The Federal Reserve and r* in Three Acts

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ACT I — Star Gazing

By now the infamous August 24, 2018, speech by Chairman Powell at the annual Jackson Hole Kansas Fed event, showed significant input uncertainty in FOMC's monetary policy decisions (i.e. we have no idea). Powell emphasized the many facets of uncertainty, around the location of important macroeconomic variables which were first discussed in the 2003 Jackson Hole symposium[1]. Conventionally, policymakers should be navigating the natural rate of unemployment (u^*), the neutral real rate of interest (r^*), and the inflation objective (π^*). Navigating by these stars in practice has been quite challenging since the Fed's best assessments of the location of the stars have been changing or shifting significantly. Historically, the stars have been in different locations during different economic times. Powell summarized this by stating that the stars are sometimes far from where they are perceived to be and the relationship between inflation and unemployment are far from certain. As such "[t]he risks from misperceiving the stars also now play a prominent role in the FOMC's deliberations." Therefore, in managing the two risks - moving monetary policy too fast and needlessly shortening the economic expansion versus moving too slowly and risking a destabilizing overheating — the Fed will only gradually raise interest rates.

ACT II — In the Dark Searching for r* and it is far from here

During the October 2, 2018, speech by Powell titled "Monetary Policy and Risk Management at a Time of Low Inflation and Low Unemployment"[2], he pointed out that no one fully understands the nature of unemployment and inflation relationship (referring to the Phillips Curve) or the role they play in the current context and the important role that risk management plays in setting monetary policy. Also, Powell reminded us that this time is seldom different by evoking Herb Stein's 1998 comment that the economy rarely performs outside the range of its past experience. As such, the Fed is emphasizing risk management: monitoring risks, balancing risks, and contingency planning for surprises.

[1] https://www.kansascityfed.org/publications/research/escp/symposiums/escp-2003
[2] https://www.federalreserve.gov/newsevents/speech/powell20181002a.htm

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In the October 3, 2018, interview with PBS's Judy Woodruff[3], Powel said that the "*… extraordinarily accommodative low interest rate we needed when the economy is quite week, we don't need it anymore. They are not appropriate any more. We need interest rate gradually, very gradually, moving back to normal. And that's what we have been doing now for basically three years. Interest rates just now, in real terms, moved above zero. So, interest rates are still accommodative, but we are gradually moving to a place where they will be neutral and not that they will be retraining the economy. We may go past neutral, but* <u>*we are long way from neutral at this point probably*</u> [underlined for emphasis]".

In the November 14, 2018[4] dialog, Dallas Fed president Kaplan's and Powell's discussed "how do you make policy in an environment of great uncertainty". During the conversation, Powell used a non-financial analogy: "[*y]ou are walking through a room full of furniture and the lights go off, what do you do? You slow down. You stop and you probably feel your way. So it's no different with policy. When there is much more uncertainty, in some cases you want to do less and in some cases you want to do more*."

ACT III – We are almost there.

On October 25th, the newly minted vice chairman, Richard Clarida, in his "Outlook for the U.S. Economy and Monetary Policy" speech at the Peterson Institute, said that U* "*may be somewhat lower than I would have thought several years ago. What this means is that, even with today's very low unemployment rate, the labor market might not be as tight--and inflationary pressures not as strong--as I once would have thought*." This suggests that he knows where the u* is. Further, "*inflation is at or close to the Fed's 2 percent inflation goal. Thus, the economy is as near as it has been in a decade to meeting both of the Fed's dual-mandate objectives, which suggests to me that monetary policy at this stage of the economic expansion should be aimed at sustaining growth and employment at levels consistent with keeping inflation at or close to the 2 percent rate consistent with price stability*." In the case of r*, Clarida stated *"[t]he funds rate is just now--for the first time in a decade--above the Fed's inflation objective, but the inflation-adjusted real funds rate remains below the range of estimates for the longer-run neutral real rate*." This seems to suggest that the r* is within sight or at least the Fed knows the range.

[3] https://youtu.be/IEPcPIYTMY0 [7:45 - 8:07]
[4] https://www.dallasfed.org/institute/events/2018/18powell [16:20 - 16:40]

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In Clarida's November 16th CNBC[5] interview, he said that the Fed Funds rate "by some estimates is close to neutral", and he went on to paraphrase Chairman Powell's darkroom analogy, "*if you're in a darkroom, especially without your shoes on, you want to go slow so you don't stub your toe. So, I think data dependence makes sense right here*." Then, in response to if the rates are at r* yet, he said that "*as of September, the long run neutral policy by members of the committee was in a* <u>*range of somewhere between 2.5% and 3.5%. So currently the policy rate is below that range. But as you can tell, it's getting closer towards the vicinity of that range.*</u>"

There appears to be light in the room "now", and the uncertainty regarding the location of r* has given way to a clear range. This new insight is confirmed by the November 28, 2018, speech given by Chairman Powell at The Economic Club of New York regarding the Federal Reserve's framework for monitoring financial stability. During which, Chairman Powell changed his position regarding r*. He stated that "*Interest rates are still low by historical standards, and they remain* <u>*just below the broad range of estimates of the level that would be neutral for the economy*</u>" [underlined for emphasis]. This means that at the current 2.00% to 2.25% federal funds rate, it is now close to or "just below" r*.

Final Note

Powell is new to his Chairmanship. Although he was to impose his no-nonsense, plain speaking, transparent style, he is learning the power of his words and how his words and the uncontrollable interpretation of them move markets with unwanted outcomes at times. I believe that the Jackson Hole speech is truthful and reflects accurately ongoing discussions at the Fed regarding the stars. In reality, they don't know the exact location of the stars. Under this framework, both Powell and Clarida cannot be proven wrong prospectively that the current Fed Funds rate range is near and far from r*. The market reacted poorly to Powell's remarks, worried about a long path to rate hikes and then recovered after Clarida's comments suggesting we are near the end of this hiking cycle. Quite frankly, I am not aware of any significant changes in any economic data between the October 3rd interview speech and the November 28th Economics Club of New York speech that moved the current interest rate from being a "long way from" to "just below" r*. After all, it seems that the "room is still dark" and the Fed is still moving slowly (and not stopping yet).

[5] https://www.cnbc.com/2018/11/16/cnbc-exclusive-cnbc-transcript-us-federal-reserve-vice-chairman-richard-clarida-speaks-with-cnbcs-steve-liesman-today.html

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As a concept, r* is as dynamic as the economic cycle. For clarity purposes, when we refer to r*, we should be clear if we are referring to the cyclical (shorter term) or secular (longer term) r*.

A good friend, who was at the NY Fed, reminded me recently that the mission[6] of the Board of Governors of the Federal Reserve System "is to foster the stability, integrity, and efficiency of the nation's monetary, financial, and payment systems so as to promote optimal macroeconomic performance." Far too often, we narrowly interpret the Fed's interest rate action or quantitative tightening purely from a monetary lens. In fact, the mission of the Fed includes the stability of the nation's financial system.

The Fed often states that monetary policy is a tool to calibrate for maximum employment and price stability, and regulatory and macroprudential tools are better suited in addressing financial stability. However, as a secondary derivative, monetary policy actions often bleed into and affect financial stability such as currency valuation, interest rate spread, and market liquidity, just to name a few. As market participants, we should broaden our analysis when we anticipate the Fed's monetary action. We believe that there is no Chinese wall between monetary and financial stability decisions even though the monetary dual mandate objectives exclude financial stability explicitly.

Based on our research, as so explained in our third quarter 2018 commentary, we believe that the cyclical r* is at or around 3%. This means that there are likely three more 25bp hikes before the Fed deems it has reached its "normalization" objective.

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[6] https://www.federalreserve.gov/publications/gpra/2011-mission-values-and-goals-of-the-board-of-governors.htm