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Outperform with IBM Business Analytics



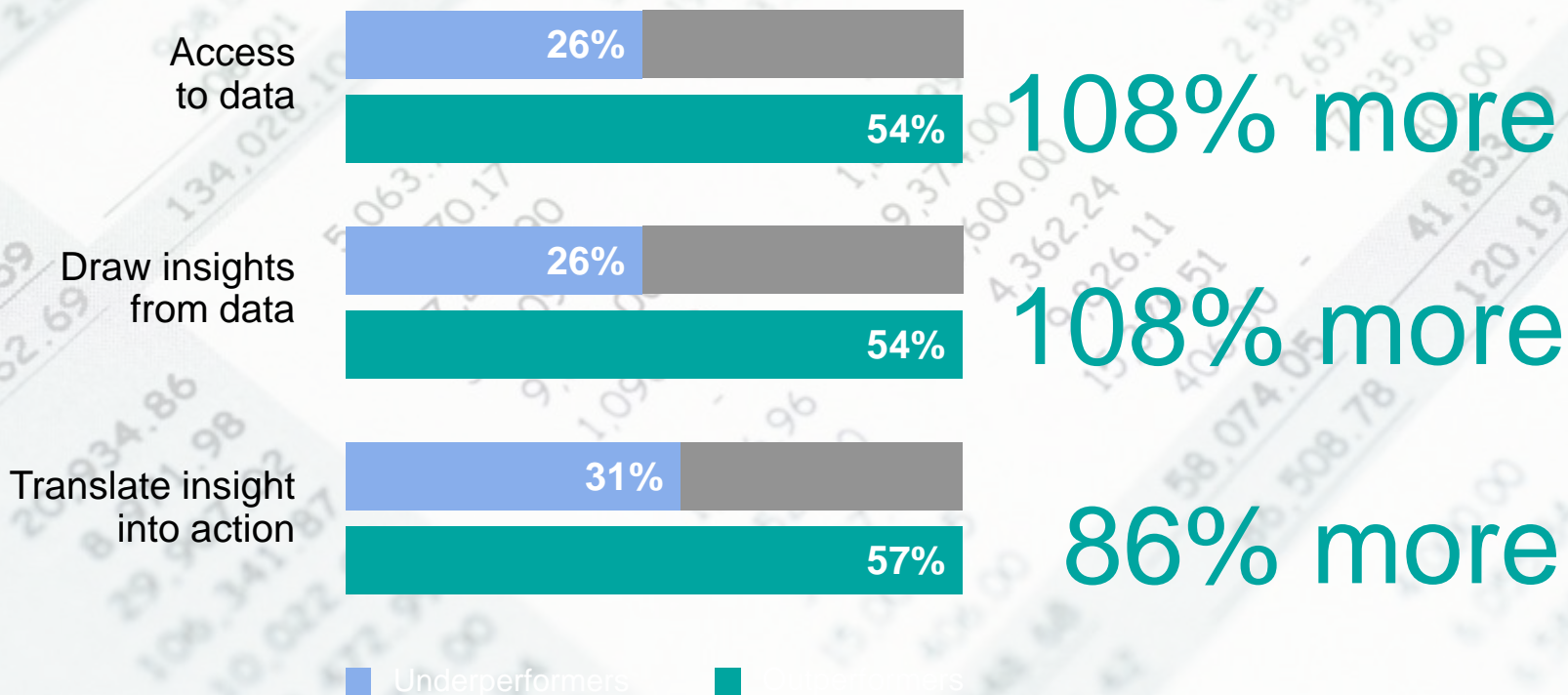
Data is the new “Oil” ...

**In its raw form, oil has little value.
Once processed & refined, it helps
power the world.**



As **Analytics has evolved** from business initiative to business imperative, **Outperformers** are seizing the opportunity

Percent of CEOs who believe their organization is good at driving value from information



Future relevance requires

integrating traditional data with new sources and types of information to power

transformation

1

New insights and new possibilities

2

Process and performance improvement

3

New revenue opportunities

Transaction
Social
Documents
Machine
Application



Big Data

Today's organizations are facing many **DISRUPTIVE FORCES** fueling the need for analytics

1 The emergence of big data

Creating new opportunities to capture meaningful information from new varieties of data and content coming at organizations in huge volumes and at accelerated velocity



2 The shift of power to the consumer

Creating the need for organizations to understand and anticipate customer behavior and needs based on customer insights across all channels



3 Accelerating pressure to do more with less

Creating the need for all parts of the organization to optimize all of their processes to create new opportunities, to mitigate risk, and to increase efficiency

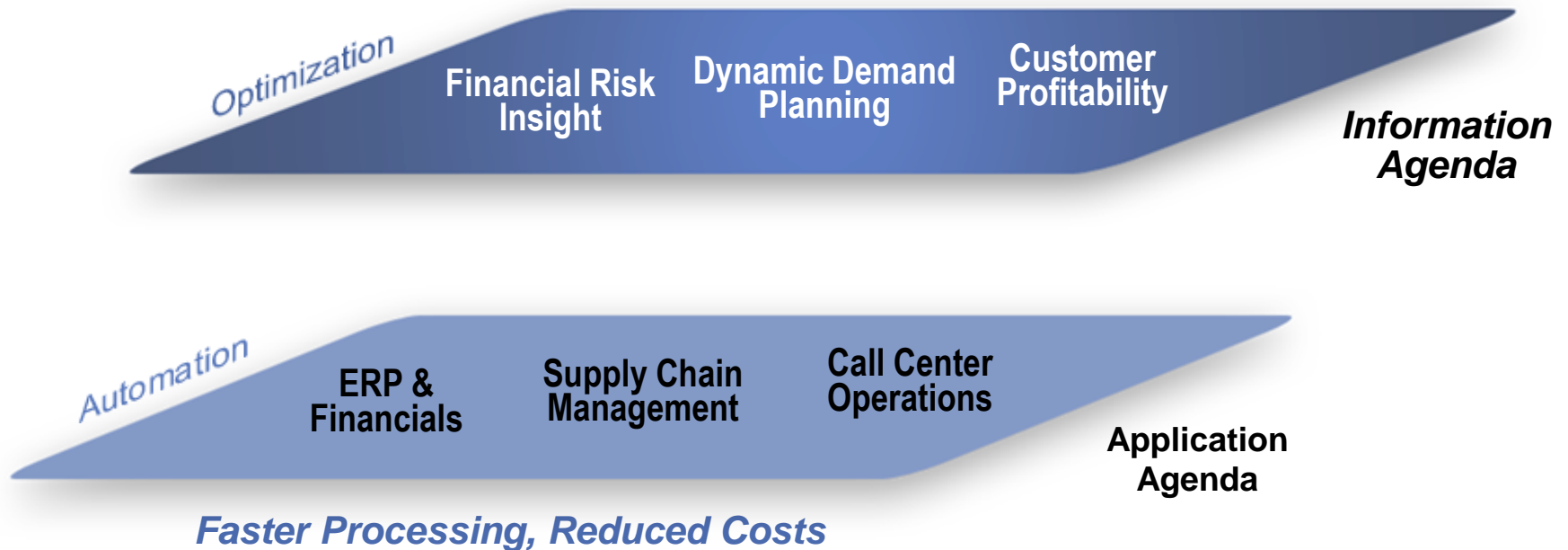


New Investments Increasingly Focus on Optimization

Organizations Striving for Competitive Advantage

Business Optimization Growth
is 2 Times Faster than
Business Automation

Competitive Advantage

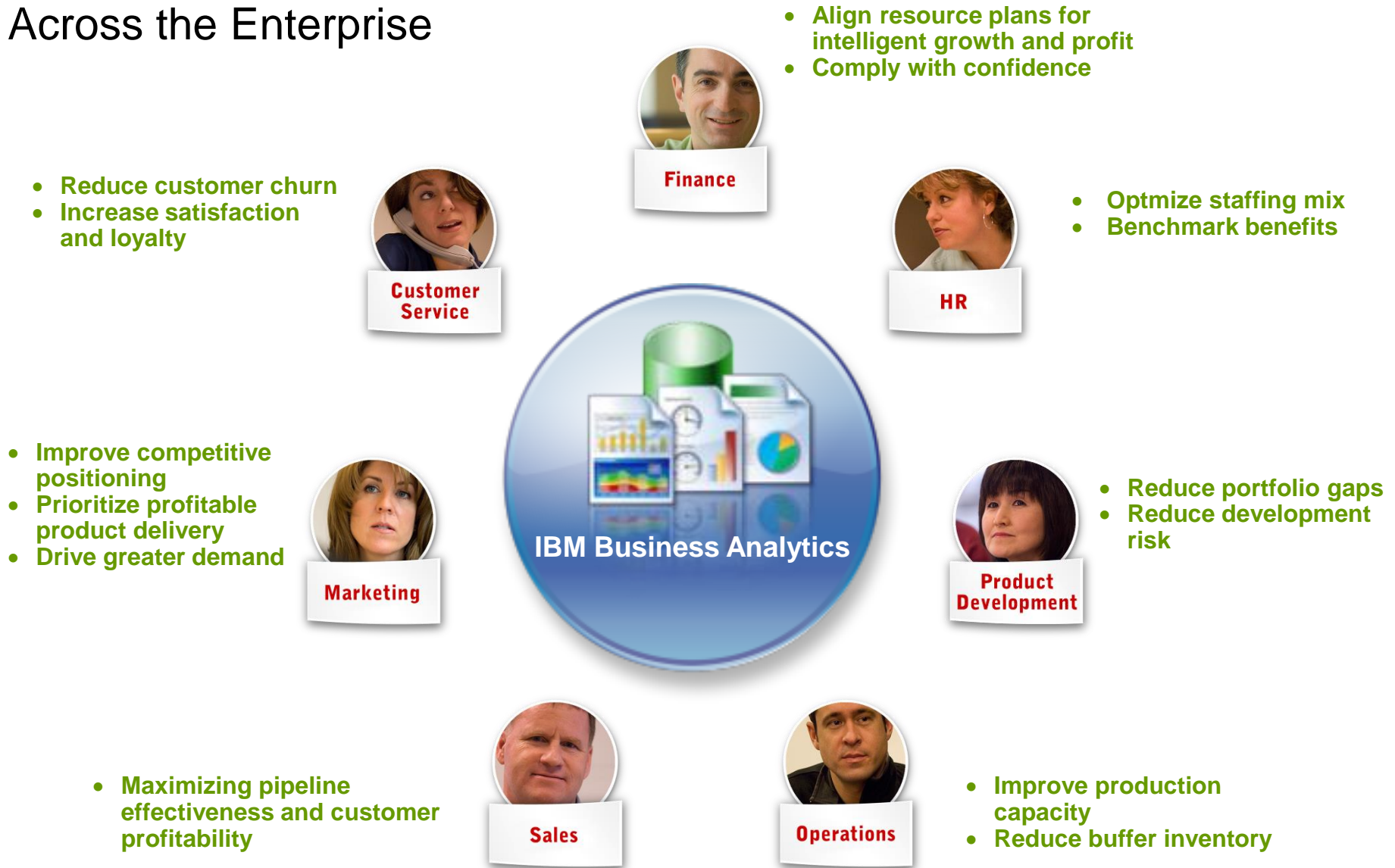


Three Questions for Business Insight

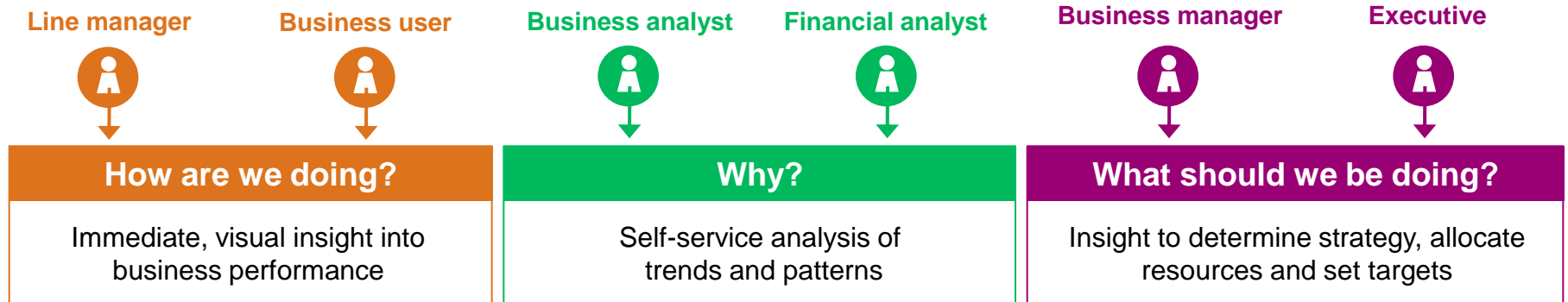


Source: 2010 IBM Global CFO study

Across the Enterprise



Actionable insights to optimize business outcomes



IBM Business Analytics platform
Data-agnostic, service-oriented architecture (SOA) platform



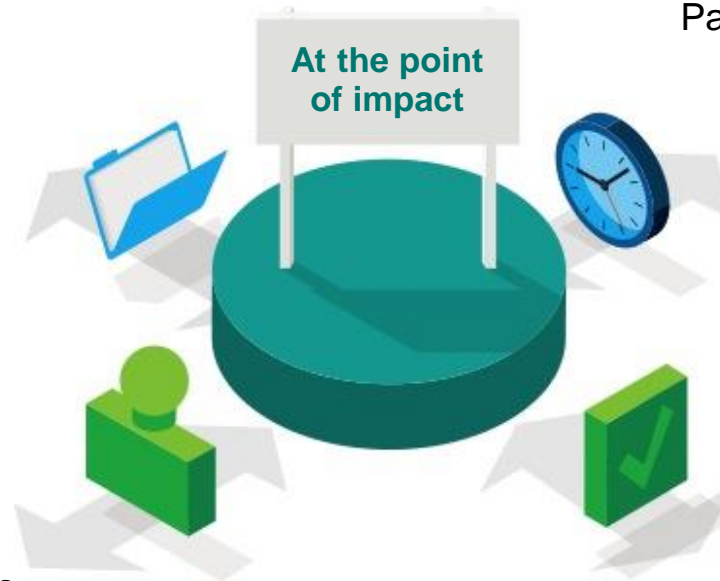
ANALYTIC-DRIVEN ORGANIZATIONS are distinguished by their ability to leverage ...

All information

- All information
- Transaction data
- Application data
- Machine data
- Social data
- Enterprise content

All perspectives

- Past (historical, aggregated)
- Present (real-time)
- Future (predictive)



All people

- All departments
- Experts and non-experts
- Executives and employees
- Partners and customers

All decisions

- Major and minor
- Strategic and tactical
- Routine and exceptions
- Manual and automated

...and focusing on high-value initiatives in core **BUSINESS AREAS****1****Customers**

Examples:

- Advanced client segmentation
- Leveraging customer sentiment analysis
- Reducing customer churn

2**Finance**

- Enabling rolling plan, forecasting and budgeting
- Automating the financial close process
- Delivering real-time dashboards

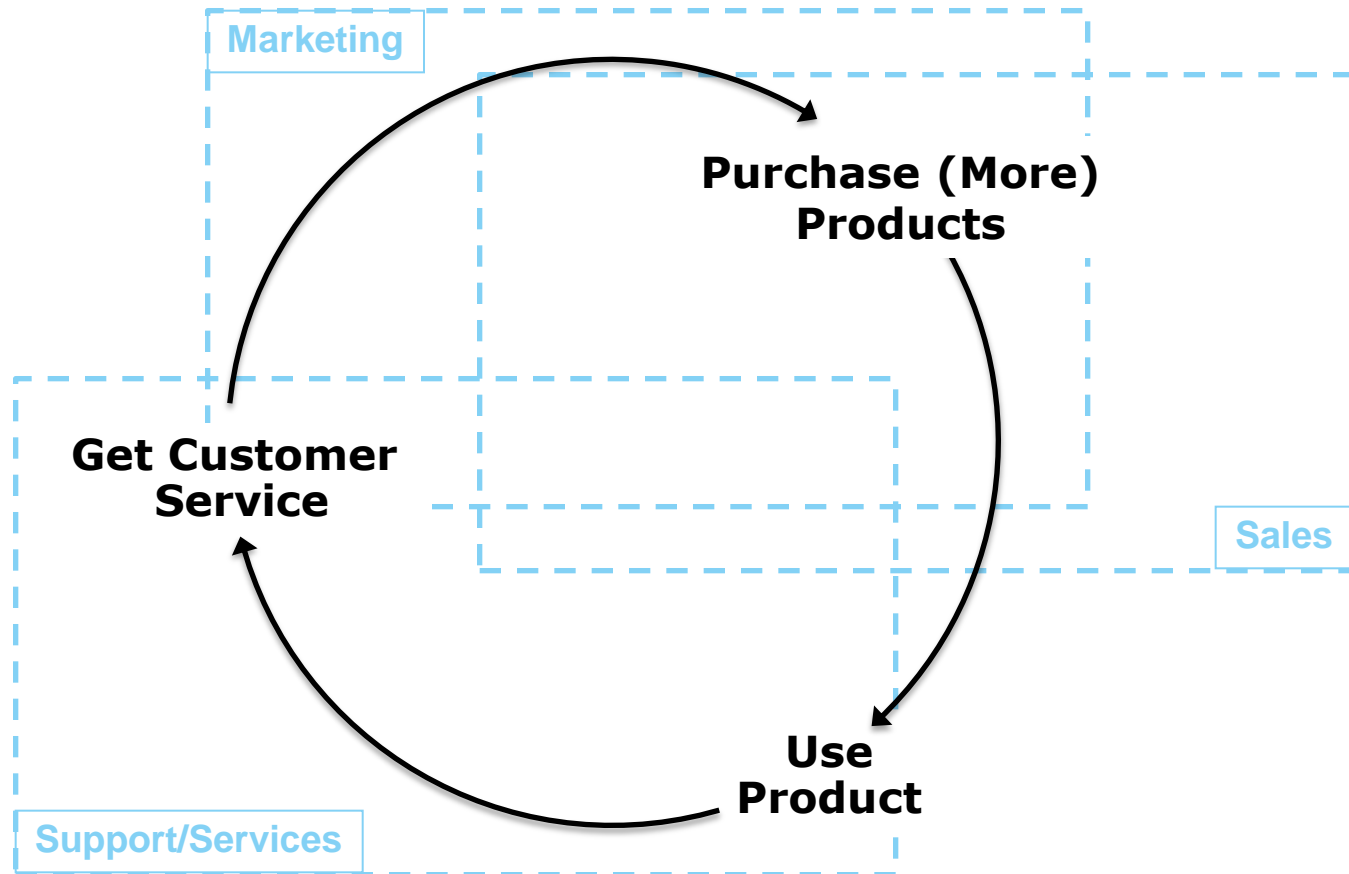
3**Risk**

- Making risk-aware decisions
- Managing financial and operational risks
- Reducing the cost of compliance

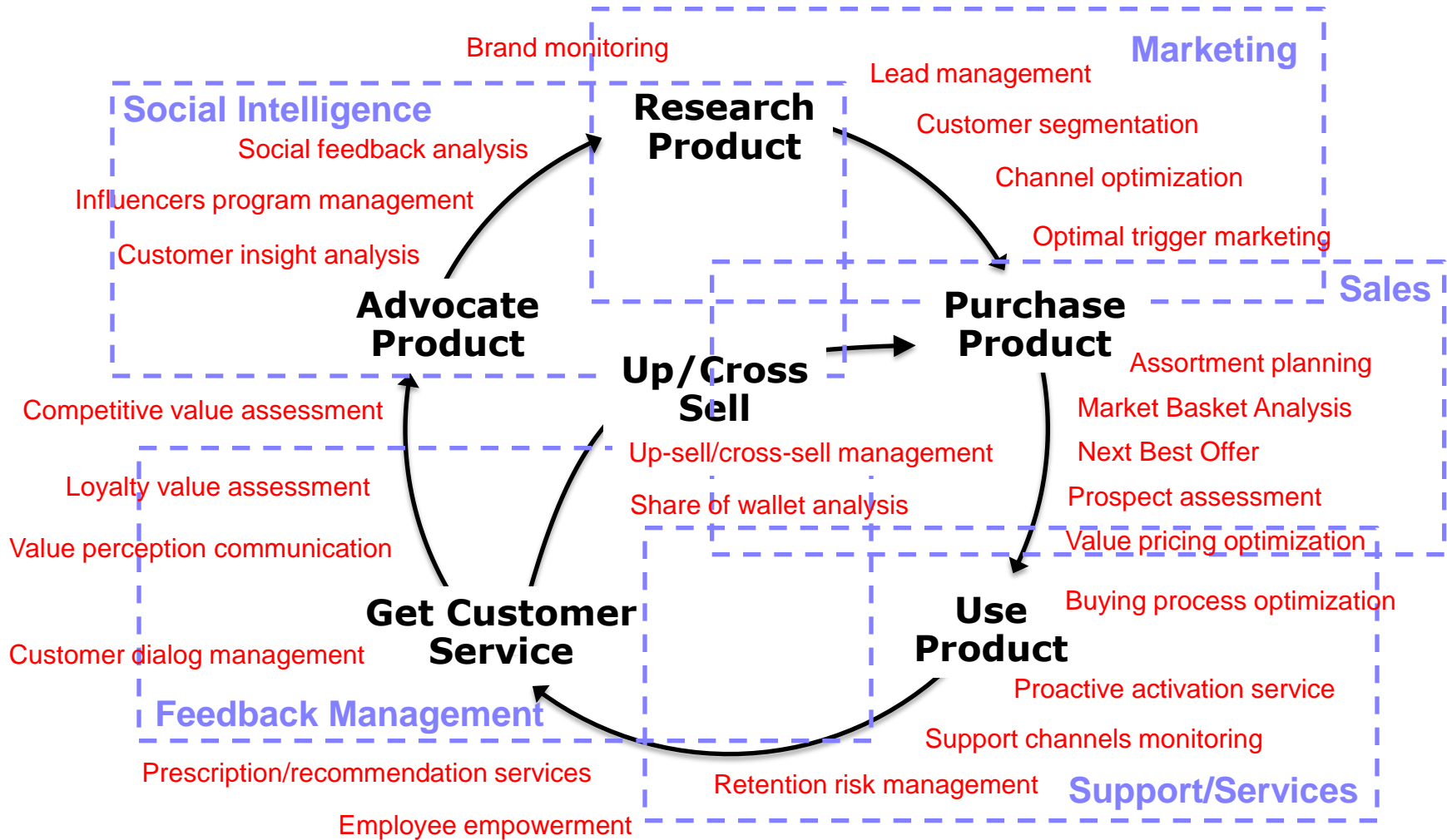
4**Operations**

- Optimizing the supply chain
- Deploying predictive maintenance capabilities
- Transform thread & fraud identification processes

Consumer Experience Framework – 10 years ago

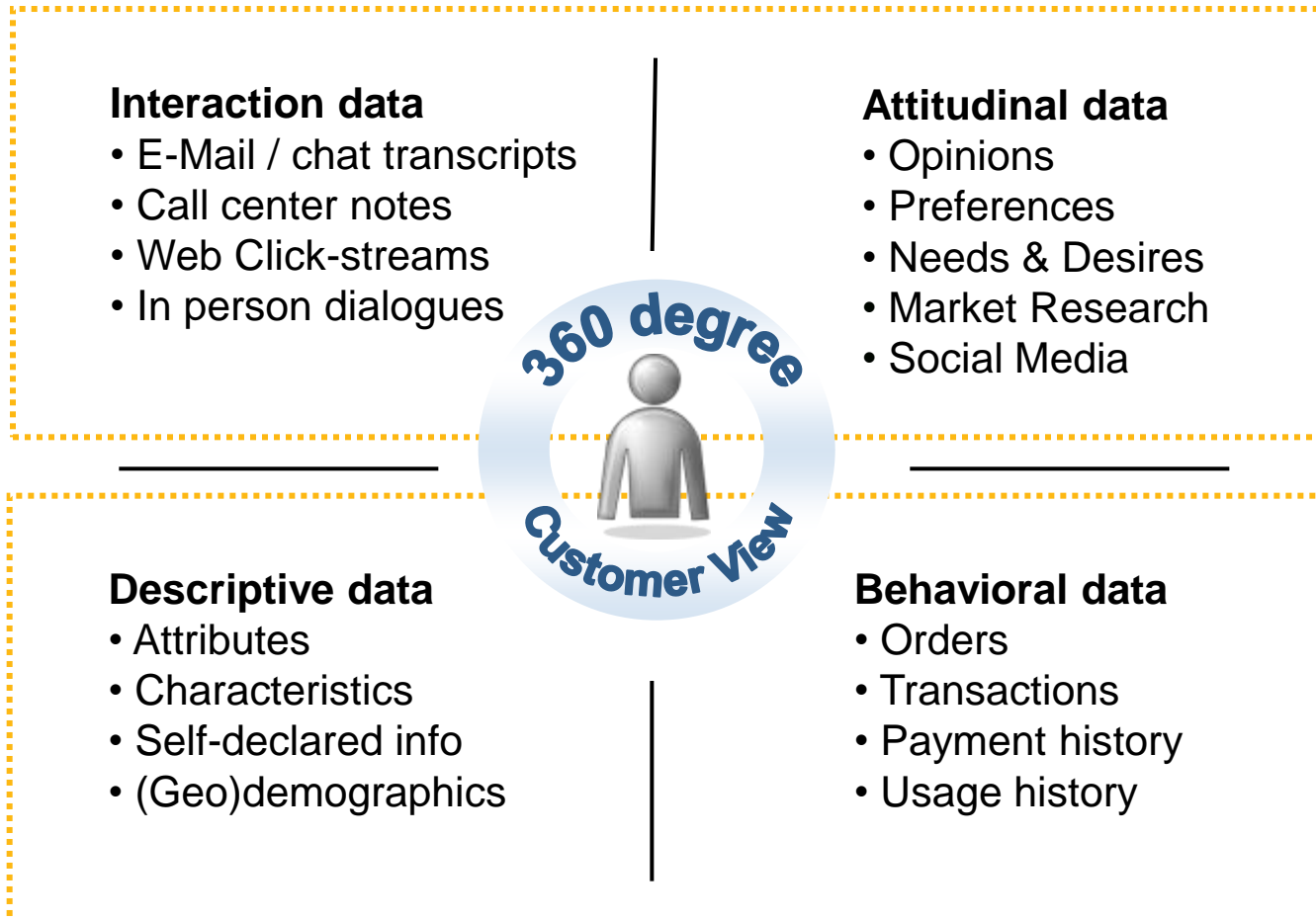


Customer Experience Framework Today where analytics can play a role



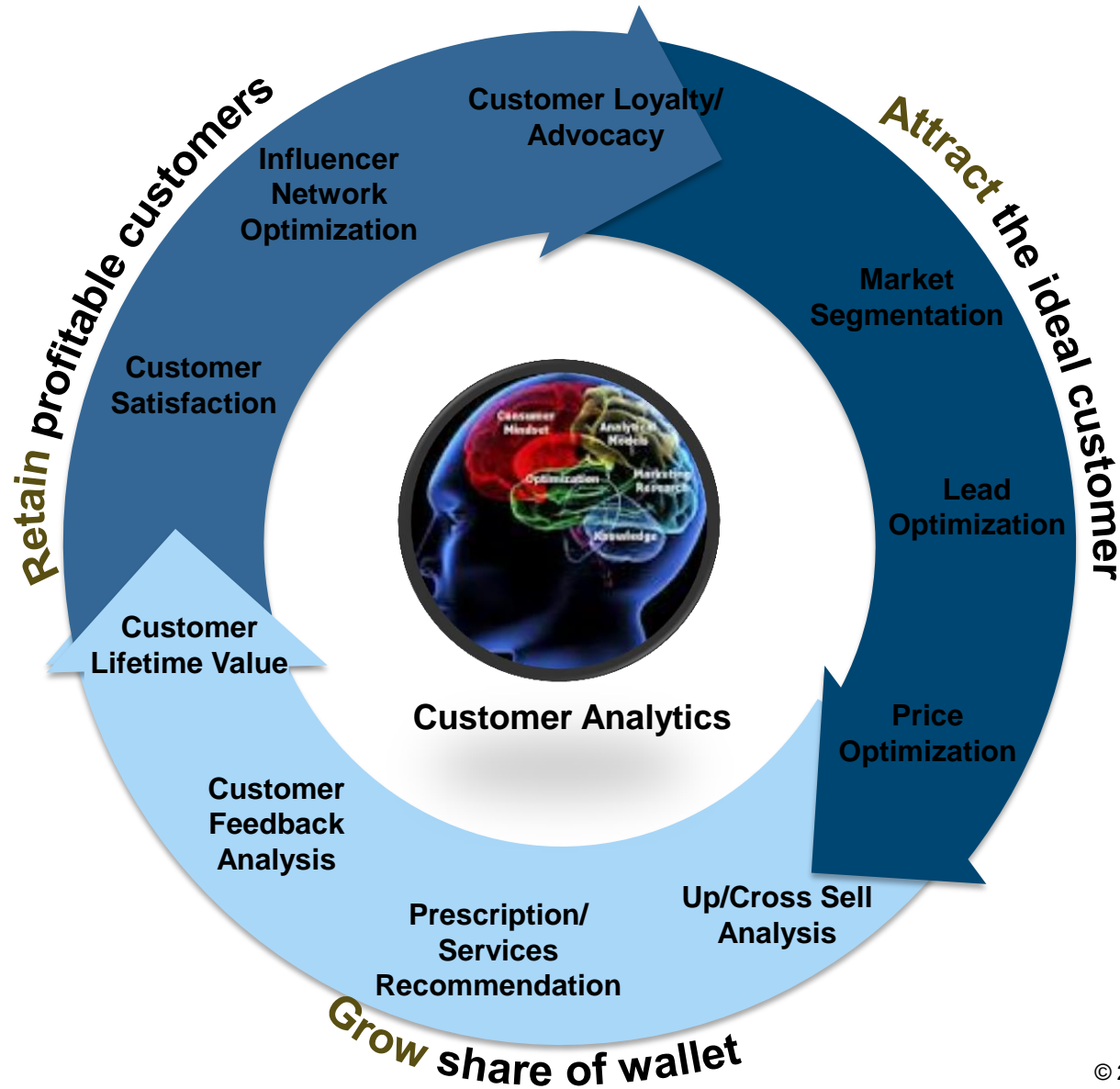
Data at the heart of customer analytics

High-value, dynamic - source of competitive differentiation



“Traditional” – CRM Mentality

Customer experience framework – From the enterprise viewpoint



Insight & acquisition – Techniques & solutions

▪ RFM Analysis

- Cheap (low overhead) way to segment a database of customers
- *Example: determine the groups of people for a coupon marketing offer*

▪ Segmentation

- Ability to find hidden clusters / groups of people
- *Example: identifying the people that are likely to buy*

▪ Reporting & Analysis

- Provide historical and current views of business operations
- *Example: provide insight into how a current sales campaign is performing*

▪ Planning & Forecasting

- What-if analysis to drive timely decision making
- *Example: determine the optimal marketing plan based on a set budget*

**Customer
Segmentation**

**Cross-Channel
Campaign Optimization**

**Optimal Trigger
Marketing**

Lead Management

Budget Optimization

Customer lifetime value – Techniques & solutions

Association

- Finding the things done in tandem
- *Example: market basket analysis, students curriculums, insurance policies that are bought together*

Classification

- Identifying the attributes that are causing something
- *Example: give the cascading predictive attributes of purchase behavior*

Scorecards & Dashboards

- Translate strategy into accountability & measure progress
- *Example: monitor the continued success of cross-sell campaigns*

Market Basket Analysis

Next Best Offer

Prospect Assessment

Value pricing Optimization

Buying Process Optimization

Proactive Activation Service

Customer satisfaction & loyalty – Techniques & solutions

Net Promoter Score

- Survey technique to determine customer satisfaction
- *Example: a question to determine whether a customer is a promoter detractor*

Sentiment Analysis

- Taking unstructured data and put it into an organized, structured format
- *Example: sentiment analytics for customer satisfaction in surveys & social media*

Anomaly Detection (outliers)

- Finding data points that are statistically significant in their difference from others
- *Examples: understand the best performing customer group / comment that doesn't fit / behavior that doesn't follow the norm*

Brand Monitoring

Social Feedback Analysis

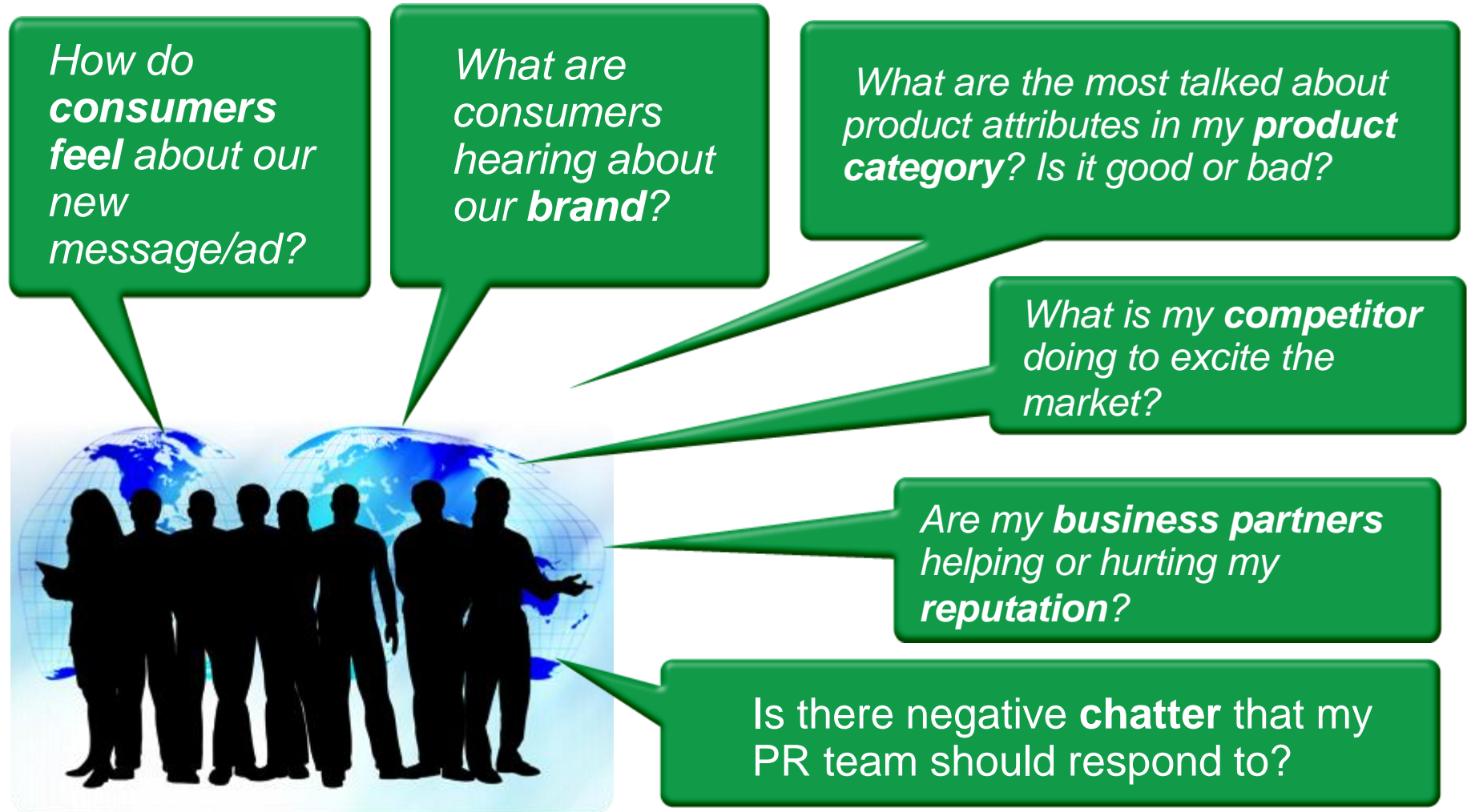
Competitive Value Assessment

Loyalty Value Assessment

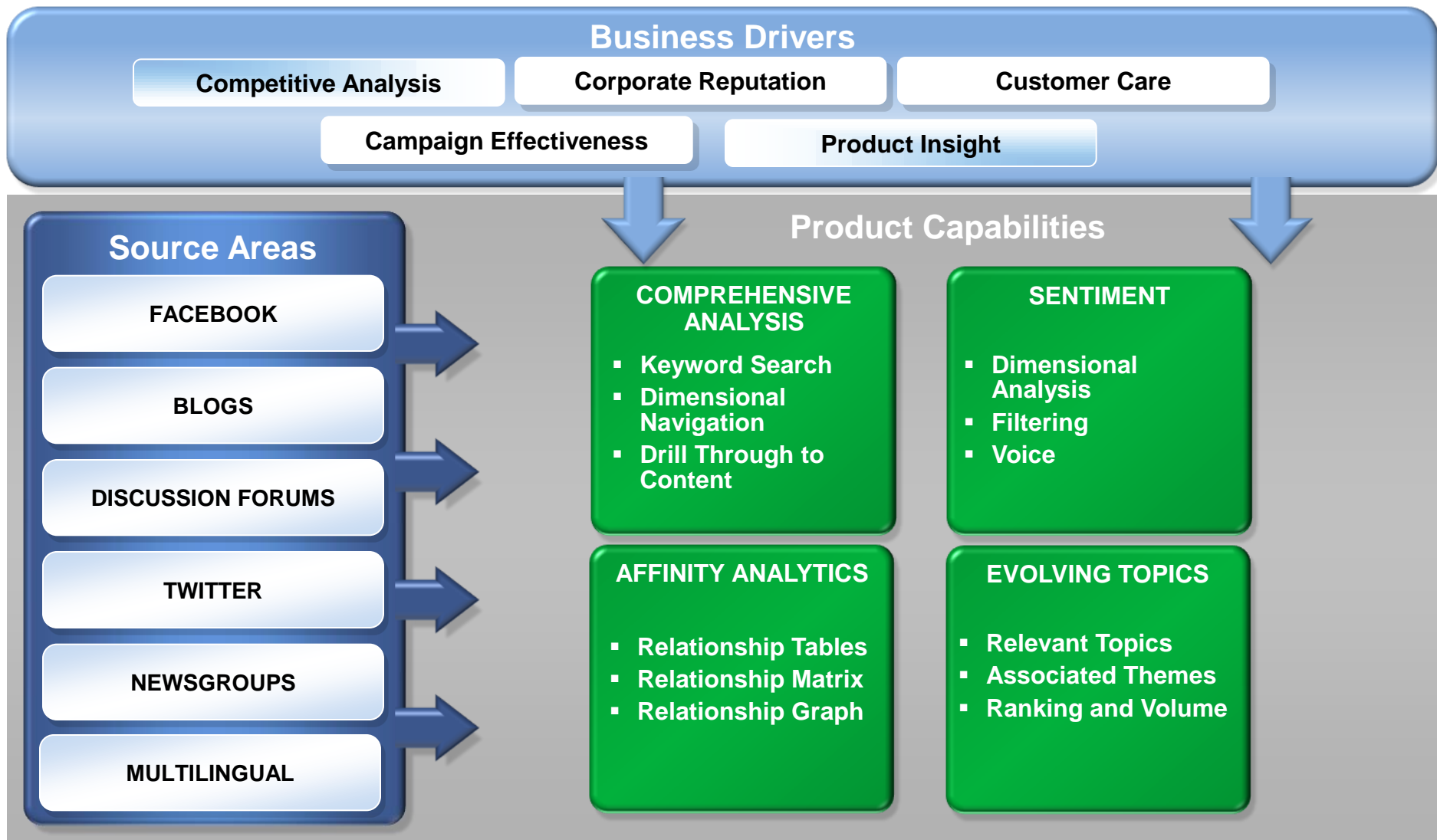
Customer Dialog Management

Retention Risk Management

Tap into Consumer generated content

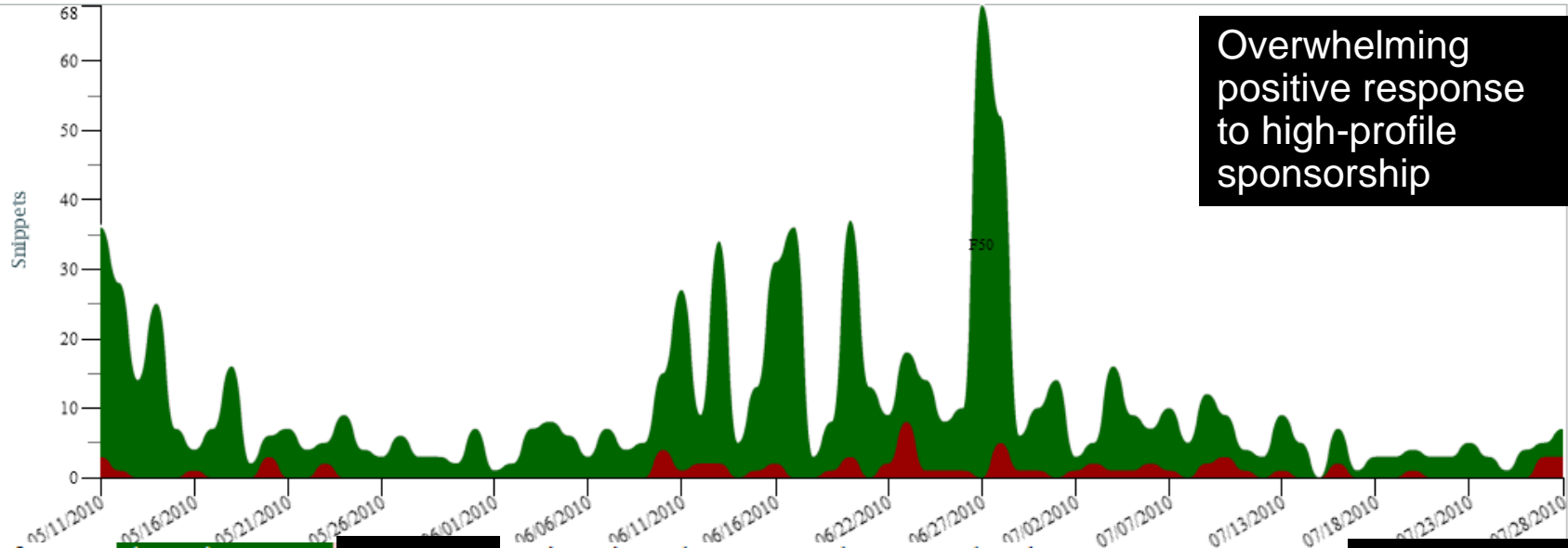


IBM Social Media Analytics



Marketing Campaign Analysis - Adidas

Significant sponsorship investment in Global event and high-profile athlete. Company wanted to assess the impact of their investment on consumer perceptions.



Snippet: I love those new [redacted] in that chameleon type colourway. Already pre-ordered those in the leather version.
Model: [redacted]
Brand: [redacted]
Sentiment: [positive](#)
Date: [05/30/2010](#)

Design feedback

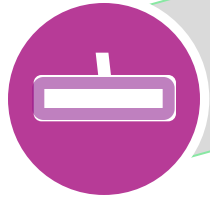
Snippet: Getting [redacted]
Model: [redacted]
Brand: [redacted]
Sentiment: [positive](#)

Campaign "activeness"

Snippet: RT @Heather_SBFC: Coming home from training. Been wearing the [redacted] **They are awesome!**
Sentiment: [positive](#)
Date: [07/07/2010](#)
Language: [English](#)



As finance evolves, organizations need to understand **WHAT** happened, **HOW** they are doing, and **WHAT** the future may hold



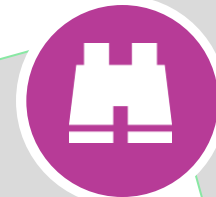
WHAT HAPPENED?

- Balance sheet, profit and loss, and cash flow statements
- Revenue and cost variance analysis



HOW ARE WE DOING?

- Customer and product profitability
- Spend optimization
- Working capital analysis
- Market, customer, & channel pricing
- Sales and supply chain effectiveness

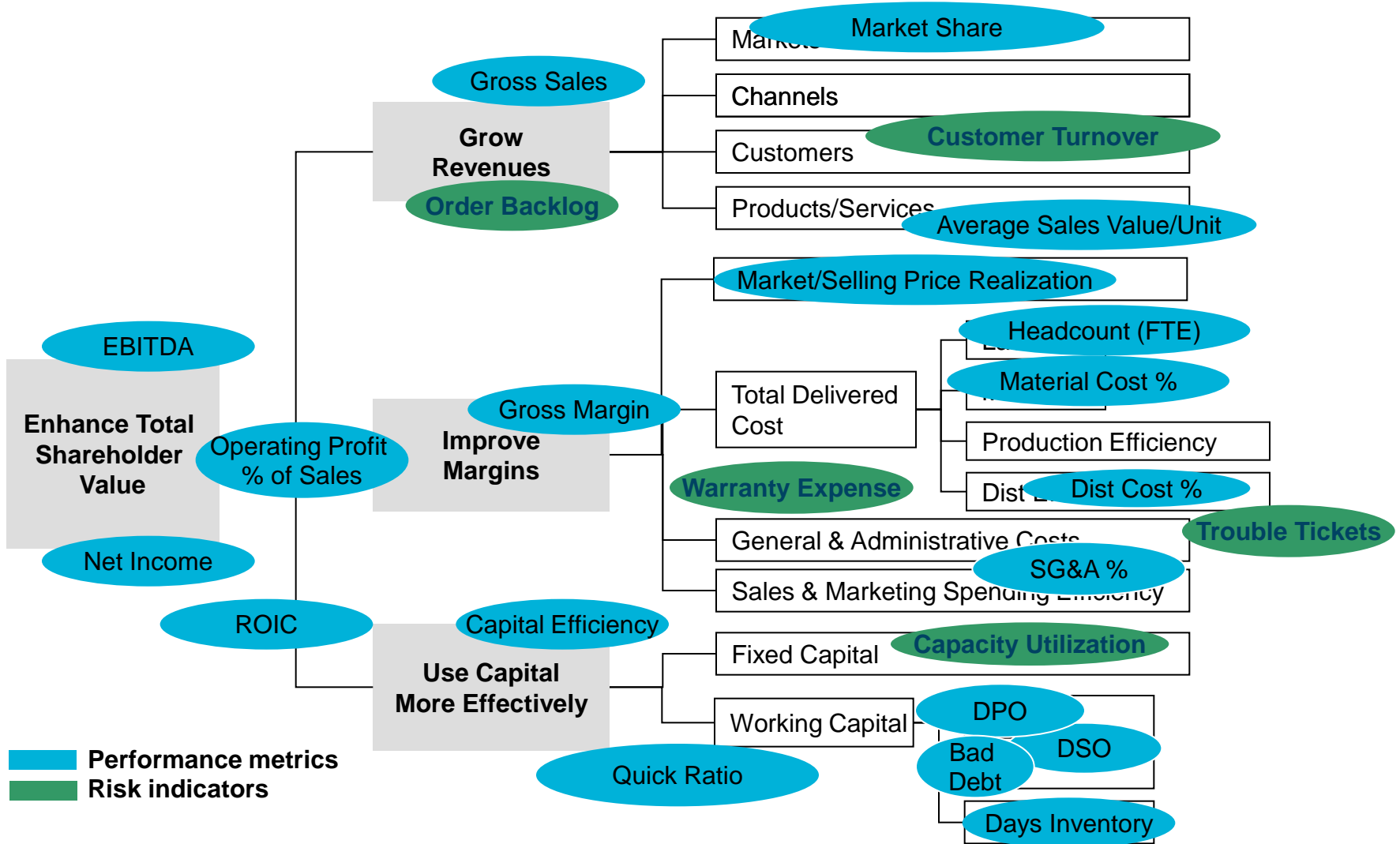


WHAT WILL HAPPEN NEXT?

- Cash forecasting
- Scenario-based planning and forecasting
- Strategic investment decision support
- Volatility and risk-based predictive and behavioral modeling

CFO Performance Insight

CFO Performance Dashboard - Insight Metrics



CFO Performance Insight

CFO Performance - Finance Scorecard Quadrants

Financial Management	Operational Revenue Management
Are we performing to shareholder expectations ?	Are we driving revenue growth effectively?
Operational Expense Management	Capital Management
Are we managing operational expenses effectively?	Are we managing fixed and working capital effectively to increase future revenue and expense management capabilities?
Embedding Risk Management in the Quadrants	
Are we managing the risks of sustaining this performance?	

CFO Performance Insight Portal Page

Company Logo

ERP/source web
[link to ERP/source web interface](#)

Link to ERP Web Interface

Report List

Financial reports

“What-if” analysis

Place holders for News Feeds and Company Info

IBM Cognos Viewer

YTD Business: All Businesses Measuring: Report Currency Company: All Companies

All Geographies Country: All Countries

Executive Dashboard

Actual vs Budget vs Forecast

Traffic light indicators

Financial Management	2011 Fiscal YTD		2011 Full Fiscal Year			Rolling 12 mo. Fcst.	Trends	Risk	TCM
	Actual	Target	Budget	Forecast	Variance				
EBITDA	\$99,958,803	\$90,500,917	\$139,151,262	\$121,463,095	-13%	\$119,227,086			
Net Income	\$43,506,230	\$38,406,045	\$59,386,062	\$42,599,047	-28%	\$41,879,335			
ROIC	15%	12%	12%	2%	-9%	9%			
Operating Profit%	39%	39%	39%	34%	-5%	34%			

Risk Status indicators

Operational Revenue Management	2011 Fiscal YTD		2011 Full Fiscal Year			Rolling 12 mo. Fcst.	Trends	Risk	TCM
	Actual	Target	Budget	Forecast	Variance				
Gross Sales	\$418,367,062	\$413,674,560	\$632,399,040	\$590,339,683	-7%	\$582,262,307			
Avg. Sales Value/Unit	\$747	\$692	\$691	\$748	8%	\$748			
Price Realization	60%	56%	56%	60%	4%	59%			
Market Share	95%	95%	96%	96%	0%	96%			

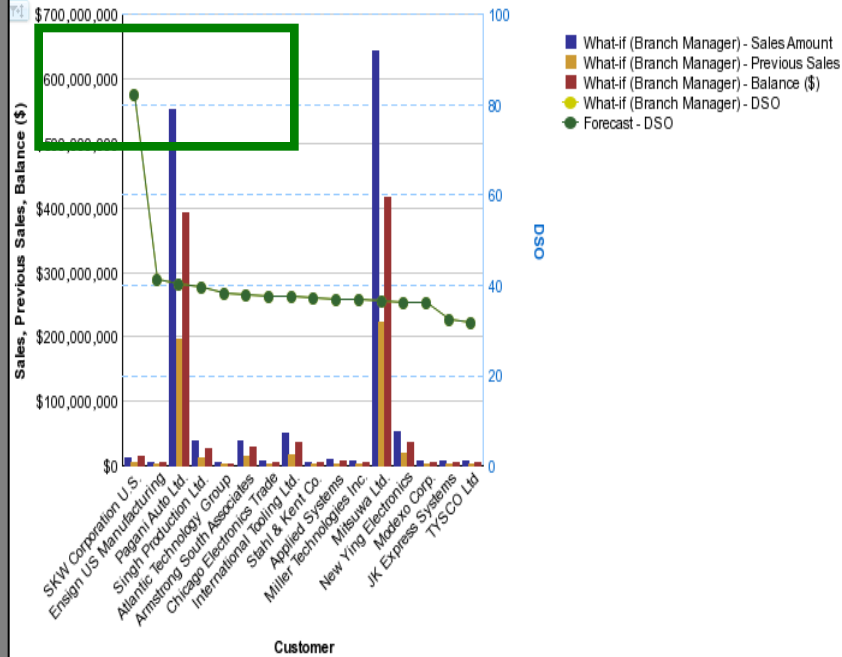
Metric trending

Operational Expense Management	2011 Fiscal YTD		2011 Full Fiscal Year			Rolling 12 m	Trends	Risk	TCM
	Actual	Target	Budget	Forecast	Variance				
SG&A%	21%	21%	21%	27%					
Gross Margin%	60%	59%	59%	61%					
Material Cost%	20%	20%	20%	19%	-1%	19%			
Distribution Expense%	5%	5%	5%	9%	4%	9%			
Headcount	6,352.0	6,405.0	6,397.0	6,402.0	0%	6,3			

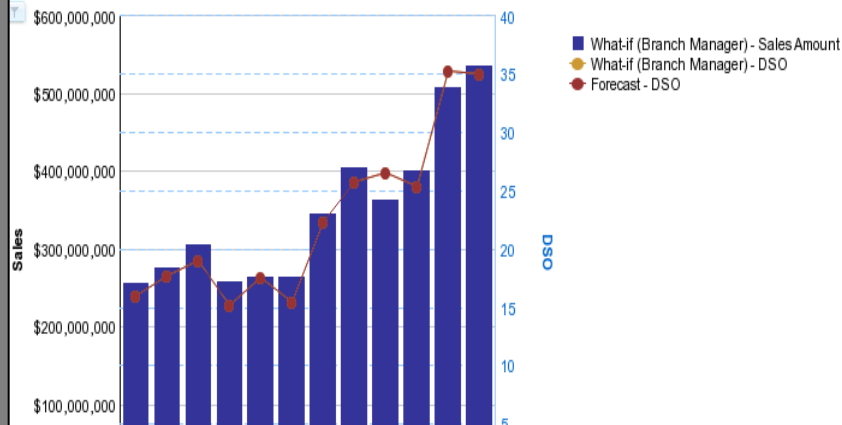
Temporal Causal Model Analysis

Management	2011 Fiscal YTD		2011 Full Fiscal Year			Rolling Fcst.	Trends	Risk	TCM
	Actual	Target	Budget	Forecast	Variance				
Capital Efficiency	\$9	\$7	\$9	\$9	1%	\$8			
Quick Ratio	32.3	32.3	33.6	34.3	2%	37.5			
DSO	29.2	29.4	50.1	56.8	13%	27.3			
Days Payable	18.0	17.5	21.9	30.9	41%	16.2			
Days in Inventory	12.7	12.5	15.3	15.5	1%	11.4			
Bad Debt Write-off	\$1,732,948	\$1,853,660	\$2,470,406	\$2,866,504	16%	\$2,858,174			

DSO Analysis - By Customer



DSO Analysis - By Period



Balance Sheet

Rows: Month [Month] Columns: BalanceSheetMeasure [BalanceSheetMeasure] Scenario [Scenario] Context: 2011 [Year] NewYork [Organization] Balance [BSChange] TransactionCurrency [Currency]

	CashAndCashEquivalents			Receivables			AccountsReceivable		
	Forecast	WhatifBranchManager	Actual	Forecast	WhatifBranchManager	Actual	Forecast	WhatifBranchManager	Actual
Jan	\$6,043,683	\$6,043,683	\$890,048	\$565,327	\$565,327	\$1,174,106	\$851,346	\$851,346	\$
Feb	\$6,063,261	\$6,063,261	\$964,322	\$921,288	\$921,288	\$1,281,917	\$1,229,142	\$1,229,142	\$
Mar	\$6,452,677	\$6,452,677	\$919,138	\$1,282,097	\$1,282,097	\$1,266,272	\$1,608,563	\$1,608,563	\$
Q1	\$6,452,677	\$6,452,677	\$919,138	\$1,282,097	\$1,282,097	\$1,266,272	\$1,608,563	\$1,608,563	\$3
Apr	\$7,268,901	\$7,268,901	\$813,335	\$545,354	\$545,354	\$1,182,202	\$891,026	\$891,026	\$
May	\$7,293,403	\$7,293,403	\$793,665	\$954,486	\$954,486	\$1,186,020	\$1,312,785	\$1,312,785	\$
Jun	\$7,794,621	\$7,794,621	\$523,661	\$781,585	\$781,585	\$943,337	\$1,144,311	\$1,144,311	\$
Q2	\$7,794,621	\$7,794,621	\$523,661	\$781,585	\$781,585	\$943,337	\$1,144,311	\$1,144,311	\$4
Jul	\$7,668,586	\$7,668,586	\$1,588,185	\$1,414,373	\$1,414,373	\$2,035,850	\$1,794,504	\$1,794,504	\$
Aug	\$7,629,653	\$7,629,653	\$1,904,649	\$2,616,931	\$2,616,931	\$2,375,510	\$3,007,757	\$3,007,757	\$
Sep	\$9,273,280	\$9,273,280	\$1,734,910	\$1,842,449	\$1,842,449	\$2,218,459	\$2,257,763	\$2,257,763	\$
Q3	\$9,273,280	\$9,273,280	\$1,734,910	\$1,842,449	\$1,842,449	\$2,218,459	\$2,257,763	\$2,257,763	\$4
Oct	\$9,044,453	\$9,044,453	\$0	\$3,177,950	\$3,177,950	\$0	\$3,610,775	\$3,610,775	\$
Nov	\$6,617,801	\$6,617,801	\$	\$6,589,976	\$6,589,976	\$0	\$7,048,932	\$7,048,932	\$
Dec	\$4,502,247	\$4,502,247	\$	\$9,567,208	\$9,567,208	\$0	\$10,051,487	\$10,051,487	\$
Q4	\$4,502,247	\$4,502,247	\$	\$9,567,208	\$9,567,208	\$0	\$10,051,487	\$10,051,487	\$
TotalYear	\$4,502,247	\$4,502,247	\$1,734,910	\$9,567,208	\$9,567,208	\$2,218,459	\$10,051,487	\$10,051,487	\$4

DSO What-if Analysis

Rows: Month [Month] Columns: CustomerPaymentSummaryMeasure [CustomerPaymentSummaryMeasure] Context: 2011 [Year] TotalBusinessUnit [BusinessUnit] NewYork [Organization] SKWCorporationUS [Customer]

	Debit	Credit	SalesAmount	PreviousSales	AccountsReceivable	DSO	BadDebtAllowance	BadDebtWriteOff	BadDebtRepaid
Jan	\$5,476,599	\$4,612,461	\$1,672,855	\$3,888,053	\$851,346	15.78	\$21,416	\$12,792	\$13,489
Feb	\$2,916,757	\$1,678,006	\$2,065,411	\$1,672,855	\$1,229,142	17.26	\$22,183	\$9,608	\$9,260
Mar	\$3,722,243	\$2,100,250	\$2,493,101	\$2,065,411	\$1,608,563	20.00	\$19,015	\$13,431	\$13,028
Q1	\$13,706,608	\$8,390,717	\$6,231,367	\$2,065,411	\$1,608,563	23.49	\$62,614	\$35,831	\$35,777
Apr	\$3,298,722	\$2,399,610	\$1,690,159	\$2,493,101	\$891,026	15.82	\$17,565	\$8,086	\$9,727

DSO What-if Analysis

Rows: [Month] Columns: [CustomerPaymentSummaryMeasure] Context: [2011] [TotalBusinessUnit] [NewYork] [SKWCorporationUS]

	Debit	Credit	SalesAmount	PreviousSales	AccountsReceivable	DSO	BadDebtAllowance	BadDebtWriteOff	Bad
Mar	\$13,706,608	\$8,390,717	\$6,231,367	\$2,065,411	\$1,608,563	23.49	\$62,614	\$35,831	
Q1	\$3,298,722	\$2,399,610	\$1,690,159	\$2,493,101	\$891,026	15.82	\$17,565	\$8,086	
Apr	\$3,030,933	\$1,705,597	\$2,139,907	\$1,690,159	\$1,312,785	19.02	\$11,956	\$12,551	
May	\$3,222,302	\$2,063,330	\$1,909,517	\$2,139,907	\$1,144,311	17.98	\$8,282	\$14,661	
Jun	\$9,461,826	\$6,168,537	\$5,739,583	\$2,139,907	\$1,144,311	18.14	\$37,803	\$35,298	
Q2	\$3,702,553	\$1,892,842	\$2,558,242	\$1,909,517	\$1,794,504	21.75	\$24,102	\$15,206	
Jul	\$5,261,292	\$2,239,100	\$3,466,788	\$2,558,242	\$3,007,757	26.90	\$15,944	\$14,436	
Aug	\$5,998,379	\$3,722,866	\$2,990,622	\$3,466,788	\$2,257,763	22.65	\$22,808	\$17,750	
Sep	\$12,237,954	\$7,854,808	\$9,015,652	\$3,466,788	\$2,257,763	23.04	\$62,854	\$47,392	
Q3	\$5,758,227	\$2,134,842	\$3,500,464	\$2,990,622	\$3,610,775	31.98	\$21,661	\$12,611	
Oct	\$7,375,297	\$318,531	\$3,764,522	\$3,500,464	\$7,048,932	56.17	\$22,937	\$7,834	
Nov	\$10,997,032	\$939,311	\$3,948,100	\$3,764,522	\$10,051,487	78.92	\$22,040	\$6,234	
Dec	\$17,211,465	\$3,392,683	\$11,213,086	\$3,764,522	\$10,051,487	82.47	\$66,638	\$26,679	
Q4	\$17,211,465	\$3,392,683	\$11,213,086	\$3,764,522	\$10,051,487	82.47	\$229,909	\$145,200	
TotalYear									

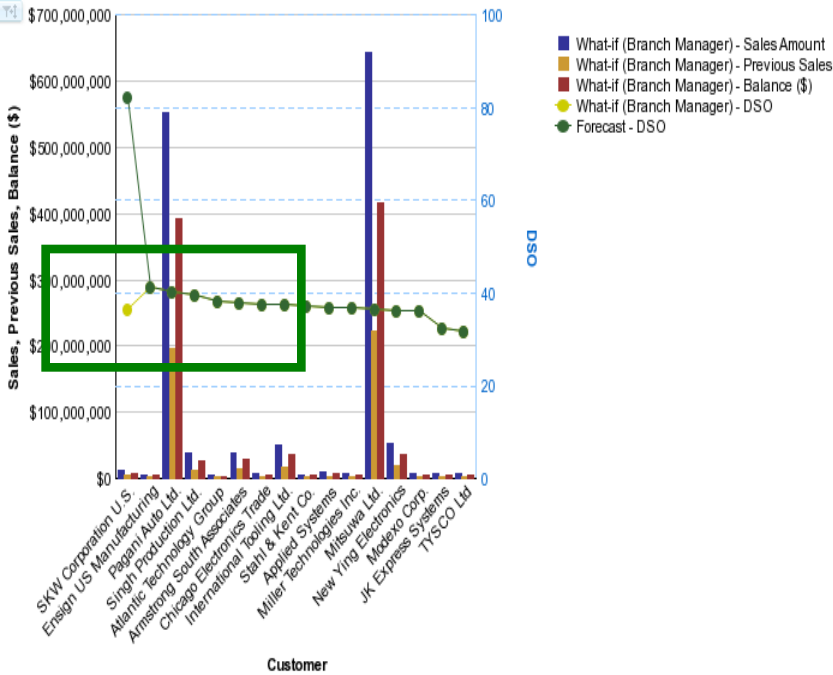
Change DSO for Nov & Dec from 78.92 and 82.47 DSO to 35.00 and 35.00

DSO What-if Analysis

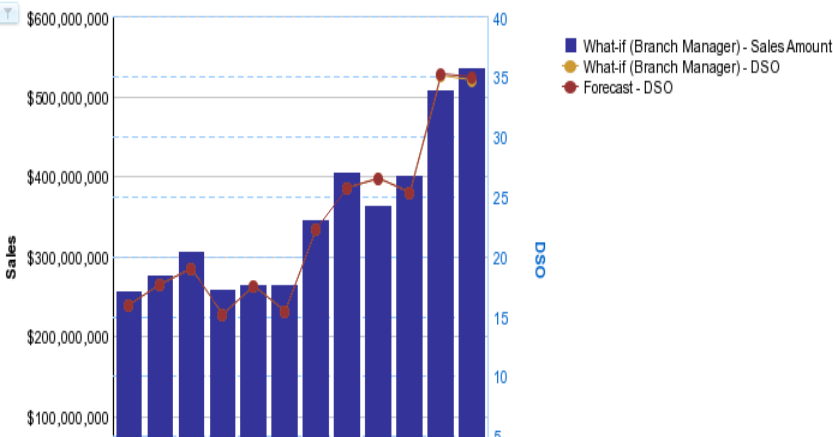
Rows: [Month] Columns: [CustomerPaymentSummaryMeasure] Context: [2011] [TotalBusinessUnit] [NewYork] [SKWCorporationUS]

	Debit	Credit	SalesAmount	PreviousSales	AccountsReceivable	DSO	BadDebtAllowance	BadDebtWriteOff	Bad
Mar	\$3,722,243	\$2,100,250	\$2,493,101	\$2,065,411	\$1,608,563	20.00	\$19,015	\$13,431	
Q1	\$13,706,608	\$8,390,717	\$6,231,367	\$2,065,411	\$1,608,563	23.49	\$62,614	\$35,831	
Apr	\$3,298,722	\$2,399,610	\$1,690,159	\$2,493,101	\$891,026	15.82	\$17,565	\$8,086	
May	\$3,030,933	\$1,705,597	\$2,139,907	\$1,690,159	\$1,312,785	19.02	\$11,956	\$12,551	
Jun	\$3,222,302	\$2,063,330	\$1,909,517	\$2,139,907	\$1,144,311	17.98	\$8,282	\$14,661	
Q2	\$9,461,826	\$6,168,537	\$5,739,583	\$2,139,907	\$1,144,311	18.14	\$37,803	\$35,298	
Jul	\$3,702,553	\$1,892,842	\$2,558,242	\$1,909,517	\$1,794,504	21.75	\$24,102	\$15,206	
Aug	\$5,261,292	\$2,239,100	\$3,466,788	\$2,558,242	\$3,007,757	26.90	\$15,944	\$14,436	
Sep	\$5,998,379	\$3,722,866	\$2,990,622	\$3,466,788	\$2,257,763	22.65	\$22,808	\$17,750	
Q3	\$12,237,954	\$7,854,808	\$9,015,652	\$3,466,788	\$2,257,763	23.04	\$62,854	\$47,392	
Oct	\$5,758,227	\$2,134,842	\$3,500,464	\$2,990,622	\$3,610,775	31.98	\$21,661	\$12,611	
Nov	\$7,375,297	\$2,975,520	\$3,764,522	\$3,500,464	\$4,391,942	35.00	\$22,937	\$7,834	
Dec	\$8,340,042	\$3,876,276	\$3,948,100	\$3,764,522	\$4,457,532	35.00	\$22,040	\$6,234	
Q4	\$17,211,465	\$8,986,638	\$11,213,086	\$3,764,522	\$4,457,532	36.57	\$66,638	\$26,679	
TotalYear	\$17,211,465	\$8,986,638	\$11,213,086	\$3,764,522	\$4,457,532	36.57	\$229,909	\$145,200	

DSO Analysis - By Customer



DSO Analysis - By Period



Balance Sheet

Rows: Month [Month] Columns: BalanceSheetMeasure [BalanceSheetMeasure] Scenario [Scenario] Context: 2011 [Year] NewYork [Organization] Balance [BSChange] TransactionCurrency [Currency]

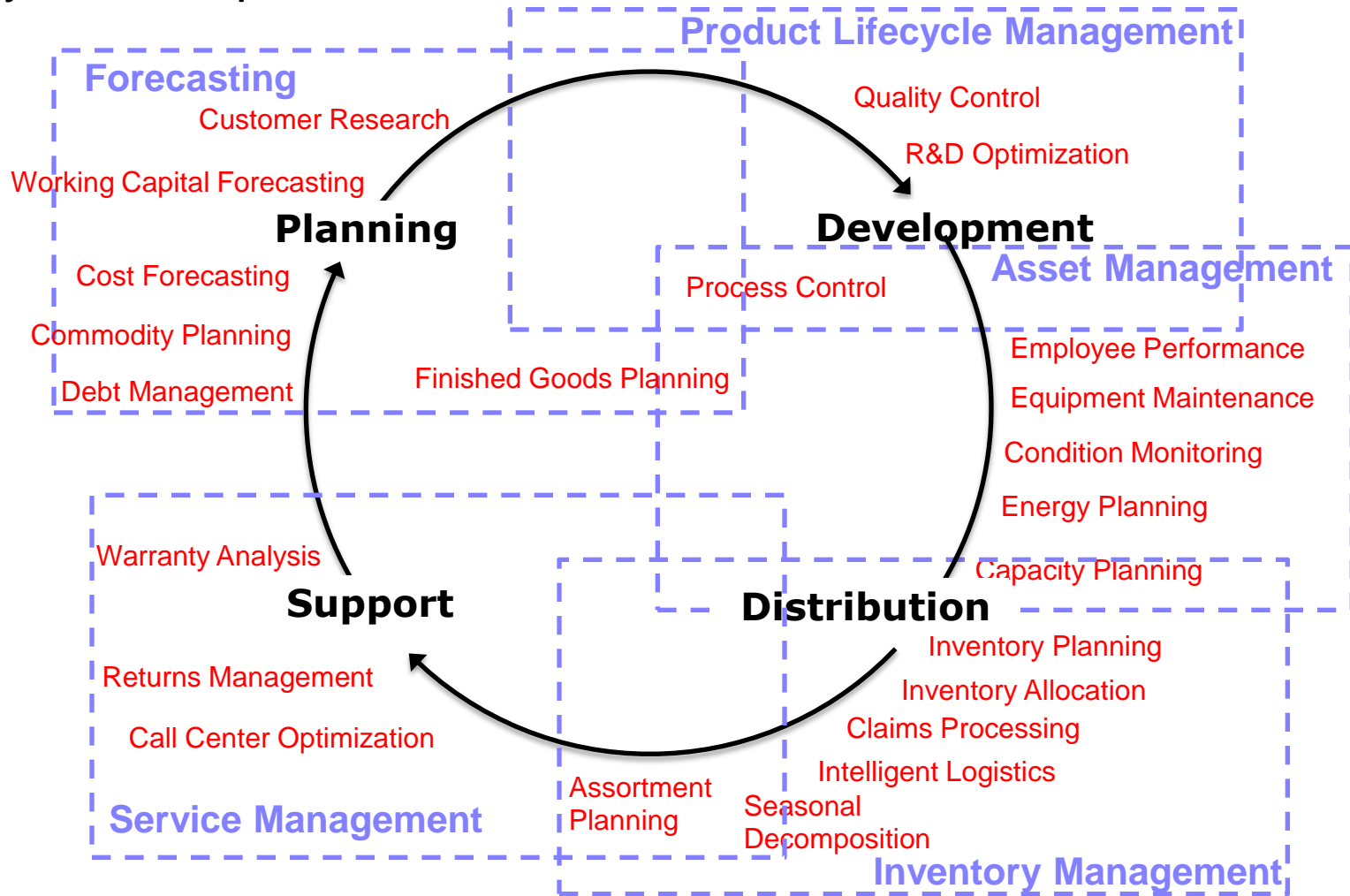
Month	Receivables			Accounts Receivable			Bad Debt		
	Actual	Forecast	WhatifBranchManager	Actual	Forecast	WhatifBranchManager	Actual	Forecast	
Jan	\$6,043,683	\$890,048	\$565,327	\$565,327	\$1,174,106	\$851,346	\$851,346	\$284,058	\$286,010
Feb	\$6,063,261	\$964,322	\$921,288	\$921,288	\$1,281,917	\$1,229,142	\$1,229,142	\$317,595	\$307,850
Mar	\$6,452,677	\$919,138	\$1,282,097	\$1,282,097	\$1,266,272	\$1,608,563	\$1,608,563	\$347,134	\$326,460
Q1	\$6,452,677	\$919,138	\$1,282,097	\$1,282,097	\$1,266,272	\$1,608,563	\$1,608,563	\$347,134	\$326,460
Apr	\$7,268,901	\$813,335	\$545,354	\$545,354	\$1,182,202	\$891,026	\$891,026	\$368,867	\$345,670
May	\$7,293,403	\$793,665	\$954,486	\$954,486	\$1,186,020	\$1,312,785	\$1,312,785	\$392,355	\$358,290
Jun	\$7,794,621	\$523,661	\$781,585	\$781,585	\$943,337	\$1,144,311	\$1,144,311	\$419,676	\$362,720
Q2	\$7,794,621	\$523,661	\$781,585	\$781,585	\$943,337	\$1,144,311	\$1,144,311	\$419,676	\$362,720
Jul	\$7,668,586	\$1,588,185	\$1,414,373	\$1,414,373	\$2,035,850	\$1,794,504	\$1,794,504	\$447,665	\$380,130
Aug	\$7,629,653	\$1,904,649	\$2,616,931	\$2,616,931	\$2,375,510	\$3,007,757	\$3,007,757	\$470,861	\$390,820
Sep	\$9,273,280	\$1,734,910	\$1,842,449	\$1,842,449	\$2,218,459	\$2,257,763	\$2,257,763	\$483,549	\$415,310
Q3	\$9,273,280	\$1,734,910	\$1,842,449	\$1,842,449	\$2,218,459	\$2,257,763	\$2,257,763	\$483,549	\$415,310
Oct	\$9,044,453	\$0	\$3,177,950	\$3,177,950	\$0	\$3,610,775	\$3,610,775	\$0	\$432,820
Nov	\$9,274,791	\$0	\$6,589,976	\$3,932,986	\$0	\$7,048,932	\$4,391,942	\$0	\$458,950
Dec	\$10,096,202	\$0	\$9,567,208	\$3,973,253	\$0	\$10,051,487	\$4,457,532	\$0	\$484,270
Q4	\$10,096,202	\$0	\$9,567,208	\$3,973,253	\$0	\$10,051,487	\$4,457,532	\$0	\$484,270
Total Year	\$10,096,202	\$1,734,910	\$9,567,208	\$3,973,253	\$2,218,459	\$10,051,487	\$4,457,532	\$483,549	\$484,270

DSO What-if Analysis

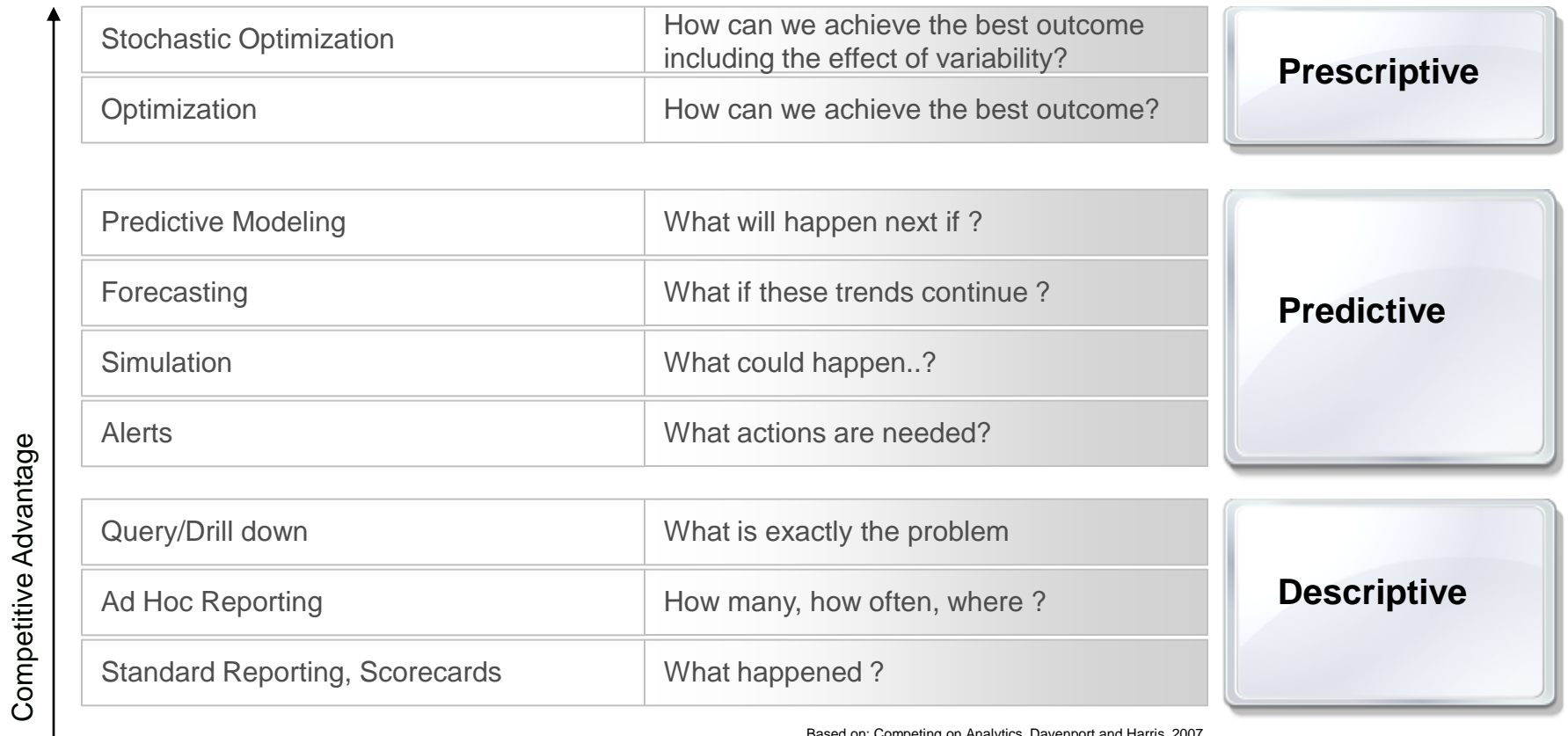
Rows: Month [Month] Columns: CustomerPaymentSummaryMeasure [CustomerPaymentSummary/Measure] Context: 2011 [Year] TotalBusinessUnit [BusinessUnit] NewYork [Organization] SKWCorporationUS [Customer]

Month	Debit	Credit	SalesAmount	PreviousSales	AccountsReceivable	DSO	BadDebtAllowance	BadDebtWriteOff	BadDebtRepaid
Mar	\$3,722,243	\$2,100,250	\$2,493,101	\$2,065,411	\$1,608,563	20.00	\$19,015	\$13,431	\$13,028
Q1	\$13,706,608	\$8,390,717	\$6,231,367	\$2,065,411	\$1,608,563	23.49	\$62,614	\$35,831	\$35,777
Apr	\$3,298,722	\$2,399,610	\$1,690,159	\$2,493,101	\$891,026	15.82	\$17,565	\$8,086	\$9,727
May	\$3,030,933	\$1,705,597	\$2,139,907	\$1,690,159	\$1,312,785	19.02	\$11,956	\$12,551	\$13,222
Jun	\$3,222,302	\$2,063,330	\$1,909,517	\$2,139,907	\$1,144,311	17.98	\$8,282	\$14,661	\$10,806

Analytics for Operational Excellence



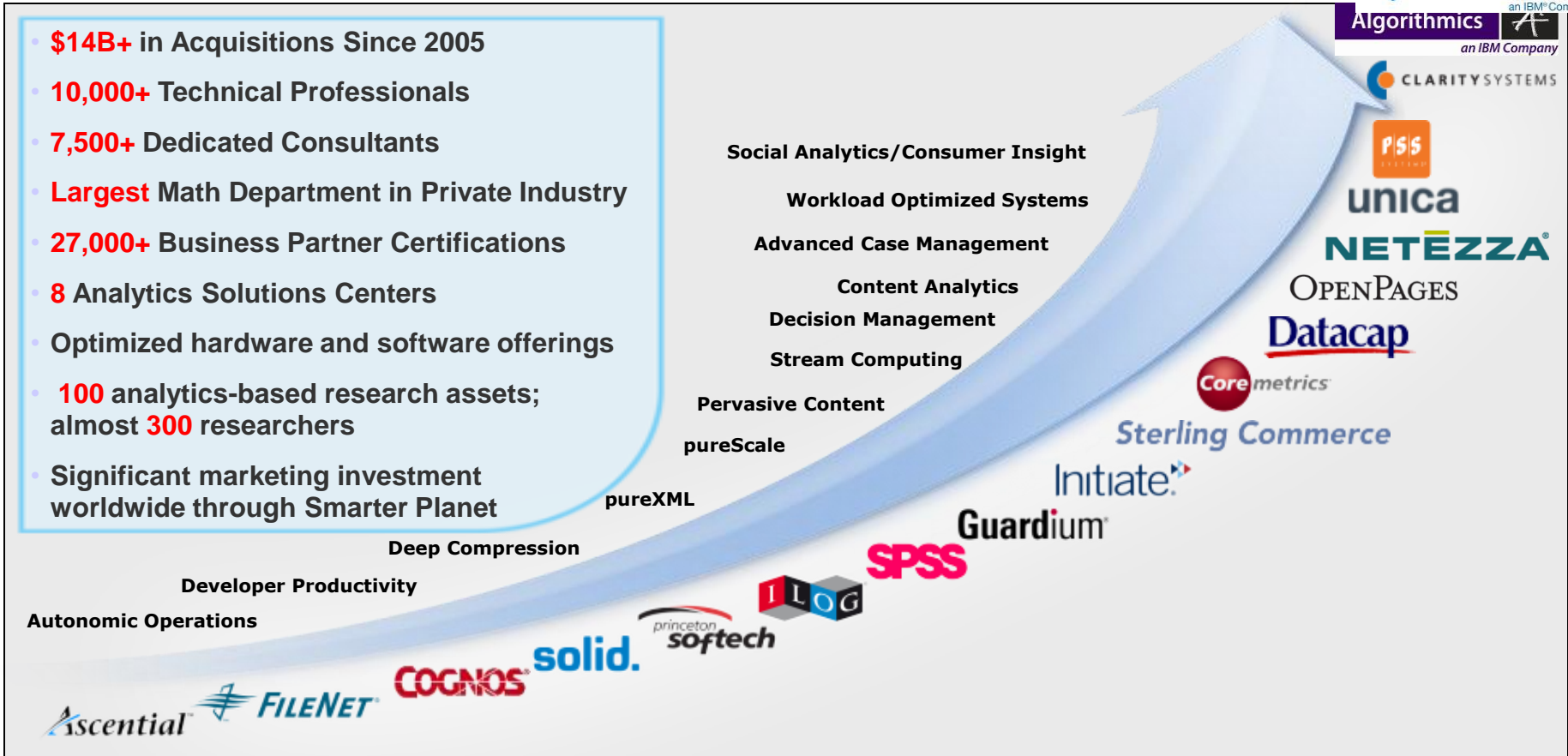
Business Analytics Roadmap



Based on: Competing on Analytics, Davenport and Harris, 2007

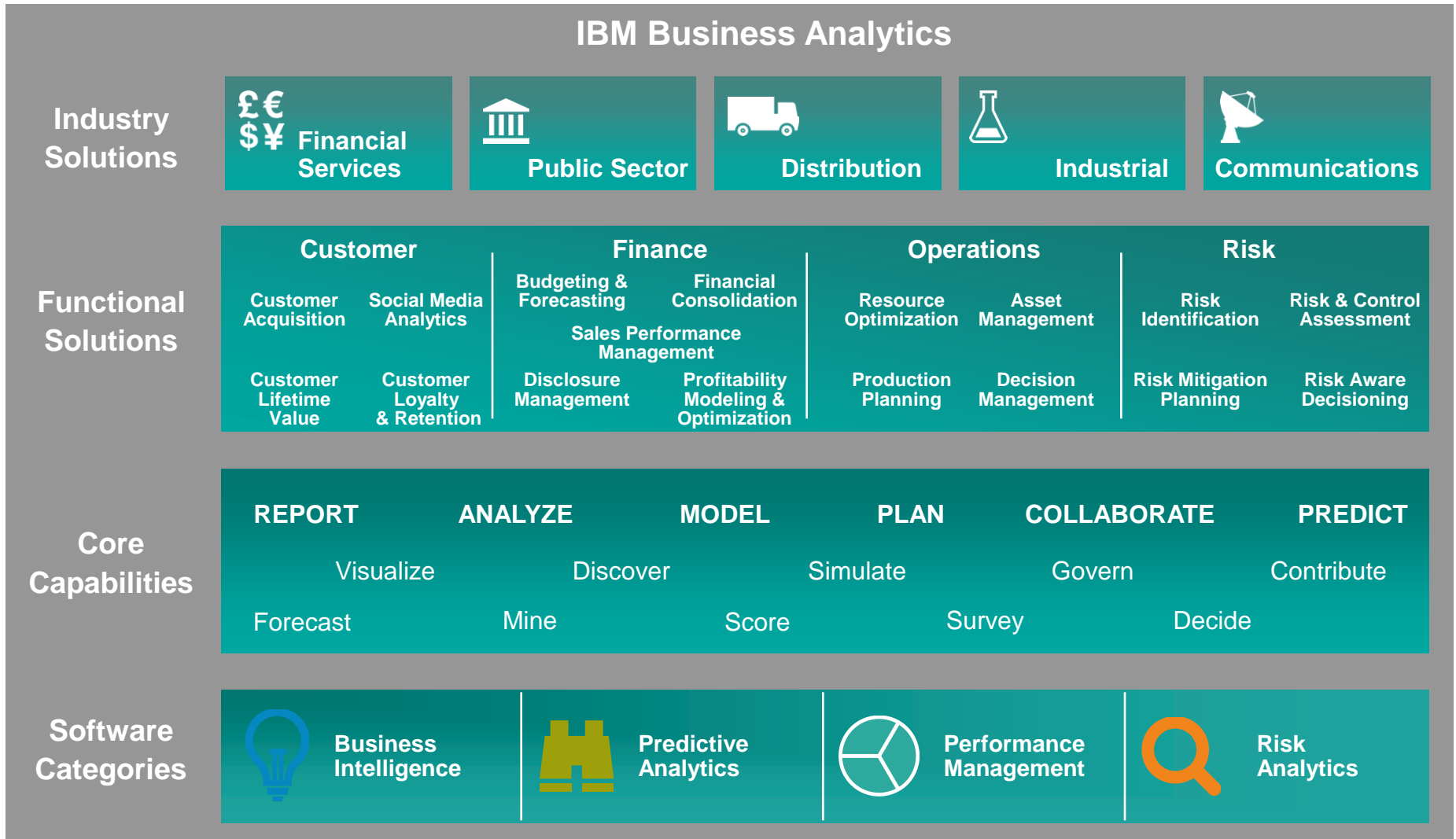
IBM is Helping Clients Maximize Results with *Innovation That Matters*

2012



2005

IBM delivers the broadest Business Analytics portfolio to drive better business outcomes



And has the industry experience to help clients address key imperatives

	 Banking/Insurance	 Government	 Retail	 Industrial	 Telecommunications
 Customer	Create a Customer-centric Enterprise	Improve Citizen Services	Optimize the Shopping Experience	Plan & Forecast Demand	Reduce Customer Churn
 Finance	Ensure Financial Transparency	Manage Resources Effectively	Demand Planning	Sales and Operations Planning	Optimise Capex and Opex
 Operations	Streamline Operations	Measure Program Performance	Improve Store Operations	Enable Predictive Maintenance	Build Smarter Networks
 Risk	Optimize Risk and Manage Compliance	Reduce Fraud and Waste	Manage Operational Risk	Manage Operational Risk	Manage Operational Risk

Business analytics from IBM

Actionable insights for better business outcomes



- **Business intelligence**
 - Instant information about how the business is doing and why
- **Financial performance and strategy management**
 - Financial and operational planning, budgeting and forecasting to put resources in the right place and set targets
- **Advanced analytics**
 - Predictive modeling and what-if analysis to predict opportunities and threats and confidently take action
- **Analytic applications**
 - Best practice–based industry solutions and accelerators
- **Governance, risk and compliance**
 - OpenPages and Clarity acquisitions build IBM's capabilities in governance, risk and compliance

Cognos[®]
software

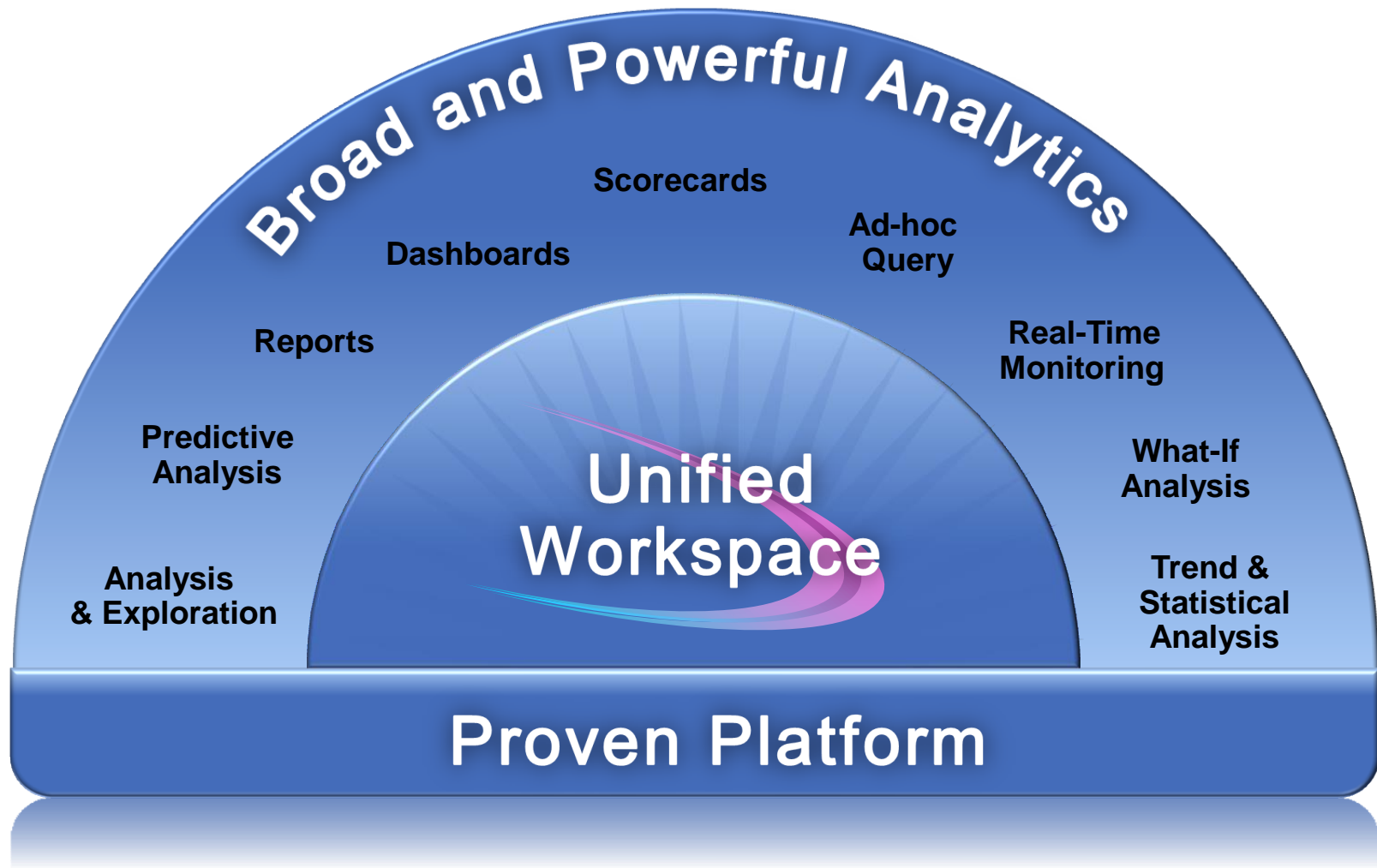


 **OPENPAGES**
an IBM[®] Company

 **CLARITY SYSTEMS**
an IBM[®] Company

Algorithmics 
an IBM Company

Introducing Cognos Business Intelligence



The Evolution of Analytics for Business Users

Cognos Insight

The only **spreadsheets** desktop product that empowers decision makers to independently take **insight to action**

data discovery 1.0



ANALYTICSZONE

Planning Areas

	Primary Use	Horizon/Frequency	Who?
Strategic Plan	Define vision, SWOT, high level corporate goals and objectives and strategies for how to attain them	Horizon: 3-5, sometimes 10 years Frequency: 1/year	<ul style="list-style-type: none"> ⑩ Corporate Execs ⑩ Senior Mgmt. ⑩ Strategy ⑩ Finance
Budget/ Annual Operating Plan	Financial guide for the current year: control expenses, evaluate performance and determine bonus compensation	Horizon: 1 year, across months, Qtrs, weeks Frequency: 1/year Infrequently updated	<ul style="list-style-type: none"> ⑩ Corporate Planning ⑩ LOB Managers ⑩ Cost Center mgrs
Forecast	Provides the most current estimates for the balance of the year/horizon	Horizon: Balance of the year or Rolling week, month, quarter, Annual. Frequency: Refreshed often	<ul style="list-style-type: none"> ⑩ Corporate Planning ⑩ LOB Managers
Modeling	<ul style="list-style-type: none"> ⑩ What-If Analysis ⑩ Acquisition modeling ⑩ Scenario Analysis ⑩ Define contingency plans 	• Ad-hoc	<ul style="list-style-type: none"> ⑩ Corporate Planning ⑩ Strategy ⑩ Sales/HR/IT
Reporting	<ul style="list-style-type: none"> ⑩ Comparison with actual ⑩ Cause & effect Analysis 	Horizon: Various Frequency: Monthly, Qtrly, Annual, Ad-hoc	<ul style="list-style-type: none"> ⑩ Corporate Planning ⑩ Reviewed at all levels

IBM Cognos TM1 helps answers Why?

Financial Analytics

Analyze and optimize performance



- Replaces manual, error prone spreadsheet-based practices
- Offers high performance, real-time, read-write capabilities.
- Analyzes and optimizes large, highly complex, rapidly changing data sets with real-time response.
- Analyzes profitability, sales mix, and price/volume variance.
- Improves planning, analytics, and "what-if" scenario modeling.

IBM SPSS Predictive Analytics

Optimized decisions made possible by pervasive, predictive, real-time decisions at the point of impact

Predictive Customer Analytics

Acquire
Grow
Retain

Predictive Operational Analytics

Manage
Maintain
Maximize

Predictive Threat & Fraud Analytics

Monitor
Detect
Control



Data Collection



CCI



Statistics



Modeler



Decision Management

Collaboration and Deployment Services

Cognos.
software
InfoSphere



ASSETS MANAGEMENT **IBM. maximo**



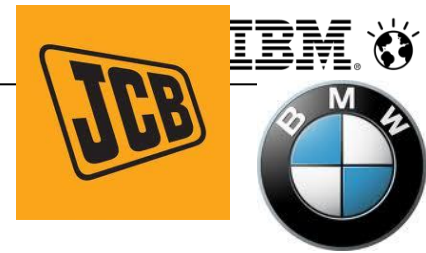
N. NETEZZA
an IBM® Company

WebSphere software

IBM Research
Etc...

Breadth of Applications across industries

- Campaign Response Prediction
- Customer Churn Modelling
- Profiling and Segmentation
- Fraud and Anomaly Detection
- Credit Scoring
- Demand Prediction/Forecasting
- Basket Analysis
- Text Analysis
- Predictive Maintenance



Customer Success Brief: Industrial

Challenges

The manufacturer and supplier had a reputation for reliability. Any downtime caused by heavy-duty machine failure would cost their customers millions of dollars. They wanted to minimize machine downtime in the field to identify potential problems – before the problems occurred.

Solution

Purchased IBM SPSS Modeler Premium to analyze data and determine patterns to identify key indicators for equipment failure and develop improved maintenance schedules and services.

Results

- Saved \$1 million in repair costs in less than 2 weeks
- 12-14x ROI in 4 months
- Improved maintenance schedules to decrease overall machine downtime by 20%



At a Glance: Construction equipment manufacturer and supplier

Location: North America

Employees: 1,700

Products: IBM SPSS Modeler Premium



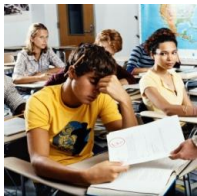
Answering key questions across industries



Which of my **insurance policy holders are unlikely to renew** next month? How could I persuade each one to stay loyal?



Which **products do my customers tend to buy together?** Can I leverage that knowledge to create combination offers and promotions that increase basket size and revenue per customer visit?



Which of our **students are performing below their predicted potential?** How should we intervene to get them back on track and avoid the possibility of their dropping out?



Which of my **overdue debtors are likely to pay?** How much can I recover from them, and which treatment will be most effective for each?



DebtCurrent.csv - Microsoft Excel

File Home Insert Page Layout Formulas Data Review View

A1 AccountID

	J	K	L	M	N	O
1	Income	Cust Age	Dependents	Occupation	MaritalStatus	CustomerGeoClass
2	71197.06972	54.729634	1	Trade	Single	town-middle income
3	69418.30361	49.546689	1	Manager	Single	suburban-middle income
4	59170.8344	40.507425	0	Professional	Married	inner-city-low income
5	71688.06936	50.197568	1	Professional	Married	suburban-middle income
6	59578.74172	51.769233	0	Trade	Divorced	town-middle income
7	51931.36312	70.276239	0	Other	Married	high income
8	49990.08614	52.523253	0	Professional	Married	town-middle income
9	60060.95901	47.000739	0	Admin	Married	town-low income
10	40625.03267	35.834923	0	Professional	Single	town-middle income

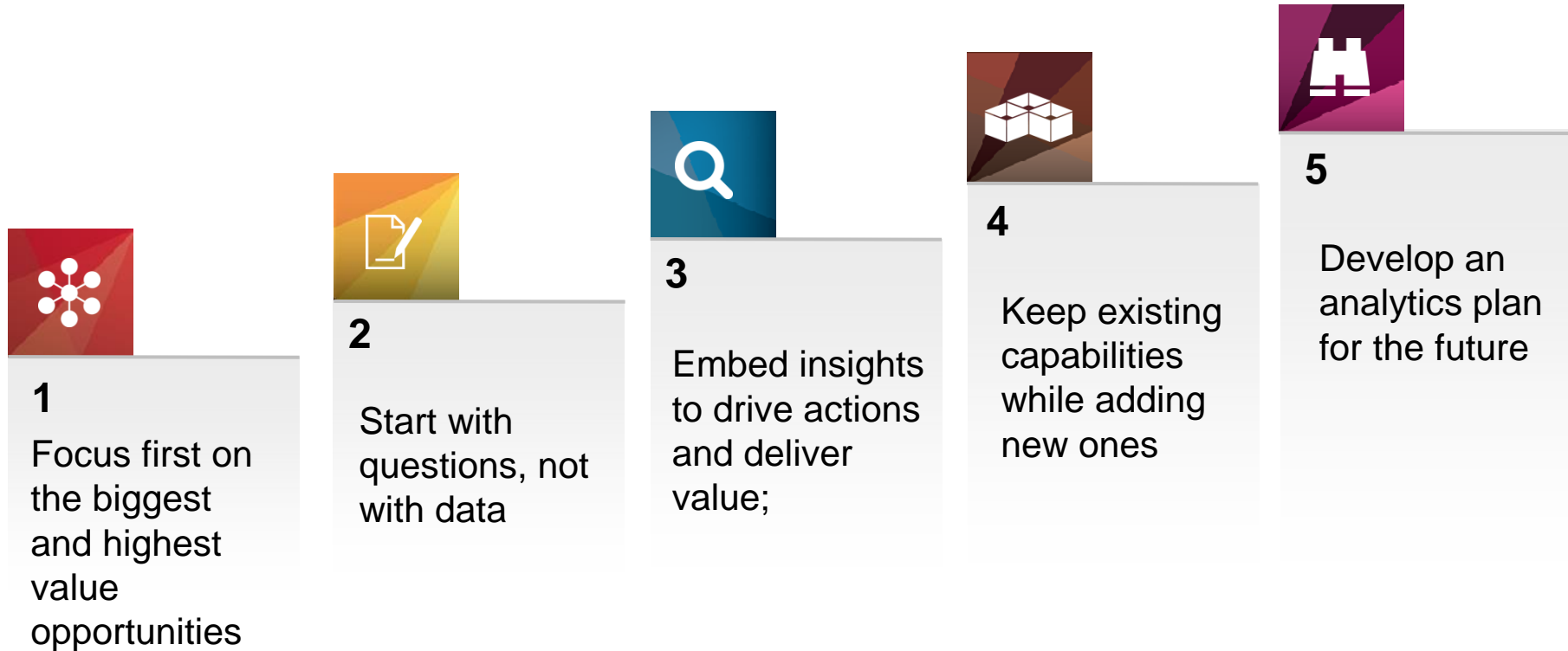
DebtCurrent

Ready 100%

1-1 of 1 items



The Path Of A Credible Analytics Strategy



Information is exploding whether you like it or not; companies that leverage this will outperform.

State Bank of India



Alternate Channel

NEFT / RTGS Transactions Analysis

Bank Network Analysis, Funds Management Analysis, Income Leakage Analysis, Customer-Beneficiary Analysis

Cash Deposits v/s GCC Txn Analysis

Study on Usage of GCC, Potential Branches for GCC machines installation

Productivity Analysis

Branch Productivity Analysis for NBG

-Teller (award staff) Performance
- Branch Performance : voucher analysis

Recent Analytics

SB Accounts Profitability Analysis
CGTMSME Analysis
Channel Preference Analysis

Marketing & Cross-Selling

ECS Debit Transactions

1.77 Lac potential Leads provided to Business for Loans Take Over

Inward Clearing Transactions Analysis

Potential leads Bank & Beneficiaries wise

Merchant Acquisition

Debit Card Usage in POS

Locations for POS machines, Merchant Tie-Ups, Loyalty Reward

SBI POS Machine Merchants Analysis

Performance Analysis SBI v/s Non SBI POS Machines

Predictive Analytics

Default Model for Home Loans

Logistic Regression Model for predicting default behavior

ATM Analysis

Credit Risk Analysis

Asset Quality Management

Cheques Returned Unpaid

Early warning signal for 19100 SMA/NPA accounts to Branches



Performance Management @ Asian Paints – Drivers



Enablement of critical planning & consolidation processes

- Consolidation of 20 subsidiaries

- Monthly Financial Planning - P&L Planning & Reporting

- Annual Business Planning - Top line planning, Overheads, manpower costs, other income, depreciation

- Sales Planning - Annual Sales Planning (Retail Audit) & Monthly Sales Planning

- Sales Budgeting

Actionable Insights

Ability to proactively identify and adapt to changing market needs based on history/trend and predictive analysis leveraging integrated data across multiple sources

Planning and tracking Market and Sales growth and performance along multiple dimensions to enable designing new strategies for growth e.g. Product/ Planning Cluster/ Town /Locality /

Robust performance management through analysis around “Plan versus Actual” and also “Impact of action taken” for

- Financial Plans (Overhead/ CAPEX/ Overheads/ Depreciation)

- Sales Plans

Intelligent Dealer engagement (deepening, retention and perpetuation strategies)through powerful insights around

- Dealer life cycle (Regular to Critical Retailer to Premium Retailer)

- Dealer TCO Sense check (CR ROI)

Empowered Sales Force with a “single window” of integrated analytics from “Sales to Service”, rendered role-wise (Stocks, Schemes, Service Metrics)

Insightful market spend analysis to track scheme and promotion efficiency/effectiveness

Marico

⑩ Brief profile

- Present in almost every FMCG market segment – hot oils, hair, skin, weight management, beauty and wellness amongst others
- Marico has also been rated one of India's 'Top 8 Global Challengers' by Standard & Poor



"IBM Cognos TM1 has helped us streamline and take our planning and budgeting processes to a new level. This tool has enabled us to shift our focus from data crunching to data analysis."

Girish Rao, IT Head , Marico

Challenge

- ⑩ Inflexible planning through spreadsheets
- ⑩ Seamless integration across multiple data sources including mySAP and SAPBW

Solution

- ⑩ Cognos TM1

Results

- ⑩ Reduces the time required for budgeting, planning and reporting.
- ⑩ Increases flexibility, accuracy and efficiency.
- ⑩ Easy to use and maintain.

ICICI Prudential AMC



“Cognos was able to meet the challenges faced by ICICI Prudential AMC in terms of reducing the time taken to prepare the MIS from 8 - 10 days to two days a month. Business users were able to perform analysis on their own. Implementation of the Cognos solution helped MIS drive sales”
Kalyan Prasath, Head - IT, ICICI Prudential AMC

10 Brief profile

- ICICI Prudential AMC, a joint venture between ICICI Bank and Prudential PLC., is into asset management business since 1998. With a present workforce of around 800 plus employees, the company has more than 160 branches across the country
- It is one of the largest Mutual Fund houses in India. As on 30th November 2009, the Asset under Management is Rs. 82138 Crores.

Challenge

- 10 Enabling management team with the information needed to get a deep understanding of business performance for effective decision making
- 10 Was not possible to generate daily sales reports and as a result, sales performance reviews could not have happened daily

Solution

- 10 IBM Cognos 8 BI

Results

- 10 Reduce the time to prepare monthly MIS reports from 8-10 days to just two days, resulting in business efficiency and cost saving
- 10 Sales information is now available on a daily basis with the result that the organization can drive business growth more effectively and can respond to emerging market conditions with greater agility

Ashok Leyland



⑩ Brief profile

- One of the largest commercial vehicle manufacturers in India – flagship company of the Hinduja Group
- Their buses carry over 70 million passengers everyday

“IBM Cognos TM1 has helped us streamline and take our planning and budgeting processes to a new level. This tool has enabled us to shift our focus from data crunching to data analysis.”
 Girish Rao, IT Head , Marico

Challenge	Solution	Results
<ul style="list-style-type: none"> ⑩ Ashok Leyland sought a robust financial planning and analysis solution that would address the needs of multiple departments and corporate functions ⑩ The overall objective was to simplify, streamline and establish an integrated finance information structure across key decision-support processes. 	<ul style="list-style-type: none"> ⑩ IBM® Cognos® 8 Planning software was identified as the preferred solution because it offered the flexibility and complex “what if” modeling capabilities the client desired. ⑩ Implementing the IBM® Cognos® 8 Planning software ensured that the client improve analytical and planning process efficiency across several key areas. 	<ul style="list-style-type: none"> ⑩ Extensive, faster, standardized and better-presented management information across the organization ⑩ Easier communication and implementation of strategic initiatives ⑩ Responds more effectively to changes in its own financial condition as well as to strategic opportunities identified in the marketplace

Birla Sunlife Insurance



⑩ Brief profile

- Part of the Aditya Birla Group conglomerate
- Currently one of the leading life insurance companies in the country.

Challenge

- ⑩ Needed a solution where they could identify existing customers who were at risk of not renewing their policy when their premium was due.
- ⑩ Additionally, wanted to identify customers who would be good candidates for cross-sell opportunities.

Solution

- ⑩ Deployed predictive analytics software to enable its marketing team to efficiently execute its outbound campaigns.
- ⑩ By using predictive analytics, the insurance company automatically identifies groups that are likely to respond to a cross-sell offer
- ⑩ The operations team identifies a group of customers most likely to not renew for whom attractive offers are designed

Results

- ⑩ Extensive, faster, standardized and better-presented management information across the organization
- ⑩ Easier communication and implementation of strategic initiatives
- ⑩ Responds more effectively to changes in its own financial condition as well as to strategic opportunities identified in the marketplace

Ultratech Cements

⑩ Brief profile

- By embracing a corporate performance-management system driven by robust analytical tools, this cement company gained the ability to pinpoint the exact blend of raw materials and power sources it needs to promote cost-effective production



⑩

Challenge	Solution	Results
<p>⑩ The fluctuating cost of raw materials and power sources has always made cost-effective cement production a challenge. By combining near-real-time data visibility and analytics, it's possible for managers to routinely procure the optimal materials for quality, cost-effective production.</p>	<ul style="list-style-type: none"> ⑩ IBM Cognos® Business Intelligence V10.1 ⑩ IBM Cognos TM1® ⑩ IBM DB2® for Linux, UNIX and Windows ⑩ IBM® Software Services for Information Management 	<ul style="list-style-type: none"> • Accelerates the production planning process by 50 percent • Integrates data across all manufacturing plants, which helps improve the efficiency of decision making across the entire enterprise • Delivers analysis and alerts that help managers determine the precise blend of materials and power sources needed to optimize production costs

A mobile communications service provider

⑩ Brief profile

- A mobile communications provider in Asia uses an improved, centralized, standardized data warehouse and business intelligence to help it unlock insight into what customers really want.

When your main source of revenue is driven by doctors, it is critical to have a deep understanding of what's happening in the field—how sales teams are performing, what the competition is doing and what you need to do to improve.

Challenge	Solution	Results
<p>⑩ 23 different communications regions in 23 different data systems. As the company began to consolidate the regions under a national umbrella, it needed a faster, more accurate, more comprehensive data and analytics system that each marketer and executive could operate with ease.</p>	<ul style="list-style-type: none"> ⑩ IBM® Cognos® 10 Business Intelligence ⑩ IBM InfoSphere® ⑩ IBM Power® 750 Express ⑩ IBM AIX® 5 	<ul style="list-style-type: none"> ⑩ Saved more than USD1.6 million in the first year, and expected to provide another USD3.3 million in savings in the next two years ⑩ Eliminated more than 100 redundant reports, decreasing the number of reports by 16% ⑩ Increased the number of users who can access the system concurrently from 5 to 50, an increase of 900% ⑩ Gave the marketing team the ability to target specific customer segments with highly desirable offers

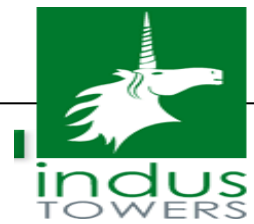
A pharmaceutical company in India

Before, employees had no confidence in the reliability of the company's data. Now, with more timely, accurate data that gets into their hands much faster, employees can use the insights they gain to do their jobs better and make customers happier.

⑩ Brief profile

- A mobile communications provider in Asia uses an improved, centralized, standardized data warehouse and business intelligence to help it unlock insight into what customers really want.

Challenge	Solution	Results
<p>⑩ Top managers lacked the insights needed to guide field teams effectively, sifting through stacks of outdated and often inaccurate reports to make decisions. They needed a new way to look at data, with a clear view of the field and a deeper understanding of the dynamics that influence business performance.</p>	<ul style="list-style-type: none"> ⑩ IBM® Cognos® Business Intelligence V10 ⑩ IBM InfoSphere® Warehouse 	<ul style="list-style-type: none"> ⑩ Helped enable executive managers to make competitive decisions based on marketplace realities instead of gut instinct ⑩ Increased marketing ROI by reducing overlap and focusing campaigns on doctors with the highest revenue potential ⑩ Boosted field productivity and sales performance by allowing better coordination among regional teams



Indus Towers

What if you could gain insight into your financial data to predict and proactively respond to trends that could negatively impact company growth?

This communications infrastructure company implements a game-changing financial planning process that uses “what-if” simulations, and trend, target-setting and variance analysis to make financial decisions that keep it on a strong growth trajectory

The Opportunity

This independent telecommunications tower company is one of the largest in India. Despite its size and continued growth, it was still managing its financial planning and reporting via electronic spreadsheets. Its regional sub-companies (called Circles) would prepare their reports and send them to the corporate level, where the finance department had to manually consolidate them and extract data with which to create profit and loss (P&L) statements and the annual operating plan (AOP). The process was cumbersome, but more importantly, it did not allow the company to make any meaningful projections or forecasts for target-setting goals, and was very limited in identifying cost or revenue trends to which the company could respond.

Solution Components

IBM Cognos BI and Planning
 IBM Global Business Services (GBS):
 BAO: (Business Analytics and
 Optimization) Services

Real Business Results

Shortens preparation time for Annual Operating Plan (AOP) development by 30 to 35 %
 Improves data accuracy by more than 20 to 25 %
 Decreases turnaround time for gathering information and data to do financial analysis by 50%
 Provides a significant improvement in data and business analysis in terms of various costs like rent, network and energy costs

The solution gives companies an integrated, accurate view of financial numbers, enabling them to plan, respond and implement financial decisions that will help them maintain or achieve leadership positions in their marketplace.

Large ITES organization in India

- Headcount Planning
- Revenue RGFTE Plan
- C&B – Country Specific
- Driver Based Cost
- TopUp Cost
- Projected P&L – (BPO & ITO)

- Capex – Infra & IT
- Recruitment

Thank You

