



On-Demand Training: Drill Down and Hierarchies Transcript

Welcome to this video on drilling down and hierarchies. You can download the Exercises workbook or follow along in your own copy of Tableau.

Hierarchy Drill Down

Drilling down can mean a couple things in Tableau. Usually, it means expanding out a hierarchy, thereby drilling down to the next level of detail. We'll address hierarchy drill down for the majority of this video.

Drill Down to Data

Alternatively, sometimes “drill down” can mean going all the way down and looking at raw data.

- This is very easy in Tableau
 - Either click on this icon, here in the data window, to see the underlying source data,
 - or for a specific mark in a view, click to bring up the tooltip's command buttons, click the same icon,
 - then go to the underlying data tab.
 - The command buttons can be turned off in the tooltip to prevent access to this feature in published workbooks if desired.

Building Hierarchies

But let's assume we want to easily expand out a series of dimensions to drill down

- such as Category to Sub-Category to Product Name,
- or Country to State to City.

Multidimensional data sources are limited to their pre-built hierarchies, but if the data source allows it, it's easy to build a hierarchy right in the data window.

- Here, we see that there's already a clear relationship between Category and Sub-Category.
- In the data window, to build a hierarchy all we have to do is click on whatever field we want as the next level down, Sub-Category,
- and drag it to top of the first level field, Category.
- We'll name this Products, and it's that easy.

Working with Hierarchies

First thing to note is that in the pill here in the view now has a minus sign.

- Clicking that will roll up our hierarchy, and now it's a plus to indicate there are more levels.
- Clicking on the plus expands it out.

What if we wanted to expand this further?

- We can add Product Name to this hierarchy simply by dragging the field in the data window underneath Sub-Category.

- Note this line showing where it will go.
- We can also rearrange the order, simply by dragging the fields around in the hierarchy

Even though the hierarchy has multiple levels, we can still manipulate each level independently.

We can remove Sub-Category from the view and just have Category and Name.

- Note, though, if we roll up and then drill back down, the view will re-default to whatever the hierarchy is in the data window.

What if we realize we don't want the drill down functionality anymore?

- We can either remove a field from the hierarchy, simply by clicking and dragging it out,
- or we can right click and remove the hierarchy all together.
- Let's undo that, though.

There may be instances when it's useful to have a field in a hierarchy, but also able to be used on its own. For example, perhaps we want to create a high-level view where drilling down to the lowest level of granularity would negatively impact performance without adding to the analysis. We want to be able to use a specific field without drilldown as an option.

- Simply right click on a field,
- click duplicate,
- and then use that field independently in the view, and it has no drill down capabilities.

Date Hierarchies

Date fields, depending on their level of granularity, are automatically brought into the view as hierarchies.

- Here, when we bring out Order Date, it already has a plus sign, indicating that we can drill down.
- If the dates in the data are in a standard format including year, month, and day, Tableau will recognize automatically the additional layer of quarters and build that out.
- As always, we can remove any individual pill we don't want in the view.

The default pill type for a date field is discrete, and a discrete date hierarchy will have a different pill for each date part.

However, if we right click and drag out the date, or change the pill type from the dropdown menu, we can select a continuous date instead.

- Continuous dates still have the same drill down functionality,
- but each drill down updates the pill to the next level down instead of creating a new pill,
 - because continuous dates by definition cannot be considered as separate date part.

To drill back up, open the dropdown menu by clicking on the caret in the pill and selecting the desired level.

Conclusion

Thank you for watching this video on hierarchies & drilling down. We invite you to continue with the On-Demand Training videos to learn more about using Tableau.