

# Excel: Great hammer, lousy screwdriver

5 needs Excel can't solve

Excel's ubiquity often makes it the default analysis tool of choice. Whether one clamors to swivel pivot tables, build macros or invoke the function wizard, the instinct to turn to Excel for analytical tasks is undeniable.

But as useful as it can be, Excel can't do it all.

Against the backdrop of what Excel does exceedingly well is a list where it falls short. In an environment of skyrocketing data volumes and pressure to eke every last drop of competitive advantage out of information, you need to equip yourself with tools to deliver insight. Fast.

There are five paths to get more value from your data, but you need the right tool for the job. For these five areas, Excel is inflexible, time consuming or just simply can't get the job done.

#### 5 capabilities you need that Excel doesn't offer

- 1. Flexible charts. Sure Excel lets you create charts. But when you want to change a chart to add new data or view as a new type of chart, you have to start from scratch. Why re-create the wheel at every turn?
- 2. Dashboards. Who knew? Yes, you CAN make dashboards in Excel. But you probably don't (and dread it if you do) because they're fussy, brittle and take forever. Are you able to see all the factors that impact a question in a single place?
- 3. Lots of data. A measly million rows and you hit a brick wall. A couple dozen calcs to run and you're out getting a coffee while you wait. There are tools that handle this much data and more – while Excel warms up.
- **4. Real-time data exploration.** It's never fun not to know the answer. Despite attempts to build a perfect model that anticipates every question, the reality is you can't. So set yourself up to answer as you go, not read the minds of others.
- **5. Maps.** Nope, not even standard issue on Excel's line-up of chart types. Can you afford to miss the "aha!" factor of seeing your data on a map?

Tableau addresses these gaps, delivering insight you need by providing a new addition to your analytical toolbox.

Designed from the ground up to support visual analysis at the "speed of thought," Tableau is used in industries, departments and companies of all sizes to get data insight that Excel can't deliver. With an intuitive user interface and the ability to tap directly into nearly any data source, Tableau is transforming the way even the world's most complex, demanding data environments are shedding light on their data quickly, easily and with massive impact.

# Charts that work with you, not against you

Does this scenario sound familiar?

You finish up your analysis, confident you know just the chart to show in an upcoming presentation. You've taken care to arrange your data so you can create a nifty Excel chart. You click through a bunch of steps and make the chart. It looks ok.

But then you realize you need to add another column of data. Or, now that you see the graph, you realize something is off and you have to re-do a calculation. Perhaps the chart doesn't show the answer you expected when you saw the numbers. And now you have to start over.

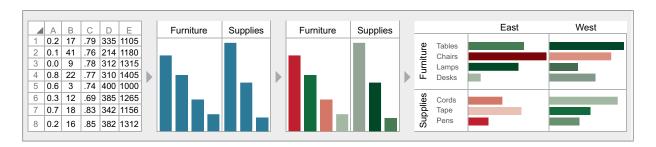
There are two problems with this scenario. First, it's a terrible waste of time. Second, by forcing you to make your chart after your analysis is complete, your ability to learn as much as possible from your data is inherently limited.

It's the very act of viewing your data in charts in an iterative fashion, not relegating it to an output after your work is complete, that takes analysis to a whole new level. However, creating charts in Excel is so onerous that you aren't likely to bother with this approach.

Tableau equips you to create charts quickly and easily – adding data, modifying calculations and changing scenarios on the fly. The result is that you see the implications of your analysis as you go, informing you

Figure 1: Interactive charts reveal more insight.

Using a tool that lets you analyze with charts – not just pivot tables – reveals important insights quickly. With a few clicks, for example, you can reveal significant profit challenges in the East region within your supplies category suggesting the need to start answering questions about what's going on there.



along the way of what your data reveals. With this capability at hand, seeing your data becomes a fundamental dimension of your analysis, not simply the output of some spreadsheet work.

## 2 Dashboards with a drag and a drop

When was the last time you had enough time to enjoy the daily newspaper, much less digest all the key factors impacting critical decisions at work?

Assembling relevant information in one place so you can have focused, smart discussions is invaluable. (No, a pile of spreadsheet printouts doesn't count as putting all relevant factors in one place.) Yet creating a dashboard where salient information can be considered in one interface is a step that most avoid. Why? For some, it's because creating a dashboard carries the assumption that a painful, long IT project is the only path. For others who might turn to Excel, dashboards are so arduous they are avoided at all costs.

Tableau lets you create dashboards quickly, using the same drag-and-drop interface that makes creating individual charts and graphs intuitive and meaningful. Establishing filters and drop downs that are easy to create and navigate makes it easy to interact directly with your information. Not only do the dashboards reveal telling relationships between key analyses, Tableau lets you drill down in real-time to specific data

points and calculations to answer questions that are raised by seeing your information in one place.

Adding dashboards to your analysis toolkit equips you to consider all relevant factors for your decisions in one place. Forget about development queues or tenuous Excel features and put the power of creating dynamic dashboards in your own hands.



Figure 2: Dashboards mean you don't settle for one piece of the puzzle.

If you're not assembling critical elements required to answer a question in one view, you're ability to come up with an insightful answer will be limited. Creating dashboards quickly and ensuring they can be updated with current information as needed is essential to making them part of your daily decision making process.

"The predominant reason why we have been using Tableau and have had success with it is because it really allows us to dig into the data in a way that you typically cannot do using a tool like Excel"

"I would say we're producing around double with Tableau what we were before with the same number of people. So in terms of savings for the organization and efficiency for my team, the effect has been really valuable and extremely profound."

– Dana Zuber, Wells Fargo

### 3 Size and speed matter

There was a time when a million rows worthy of desktop analysis seemed unthinkable. Not anymore.

Social media, transaction data, customer records and web analytics are just a few examples of the mushrooming data that push beyond Excel's capacity limits every day. Handcuffed by these boundaries, Excel users find themselves forced to use subsets of data for analysis. Does it make sense to be confined to these parameters and have to determine which data doesn't need to be included before you even begin?

And whether you're filling Excel to its breaking point or have smaller data sets, running sophisticated macros and calculations in Excel can often bring the program to its knees.

You are too busy to spend cycles sorting out which set of data you can live without or budgeting time to refresh your calcs.

Tableau gets rid of these restrictions, letting you analyze as much data as you choose to dig into. With the flexibility to analyze your data through a live connection to the data source or within Tableau's own fast data engine, size no longer matters. Depending upon your data sources and goals, you have the flexibility to match your need for rapid analysis on data of any size for your environment.

# The power of "where." Add maps to your analysis

You can't get cup of coffee much less plan a trip across town to a new restaurant these days without pulling out a device of some kind and looking for a map. Why? Because it matters. And because we can.

Seeing information on a map – whether it's a theater downtown or finding your next customer's office makes a difference. We make informed choices about time and resources. We explore paths not previously seen. We consider alternatives when the map tells us something we didn't expect.

Adding maps to your analysis toolkit will do the same for your data.

Tableau instantly recognizes geographical data. Whether your data includes a list of country names or postal codes in France you'll be creating maps in a matter of clicks.



Figure 3: Include maps in a snap.

Seeing your data on a map brings a level of understanding that makes an impact no pivot table could hope to achieve. In this example, U.S. obesity data quickly shows that the interior areas of California face higher obesity rates than counties on the coast, instantly showing where a campaign to educate the population about healthier eating should be focused.

By mapping your data, you'll reveal patterns – from product profitability to customer penetration and everything in between – to inform your decisions and guide next steps. Are you really going to be able to see how your distribution channel is penetrating across three product categories throughout the country and their respective margins in an Excel table or bar chart? No. But in Tableau, you can.

# 5 Smart people exploring data together

"I'll get back to you on that."

How many times have you heard these words uttered in a meeting? It seems that no matter how much you think ahead to the questions that might come up about a piece of analysis, there's always one that's not accounted for. Sure, you might bring a back-up binder filled with related spreadsheets printed out, but

"When I was learning Tableau, I plugged data in that I'd been analyzing for the prior two weeks. I was able to make it to the same point in Tableau in two hours. ... "

".... I had the same graphs and I was starting to explore and filter in ways that I had never been able to do before in Excel."

- Steve Knutzen, Seattle Children's Research Institute

discussion typically moves faster than your ability to pick through that stack.

Throw away the printouts. Leave the binders behind. In fact, you might find you don't even need that PowerPoint deck. Tableau is designed to let you answer questions in real-time, getting down to the most minute levels of detail with a couple of clicks.

Does your vice president want to know what happens when you combine revenue from a set of products? Group them together and check it out. How about the director who wants an explanation about some unexpected outliers on a chart? Lasso those points and dig in to reveal the source data. What about a sales manager who wants to understand why the Northeast region is exceeding quota and the West is woefully behind? Filter by region to see which product sets are selling and which aren't. And do it right in the meeting, in seconds.

Opening up the possibility to have real-time collaboration brings the power of a room full of smart people to a whole new level. Equip yourself – and your team – with a tool that lets you drive discussions and decisions with your data instead of relegating the answer to a follow-up meeting next week. And bring a projector, because everyone is going to want to see this.

#### Add Tableau to your analytical toolkit

There's no doubt that Excel is an outstanding analysis tool. But it's not equipped to do everything you need to get the most out of the mounting piles of data that have the potential to unlock significant opportunities for your organization.

Tableau offers capabilities that extend your analytical toolkit in ways that bring insight and impact quickly and intuitively. See for yourself what Tableau can bring to you. *Download the full-featured trial*, grab one of your favorite data sets (or use the sample provided) and dig in. And for that next meeting? Don't bother bringing donuts – their jaws are going to drop all on their own.

#### About Tableau

Tableau Software helps people see and understand data. Ranked by Gartner in 2011 as the world's fastest growing business intelligence company, Tableau helps individuals quickly and easily analyze, visualize and share information. With more than 6,500 customers worldwide of all sizes and across industries, Tableau is used by individuals throughout an organization, in an office and on-the-go. See the impact Tableau can have on your data by downloading the free trial at <a href="https://www.tableausoftware.com/trial">www.tableausoftware.com/trial</a>.