

# GROW

## YOUR ANALYTICS MATURITY

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Gain and Sustain a Competitive Edge

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# FROM DATA TO ACTION

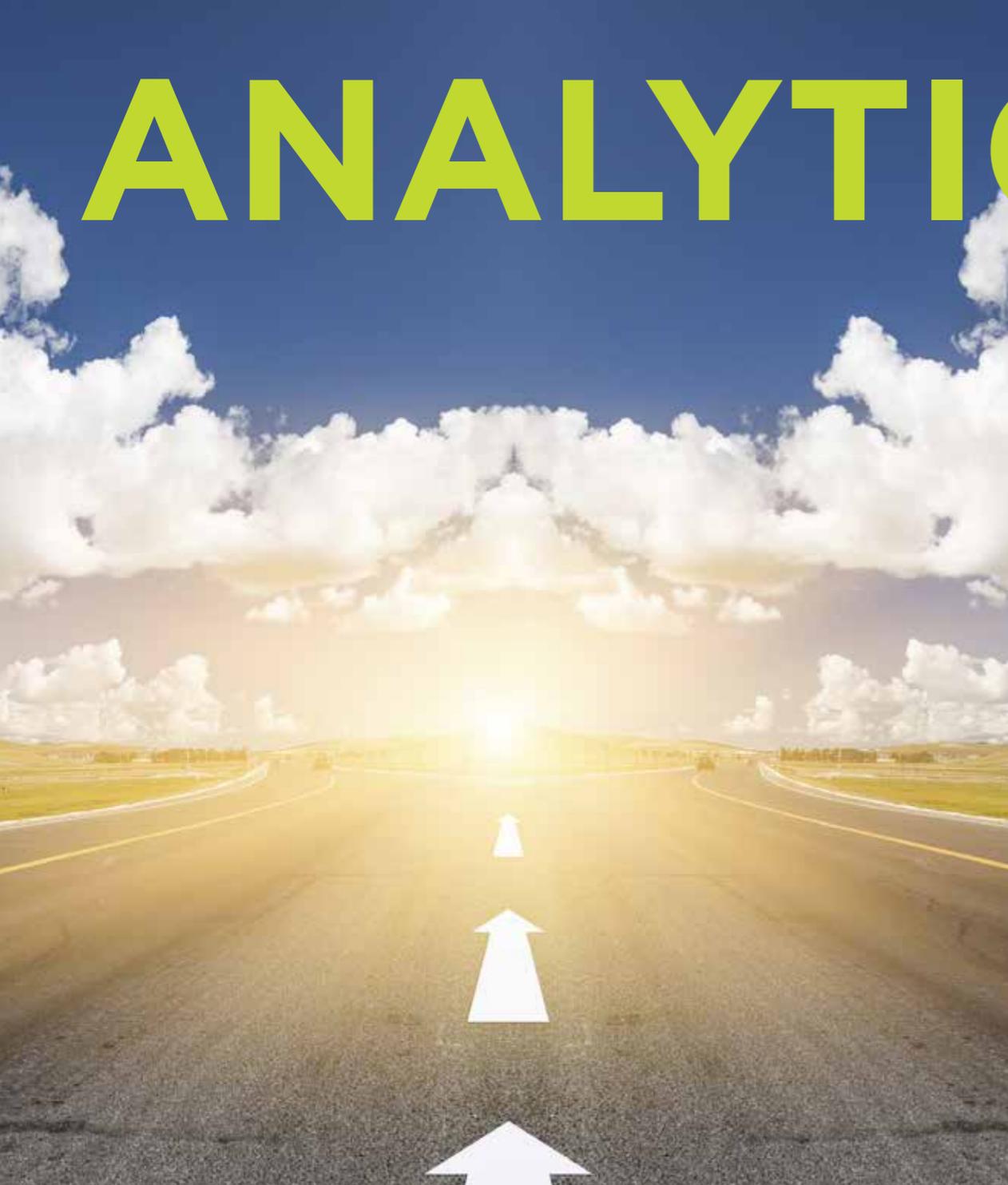
**YOU'VE HEARD THE  
BIG DATA BUZZ. WE'RE  
SWIMMING IN MORE  
DATA THAN EVER.**

But it's not about the amount of data, the different types, or how fast it gets thrown our way.

It's about what we \*do\* with that data and the speed at which we do it. The decisions we make. The actions we take. How fast we act. Creating business success. Winning the market.

So how do we get from raw data to instant insights? From insights to immediate action? How do we wield data as a competitive weapon?

**Welcome to the Age of Analytics.**

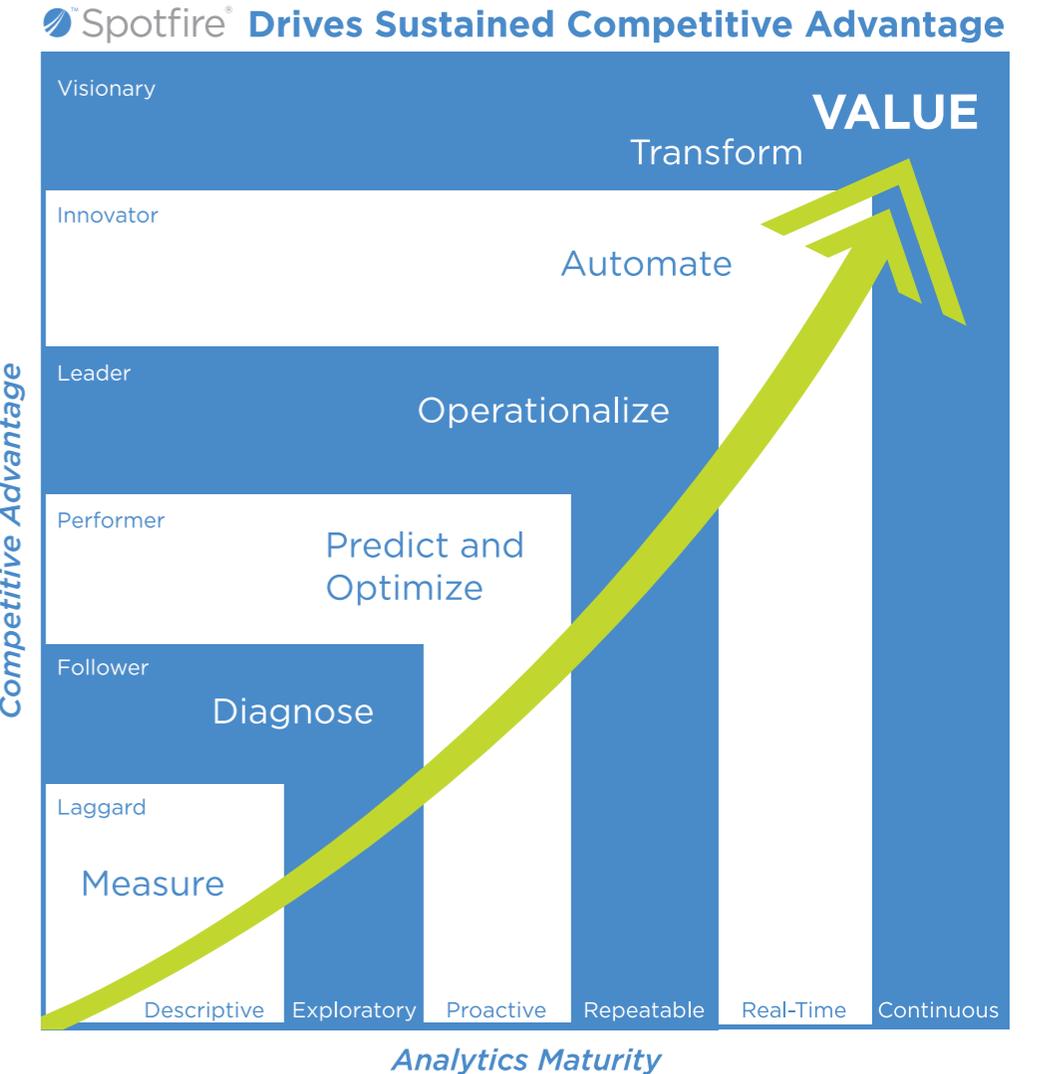


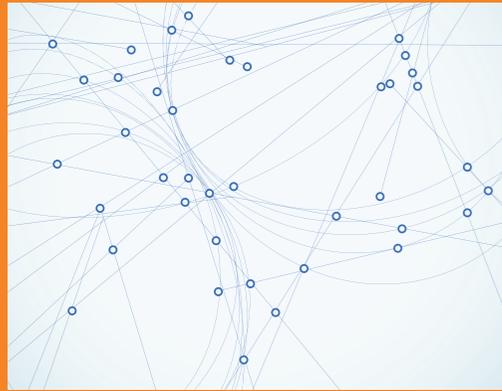
# ANALYTICS. IT'S A JOURNEY.

The truth is, if you want to compete in today's fierce climate, business intelligence reports and dashboards simply won't give you with the level of detail and agility you need to make fast, informed decisions. If you want to win the market, analytics is the key differentiator that can help you to gain a competitive advantage. Developing analytics maturity will help you sustain that advantage!

It's a journey. You need to understand past behavior, what is happening now, and make future projections. You want to measure business performance, diagnose root cause, forecast trends and optimize your business decisions. You need to distribute powerful analytics that is easy for business users to use. And further down the line you may also want to advance into event analytics, where a real-time change in business can trigger an automatic analytic application, or you can use analytics to understand data in real time and automate a business decision. Your ultimate goal is to apply analytics to every use case across your organization.

Let's walk through each step in the analytics maturity journey, and provide insights into the capabilities and tools you should consider on each step of the journey.





## Best Practice Capabilities

### Highly Visual

Understand status at-a-glance

### Real-Time

The most up-to-date information available

### Mobile

Accessible no matter where you are

### Personalized

The business \*you\* care about

### No Doubts

A single version of the truth

# MEASURE

## THE BASICS: “WHAT?”

First start with the basics—What’s happening? How are we doing?

Many large organizations have this step covered through traditional business intelligence (BI) reports. Except... most don’t use BI reports anymore. Reports rarely capture exactly what you need, and it takes hours, days, or even weeks for IT to run a new report. Reports become quickly outdated, and people take matters into their own hands and resort to spreadsheets.

The first step to analytics maturity, measure, empowers you with visualization, interactivity, and self-service, so you can quickly make sense of your data. With analytics, you can always have your finger on the pulse of your business, with the knowledge to make fast decisions. The first step analytics delivers the latest business metrics or key performance indicators (KPIs), anytime, anywhere to any device. It can leverage your existing BI systems. The platform allows for personalization so you can stay on top of the changing business conditions that matter most.

Once you have the up-to-date measure of your business, analytics will provide you with a springboard into the next phase of the analytics journey...



# DIAGNOSE

## DISCOVERY: “WHY?”

Once you are alerted to a significant change in business status, you want to take immediate action—to capitalize on the opportunity, correct course, or mitigate the risk. But before you take action, you need to immediately figure out what caused business performance to change.

The diagnose step of analytics maturity is where analytics starts to really shine over static BI reports and spreadsheets. The highly visual, interactive nature of analytics gives you the advantage of speed. You gain immediate insights and see things you just couldn't see in the rows and columns of a spreadsheet. You have the freedom to explore all the different factors influencing a business result. You may easily bring together all the different sources of data you need into a single analysis and quickly investigate. You will examine data at an aggregate level or dig into granular details to discover the answers you need.

Not only will you get answers to your initial questions, but through visual data discovery, often times you will spot patterns and outliers in your data, identifying opportunities and risks you didn't previously know were there. Analytics gives you the agility and power to make more informed decisions at a more rapid rate, speeding your time-to-market. This is where you start to gain an advantage over your competition.

Now that you understand the state of your business and why you got there, the next step to analytics maturity helps you look to the future and make strong plans...



### Best Practice Capabilities

#### Highly Interactive

Drag and drop, point and click visual data exploration

#### Mash Up All Sources of Data

Gain a comprehensive view of your business

#### Self-Service

Always available when \*you\* need it

#### For All Users

Intuitive for business users, rich tools for analysts

#### Highly Visual

Options for both simple and highly complex data

# FORESIGHT: “WHERE TO?”

# PREDICT & OPTIMIZE

The next step in the journey, Predict and optimize, focuses on the future, “Where are we headed?” “What’s the best course of action?” This step is designed for more proactive decision-making and planning. It’s where competitive differentiation really starts to come to the fore.

Predict and optimize is about employing advanced analytics to produce better business

outcomes and reduce decision-making uncertainty. It incorporates predictive analysis to forecast and anticipate trends, statistical modeling to discover meaningful patterns and correlations, and location analytics to geo-enable your analyses.

Beware: some analytics software only offers black-box statistical tools, programming the calculations

for you. This may be all you need for a simple decision. But to build a competitive advantage, you also need to build proprietary statistical models. After all, Coke and Pepsi don’t use the same recipes, and neither should you rely on the same models your competitors use. Choose an analytics solution that offers both pre-programmed and advanced analytics tools to build your secret recipe

statistical models.

Many people feel they aren’t ready for advanced analytics right away. That’s okay—analytics is a journey and it’s important to learn to walk before you start to run. But as you look at analytics solutions, make sure that you choose one that will support all your analytic needs today and into the future.

Advanced analytics of predict and optimize is an essential component to expanding your competitive advantage. The next step in the journey will assist the non-technical user with both basic and advanced analytics tools.



## Best Practice Capabilities

**Competitive**  
Ability to create proprietary models

**Location**  
Geo-enable advanced analytics

**In-line**  
Fully incorporated within the analytics platform

**Extensible**  
Leverage open-source and third-party tools, such as R, S+, SAS, MATLAB

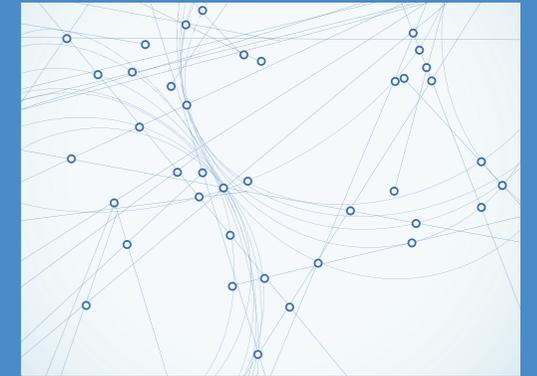
# OPERATIONALIZE

## EMPOWERMENT: “HOW TO?”

To win the market, all business users must be enabled to take immediate, data-driven action. Analytics isn't just for analysts and statisticians—it needs to be baked into your everyday business processes. The question at this step is, “How can analytics become a natural part of business users' workflow?” Operationalizing empowers day-to-day decision-makers with competitive analytics that will help them to make informed decisions, but won't require them to have a Ph.D. in statistics.

Even though we're not all formally trained analysts, we fully understand the context of the business decisions we need to make on a regular basis. Some of us want or need help with the analytic methodology so that we can quickly get the answers we seek without having to create models ourselves. With guided analytic applications and dashboards, analysts can create interactive analyses with up-to-date, sanctioned analytics and statistical models. This puts expertise in the hands of front-line decision makers, analytics as a natural part of the business workflow positioning.

Once all of us are empowered with analytics, the next step is to determine where we can use automation for real-time decisions.



### Best Practice Capabilities

#### Guided

Built-in capabilities to create business workflow into the analysis

#### No Doubts

The latest sanctioned competitive analytic models

#### Self-Service

Available anytime, anywhere; users are always empowered

#### Interactive

Intuitive data discovery

#### Zero-Step App Development

No extra steps to create or publish a guided application



# AUTOMATE

## ACTION: “NOW!”

There is a time-value to data. Some data or events are so important that you must act immediately, or you incur risk or lose opportunity. This is where the automate step of analytics maturity comes into play.

Event analytics allows you to act while data has greatest value, by monitoring, analyzing and optimizing your real-time processes. It involves taking advantage of real-time data—to make decisions and take immediate action. Some real-time events require immediate human intervention to decide on a course of action, for example, a competitor lowers their price in a key market. In this case, the event software detecting

the event can automatically send you an analysis that marries the real-time data generated by the event with contextual historical data. This side-by-side contextual data can help you to immediately determine the best course of action, for example, offer an in-store promotion.

For other real-time events, you already know what action you would want to take, such as for loyal customers who arrive at a sporting arena are the targets for a mobile offer to purchase a jersey in the gift shop. In this case, you can program the technology to automatically take a pre-determined action (send mobile offer) so that once event analytics detects the event (customer enters

the arena), the action is executed.

Not all use cases require immediate action. If you’re making a decision about what to do next month or quarter, then historical data may be exactly what you need. Just keep in mind, the strongest companies are increasingly applying event analytics to new use cases to gain a competitive advantage. So when evaluating analytics software, ensure your solution will provide you with real time capabilities when you’re ready to take this step.

And finally, the last step in the analytics maturity...



## Best Practice Capabilities

### Data-in-Motion

Monitor and analyze streaming data

### Real Time

Trigger an automated analysis or action

### Action-Oriented

Analytics integrated with event processing

### Contextual

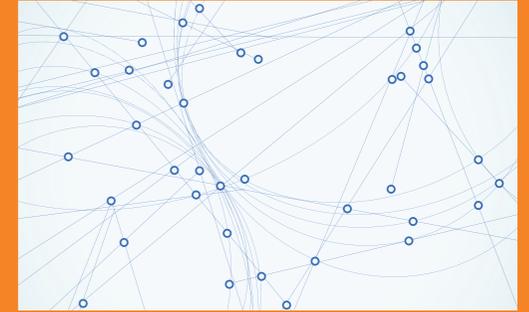
Mash up historical and real-time data side by side

# TRANSFORM

## CULTURAL CHANGE “DATA DRIVEN.”

Over time, you'll settle into the final step on the analytics journey, transform. A data-driven mindset is embedded into the culture of one organization, from the executive suite to front-line decision makers. The knowledge and data you need are accessible anywhere you need them, in your office or on-the-go. You don't need to think "analytics" any more, it's simply a part of who you've become as an organization, built into the everyday work flow. You enjoy a broad deployment of analytics to solve all types of challenges, safeguard from risk, and identify opportunities. You put analytics in practice across all functional areas, and it is continually adopted across new use cases and processes.

You continually look at historic business decisions to constantly refine and perfect best practices and business results. It is through this loop of continuous improvement that competitive advantages you've built become sustainable over time.



### Best Practice Capabilities

#### Enterprise-Class

Scales and extends to large numbers of users and use cases

#### On-Premise and Cloud

Deployment choices to suit various use cases

#### Universal

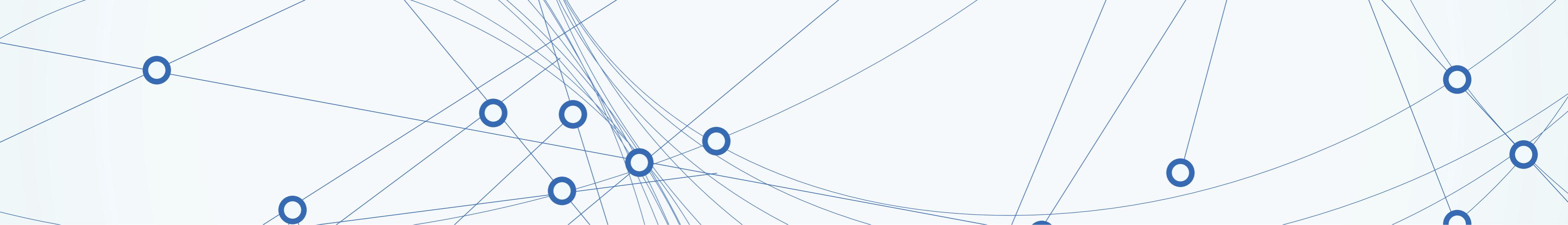
All users, all use cases, all data sources

#### Tailored

Integrates with your security, access governance, and operational systems

#### Self-Service

Always available for end user analysis and decision making



# SUMMARY TABLE

## Measure      Diagnose      Predict and Optimize      Operationalize      Automate      Transform

- Value: Descriptive. Provides insight
- Indicators: Metrics, key performance indicators
- Best Practice: Visual, interactive, self-service, mobile, single version of the truth

- Value: Exploratory. Identifies root cause
- Indicators: All needed underlying details
- Best Practices: Mashup all data sources; interactive, highly visual, all users, self-service, easy-to-learn, collaborative

- Value: Foresight. Identifies trend; provides prescription for plans
- Indicators: Correlation, propensity, forecast, optimization
- Best Practices: Proprietary/competitive, extensible, inline, location aware

- Value: Competitive models broadly deployed
- Indicators: Analytics in the hands of all
- Best Practices: Guided, zero-step app development; sanctioned competitive models; self-service; interactive, collaborative, supports business workflows

- Value: Decisions and action made in real-time while data has greatest value
- Indicators: Streaming data, pre-defined events
- Best Practices: Real time, automated actions, mashup of data-in-motion/data-at-rest

- Value: Sustained competitive advantage
- Indicators: Analytics embedded in organizational culture, continuous process improvement
- Best Practices: Enterprise-class; universal; secure; self-service, tailored

# TRY

# TIBCO<sup>TM</sup> Spotfire<sup>®</sup>

## Business Analytics and Data Discovery

Visualize and interact with your data. Instantly spot and act on insights. Monitor key operational metrics. Mashup all your data and explore freely. Share and collaborate with teammates. Predict future direction. Explore real-time and historical data side-by-side. Use advanced statistics to discover unexpected opportunities and risks. Analytics at your desk or on-the-go. On-premises or in the cloud.

*You can do it all with TIBCO Spotfire.*

In this era of fierce competition and non-stop change, strong analytical maturity will be a key differentiator to give you the insights to make strong decisions and win the market. Spotfire is the only analytics and data discovery platform that can take you every step on this journey to a sustained competitive advantage. We hope you'll get in touch!

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