



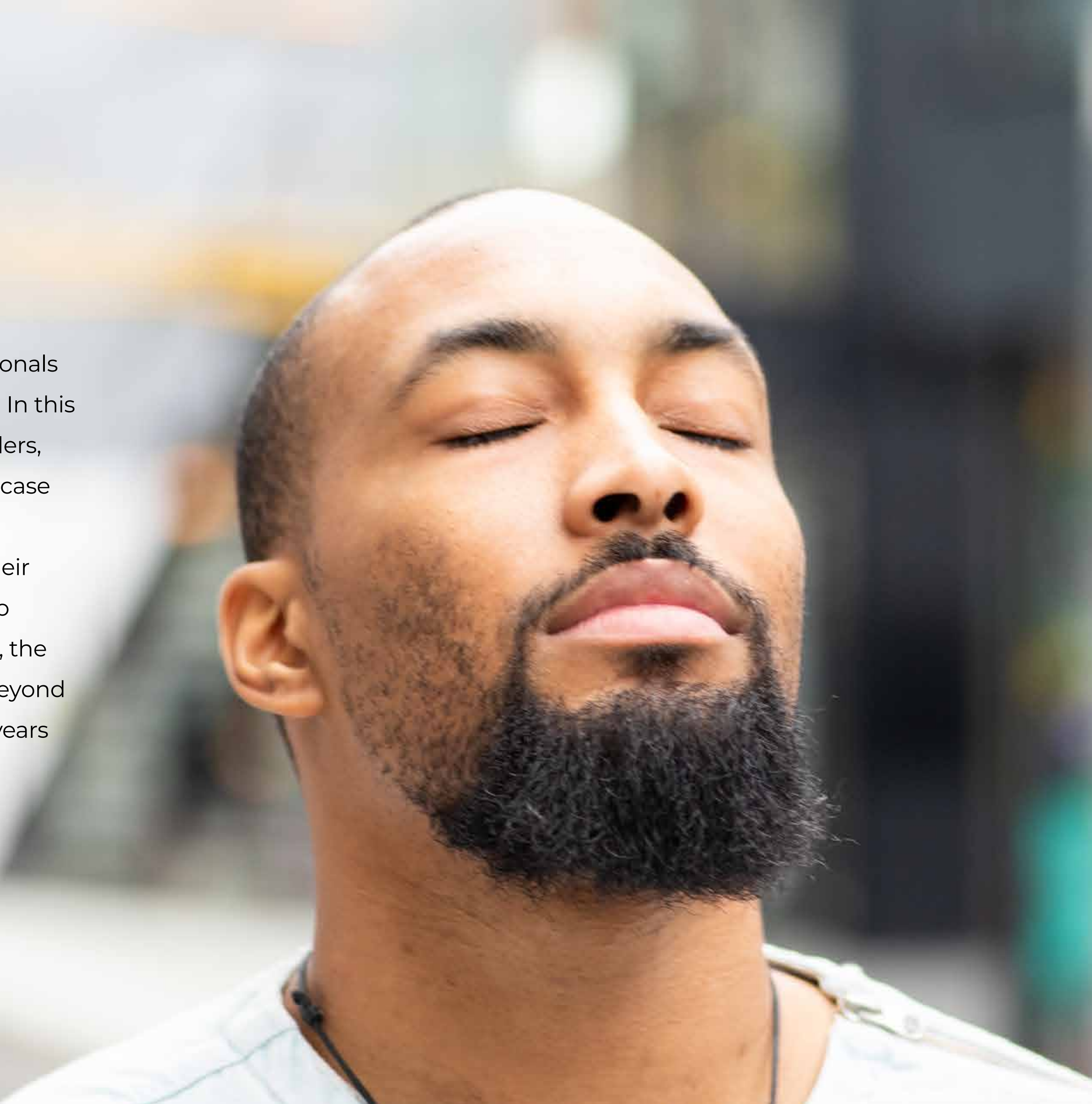
alteryx

Data Innovators in Finance, Tax, and Audit

Five stories of companies unleashing data innovation in the office of finance — and the benefits they experienced as a result.

Embrace the Present Moment

Data science transforms how finance professionals do their work in companies around the globe. In this book, you'll read stories from auditors, controllers, business leaders, and tax professionals — real case studies about how some of the biggest, most reputable companies in the world innovate their processes in finance. For business leaders who rely on finance teams to guide their decisions, the tools and insights available to you today are beyond anything that was available even a few short years ago. It's an exciting time to work in finance.



Three Opportunities for **Data Innovation** in Finance

1. Far Better Financial Projections

The process most companies use to create their financial projections has changed very little over the years. Most simply rely on internal data projected forward. If revenue grew 10% last year, a company will project 10% growth for this year. It's the same with expenses, taxes, payroll, and most business projections. But what if something external happens? What if interest rates change? What if elected officials raise or lower taxes? For the first time, companies are beginning to include these external factors into their revenue and expense projections.

2. Tax Compliance Under Wayfair

The Supreme Court's Wayfair decision imposed a tremendous administrative burden on any company selling anything to anyone out of state — usually as part of an online sale. Companies must now stay abreast of the 45 different states with sales tax, including reporting requirements, payment, due dates, and thresholds for each state. The burden is large, but so is the opportunity. It's a perfect situation for innovative data.

3. The End of Sampling for Audit Teams

Audits often rely on a random sampling of data. But what if you could run all your data through an auditing model and identify only those transactions or data points that set off red flags? In this book, you'll read two stories of companies doing just that: analyzing their entire data sets — not just a sampling — as part of their internal auditing process.



TABLE OF CONTENTS

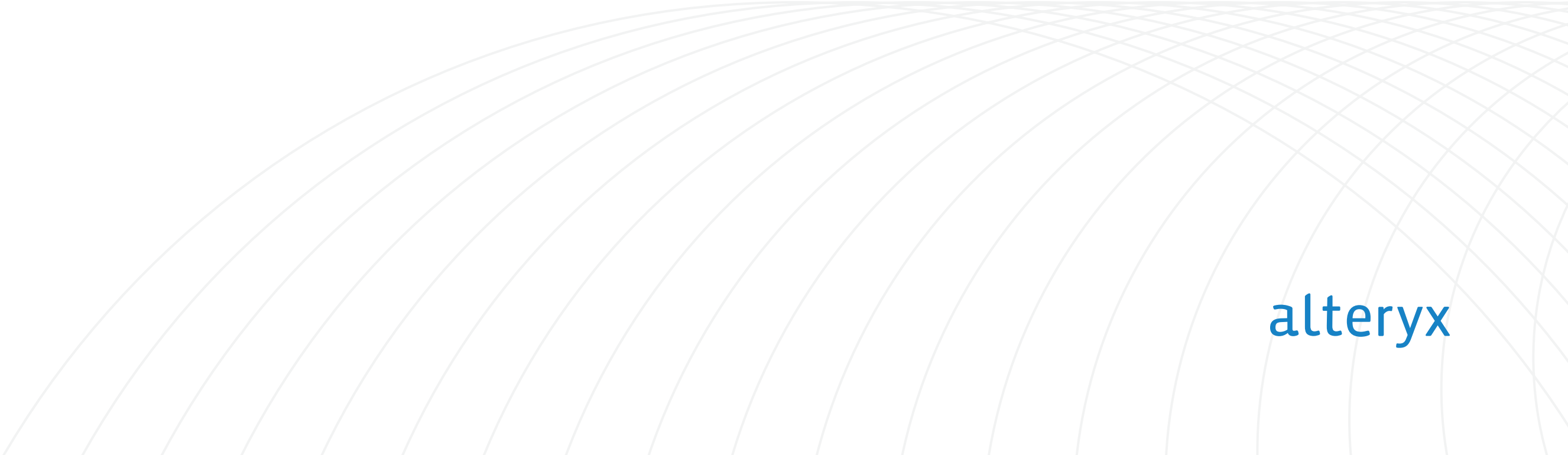
Cetera Financial 05

Thomson Reuters 09

Grant Thornton 13

Aetna 17

Carnival 21



Cetera Financial Creates Better 5-Year Forecasts





“Alteryx pushes our analytics from playing checkers to playing chess.”

Michael Pontoon

Director of Analytics at Competitive Analytics

Cetera Financial Goes
Beyond Traditional Data
Sources to Build

5-Year
revenue + expense forecasts

Executives at cetera are
now empowered with
dashboard-based revenue
and expense models.

INDUSTRY

Financial Services

DEPARTMENT

FP&A



1. Escape From Spreadsheets

Cetera is one of the largest independent financial broker-dealers in the U.S. Like many companies, Cetera had been using a spreadsheet-driven analytics process to produce its annual five-year expense and revenue forecasts, but it was looking for a better way of doing things. William McBride, Cetera's Director of FP&A, wanted to create a reliable and accurate long-term financial forecasting model that included traditional data from within the company and data from external sources.

To help with the new process, Cetera turned to Competitive Analytics, a firm that specializes in building predictive analytics models.

2. Internal and External, Combined

Most revenue forecasts are created using a laundry list of internal factors, but they don't often incorporate external macroeconomic factors. The state of the economy, the housing market, the stock market, and a wide variety of other factors impact the performance of every firm, but they're rarely included in revenue and expense models. "And that's critical, since nothing exists in a vacuum," says Michael Pontoon, Director of Analytics at Competitive Analytics. To create more accurate forecasts, the team created a new analytics engine that considered both internal and external data sources.



3. Visual Data for Decision-Makers


Cetera executives now have access to revenue and expense forecasts based on 10 to 20 internal and external drivers, including economic changes, raw materials, supply changes, inflation, and seasonality.

Company leaders can see comprehensive graphs of actual data, model data, and forecasts. The competitive analytics team also set up a driver overlay page to explain the effect of each driver on the Gross Dealer Concession. “It’s the difference between playing checkers and playing chess,” Michael says.

For more of this story, watch the full Cetera Financial presentation: “How To Build Scenario-Based Revenue & Expense Forecasts With Alteryx Predictive Tools.”

[Watch Now](#)



A close-up photograph of a broken glass hourglass lying on a dark, reflective surface. The hourglass is shattered, with several sharp fragments scattered around it. Black sand is spilling out from the broken bulb and filling the lower bulb. The background is a soft, out-of-focus grey.

Thomson Reuters Slashes 24-30 Hours From End-of-Month



“ The workflow processes thousands of month and year-to-date GL line items in 24 minutes per month.”

Cheryl Erickson

Sr. Manager of Finance, Thomson Reuters

New, automated process runs in

24 minutes

The change freed up time during the busiest season of the month.

INDUSTRY

Financial Services

DEPARTMENT

Finance and Accounting

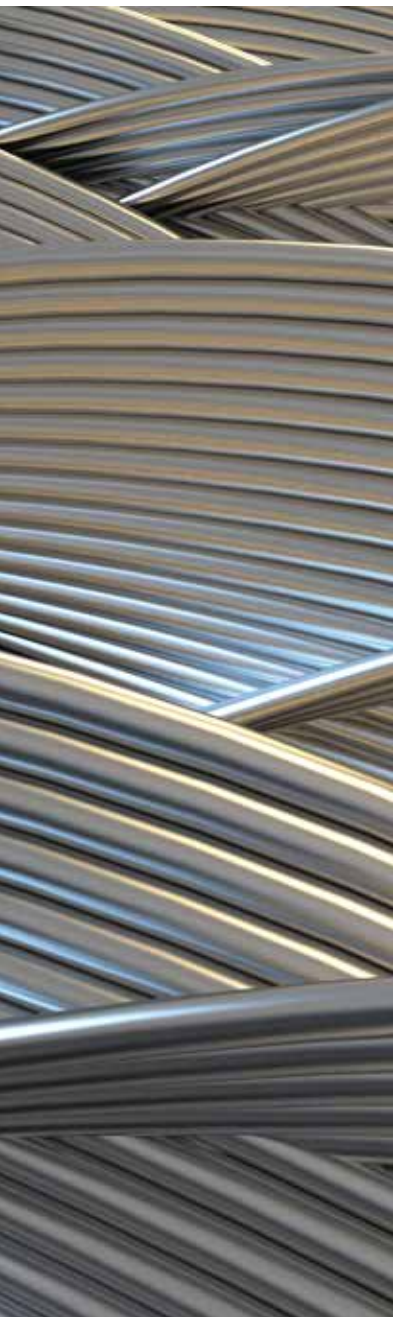


1. End-of-Month Is the Busiest Time of Month

At the end of the month, a Thomson Reuters team would conduct a cost assurance process twice a day for six days (three days prior to close and three days during close) as part of its end-of-month activities. The full process required a total of 24-30 hours to complete, a large commitment during the busiest time of the month for the team. Thomson Reuters decided to pursue automating the cost assurance process. “Because month-end close is a critical time for Controllershship ... the goal was to automate the process as much as possible,” said Cheryl Erickson, Senior Manager of Finance for Thomson Reuters. The team also wanted to “remove the pre-analysis work from the hands of the end user, allowing their time to be better spent on analysis.”

2. Goodbye Manual Work; Hello Automated Workflows

The team created a repeatable workflow that loads GL line item data into Alteryx, then performs all the analysis steps that used to be done manually. This removes the need for anyone on the team to do pre-analysis prior to the workflows. The final output is written into macro-enabled worksheets using an “Overwrite sheet/drop” method.



3. Eliminating 24-30 Hours of Work Per Month

The Controllershship team can now focus on value-added activities and analysis rather than data wrangling. Oracle report scheduling means data is available and ready when needed. The workflow completes the postquery process on thousands of lines per month and YTD GL line items in 24 minutes a month. As a result, the team no longer has to spend 24-30 hours of work per month on the cost assurance process. Instead, it's complete in less than 30 minutes.

Looking for more stories about innovative analytics in finance? Read our use case: Financial Services Organization Risk Analytics.

Read Now



A photograph of a business meeting. Two people are seated at a wooden table. One person, wearing a light blue shirt, is holding a black pen and pointing at a document. The other person, wearing a dark shirt, is also pointing at the document. The document features a map of the United States with some states highlighted in orange, and a circular chart with three segments labeled '20%', '40%', and '60%'.

Grant Thornton Builds Wayfair Sales Tax Analysis Tool



“ [State sales tax] is a massive compliance burden for businesses, especially if you’re a small business or like a two-person tax department.”

Alex Schmitt, CPA

Senior Associate, Grant Thornton

Grant Thornton has used its model with over

200 companies

relieving a tremendous administrative burden.

Companies could now be liable for state sales tax in up to 45 states.

INDUSTRY

Accounting

DEPARTMENT

Finance and Accounting



1. A Compliance Challenge: 45 States

Just five states don't charge sales tax, leaving 45 that do. Of those, many have thresholds for when taxes are owed or not. They have different filing dates, requirements, payment guidelines, and tax rates. And they're constantly changing as states amend their laws.

Alex Schmitt, CPA and Senior Associate at Grant Thornton wanted to build an always up-to-date model that kept up with all 45 states' requirements. This model enables Grant Thornton clients to understand when they need to pay taxes or file a return — or when they are approaching the threshold for doing so in any specific state.

2. Wayfair Analysis

Alex and his colleagues built a tool that performs a “Wayfair analysis” using data provided by their clients. The tool creates a visual, color-coded map showing the company's current tax status across the country. “For each state, it shows where they're over current thresholds, where they're approaching thresholds, where they're below thresholds,” Alex said.



3. Tax Compliance, Simplified

Once the right inputs are set up from the client, Grant Thornton's Wayfair Analysis tool runs in seconds, providing an up-to-date view of where the company will need to pay sales tax — and where it doesn't. This relieves a tremendous amount of pressure on both Grant Thornton and its client companies, since they no longer need to manually keep track of sales tax changes in each state.

"By building this workflow and by having this tool developed, I can spend my time researching state laws and keeping the thresholds up-to-date," Alex said. "It keeps us from having to constantly format Excel templates and rerun them over and over again. We've used it for a couple of hundred clients now, at least."

For more on how advanced analytics can help with tax compliance, view our on-demand webinar: "Tax Analytics Efficiency: How to Excel From Worksheets to Workflows."

[View Webinar](#)



Aetna's Internal Audit Saves Millions

Automation allows Aetna's
internal audit team to prevent

millions

in potential overpayments.

Robotic automation completely
changed the internal audit
process and saved the team five
to eight days per audit.

INDUSTRY

Health Insurance

DEPARTMENT

Internal Audit

“ Instead of testing a sample of
all transactions, Alteryx has
allowed Aetna to test all 10 million
transactions to ensure they
address all risk.”

Sundar Victor

Sr. Manager Data Science, Aetna

Rahul Sharma

Data Analytics Manager, Aetna

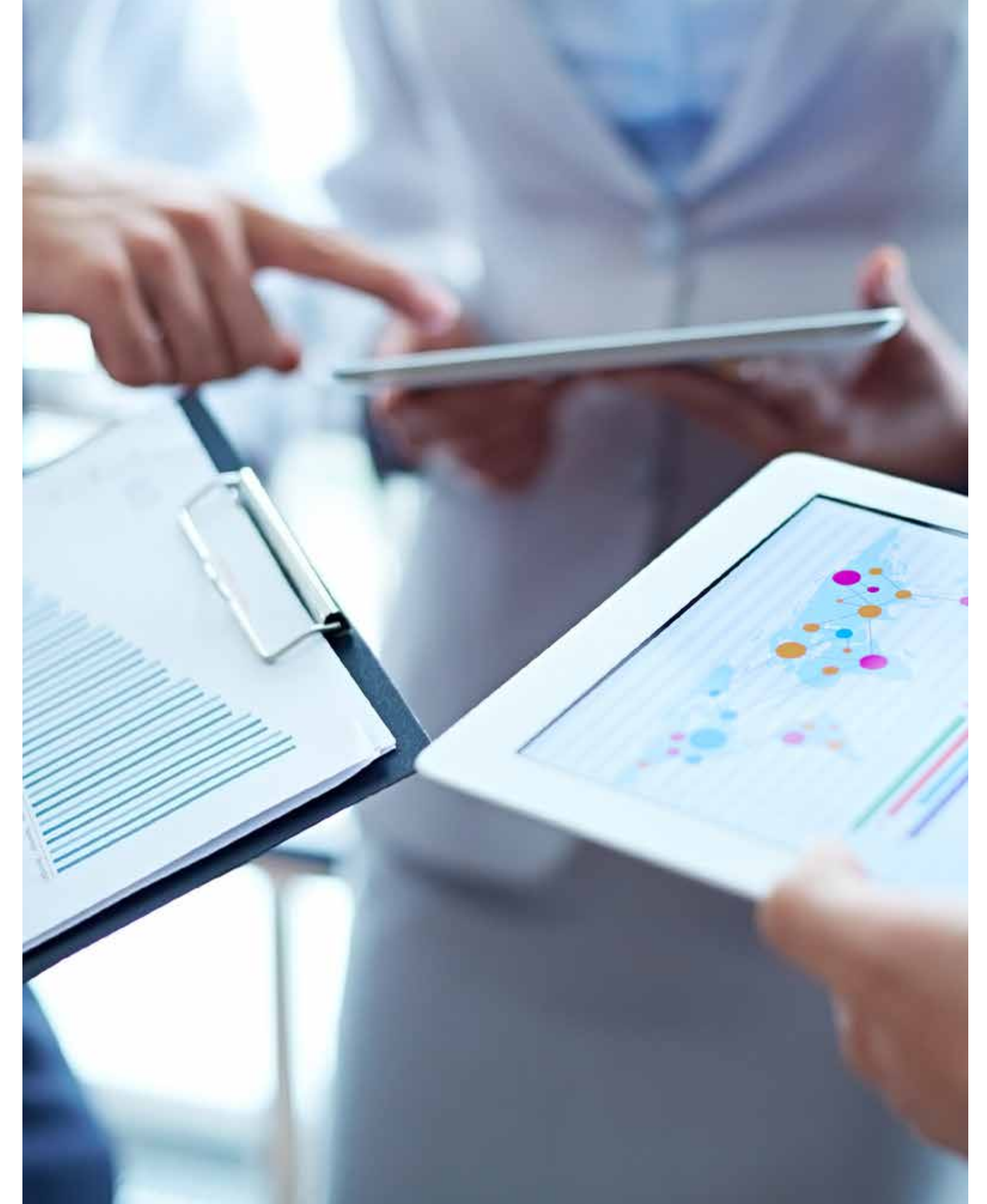


1. Audits Are Time-Consuming

Internal audit processes are time-consuming, tedious, and incredibly labor-intensive. A key step in the traditional audit process is control assessment, where auditors test a sample from their dataset. Aetna's leadership was concerned about this step. Specifically, they were unsure if the audit team was able to produce a truly representative sample. The time commitment was also extensive, requiring two to six months. The internal audit team determined to improve the sampling process and automate the workflow to save time.

2. No More Sampling

The team established a data analytics audit process that incorporated a variety of data analysis techniques. For example, the team built risk models to produce a list of the riskiest transactions. This eliminated the need to take a random sample of Aetna's data. Instead, the model tests all 10 million transactions, identifying only those that appear suspect. The team also automated many of the reports that were formerly produced manually. They also built an automated self-service analytics server called ELI Robot, removing the need for the data science team to create dashboards for auditors. "Auditors can use the self-service dashboard for any information on the current audit," said Sundar Victor, Sr. Manager Data Science and Rahul Sharma, Data Analytics Manager. "The dashboards are built in under five minutes and the user receives the information via email in near real-time."





3. New: Continuous Auditing

By automating many parts of their process, Aetna’s internal audit team increased the accuracy of their audits while decreasing the amount of labor needed to complete them. Workflows in Alteryx gave visibility into the data process being used, allowing auditors to gain insight before the claims process began. As a result, Aetna has completely changed how it does internal auditing. “Aetna is now performing continuous auditing by automating end-to-end process review instead of manual six-month process,” Sundar and Rahul said. “Previously, when Aetna would go through an audit, they typically wouldn’t revisit the business process until nearly three years later.”

For more on how companies are using Alteryx to innovate in their auditing departments, view the on-demand webinar: “Alteryx Your Internal Audit Strategy.”

Watch Now





Carnival Cruises Vendors For Fraud Risk

New, automated
process runs in

60 seconds

Machine learning model assigns
and maintains a fraud risk rating
for every vendor.

INDUSTRY

Hospitality and Travel

DEPARTMENT

Internal Audit

“ Using this automated audit process, the team was able to identify the riskiest vendors and/or where they should perform additional audit procedures They are no longer just pulling a random sampling of 30 vendors.”

Daniel Bukowski

Manager, Carnival

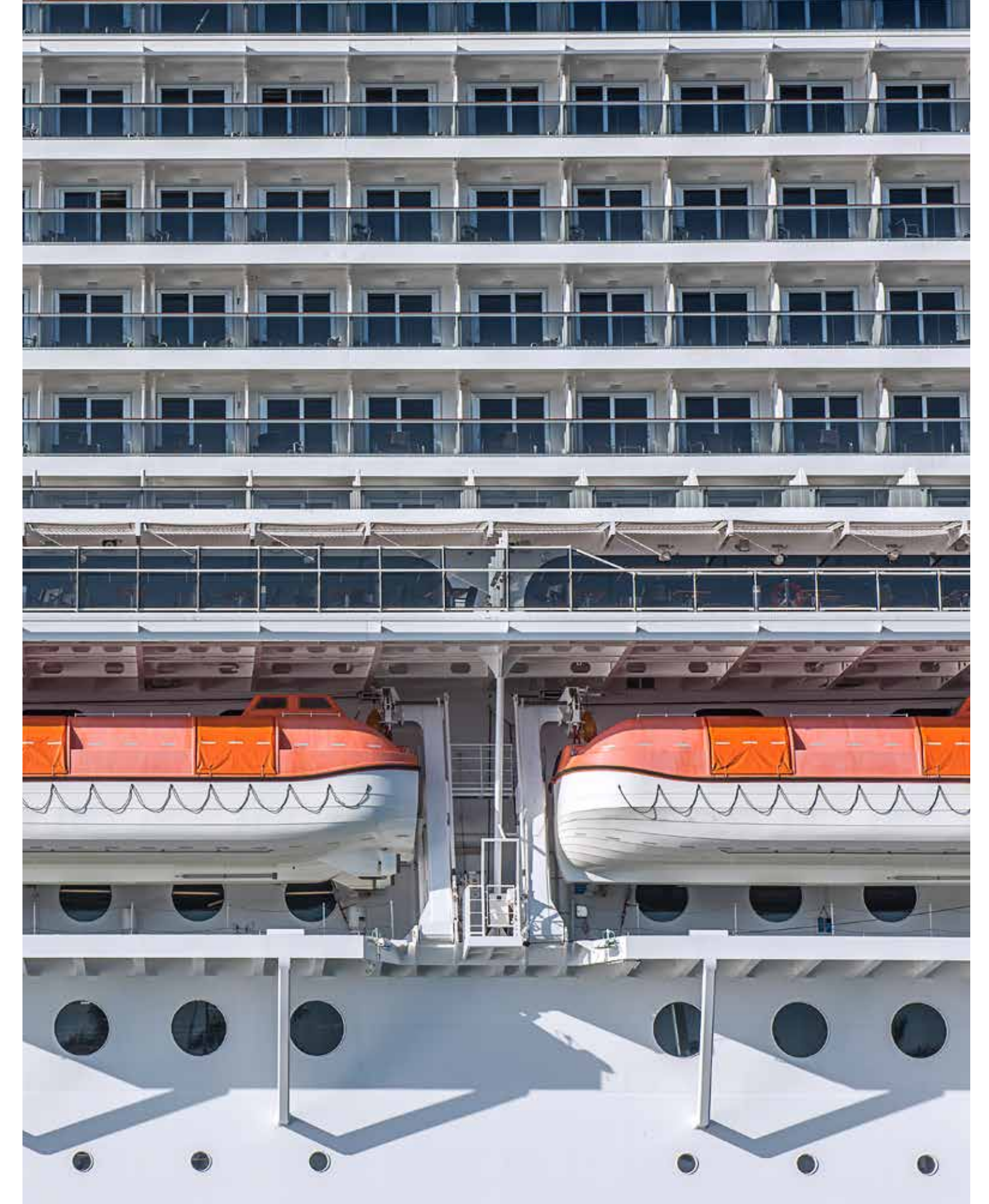
1. The Problem With One-Time Investigations

Following a fraud investigation involving a Carnival vendor, the internal audit team wanted to identify other high-risk vendors working with the company. Initially, the team decided to pull a one-time data sample from Carnival's operating reports, perform an analysis, then provide recommendations for further investigation. Before this plan was put into motion, the team paused their plan.

A one-time investigation would help them identify fraud risk now, but it wouldn't help them monitor fraud risk at later dates. The team decided to see if they could build a process that was repeatable, instead of a one-time event.

2. A Repeatable Process For Assessing Risk

The team built an automated workflow that monitored fraud risk of vendors on an ongoing basis. In the past, "these procedures were performed manually," said David Bukowski, Manager, Internal Audit at Carnival. "The fraud team was able to convert them into an Alteryx workflow that fed to a machine learning platform." The team was able to review 10,000 "non-PO" vendors, giving each one a risk rating based on 275,000 invoices representing well over \$2 billion in spending.





3. From Multiple Days to 60 Seconds

In the past, this kind of audit was a manual process that could take days. Today, it's an automated workflow that processes in less than 60 seconds. "Data analytics allows us to do more, faster," David said. The automated process enabled the team to drop the threshold for materiality from \$500,000 per company down to \$250,000 or even \$100,000 per company in some cases. "The team can do analysis at a much greater level of detail because they no longer require the time to manually review invoices and documents," David added. Finally, the team can show leadership a workflow that illustrates how the risk ratings were calculated, a much easier process for leaders than reviewing thousands of lines of R script, which is what they did in the past.

For more on how companies are using Alteryx to innovate in their auditing departments, view our on-demand webinar: "Alteryx Your Internal Audit Strategy."

[View Webinar](#)



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Become a Data Innovator

See how modern analytics can transform your finance teams.

Ready to get started? Try advanced analytics for yourself.

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