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

Open Session: Measuring Price Changes in Housing and Shelter

Tuesday, December 15, 2020
1 – 3:30 pm (US eastern)

AGENDA

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. The focus of this session is on the pricing of housing and shelter. Given that owners' equivalent rent accounts for almost 25 percent of the CPI, small changes in method or data sources for this crucial expenditure category can have a big impact on index performance.

Price measurement of housing in also unique. The methodology for housing/shelter (particularly using rental equivalence for OOH) is different from those used for most other categories. For owner occupied housing, there are three categories of methods—the acquisitions approach, the rental equivalence approach, and the user cost approach. Disagreements exist regarding which approach is most appropriate for various uses. Pricing rental housing also has contentious issues, although perhaps less so.

During this session, invited participants will help the panel think through how new kinds of data could be used, not just within the current BLS framework, but also to enable alternative methodological approaches. Non-survey data sources may be particularly helpful in sampling rents paid and rental equivalents for owner occupied housing.

1:00   Dan Sichel, Panel Chair (10 minutes)
- Welcome; charge to the panel; introductions.
[Support document: *Panel's Statement of Task*]

Guest Presentations (15 minutes each, give or take, plus 5 minutes for clarifying questions)

1:05   Jeremy Moulton, UNC Chapel Hill
- Use of big data, including Zillow ZTRZX data, to measure the price of housing services in the user cost framework and how the data could be useful to BLS in its current approach.
[Support document: *Valuing Housing Services in the Era of Big Data: A User Cost Approach Leveraging Zillow Microdata*, by Marina Gindelsky, Jeremy G. Moulton, and Scott A. Wentland]

1:25   **Bettina Aten**, Bureau of Economic Analysis
– BEA use of and research on the rental equivalence method of measuring housing services (and use of owner premium adjustments) in regional indexes/national accounts context.
[Supporting document: *The Owner-Premium Adjustment in Housing Imputations*, by Bettina Aten and Alan Heston]

1:45   **Annie De Champlain**, Chief of Housing and Construction, Producer Prices Division, Statistics Canada; **Elspeth Hazell**, Chief of Production, Consumer Prices Division, Statistics Canada; **Faouzi Tarkhani**, Analyst, Consumer Prices Division, Statistics Canada
– Housing price measurement methods and use of alternative data.
[Supporting documents: *Methodology of the Residential Property Price Index (RPPI)*; *Shelter in the Canadian CPI: An overview*, by Amadou Soumare]

2:05   *BREAK*

2:10   **Robert Hill**, University of Graz
– Potential advantages of a simplified user cost method as an alternative to rental equivalence for measuring price changes in owner-occupied housing in the CPI.
[Supporting document: *Owner Occupied Housing, Inflation and Monetary Policy*, by Robert Hill, Miriam Steurer, and Sofie Waltl]

2:30   **Brian Adams,** BLS Supervisory Research Economist
– Recently, apartment rents have increased more than rents for houses, even after controlling for location effects. Many housing data sources, as well as the Owner Equivalent Rent index, rely disproportionately on apartment rents, creating problems of representativeness.
Paul Liegey, BLS Housing Sections Chief; **Randy Verbrugge**, Cleveland Federal Reserve Bank (former BLS)
– BLS methodology question and answer.
[Supporting documents: *Location, Location, Structure Type: Rent divergence within neighborhoods*, by Brian Adams and Randal Verbrugge; *Treatment of Owner-Occupied Housing in the CPI*, by Robert Poole, Frank Ptacek, and Randal Verbrugge]

2:50   *BREAK*

3:00   **Open Discussion**

3:30   *Adjourn*