# Panel on Improving Cost-of-Living Indexes and Consumer Inflation Statistics in the Digital Age

### Virtual Meeting Session: Supplemental Subgroup (defined by income) Price Indexes

#### October 2, 2020

4-6 pm (Eastern, US) 9-11 pm (UK) 6-8 am (**October 3**) (Sydney)

**Session goals:** The panel is charged with examining the potential to improve the CPI by supplementing (or in some cases replacing) traditional survey-based data collection with an approach that blends multiple (survey and non-survey, government and commercial) data sources. At the core of the charge is to consider opportunities for the BLS to apply new data sources to improve the construction of elementary item-area indexes; however, improving the accuracy, timeliness, and detail of index aggregation is also of interest. One research and policy need may be for price indexes (as well as other economic statistics such as distributional household income measures) for specific population subgroups, and modern data sources create new opportunities to make advances in this area. During this session, the panel hopes to learn about ongoing research to construct subgroup price indexes, including the data demands and any particularly methodological issues confronted during such work. One specific question the panel has is about the possible use of outlet location as a proxy for neighborhood income, an option that seems enhance given that the CEX has incorporated BLS's point of purchase survey (using outlet location seems like a much finer filter than previously discussed ideas to use broader region indicators).

### Dan Sichel, panel chair (10 minutes).

- Charge to the panel, and how interest in income-base subgroup indexes fits into the charge.
- Support document: Panel's Statement of Task

# Xavier Jaravel, LSE (15 minutes)

- Using scanner data to measure differences in prices paid by population subgroups across income distribution. This work addresses a gap in current data as BLS research into price change heterogeneity across populations at below elementary level has been limited.
- Support documents: "The Unequal Gains from Product Innovations: Evidence from the U.S. Retail Sector," Xavier Jaravel. <u>https://academic.oup.com/qje/article-abstract/134/2/715/5230867</u>. To add: review article about inflation inequality in preparation for the Annual Review of Economics; "Inflation Spike and Falling Product Variety during the Great Lockdown."

Greg Kaplan, University of Chicago (from Australia) (15 minutes)

- Measuring price dispersion across subgroups and other work using scanner data to measure price dispersion across the population. (15 minutes)
- Support documents: Kaplan and Schulhofer-Wohl, "Inflation at the Household Level";
  "Price Dispersion and Bargain Hunting in the Macroeconomy"

Dennis Fixler, Bureau of Economic Analysis (15 minutes)

- BEA's has embarked on a project to produce distributional measures of personal income for households. What, ideally, would be needed from BLS to produce distributions of real income and consumption? (15 minutes)
- Support document: "Measuring Inequality in the National Accounts," by Dennis J. Fixler, Marina Gindelsky, and David Johnson (2020).

# Chris Payne, UK ONS (15 minutes)

- ONS regularly publishes two sub groups measures, the HCIs (Household Cost Indices), which have been developed to measure the change in household costs over time, and CPIH-consistent subgroup inflation measures which are in line with the agency's headline measure of consumer prices. (15 minutes)
- Support documents: "Household Costs Indices, UK: third preliminary estimates, 2005 to 2019

https://www.ons.gov.uk/economy/inflationandpriceindices/bulletins/householdcostsin dices/thirdpreliminaryestimates2005to2019; "CPIH-consistent inflation rate estimates for UK household groups: October to December 2019" https://www.ons.gov.uk/economy/inflationandpriceindices/articles/cpihconsistentinflat ionrateestimatesforukhouseholdgroups20052017/octobertodecember2019]

# Rob Cage, BLS (15 minutes)

- Reactions to presentations and thoughts on current and planned BLS work to produce experimental sub-group price indexes (15 minutes)
- Support document: "Population Subgroup Price Indexes: Evidence of Heterogeneity or Measurement Error?" By Rob Cage, Joshua Klick, William Johnson

**Open Discussion/Questions** (30-40 minutes)