1. **Messaging:** What is the message you are trying to communicate with the narrative visualization?

   The narrative data visualization is aimed to help users find out if there is a clear correlation between the federal funds rate and the 30-year fixed mortgage rate since 1971.

2. **Narrative Structure:** Which structure was your narrative visualization designed to follow (martini glass, interactive slide show or drop-down story)? How does your narrative visualization follow that structure? (All of these structures can include the opportunity to "drill-down" and explore. The difference is where that opportunity happens in the structure.)

   This narrative visualization followed the interactive slide structure.
   It uses 5 scenes to guide the user through a line chart showing the federal funds rate and the 30-year fixed mortgage rate from March 1971 to March 2018. Each scene is a successor of the last one by progressing(drawing) the line chart from a specific date to another. And these dates are picked where major rate change events occurred, which are also annotated on the chart at the end of the drawing animation.
   For exploration, at each scene, users are free to hover the mouse over the chart to see detail tooltip for a specific month's rates. They can also use the slider beneath the chart to change the line chart's progression. What's more, users can jump directly to any scene if they don't want to follow the scene's sequence.

3. **Visual Structure:** What visual structure is used for each scene? How does it ensure the viewer can understand the data and navigate the scene? How does it highlight to urge the viewer to focus on the important parts of the data in each scene? How does it help the viewer transition to other scenes, to understand how the data connects to the data in other scenes?

   Each scene's visual structure consists of a line chart with annotation, a parameter slider, a text description and some buttons. The line chart has legend that indicates which line is for which rate. When the user hovers mouse over the chart, the tooltip will show rates and month in detail of the point where the cursor

is at. The annotations that appear at end of each scene helps users focus on points of interest on the chart. Since the chart in each scene is drawn from the last scene's chart, users will have better connection of data in different scenes. Also, the chart' element like line color, legends and annotations are all consistent throughout all scenes.

4. **Scenes:** What are the scenes of your narrative visualization? How are the scenes ordered, and why?

   Each scene is the line chart drawn from the start month to a specific month with annotations on interest point of the line chart. The scenes are ordered chronologically.

5. **Annotations:** What template was followed for the annotations, and why that template? How are the annotations used to support the messaging? Do the annotations change within a single scene, and if so, how and why?

   The annotation's template is a circle that highlights the point of interest on the chart and a text label of the point of the interest. These annotations can help users focus on the point where both rates change together which support the message the narrative data visualization trys to conduct. The annotation only pops up at the end of the scene changing animation, this helps user to pay attention to the point of interest.