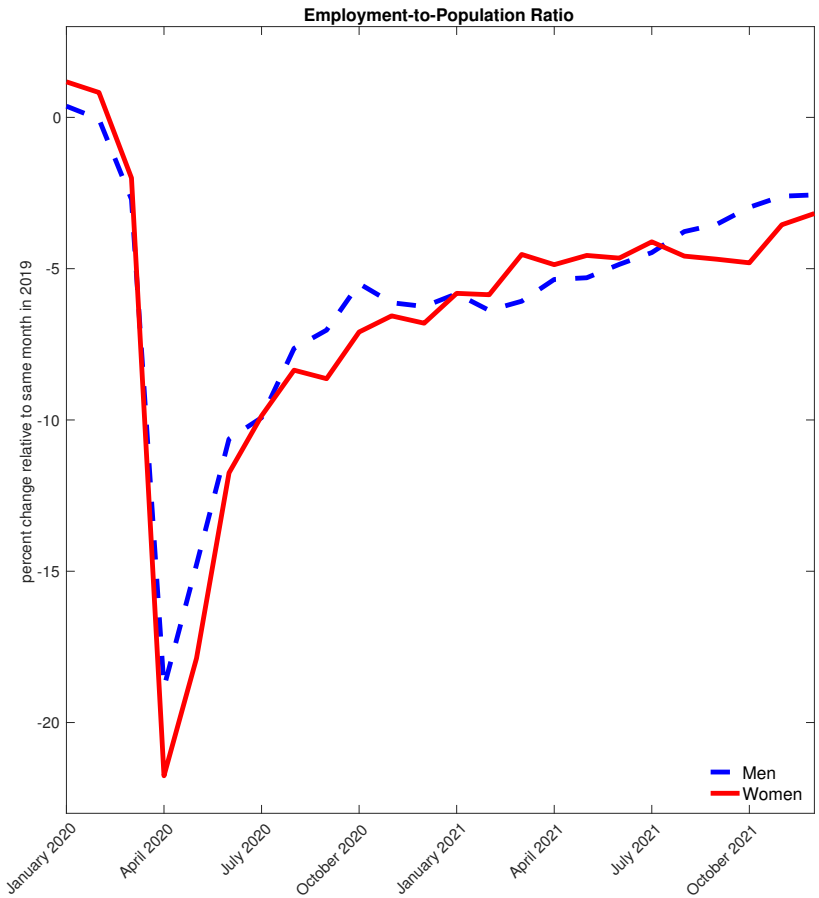
Employment by Gender During COVID-19

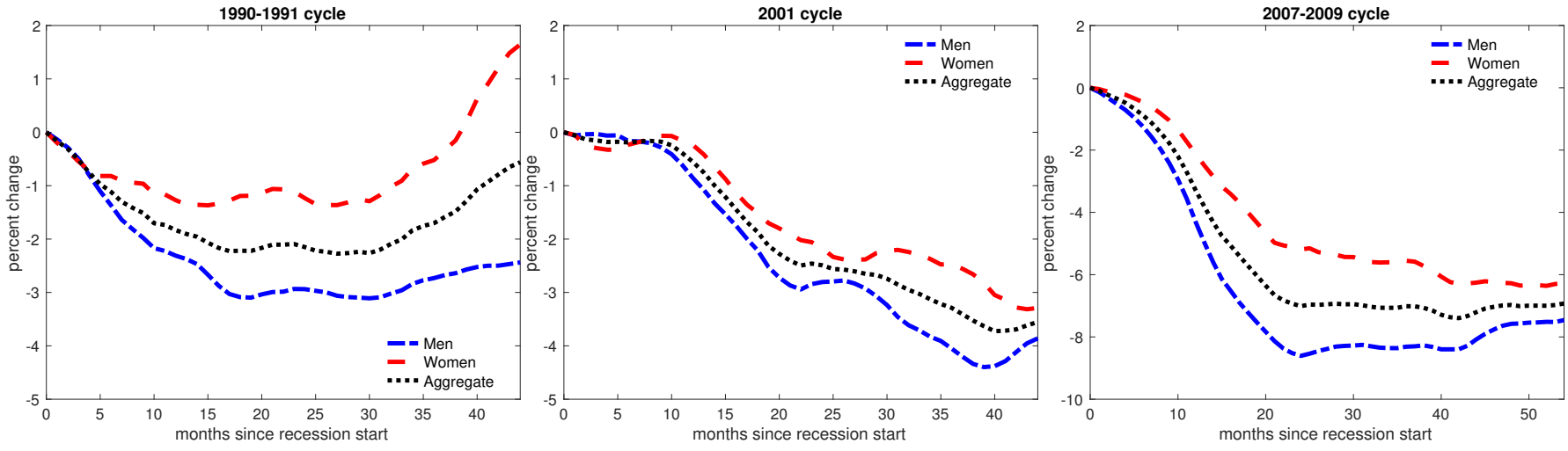
- Women experienced a bigger decline in employment than men



Change in the employment-to-population ratio relative to the same month in 2019, by gender, January 2020 to December 2021. Population age 25-54 years old.
Source: Author's calculations from Current Population Survey.

Employment by Gender During COVID-19

- Women experienced a bigger decline in employment than men
- Pattern differs from typical recessions



Percentage change in the employment-to-population ratio since the start of each recession for the last three pre-pandemic business cycles. Recession dates based on the National Bureau of economic Research business cycle dates. Source: Authors' calculations based on Current Population Survey.

Typical Business Cycles

- Employment drops more for men than women in typical recessions
- Explanations:

  Labor demand:

  men employed in more cyclical industries/occupations (Albanesi and Sahin 2018)

  i.e. manufacturing, construction

  Labor supply:

  household insurance (Albanesi 2019, Ellieroth 2019)

  i.e. married women less likely to leave the labor force in recessions

COVID-19 Recession

- Women experience larger decline in employment than men
- Explanations (Albanesi & Kim 2021):

  Labor demand:

  Women over-represented in service occupations exposed to infection risk

  Labor supply:

  Mothers saddled with childcare responsibilities due to school closures

Labor Demand by Gender During COVID-19

Occupational categorization:

High/Low-contact, based on distance with co-workers/customers

Flexible/Inflexible , based on ability to perform work remotely

Labor Demand by Gender During COVID-19

Occupational categorization:

- Flexible/High-contact i.e. education
- Flexible/Low-contact

  i.e. professionals, managers, legal, sales, administrative
- Inflexible/High-contact most affected by COVID-19

  i.e. healthcare, personal care, hospitality
- Inflexible/Low-contact most affected by standard recessions

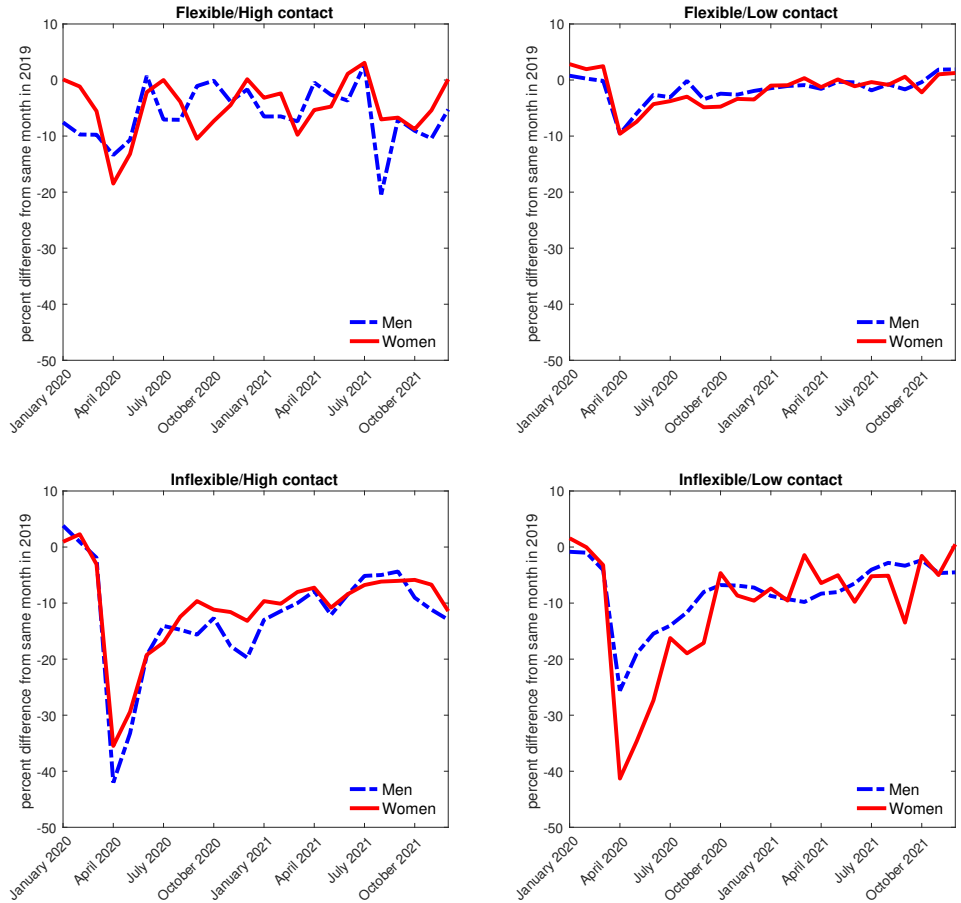
  i.e. production, construction, transportation

Occupation	Employed women	Employed men	Total employed	Female share
Flexible, High-contact	10	3	6	76
Flexible, Low-contact	53	48	51	50
Inflexible, High-contact	**26**	**9**	**17**	**73**
Inflexible, Low-contact	**11**	**40**	**26**	**19**

Values in percentage for February 2020. Detailed categorization in **Appendix**. Source: Author's calculations based on CPS.

Labor Demand by Gender During COVID-19

- Inflexible occupations suffer big & persistent employment loss dominated by low wage workers, without college degree

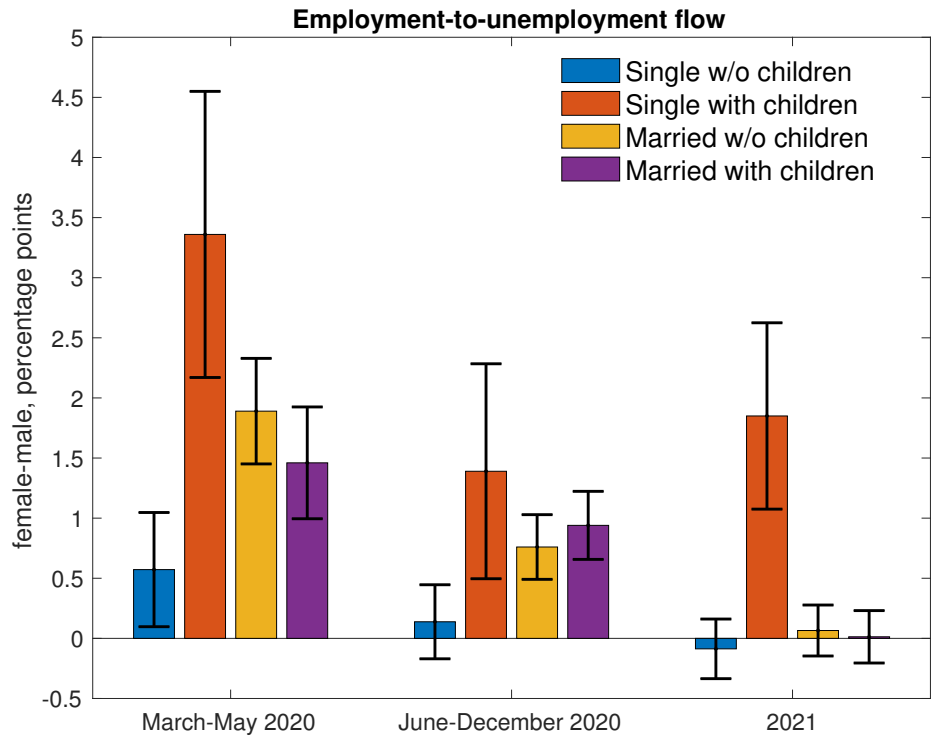


Percentage change in the employment-to-population ratio by occupation from same month in 2019. Population age 25-54 years old. Source: Authors' calculations based on CPS.

Labor Demand by Gender During COVID-19

- Occupation distribution accounts for 1/3 of gender differences in employment behavior
- Controlling for age, education and occupation:

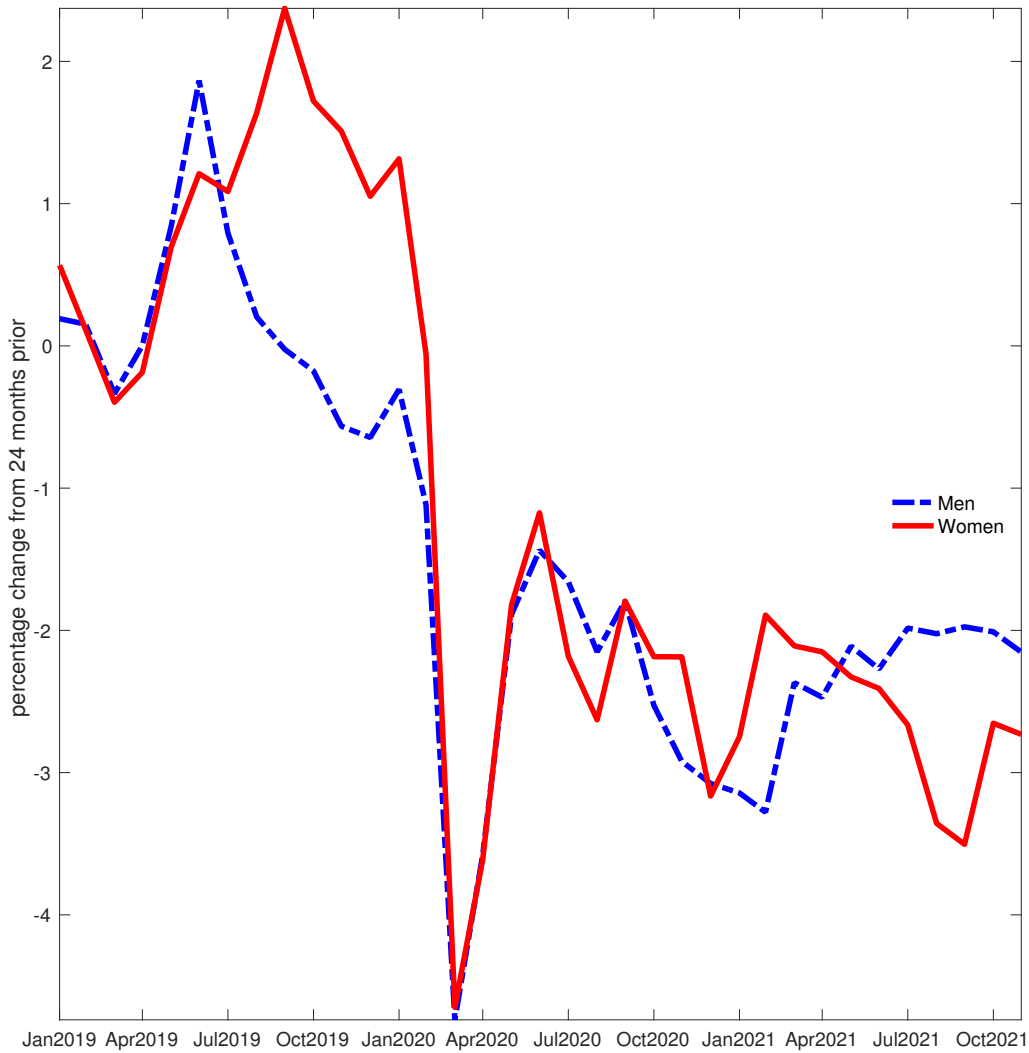
  significant gender differences flows into unemployment



Female-male difference in changes in employment-to-unemployment flows relative to 2019 average by family status, controlling for age, education and occupation. Error bars denote 90% confidence intervals. Population 25-54 years old. Individuals "with children" have children younger than 12 years old residing in their households. Source: Author's calculations from CPS.

Labor Supply by Gender During COVID-19

- Aggregate decline in participation quite similar for men and women

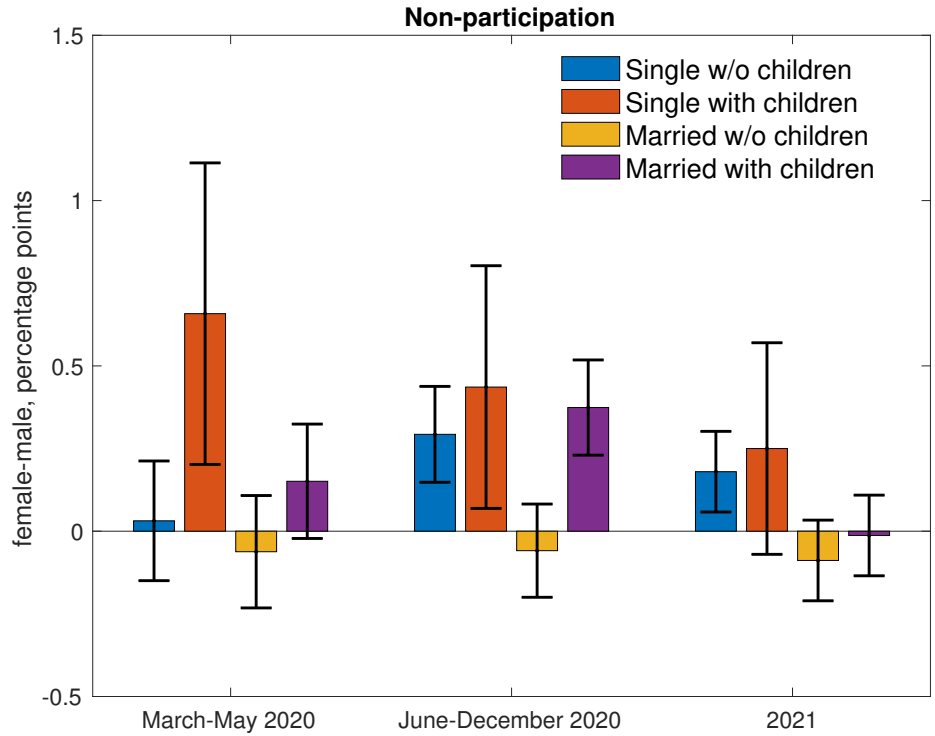


Labor force participation rate by gender May 2019-December 2021, 25-54 years old. Percentage change since 24 months prior. Source: Current Population Survey.

Participation by Gender During COVID-19

- Controlling for age, education and occupation:

  non-participation rises for single/married mothers compared to single/married fathers in 2020



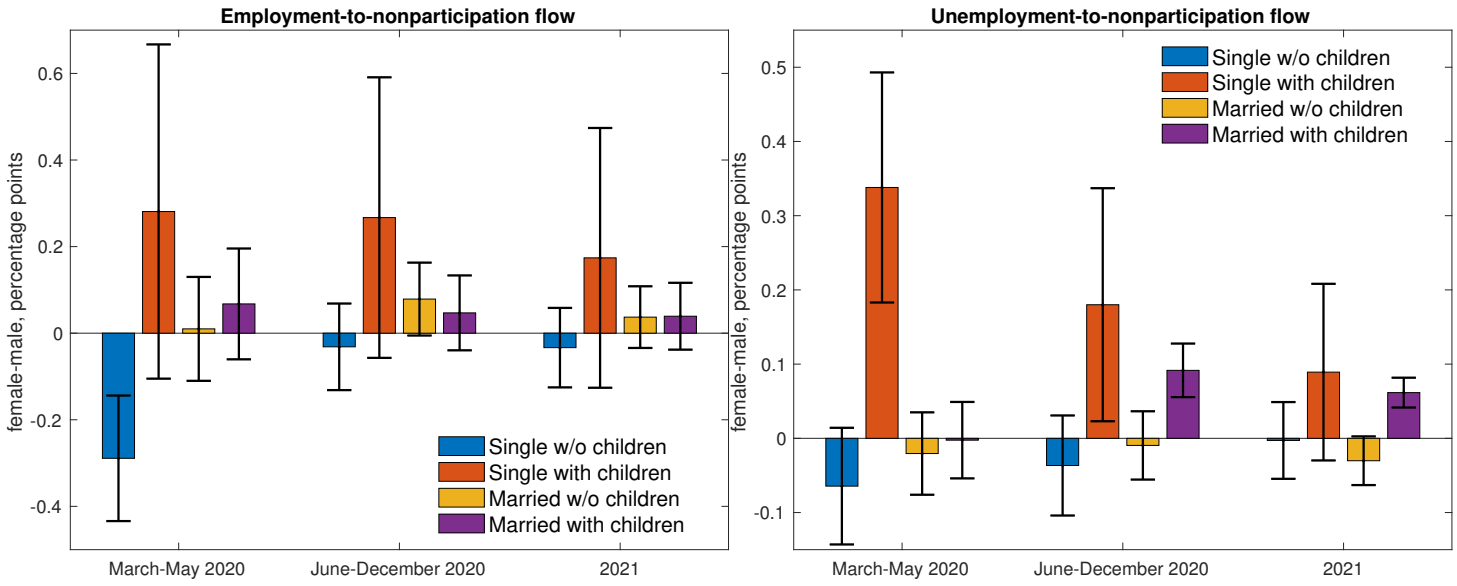
Female-male difference in changes in non-participation relative to 2019 average by family status, controlling for age, education and occupation. Error bars denote 90% confidence intervals. Population 25-54 years old. Individuals "with children" have children younger than 12 years old residing in their households. Source: Author's calculations from CPS.

Participation by Gender During COVID-19

- Controlling for age, education and occupation:

1 No significant gender differences in quits from employment

2 Rise in non-participation for mothers stems from unemployment



Female-male difference in changes in employment-to-nonparticipation flows and unemployment-to-nonparticipation flows relative to 2019 average by family status, controlling for age, education and occupation. Error bars denote 90% confidence intervals. Population 25-54 years old. Individuals "with children" have children younger than 12 years old residing in their households. Source: Author's calculations from CPS.

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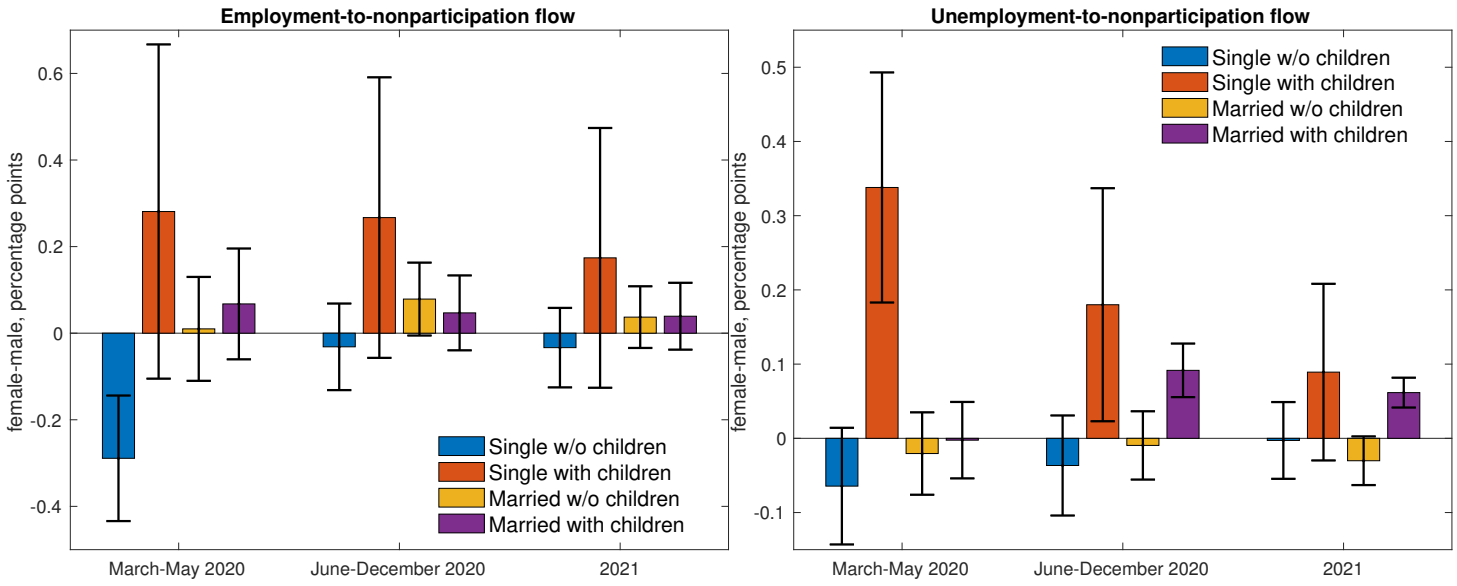
$\rightarrow$ Decline in labor demand responsible for decline in labor supply



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Looking Forward

- Labor demand: jobless recoveries since 1990 due to permanent reduction in routine jobs due to automation
  (Acemoglu and Autor 2011, Jaimovich and Siu 2020)

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Table: Susceptibility to Automation by Occupation

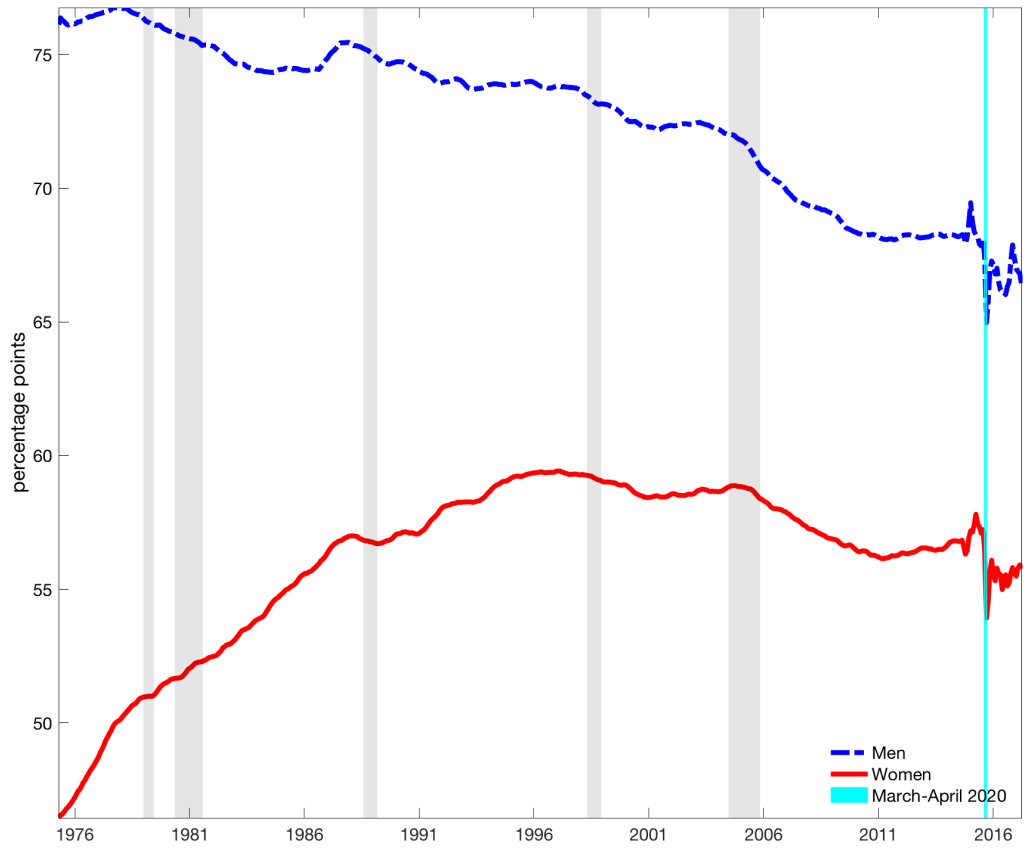
Occupation	Percent Employed in High Routine Intensity Jobs
Flexible, High-Contact	0.2
Flexible, Low-Contact	49.0
Inflexible, High-Contact	**34.3**
Inflexible, Low-Contact	22.0

High Routine Intensity jobs based on Autor and Dorn (2013). Source: Albanesi & Kim 2021.

$\rightarrow$ Occupations hardest hit by the pandemic highly susceptible to automation

Looking Forward

- Labor supply: discontinued rise in female participation since mid-1990s



Labor force participation rate by gender January 1976-December 2021, 25-54 years old.
Source: Current Population Survey.

Why Did Women's LFP Stop Growing?

- Slowdown in participation only for married women, largest for wives of college husbands: 17% lower than pre-1995 trend
  wives of high income husbands: 20% lower than pre-1995 trend

Why Did Women's LFP Stop Growing?

- Hypothesis: (Albanesi & Prados 2022)

  Rise in college premium for men contributes to slowdown in participation of married women since the early 1990s

- Mechanism:

  Rise in earnings for college men $\Rightarrow$ negative wealth effect on wives' participation and market hours

$\rightarrow$ Positive assortative matching implies large effect on college women

- Related explanations: Greedy jobs (Goldin 2021)

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- Related explanations: Greedy jobs (Goldin 2021)

- Other factors: Lack of access to family policies (Blau & Kahn 2013)

Looking Forward

- Reduced labor supply may outlive the pandemic:

1. Temporary non-participation spells reduce perspective wages (Adda, Dustman and Stevens 2017), may deter labor market re-entry
2. Persistent decline in hours conditional on participation for men and women (Faberman, Mueller & Sahin 2022)

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- Historic rise in women's labor supply contributed to (Albanesi 2019):

  TFP growth

  wage growth for men and women

  'moderated' business cycles

  strong employment growth during business cycle recoveries

$\dashrightarrow$ Re-establishing this growth pattern will add competitiveness to U.S. economy post-pandemic

END
Additional Slides

Detailed Occupational Classification

- Exposure to pandemic by occupation

1 High/Low-contact, based on distance with co-workers/customers

2 Flexible/Inflexible , based on ability to perform work remotely

	Flexible	Inflexible
High-contact	Education, Training, and Library	Healthcare Practitioners and Technical Healthcare Support Food Preparation and Serving Personal Care and Service
Low-contact	Management Business Computer and Mathematical Architecture and Engineering Life, Physical, and Social Science Community and Social Services Legal Arts, Design, Entertainment, Sports, and Media Sales and Related Office and Administrative	Protective Service Building and Grounds Cleaning and Maintenance Farming, Fishing, and Forestry Construction Trades, Extraction Installation, Maintenance, and Repair Production Transportation and Material Moving

Occupations are inflexible if their inflexibility score is above the median and flexible otherwise. Occupations are high-contact if their contact intensity score is 4 or above, corresponding to a distance of less than 6 feet. Source: Author's calculations based on O*NET.

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