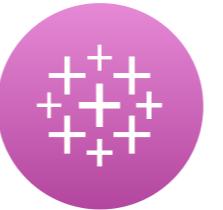


Introduction

INTRODUCTION TO TABLEAU

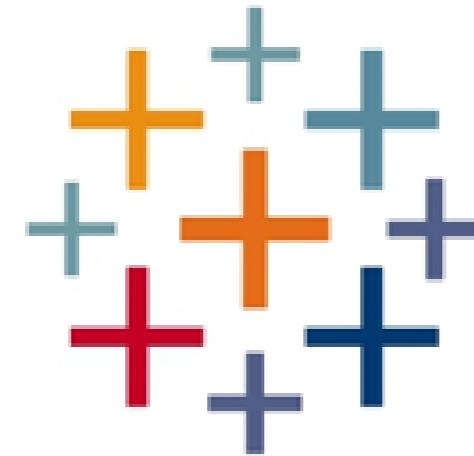


Hadrien Lacroix

Content Developer at DataCamp

What is Tableau

+ a b | e a u



- Visualization tool
- VizQL
- Easy
- Beautiful
- Interactive

Why use Tableau

Traditional photography



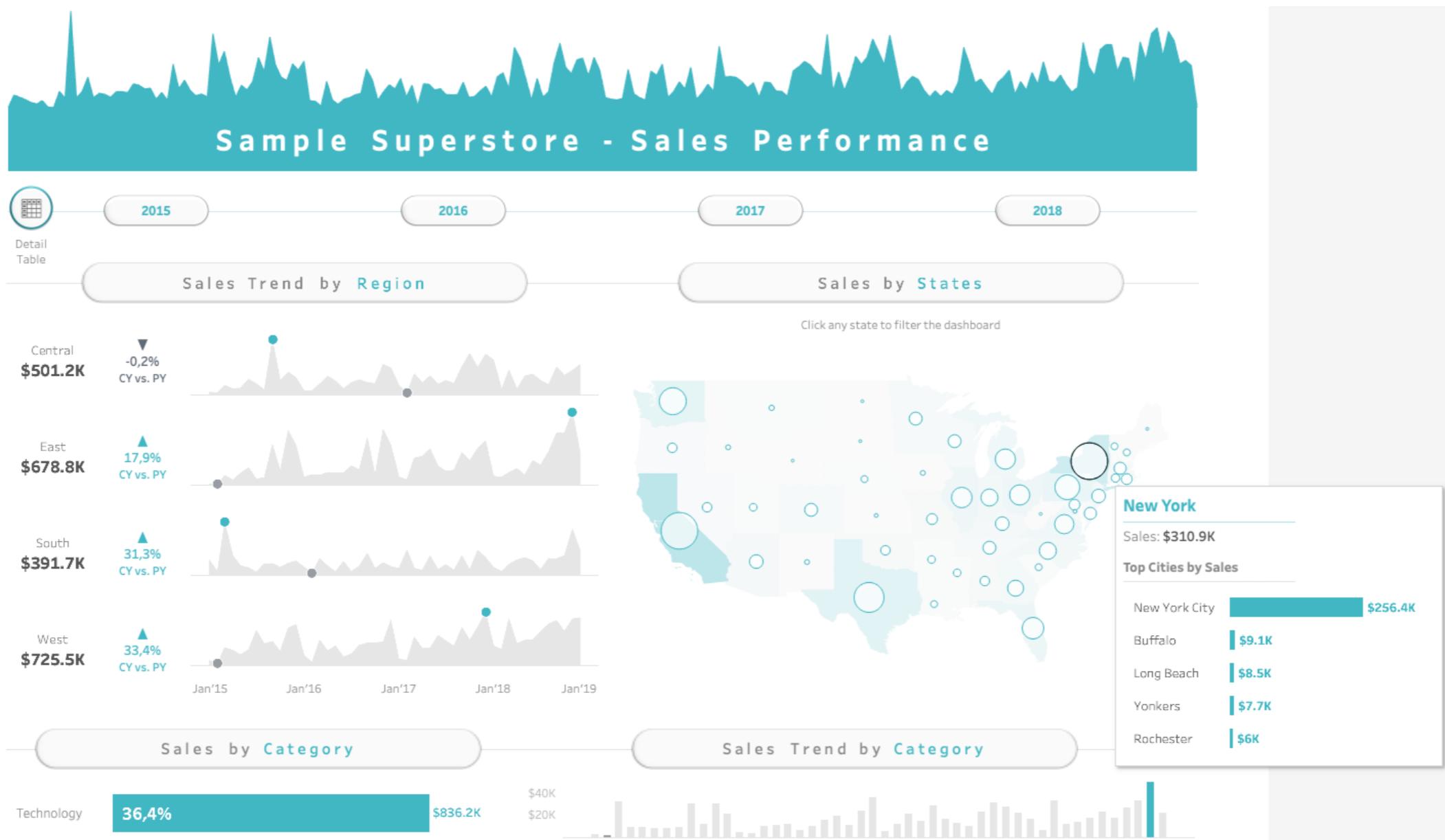
Digital photography



Why use Tableau

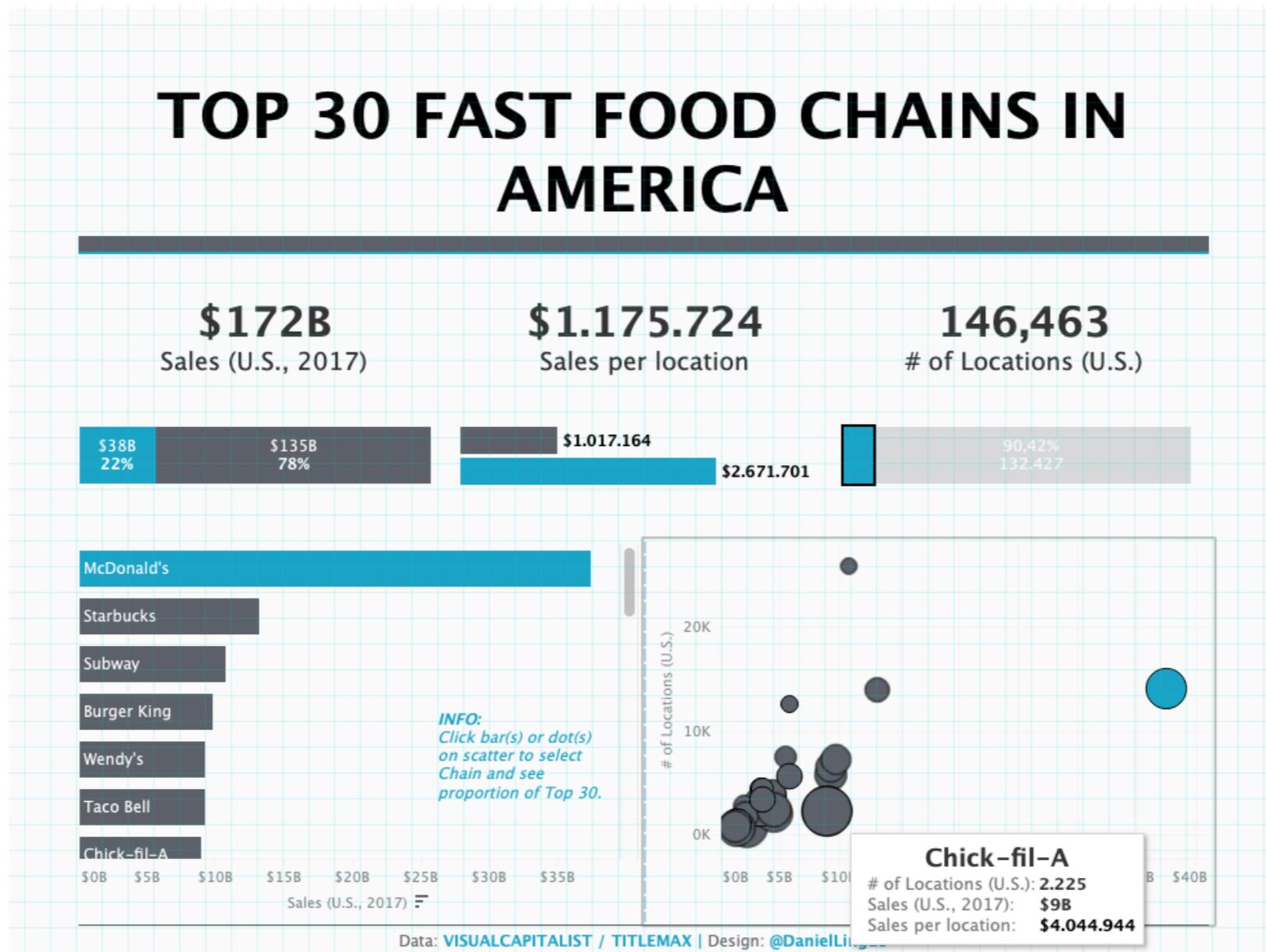
- Accessible but complete
- Flexible
- Intuitive
- Quick and robust prototyping
- Frame business questions
- Import and clean data
- Analyze and visualize data
- Drive business decisions
- Present insights

Why use Tableau - Monitoring performance



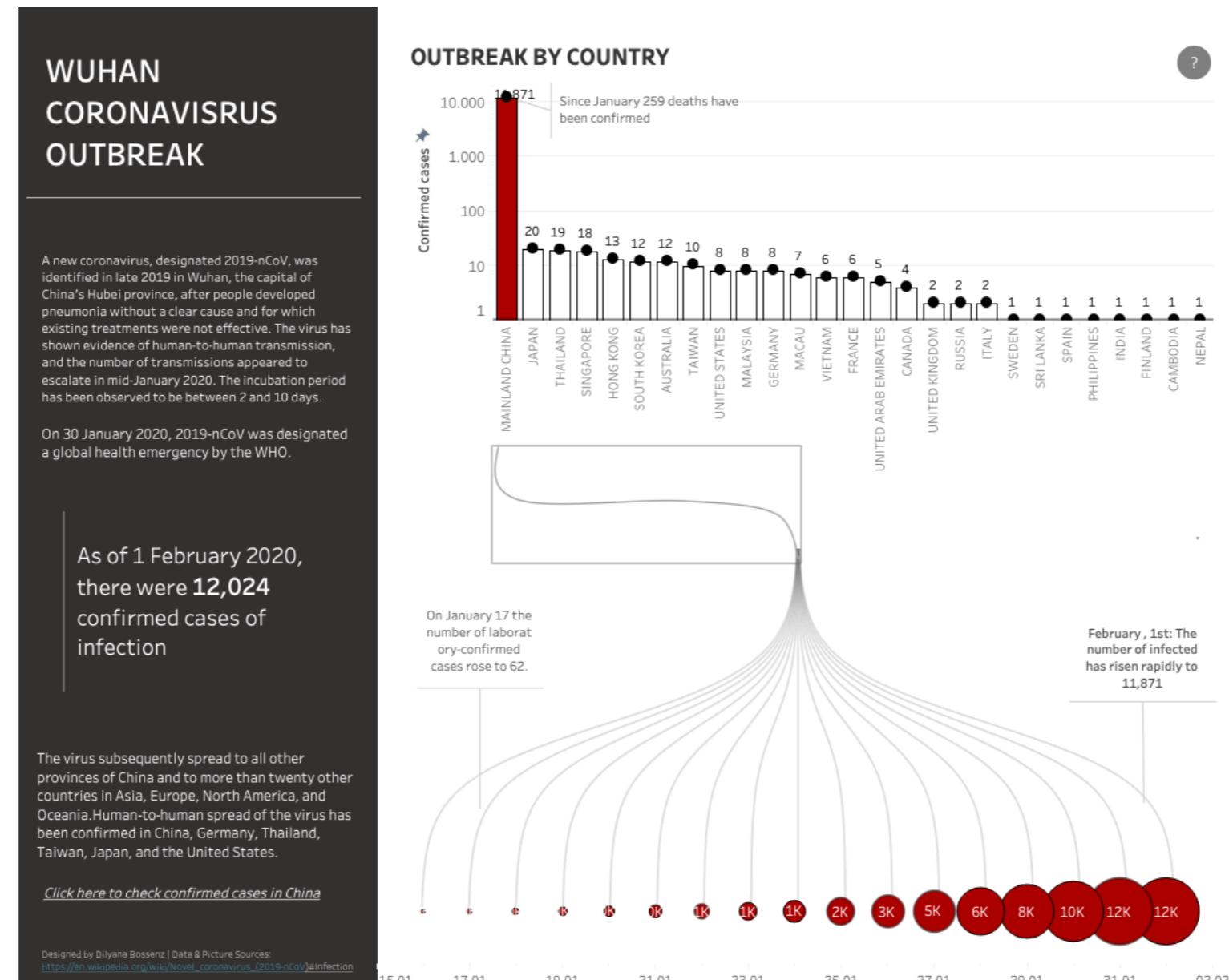
¹ Author: Pradeep Kumar G. Originally published on: Tableau Public

Why use Tableau - Competitive analysis



¹ Author: Daniel Ling. Originally published on: Tableau Public.

Why use Tableau - Tracking outbreaks



¹ Author: Dilyana Bossenz. Originally published on: Tableau Public

Who uses Tableau

Roles

- Data analyst
- Business analyst
- Quantitative analyst

Who uses Tableau



¹ <https://enlyft.com/tech/products/tableau>

Tableau versions

Tableau Public

- Free
- Create beautiful visualizations
- Only CSV, Excel and text files
- Save online
- 15 millions rows of data
- Public reports

Tableau Desktop

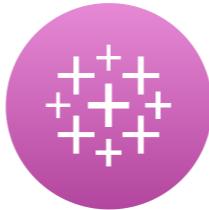
- Paid
- Create beautiful visualizations
- All listed data sources
- Save locally
- Unlimited rows of data

Let's practice!

INTRODUCTION TO TABLEAU

Connecting to data

INTRODUCTION TO TABLEAU



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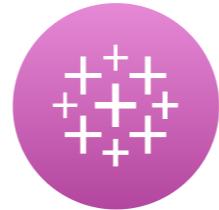
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Let's practice!

INTRODUCTION TO TABLEAU

Navigating Tableau

INTRODUCTION TO TABLEAU



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Content Developer at DataCamp

The screenshot shows the Tableau Data Prep interface. At the top, there's a toolbar with various icons for file operations, data transformations, and visualization. Below the toolbar, the left sidebar displays the data source "new_york" under the "Data" tab. The "Dimensions" section lists fields: Id, Neighborhood, Reviews Per Month, Room Type, and Measure Names. The "Measures" section lists fields: Availability 2020, Days Occupied In 2019, F1, Latitude, Longitude, Minimum Nights, Number Of Reviews, Price, Number of Records, and Measure Values. The main workspace is titled "Sheet 1" and contains two large, empty rectangular areas labeled "Drop field here". On the right side of the workspace, there are three small placeholder boxes: "Pages", "Columns", and "Rows". The bottom navigation bar includes tabs for "Data Source" and "Sheet 1", along with other icons for saving and publishing.

The screenshot shows the Tableau Data Prep interface. In the top navigation bar, there are icons for back, forward, search, and file operations, followed by a dropdown menu for 'Standard' mode and a 'Show Me' button.

The main workspace is titled 'Sheet 1'. It features a large area labeled 'Drop field here' where no fields have been placed. To the left of this area are several panels:

- Data** panel: Shows the current dataset is 'new_york'.
- Analytics** panel: Shows the current mode is 'Standard'.
- Dimensions** panel: Lists dimensions: Id, Neighborhood, Reviews Per Month, Room Type, and Measure Names.
- Marks** panel: Shows options for Color, Size, Text, Detail, and Tooltip.
- Measures** panel: Lists measures: Availability 2020, Days Occupied In 2019, F1, Latitude, Longitude, Minimum Nights, Number Of Reviews, Price, Number of Records, and Measure Values.

At the bottom of the interface, there is a navigation bar with tabs for 'Data Source' and 'Sheet 1', along with other icons for saving and publishing.

The screenshot shows the Tableau Data Prep interface with the following components:

- Top Bar:** Includes standard icons for file operations (New, Open, Save, etc.), a search bar, and a "Standard" view selection.
- Data Source:** "new_york" is selected from the "Data" dropdown.
- Dimensions:** A list of categorical fields:
 - # Id
 - Abc Neighborhood
 - # Reviews Per Month
 - Abc Room Type
 - Abc *Measure Names*
- Measures:** A list of numerical and calculated fields:
 - # Availability 2020
 - # Days Occupied In 2019
 - # F1
 - @ Latitude
 - @ Longitude
 - # Minimum Nights
 - # Number Of Reviews
 - # Price
 - =# *Number of Records*
 - # Measure Values
- Marks:** A panel showing options for visual encoding:
 - Automatic (selected)
 - Color
 - Size
 - Text
 - Detail
 - Tooltip
- Sheet 1:** The main workspace with three drop zones:
 - Top-right: "Drop field here"
 - Left: "Drop field here"
 - Right: "Drop field here"
- Bottom Navigation:** Includes tabs for "Data Source" (selected), "Sheet 1", and other sheet icons.

The screenshot shows the Tableau desktop application interface. The top navigation bar includes icons for file operations (New, Open, Save, etc.), a search bar, and a "Standard" view dropdown. On the right, there's a "Show Me" button.

The left side features the "Data" and "Analytics" panes. The "Data" pane is expanded, showing a project named "new_york". Under "Dimensions", fields include Id, Neighborhood, Reviews Per Month, Room Type, and Measure Names. Under "Measures", fields include Availability 2020, Days Occupied In 2019, F1, Latitude, Longitude, Minimum Nights, Number Of Reviews, Price, Number of Records, and Measure Values. The "Analytics" pane is collapsed.

The main workspace is titled "Sheet 1". It contains two large, empty rectangular areas labeled "Drop field here" in each corner. To the left of these areas is a "Marks" shelf with options for Automatic, Color, Size, Text, Detail, and Tooltip.

At the bottom, the ribbon shows tabs for "Data Source" (selected), "Sheet 1", and other sheet icons. There are also buttons for "New", "Open", and "Save".

The screenshot shows the Tableau Data Prep interface with the following components:

- Top Bar:** Includes standard icons for file operations (New, Open, Save, etc.), a search bar, and a "Standard" mode switch.
- Data Source:** Shows "new_york" under the "Data" tab.
- Dimensions:** A list including "Id", "Neighborhood", "Reviews Per Month", "Room Type", and "Measure Names".
- Marks:** A panel showing options for "Automatic" marks (Color, Size, Text, Detail, Tooltip).
- Measures:** A list of numerical fields: "Availability 2020", "Days Occupied In 2019", "F1", "Latitude", "Longitude", "Minimum Nights", "Number Of Reviews", "Price", "Number of Records", and "Measure Values".
- Sheet 1:** The main workspace with three "Drop field here" placeholder areas.
- Bottom Navigation:** Includes tabs for "Data Source" and "Sheet 1", along with other standard Tableau navigation icons.

Segmenting with dimensions

- Dimensions and measures affect visualizations differently:
 - Dimensions are used to **segment** data
 - Measures can be aggregated
- **Segmenting** = grouping similar data together
- For example: price per neighborhood, days occupied by room type

The screenshot shows the Tableau desktop interface with a context menu open over a measure named "Reviews Per Month". The menu is organized into several sections:

- Add to Sheet**: Options include Duplicate, Rename, and Hide.
- Create**: Options include Convert to Discrete, Convert to Measure (which is selected), Change Data Type, Geographic Role, and Default Properties.
- Group by**: Options include Folders and Hierarchy.
- Replace References...**
- Describe...**

The main workspace is titled "Sheet 1" and contains two "Drop field here" placeholder areas. The top-left corner of the workspace shows a portion of the data source pane, which includes sections for "Data", "Analytics", "Pages", "Columns", "Rows", and "Filters". The "Dimensions" section lists fields like "Id", "Neighborhood", and "Room Type". The "Measures" section lists fields like "Availability 2019", "Days Occupied In 2018", and "Price".

The screenshot shows the Tableau Data Prep interface. The top navigation bar includes icons for back, forward, search, and standard mode, along with a "Show Me" button. The left sidebar has tabs for "Data" and "Analytics", with "amsterdam" selected under "Data". Under "Dimensions", fields include "Id", "Neighborhood", "Reviews Per Month", "Room Type", and "Measure Names". Under "Measures", fields include "Availability 2019", "Days Occupied In 2018", "F1", "Latitude", "Longitude", "Minimum Nights", "Number Of Reviews", "Price", "Number of Records", and "Measure Values". The main workspace is titled "Sheet 1" and contains three columns labeled "Pages", "Columns", and "Rows". The "Rows" column is highlighted with an orange border and contains the field "Neighborhood", which is currently being edited, indicated by a blue selection bar and a cursor icon. The workspace also features "Marks" settings for Color, Size, Text, Detail, and Tooltip, and placeholder text "Drop field here" in the other columns.

The screenshot shows the Tableau Data Prep interface. The top navigation bar includes icons for file operations (New, Open, Save, etc.), a search bar, and a "Standard" mode switch. On the far right, there's a "Show Me" button.

The left sidebar contains several sections:

- Data**: Shows a connection named "new_york".
- Analytics**: A dropdown menu.
- Dimensions**: Lists "Id", "Neighborhood", "Reviews Per Month", "Room Type", and "Measure Names".
- Measures**: Lists "Availability 2020", "Days Occupied In 2019", "F1", "Latitude", "Longitude", "Minimum Nights", "Number Of Reviews", "Price", "Number of Records", and "Measure Values".

The main workspace is titled "Sheet 1" and features three large, empty rectangular areas labeled "Drop field here" in each corner. To the left of these areas is a "Marks" panel with options for "Automatic" and "Color", "Size", "Text", "Detail", and "Tooltip". Above the marks panel are sections for "Pages", "Columns", and "Rows".

Data Source

Sheet 1



The screenshot shows the Tableau desktop application interface. The top navigation bar includes icons for file operations (New, Open, Save, etc.), a search bar, and a "Standard" view dropdown. On the far right, there's a "Show Me" button.

The left sidebar contains the "Data" and "Analytics" tabs, with "Data" selected. Under "Data", a single item "new_york" is listed. Below this, the "Dimensions" section lists fields: Id, Neighborhood, Reviews Per Month, Room Type, and Measure Names. The "Measures" section lists: Availability 2020, Days Occupied In 2019, F1, Latitude, Longitude, Minimum Nights, Number Of Reviews, Price, Number of Records, and Measure Values.

The main workspace is titled "Sheet 1". It features three large, empty rectangular areas labeled "Drop field here" in each corner. To the left of these areas is a "Marks" shelf with options: Automatic, Color, Size, Text, Detail, and Tooltip.

The screenshot shows the Tableau Data Prep interface. The top navigation bar includes icons for file operations (New, Open, Save, etc.), a search bar, and a "Standard" dropdown. On the right, there's a "Show Me" button. The left sidebar has tabs for "Data" and "Analytics", with "new_york" selected under "Data". Under "Dimensions", fields include Id, Neighborhood, Reviews Per Month, Room Type, and Measure Names. Under "Measures", fields include Availability 2020, Days Occupied In 2019, F1, Latitude, Longitude, Minimum Nights, Number Of Reviews, Price, Number of Records, and Measure Values. The main workspace is titled "Sheet 1" and features a "Rows" pane at the top. The workspace area contains three "Drop field here" placeholder boxes. A vertical toolbar on the left side of the workspace provides options for Color, Size, Text, Detail, and Tooltip.

Sheet 1

Drop field here

Drop field here

Drop field here

Rows

Pages

Columns

Standard

Show Me

Data Analytics

new_york

Dimensions

- # Id
- Abc Neighborhood
- # Reviews Per Month
- Abc Room Type
- Abc *Measure Names*

Marks

- Automatic
- Color
- Size
- Text
- Detail
- Tooltip

Measures

- # Availability 2020
- # Days Occupied In 2019
- # F1
- @ Latitude
- @ Longitude
- # Minimum Nights
- # Number Of Reviews
- # Price
- =# *Number of Records*
- # *Measure Values*

Data Source Sheet 1

The screenshot shows the Tableau Data Prep interface. At the top, there's a toolbar with various icons for file operations and data management. Below the toolbar, the left sidebar displays a 'Data' tab selected, showing a dataset named 'new_york'. Under 'Dimensions', fields like 'Id', 'Neighborhood', 'Reviews Per Month', 'Room Type', and 'Measure Names' are listed. Under 'Measures', fields like 'Availability 2020', 'Days Occupied In 2019', 'F1', 'Latitude', 'Longitude', 'Minimum Nights', 'Number Of Reviews', 'Price', 'Number of Records', and 'Measure Values' are listed. A 'Filters' section is also present. The main workspace is titled 'Sheet 1' and contains two large, empty rectangular areas labeled 'Drop field here'.

The screenshot shows the Tableau Data Prep interface. On the left, there's a sidebar with tabs for 'Data' and 'Analytics'. Under 'Data', a section for 'new_york' is shown with a 'Dimensions' list containing 'Id', 'Neighborhood', 'Reviews Per Month', 'Room Type', and 'Measure Names'. Below that is a 'Measures' list with 'Availability 2020', 'Days Occupied In 2019', 'F1', 'Latitude', 'Longitude', 'Minimum Nights', 'Number Of Reviews', 'Price', 'Number of Records', and 'Measure Values'. A 'Filters' panel is open, highlighted with a blue border. The main area is titled 'Sheet 1' and contains three 'Drop field here' placeholder boxes. At the bottom, there are tabs for 'Data Source' and 'Sheet 1', along with several small icons.

The screenshot shows the Tableau Data Prep interface. At the top, there's a toolbar with various icons for file operations, data management, and visualization. Below the toolbar, the left sidebar contains sections for **Data** (selected), **Analytics**, **new_york**, **Dimensions** (listing `# Id`, `Abc Neighborhood`, `# Reviews Per Month`, `Abc Room Type`, and `Abc Measure Names`), and **Measures** (listing `# Availability 2020`, `# Days Occupied In 2019`, `# F1`, `⊕ Latitude`, `⊕ Longitude`, `# Minimum Nights`, `# Number Of Reviews`, `# Price`, `=# Number of Records`, and `# Measure Values`). The main workspace is titled "Sheet 1" and features a grid with three "Drop field here" placeholder boxes. On the far left of the workspace, a vertical panel is open, showing the **Marks** shelf with options for Automatic, Color, Size, Text, Detail, and Tooltip. This Marks shelf panel is highlighted with a dark blue border.

The screenshot shows the Tableau Data Prep interface. At the top, there's a toolbar with various icons for file operations, data transformations, and visualization. Below the toolbar, the left sidebar contains a 'Data' tab, an 'Analytics' dropdown set to 'new_york', and sections for 'Dimensions' and 'Measures'. The 'Dimensions' section lists 'Id', 'Neighborhood', 'Reviews Per Month', 'Room Type', and 'Measure Names'. The 'Measures' section lists 'Availability 2020', 'Days Occupied In 2019', 'F1', 'Latitude', 'Longitude', 'Minimum Nights', 'Number Of Reviews', 'Price', 'Number of Records', and 'Measure Values'. The main workspace is titled 'Sheet 1' and features three 'Drop field here' placeholder areas. On the right side of the workspace, there's a 'Marks' panel with options for 'Color', 'Size', 'Text', 'Detail', and 'Tooltip'. The bottom navigation bar includes tabs for 'Data Source' and 'Sheet 1', along with other icons.

The screenshot shows the Tableau desktop application interface. The top navigation bar includes icons for file operations (New, Open, Save, etc.), a search bar, and a "Standard" view dropdown. On the far right, there's a "Show Me" button.

The left sidebar contains the "Data" and "Analytics" tabs, with "Data" selected. Under "Data", a single item "new_york" is listed. Below this, the "Dimensions" section lists "Id", "Neighborhood", "Reviews Per Month", "Room Type", and "Measure Names". The "Measures" section lists "Availability 2020", "Days Occupied In 2019", "F1", "Latitude", "Longitude", "Minimum Nights", "Number Of Reviews", "Price", "Number of Records", and "Measure Values".

The main workspace is titled "Sheet 1". It features a large, empty canvas area with three "Drop field here" placeholder labels. To the left of the canvas is the "Marks" shelf, which is currently expanded to show various visualization options: Automatic, Bar, Line, Area, Square, Circle, Shape, Text, Map, Pie, Gantt Bar, Polygon, and Density. The "Automatic" option is selected.

At the bottom of the interface, there's a navigation bar with tabs for "Data Source" and "Sheet 1", along with several small icons for data preparation and sharing.

The screenshot shows the Tableau Data Prep interface. At the top, there's a toolbar with icons for file operations like back, forward, save, and a dropdown for 'Standard'. On the right side of the toolbar is a 'Show Me' button.

The left sidebar contains a 'Data' tab and an 'Analytics' dropdown set to 'new_york'. Below this is a 'Dimensions' section listing:

- # Id
- Abc Neighborhood
- # Reviews Per Month
- Abc Room Type
- Abc *Measure Names*

Below the dimensions is a 'Measures' section listing:

- # Availability 2020
- # Days Occupied In 2019
- # F1
- @ Latitude
- @ Longitude
- # Minimum Nights
- # Number Of Reviews
- # Price
- =# *Number of Records*
- # Measure Values

The main workspace is titled 'Sheet 1' and features a large grid area with three placeholder text boxes: 'Drop field here' in the top right, middle right, and bottom right.

At the bottom of the interface are tabs for 'Data Source' and 'Sheet 1', along with several small icons for navigating between sheets and saving workbooks.

Our business question

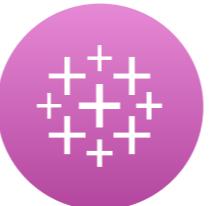
Which neighborhood and room type has the highest price on Airbnb listings?

Let's practice!

INTRODUCTION TO TABLEAU

A tour of the interface

INTRODUCTION TO TABLEAU



Hadrien Lacroix

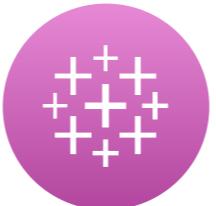
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INTRODUCTION TO TABLEAU

A closer look at shelves

INTRODUCTION TO TABLEAU



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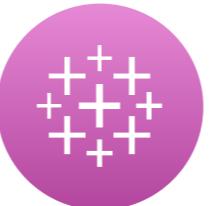
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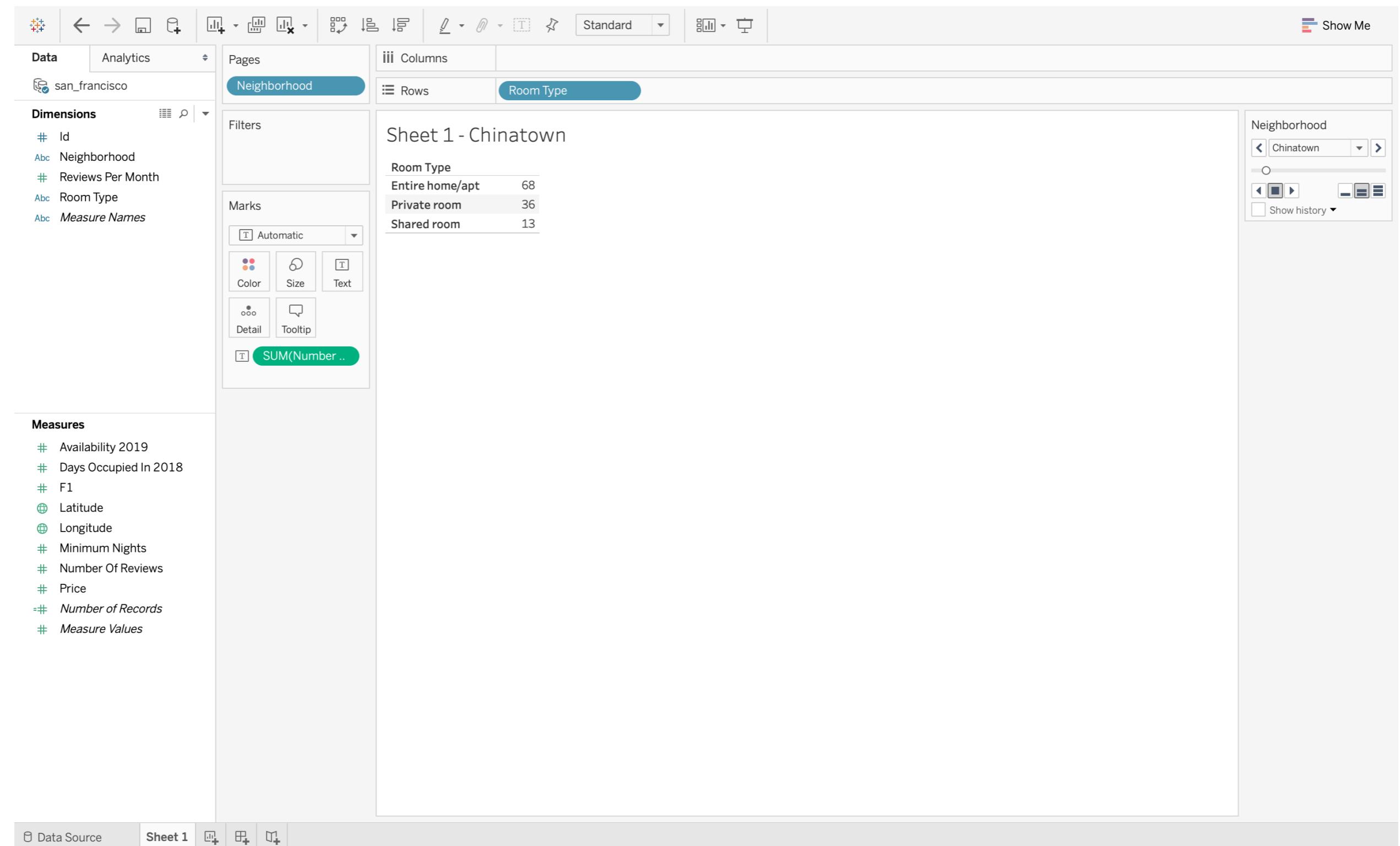
Your first visualization

INTRODUCTION TO TABLEAU

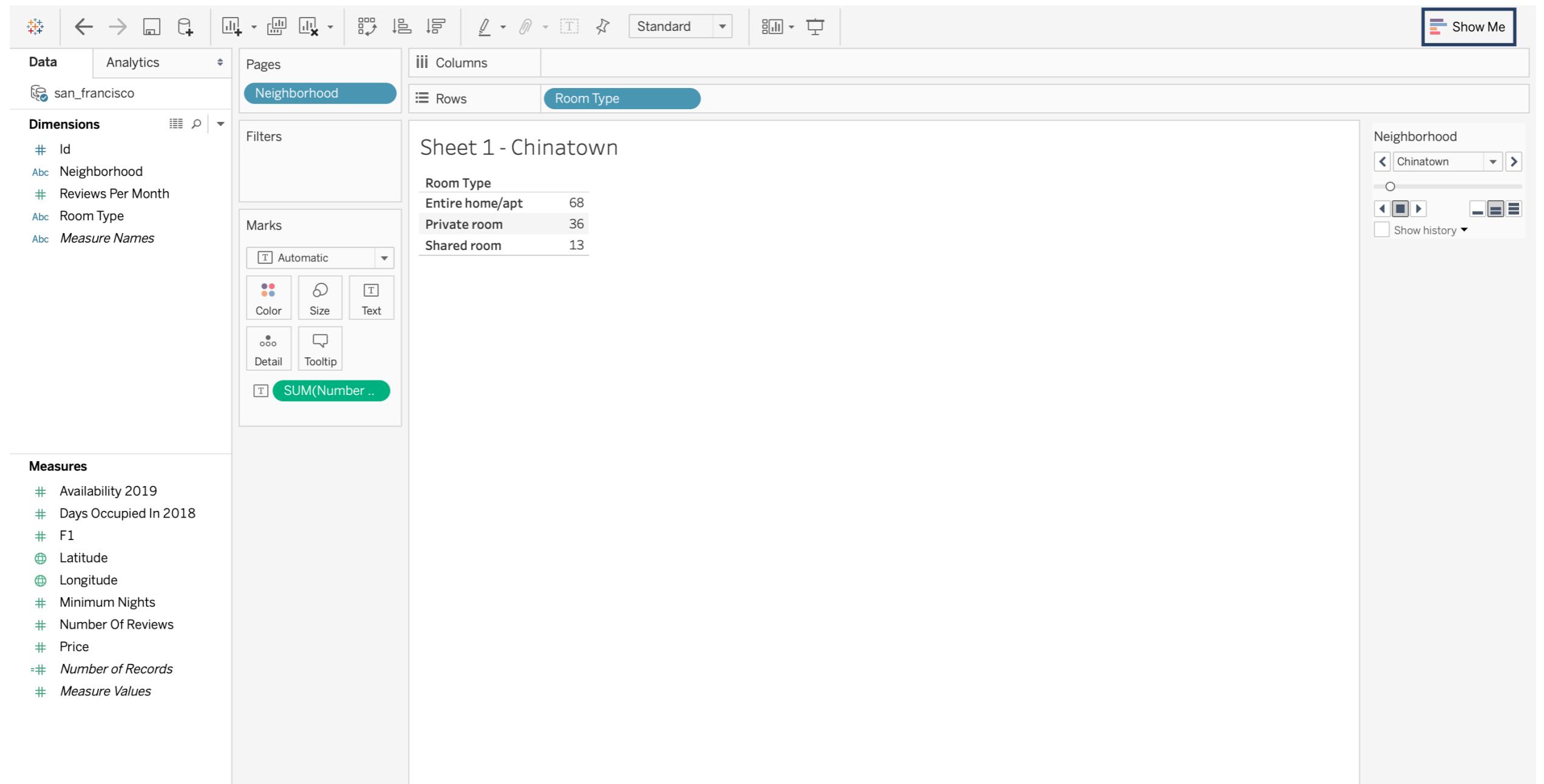


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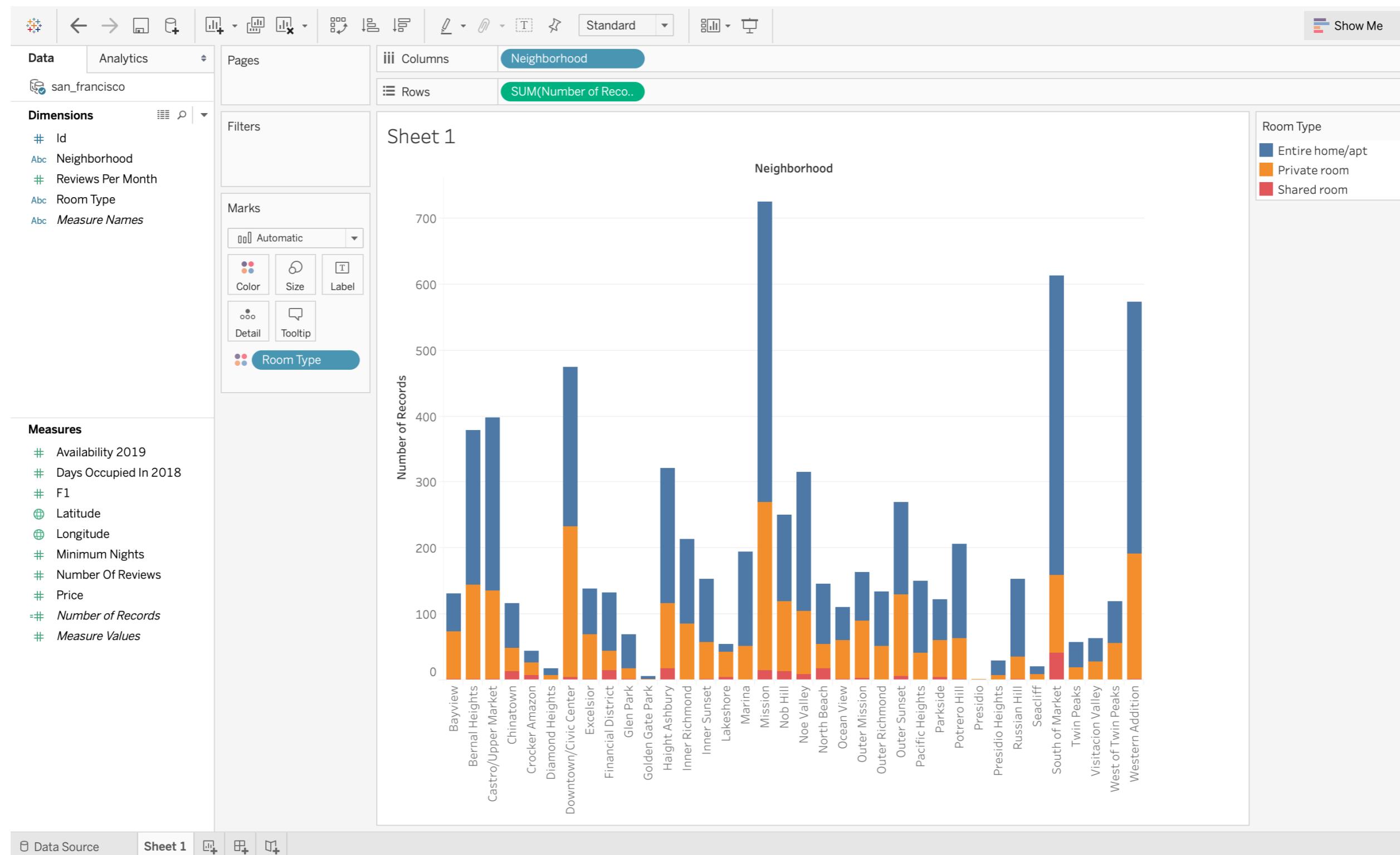


Show me!



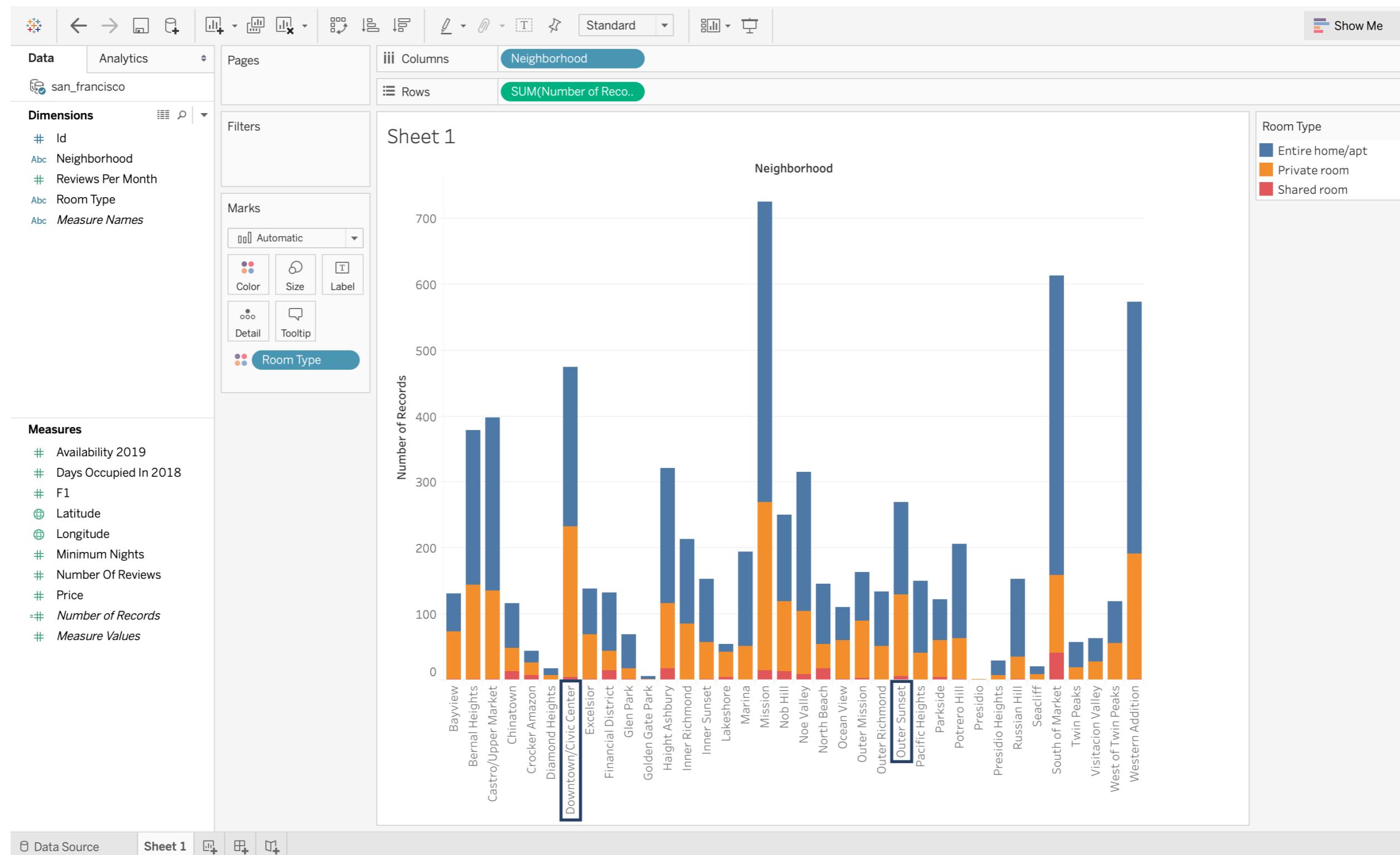
Show me choices

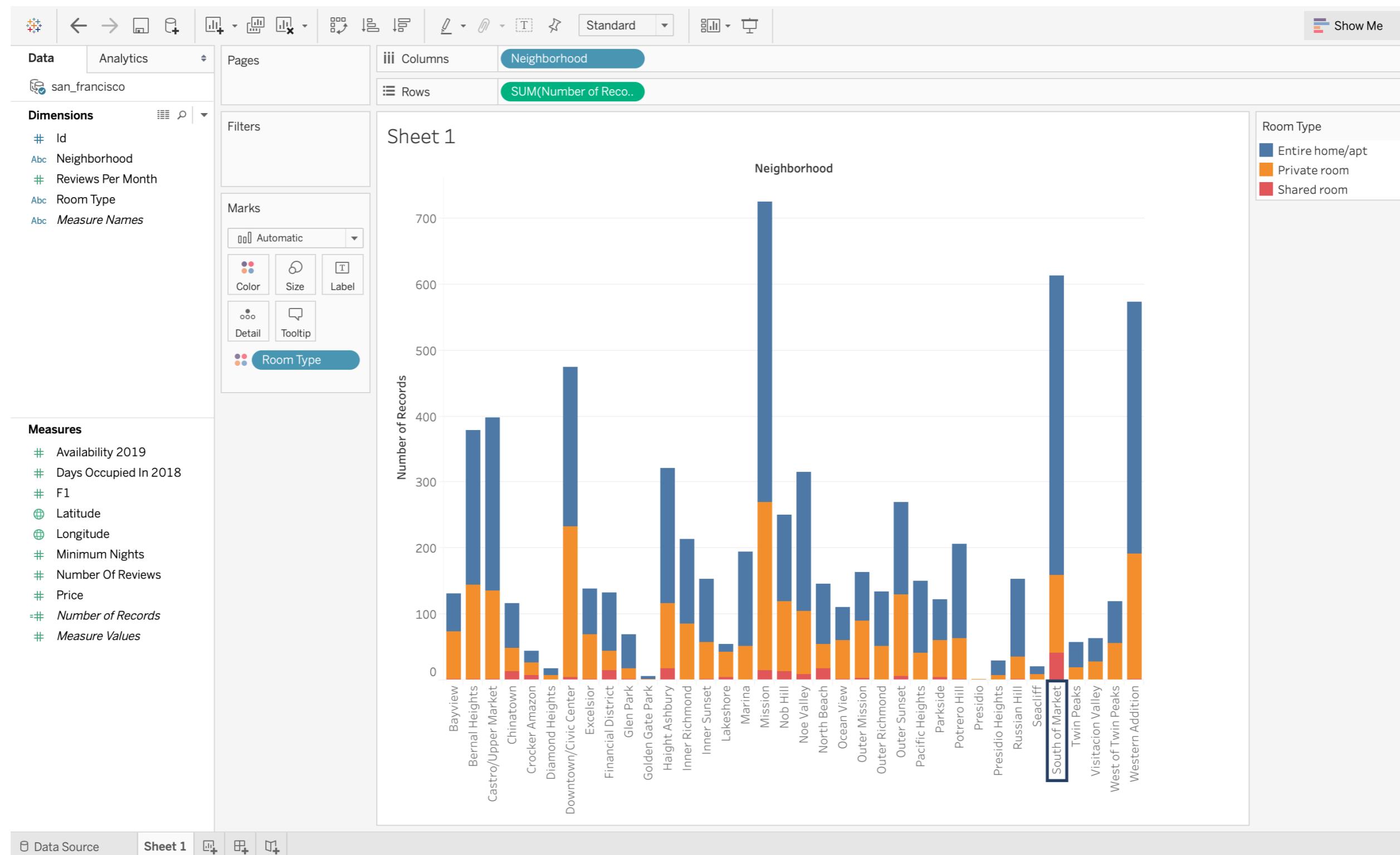




Data Source

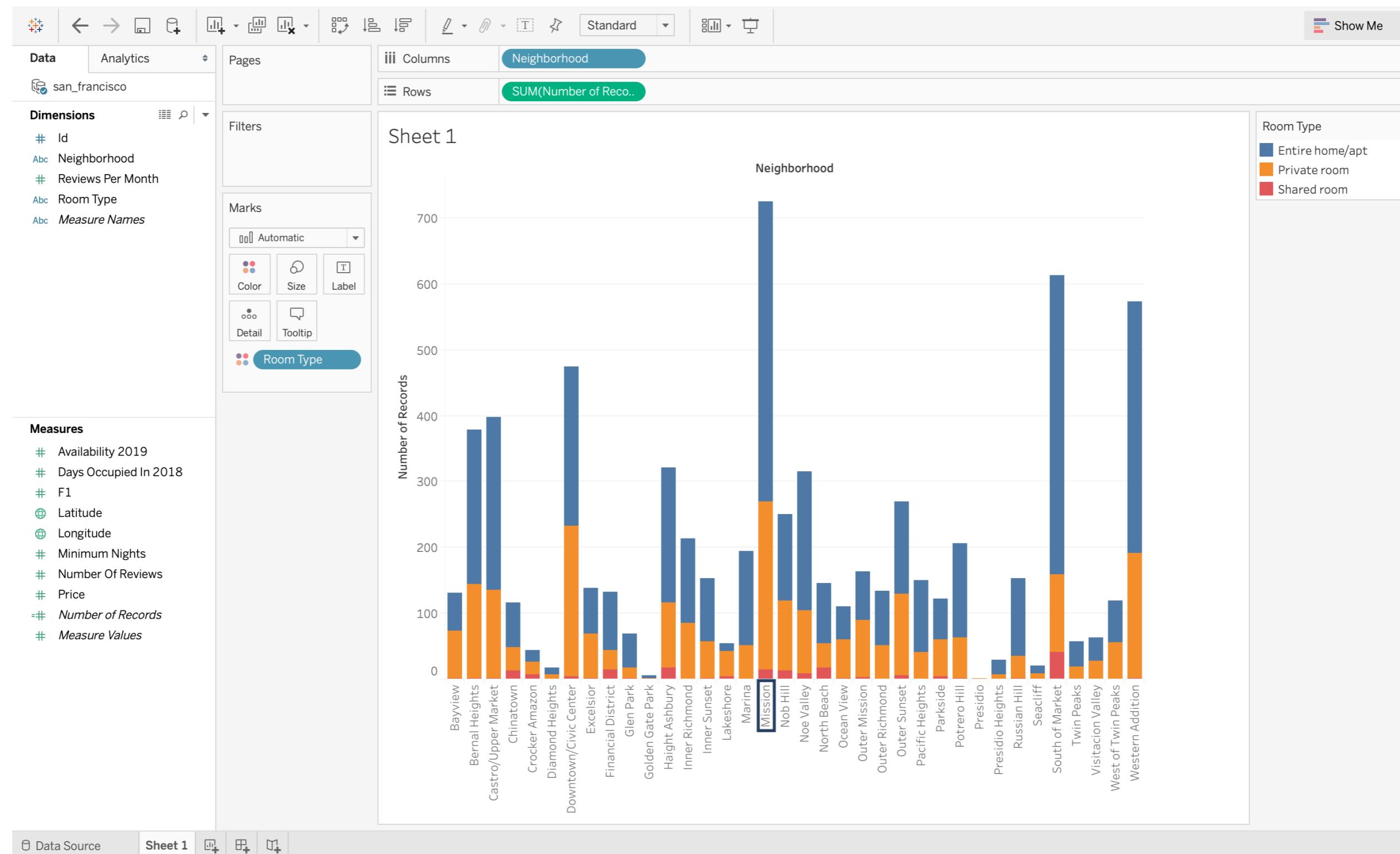
Sheet 1





Data Source

Sheet 1



Let's practice!

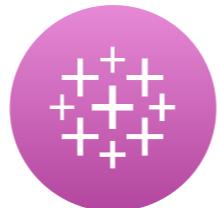
INTRODUCTION TO TABLEAU

Building visualization with Show Me

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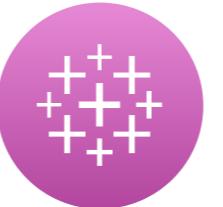


Let's practice!

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Improving visualizations

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