interworks

Level Up in Tableau Desktop

Ready to take your Tableau dashboards to the next level visually and functionally? This guide shares intermediate best practices that save development time and help you build better dashboards.

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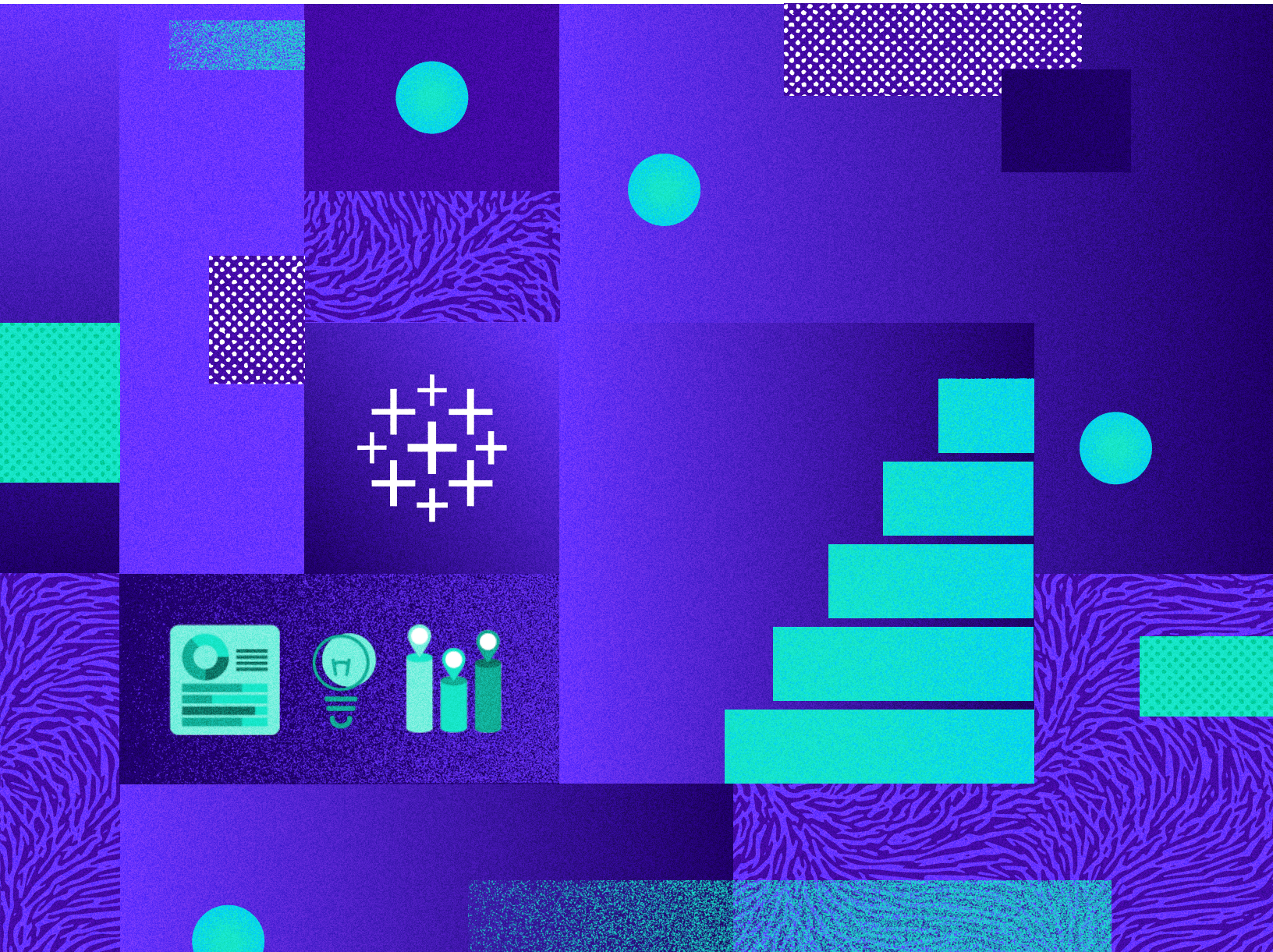

LEVEL OF DETAIL CALCS

FIXED LOD Calcs

- FIXED LOD computes a value using specified dimensions, without reference to dimensions in the view - a row-level calc.

Ex. { FIXED [Dimension].[Dimension] : AGG ([Measure]) }

- Caution: Nesting FIXED LOD Calcs can cause performance lags.
- Wildcard (no locked dimension) returns an aggregated measure with no breakdown.

Include LOD Calcs

- INCLUDE LOD expressions compute values using the specified dimensions in addition to whatever dimensions are in the view.

Ex. { INCLUDE [Dimension] : AGG ([Measure]) }

- Fields based on INCLUDE level of detail expressions will change as you add or remove dimensions from the view.

Exclude LOD Calcs

- EXCLUDE level of detail expressions prevent the calculation from using one or more of the dimensions present in the view.

Ex. { EXCLUDE [Dimension] : AGG ([Measure]) }

- This can be thought of as a "removes a dimension" LOD expression.

Additional Info on LODs

- Keywords defined as FIXED, INCLUDE, EXCLUDE.
- Most fields and calculations are tied to the granularity of the view or of the data source. LOD expressions allow you to set the granularity of calculation explicitly.
- Oftentimes aggregations of MAX or MIN are used in conjunction with FIXED LODs, especially on dates.

ANALYSIS TIPS & TRICKS

Reference Lines

- Reference lines from fields on Rows/Columns or the Marks card.
- Adds context using lines, distribution bands and box plots.
- FIXED LOD can lock a reference line to an aggregated measure.

Totals

- Analysis tab offers totals to bottom/top for Rows/Columns.
- Font can be formatted separately for sub-totals and totals.
- Can change the aggregation from analysis for Total All Using.

USING TABLE CALCS

What Are Table Calculations?

- Delta symbol shows one of the fields in the view is transformed.
- Built-in calculations offering quick analysis and insights.
- Examples include Rank, Percent of Total, Running Total, Moving Average, Difference.
- As a filter, table calculations are lowest on Order of Operations.
- Specific Dimensions aloud “For each unchecked dimension(s), run the Calculation on the checked dimension(s)”

Secondary Table Calculations

- With Running Total and Moving Calculations, you have the option to transform values twice.
- A Secondary Calculation panel is provided for further customization.
- Results of selected table calculations can be previewed as they are chosen.
- With all Table Calculations, validate results using tables.

LEVEL SETTING & REVIEWS

Easy-to-Understand Visuals

- Knowing your audience helps determine types of visuals.
- Most common: bar / line / pie / map / scatter plot charts and tables.
- Shared axis and dual axis charts allow for metric comparison.
- Show Me provides minimum number of fields for each chart type.

Blue & Green Fields, Dates

- Blue fields are discrete, green fields are continuous.
- Dates are special because they have both blue/green behaviors.
- Blue fields on filters and colors work from a list.
- Green fields on filters and/or colors provide a range/ scale based on a value's Min/Max

Calculated Fields and Parameters

- Calculated fields create new fields from existing ones.
- Calculated fields can be groups into folders.
- Parameters are dynamic and used for measure/ sheet swapping.
- 3 steps: *1.* Create parameter *2.* Show parameter . *3.* Use parameter
- Embed a parameter into a calculated field to filter using it.

Knowing Granularity

- Ellipse denotes more detail added to view in the Marks card.
- A dimension field on detail can make a view more granular.
- Blue fields on Rows/Columns builds headers for a table.
- Granularity and aggregation work opposite of each other.

Dashboards

- Related charts to answer questions and tell data stories.
- Format titles, remove grid lines and limit row banding.
- Use actions for filtering, interaction, navigation and drill-down.
- Mastery of containers for structure and sharable templates.

Best Practices

- Use colors to highlight insights, outliers and for impact.
- Neutral colors and white space help with design and flow.
- Duplicate sheets to iterate further or duplicate as a crosstab.
- Pre-attentive attributes and sorting increase speed to insights.

MORE COMPLEX CHARTS

Control Charts

- A chart as a graph to study how a process changes over time.
- Visually monitor process stability and control.
- Distribution bands pull from measured outcomes.

Pareto

- Roughly 80% of the effects come from 20% of the causes.
- Combo of bars and line to show where success is coming from.
- The X and Y Axis will be represented as percents of total.

Sparklines and Bump Charts

- Sparklines are condensed graphs showing start and end points.
- Sparklines are foundational pieces of corporate dashboards.
- Bumpcharts show rank and position over time in intuitive ways.

Cohort Analysis

- Cohort Analysis is used to study the behavior or outcomes associated with a group of people over time.
- Date fields on Columns, Value on Rows, Cohort Calc on Color.

Ex. { FIXED [Customer ID] : MIN ([Order Date]) }