Comments on “What Have They Been Thinking? Home Buyer Behavior in Hot and Cold Markets: A Ten-Year Retrospect”
Robert Shiller & Anne Thompson

BPEA Spring 2022 Conference (virtual)
March 25, 2022

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Big Picture Thoughts

- **Applaud public good provision for broader economics profession**
  - Truly remarkable time series; visionary when begun in 1988
  - Saddened that Chip Case is not here to receive our thanks

- **Survey now part of broader effort to understand expectations**
  - See Kuchler, Piazzesi & Stroebel (2022) for more on other surveys
  - Different samples across surveys
    - Recent homebuyers here
  - Expectations not wildly different across surveys, although higher frequency reporting in New York Fed and Michigan surveys show substantial volatility in COVID period (see Adam Guren’s slides for more on this)
  - Different versions of ‘long-run’ expectations across surveys (<10 years)
  - Many efforts to test for rationality
Table 8

Price Expectations, Sense of Excitement, and Talk

Percent of Responses (except as indicated)

<table>
<thead>
<tr>
<th>Question</th>
<th>Orange County</th>
<th>San Francisco</th>
<th>Boston</th>
<th>Milwaukee</th>
</tr>
</thead>
<tbody>
<tr>
<td>&quot;Do you think that housing prices in the ____ area will increase or decrease over the next several years?&quot;</td>
<td>(N=240)</td>
<td>(N=199)</td>
<td>(N=194)</td>
<td>(N=233)</td>
</tr>
<tr>
<td>&quot;Increase&quot;</td>
<td>98.3</td>
<td>99.0</td>
<td>90.2</td>
<td>83.1</td>
</tr>
<tr>
<td>&quot;Decrease&quot;</td>
<td>1.7</td>
<td>1.0</td>
<td>9.8</td>
<td>12.9</td>
</tr>
<tr>
<td>&quot;How much of a change do you expect there to be in the value of your home over the next 12 months?&quot;</td>
<td>(N=217)</td>
<td>(N=185)</td>
<td>(N=176)</td>
<td>(N=217)</td>
</tr>
<tr>
<td>Mean</td>
<td>15.3</td>
<td>13.5</td>
<td>7.4</td>
<td>6.1</td>
</tr>
<tr>
<td>(Standard Error)</td>
<td>(.8)</td>
<td>(.6)</td>
<td>(.6)</td>
<td>(.5)</td>
</tr>
<tr>
<td>&quot;On average over the next 10 years, how much do you expect the value of your property to change each year?&quot;</td>
<td>(N=208)</td>
<td>(N=181)</td>
<td>(N=177)</td>
<td>(N=211)</td>
</tr>
<tr>
<td>Mean</td>
<td>14.3</td>
<td>14.8</td>
<td>8.7</td>
<td>7.3</td>
</tr>
<tr>
<td>(Standard Error)</td>
<td>(1.2)</td>
<td>(1.4)</td>
<td>(.6)</td>
<td>(.5)</td>
</tr>
</tbody>
</table>

Note: In 2003, the median expected 12-month appreciation was 10% for Los Angeles, 7% for San Francisco, 5% for Boston, and 5% for Milwaukee

Source: Case and Shiller, 2003
Big Picture Thoughts (cont’d.)

- Passage of time has not changed basic characterizations of SR and LR expectations (although they have changed over time for sure)

- Respondent comments are underappreciated aspect of this survey
  - Important information about ‘what they were thinking’
  - Hope these data can be more widely published

- Learning from heterogeneity
  - Variation across markets can be very illuminating (which may not be feasible in the COVID period)

- See goal for economics profession to use expectations as important input to improve our understanding of housing market behavior
  - Expectations are part of the story, not the story
  - Will try to illustrate with comments on the COVID period
The (Stunning) COVID Boom

- Huge and Highly Consistent Across Markets (compared to the GFC)

Case-Shiller National and Composite Indices SA, Year-over-year Change

http://www.calculatedriskblog.com/
Heterogeneity Across Markets

- Looks to have been more important in the pre-GFC boom
What Did Buyers Recognize?

**July 2020 Survey**
- Respondents purchased in Q1 of 2020, so pre-COVID
- 1-Year Out Expectations at 3.4% (2.2%-4.5% range)
  - Actual price growth came in at about 20%
- Long-run expectations declining or stable in all four counties (3.1%-4.6% range)

**July 2021 Survey**
- Well into COVID, and house prices are booming
- Short-run expectations jump sharply—everywhere (6.1%-7.5% range)
- Long-run expectations move up, too, but less sharply (4.0%-4.5% range)
- Sample selection: 1st time buyers; high income

**Comments Section**
- 2020 Survey—lots of mentions of COVID, but no consensus on impact
- 2021 Survey—inequality; demand for more space; demand for lower density (also special question on within-metro location); high savings
  - Not all that much indication that they viewed the huge disruptions on the supply side as particularly important
Differences From the Pre-GFC Boom

- One is the gap between long-term price appreciation expectations and the long-term mortgage rate (Figure 4 from the Shiller & Thompson (2022))

Figure 4: Ten-Year Annualized Home Price Expectations and Thirty-Year Mortgage Rate, 2003-21

Source: Authors’ calculations annualized ten-year expectation is trimmed mean of responses to question in authors’ survey. Average of trimmed means for all survey respondents. Freddie Mac’s Primary Mortgage Market Survey.
Not so sure the gap between expectations and mortgage rates is a sufficient statistic for the likelihood of (an absence of) substantial mispricing in local housing markets, but implications for homeownership rate were borne out in previous boom.
What About the Supply Side?

- Dramatic disruption on the supply side of the housing market
  - Supply chain snafus—large gap between starts and completion in COVID
What About the Supply Side?

- Huge increases in the price of key inputs into housing production—albeit with a lot of mean reversion recently (but not for labor)
What About the Supply Side?

- Dramatic change in the (shorter-run) supply of existing homes you could buy
  - Listings in Maricopa County (Phoenix) fell by two-thirds over 2020; that is not atypical for markets across the county
  - In 2019, existing home sales were (roughly) five times new home sales nationally, so this is a big deal in what is available to buy at a given point in time

- Overall inventory available for sale way down

- And, the spike in prices is occurring in the rental market, too
What About the Supply Side?
What About the Supply Side?

- Supply is ramping up—a lot nationally
  - Should look at this more closely at the metro housing market level
How Sensible Are COVID Era Prices?

- Long-run expectations give one comfort

- But, they well may not be the full story
  - Near-term supply disruptions are extensive and include a new type (e.g., the dramatic listings decline)
  - Glaeser (2014) suggests people systematically underestimate the impact of the longer-run elasticity of supply on future land values
    - Should we expect a replay of this phenomenon following the COVID boom?

→ What underlies the expectations data?
→ How do people perceive supply disruptions?
→ Limits to arbitrage in housing are wide, so little immediate punishment for error
→ But, if supply chain problems and factor input cost increases are ‘semi-permanent’, can prices be justified?
Conclusions

- This paper reflects one of the most important public goods provision in economics across many decades
- Long time series across a great boom, a great bust, and another substantial boom is unique
- Economics should try to integrate the different expectations data
- The COVID era is worthy of very close study
  - Suspect expectations will be a key factor in understanding housing market outcomes, but will not be the only factor
  - Need to integrate expectations into better understanding of how supply, not just demand, disruptions were/are perceived