

Business Connect

IBM Software Universe 2013

Meet Possible

19th March, Colombo



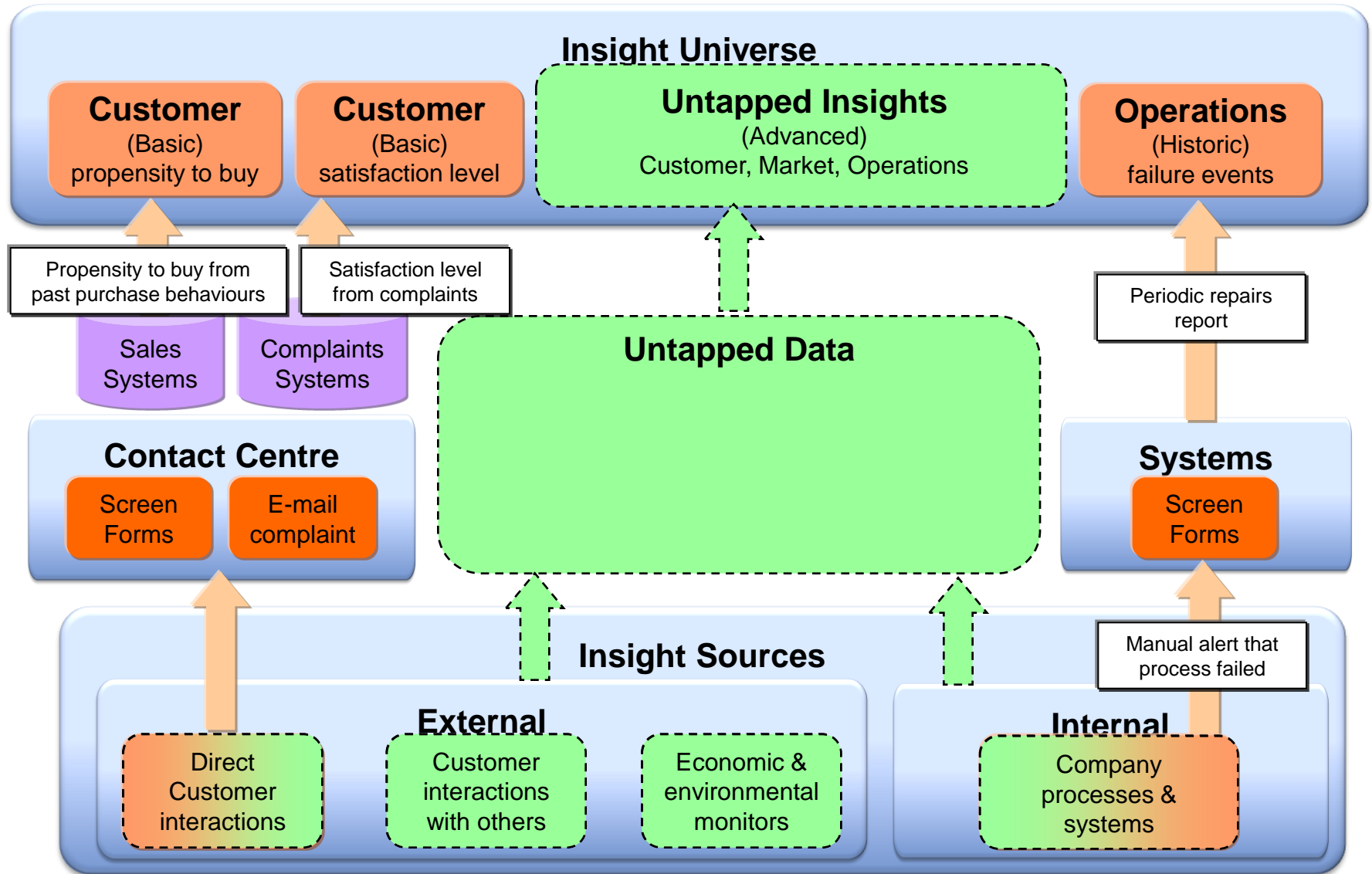
Title: New Era of Data Warehousing
& Analytics

Speaker Name: Vivek N Iyer

Designation : National Manager – Database
Sales

Is Big Data something new (don't we do it already today)?

Existing methods may be sufficient, but additional insights can give competitive advantage



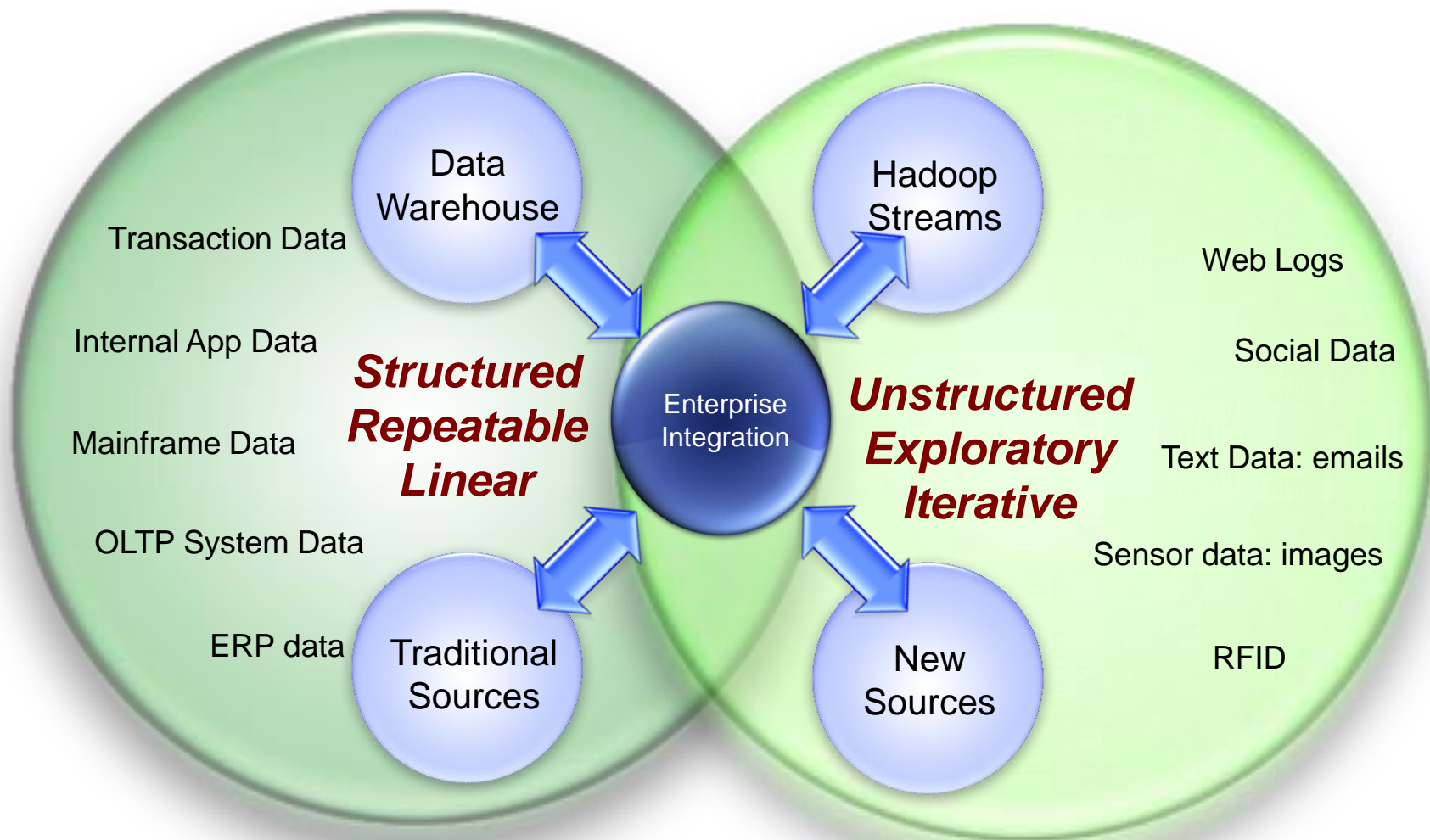
Complementary Approaches to harness the power of Big Data

Traditional Approach

Structured, analytical, logical

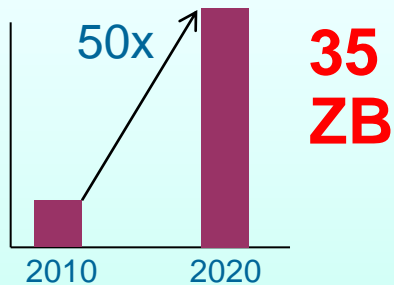
New Approach

Creative, holistic thought, intuition



The Characteristics of Big Data

Cost efficiently processing the growing **Volume**



Responding to the increasing **Velocity**



30 Billion RFID sensors and counting

Collectively Analyzing the broadening **Variety**



80% of the world's data is unstructured



Establishing the **Veracity** of big data sources

1 in 3 business leaders don't trust the information they use to make decisions

In Order to Realize New Opportunities, You Need to Think Beyond Traditional Sources of Data

Transactional & Application Data



- Volume
- Structured
- Throughput

Machine Data



- Velocity
- Semi-structured
- Ingestion

Social Data



- Variety
- Highly unstructured
- Veracity

Enterprise Content



- Variety
- Highly unstructured
- Volume

The 5 Key Use Cases



Big Data Exploration

Find, visualize, understand all big data to improve decision making



Enhanced 360° View of the Customer

Extend existing customer views (MDM, CRM, etc) by incorporating additional internal and external information sources



Security/Intelligence Extension

Lower risk, detect fraud and monitor cyber security in real-time



Operations Analysis

Analyze a variety of machine data for improved business results



Data Warehouse Augmentation

Integrate big data and data warehouse capabilities to increase operational efficiency

What can you do with big data?

Financial Services

- Fraud detection
- 360° View of the Customer



Utilities

- Weather analysis
- Smart grid management

Transportation

- Logistics optimization
- Traffic congestion



IT

- System Log Analysis
- Cybersecurity

Health & Life Sciences

- Epidemic early warning
- ICU monitoring



Retail

- 360° View of the Customer
- Real-time promotions

Telecommunications

- Geomapping / marketing
- Network monitoring



Law Enforcement

- Multimodal surveillance
- Cyber security detection



Improving next best action with big data analytics

Analyze information from all customer interactions and data sources - use that data to gain customer and operational insights to take sales, marketing or service actions



Create a customer-focused enterprise

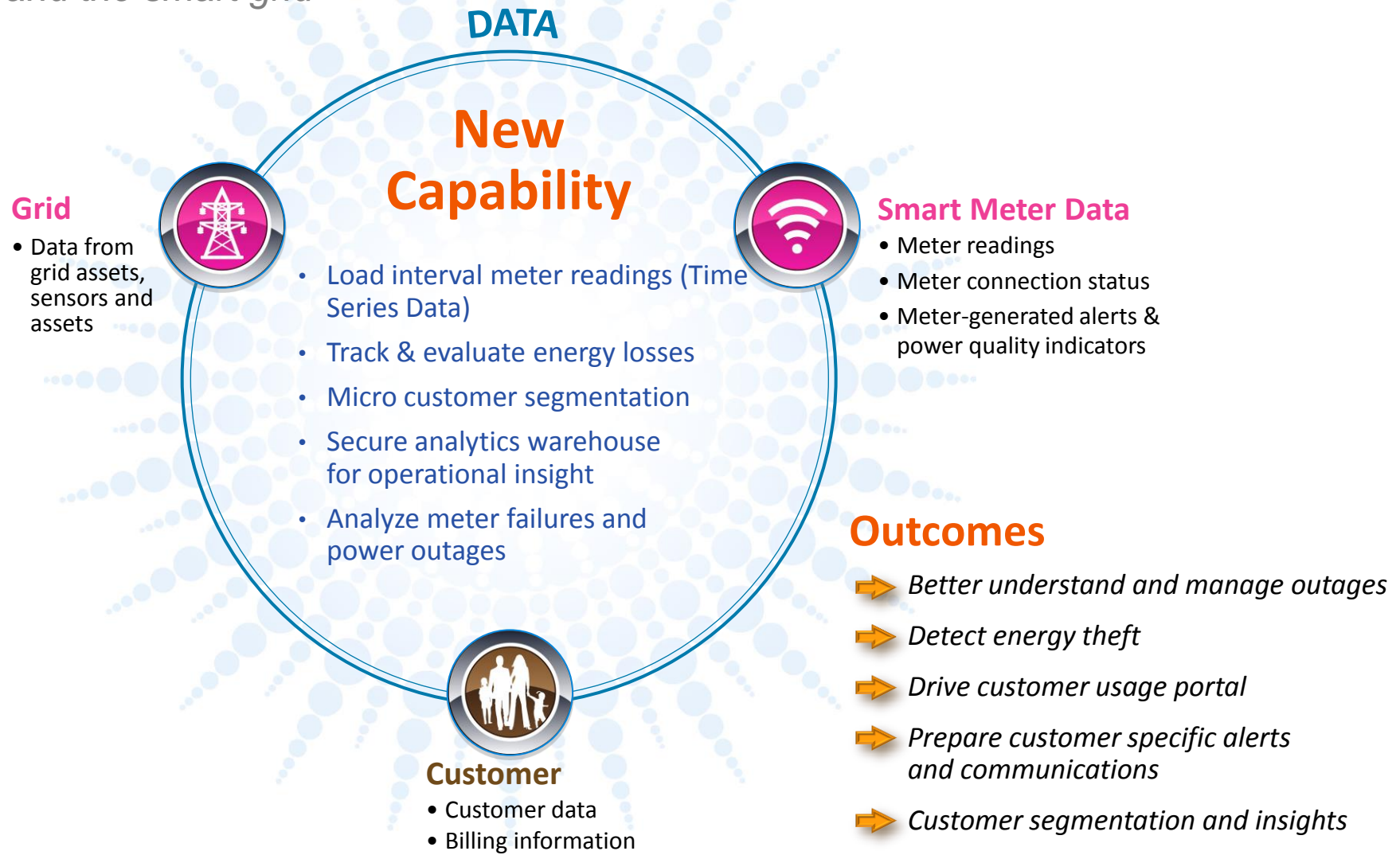


Big data for smart meter analytics

Gain customer and operational insight from smart meters and the smart grid

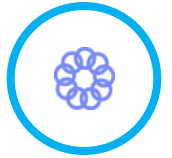


Transform customer operations



Execute dynamic pricing with big data analytics

Real-time price comparisons of top competitors and synchronizing price changes with demand and deliver real-time offers



Build smarter merchandising & supply networks

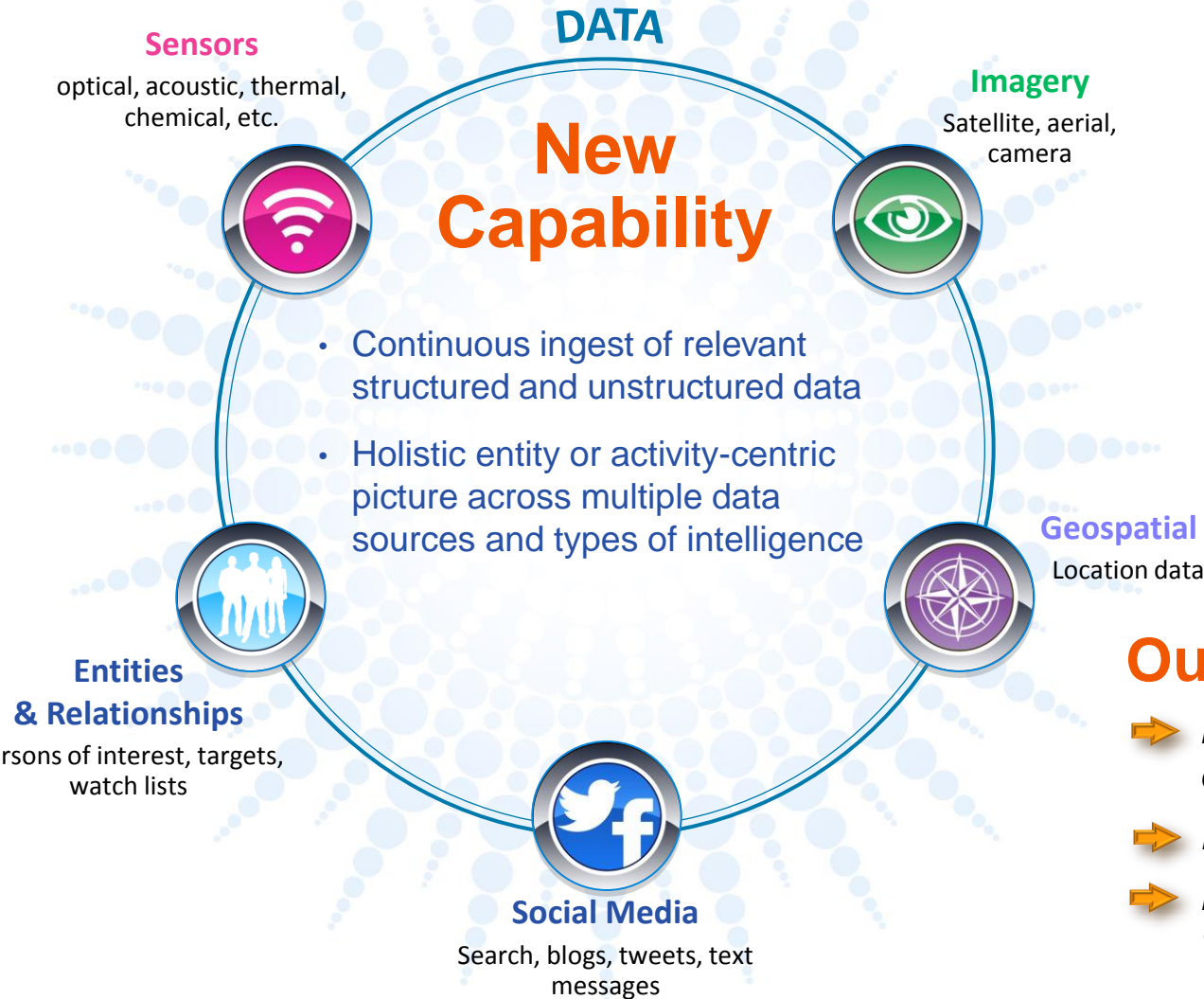


Threat & crime prediction and prevention

Identify and respond to threats and crime before it materializes



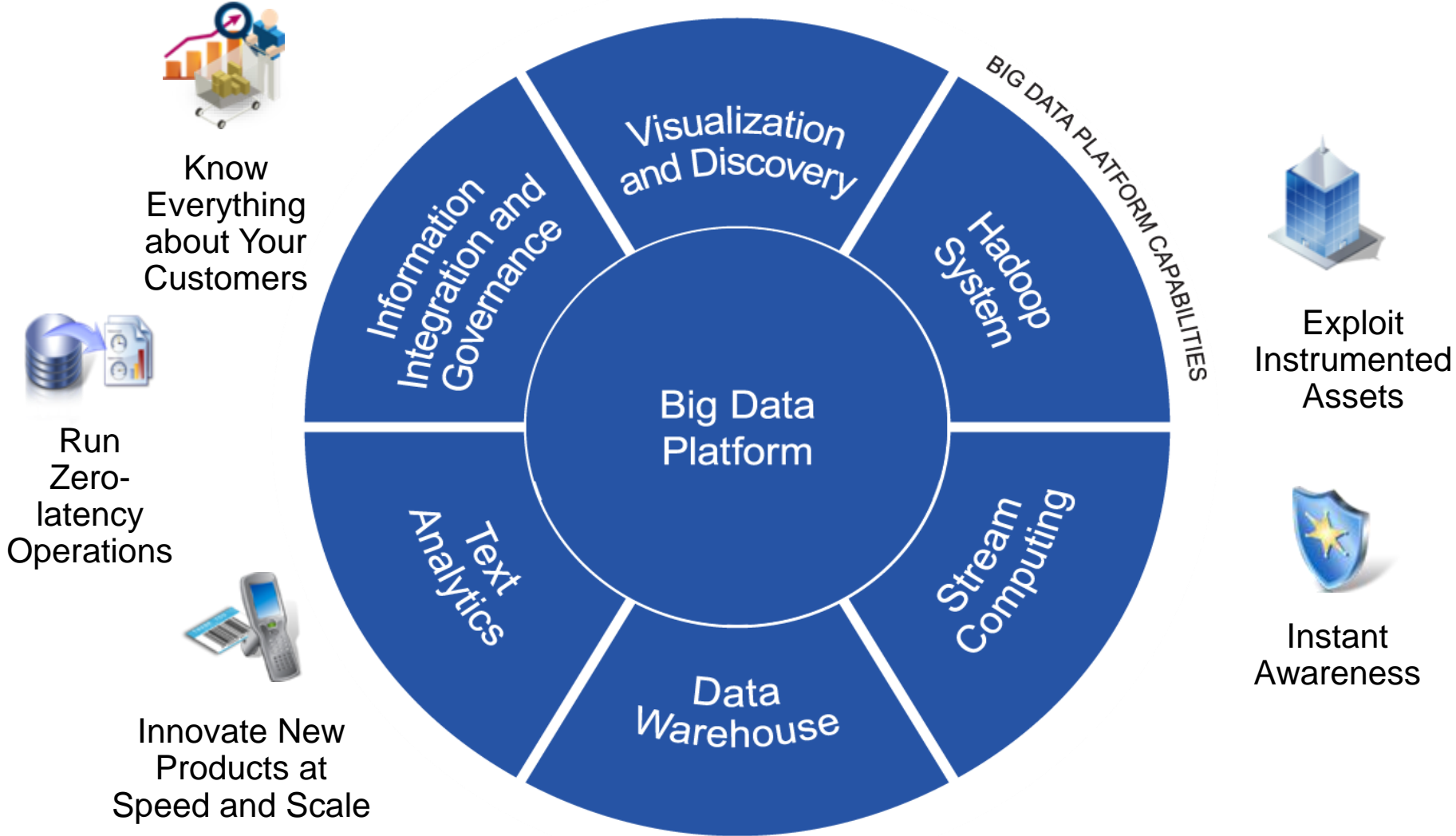
Strengthen national security, defense and public safety



Outcomes

- ➔ *More reliable understanding of target or area of interest*
- ➔ *Finds the dots, connects them*
- ➔ *Helps analysts understand what they don't know*

Entry Points to a Big Data Project



Getting the Value from Big Data – Why a Platform?

The Whole is Greater than the Sum of the Parts

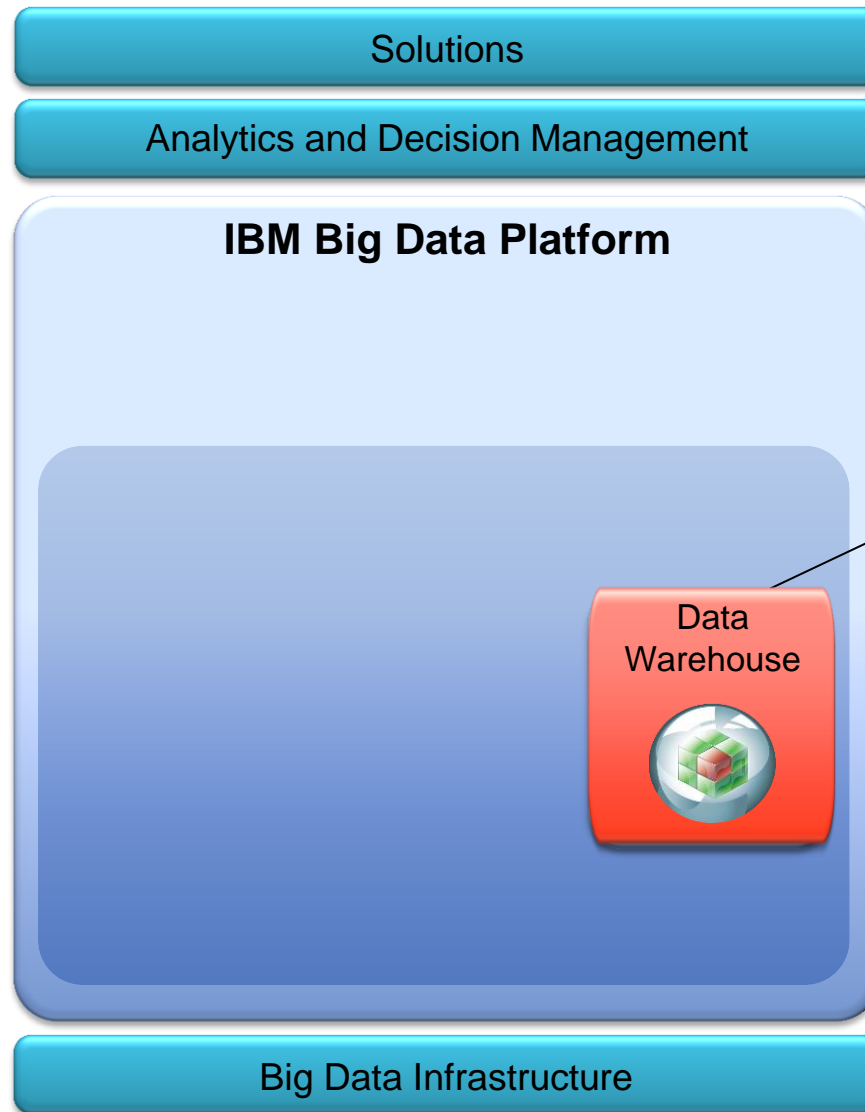
- **Almost all big data use cases require an integrated set of big data technologies to address the business pain completely**
- **Reduce time and cost and provide quick ROI by leveraging pre-integrated components**
- **Provide both out of the box and standards-based services**
- **Start small with a single project and progress to others over your big data journey (*value is additive*)**



The Big Data Platform



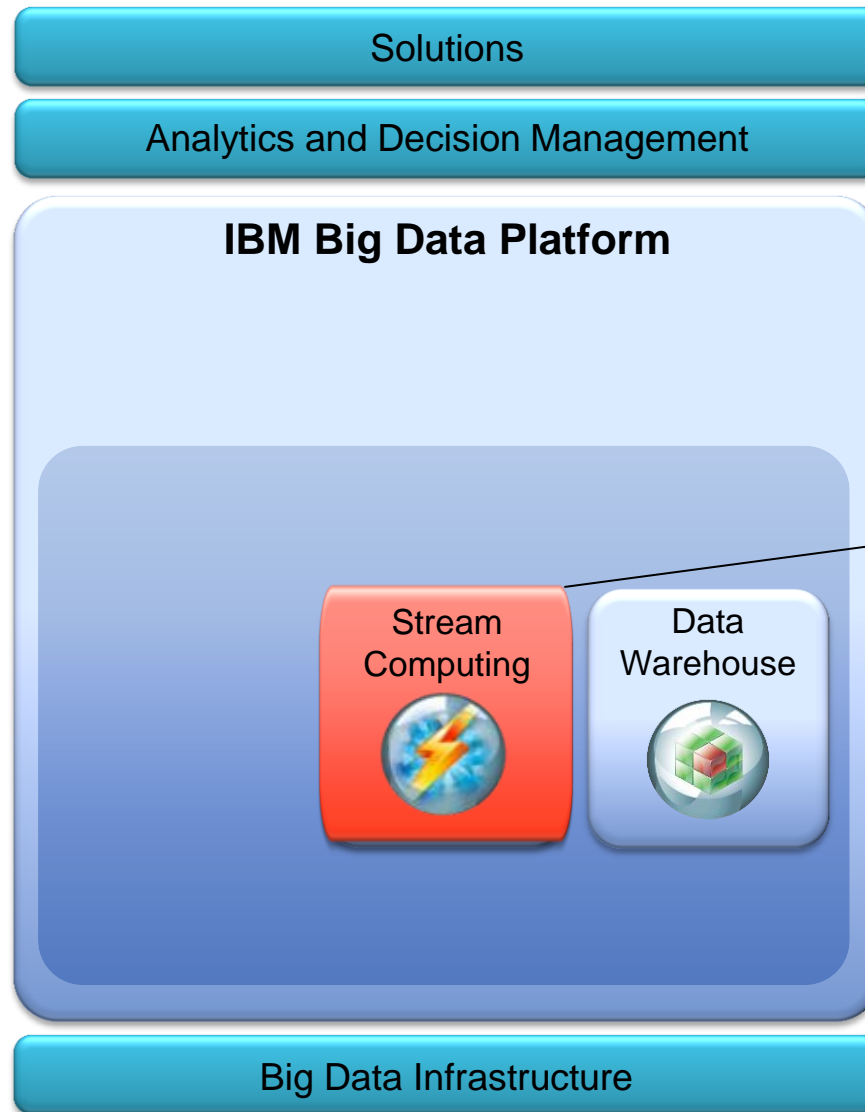
The Big Data Platform



Delivers deep insight with advanced in-database analytics & operational analytics

- **PureData for Analytics** – expert integrated systems to make advanced analytics faster & simpler
- **InfoSphere Warehouse** -- data warehouse software to access operational info in real time.

The Big Data Platform



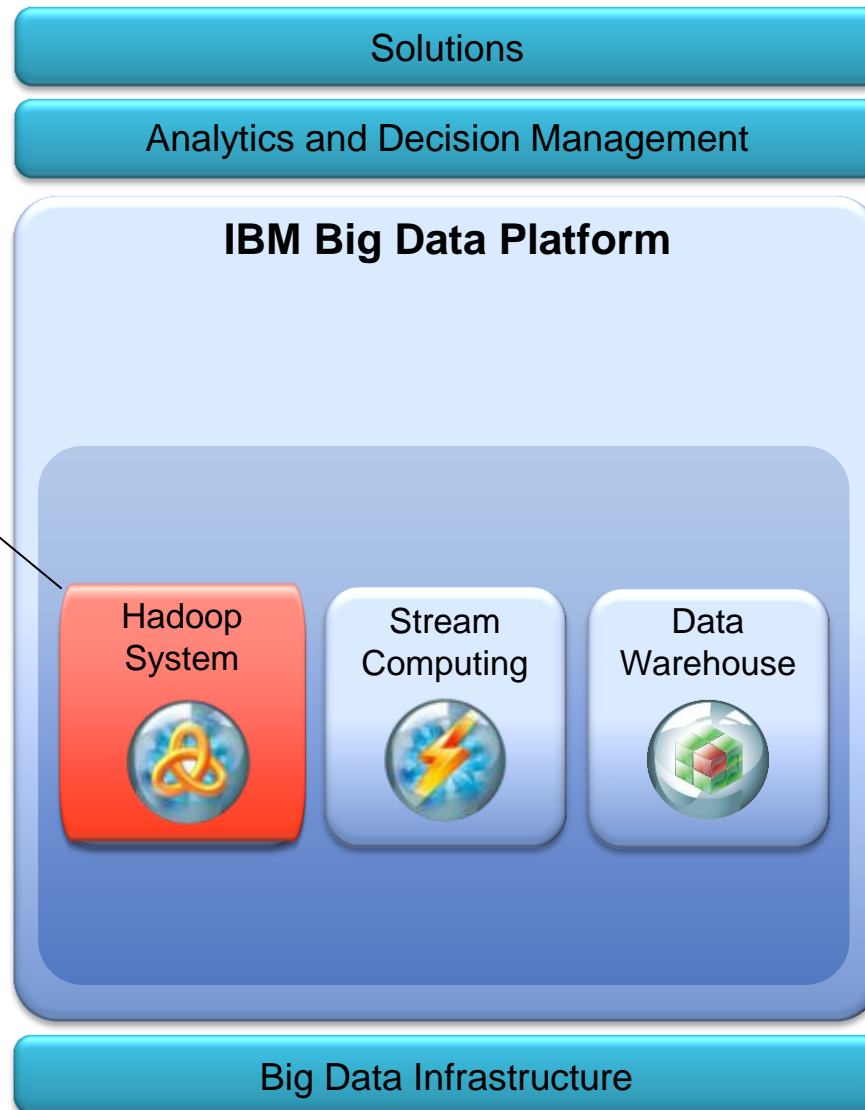
Analyze streaming data and large data bursts for real-time insights

- **InfoSphere Streams**
– software enabling continuous analysis of massive volumes of streaming data with sub-millisecond response times

The Big Data Platform

Cost-effectively analyze Petabytes of unstructured and structured data

- **InfoSphere BigInsights** -- enterprise-grade Hadoop system enhanced with advanced text analytics, data visualization, tools, & performance features for analyzing massive volumes of structured and unstructured data.



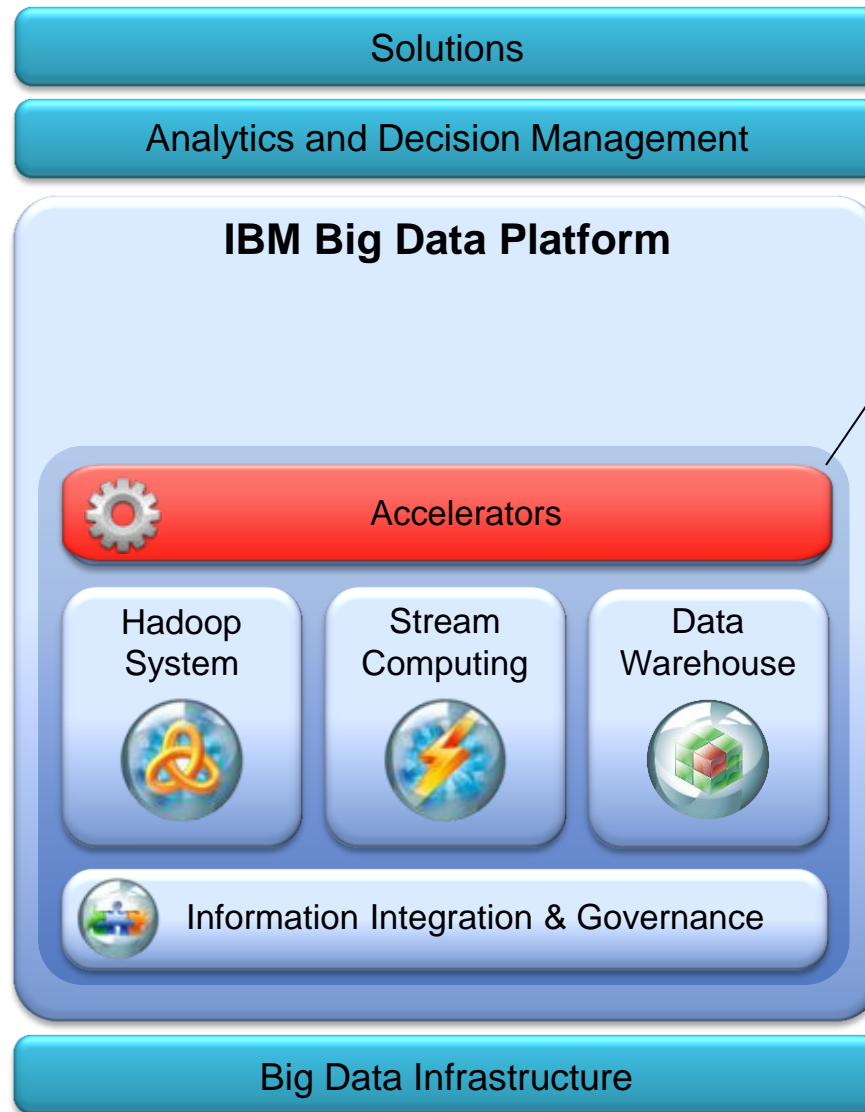
The Big Data Platform

Govern data quality and manage the information lifecycle

- **InfoSphere Information Server** –Cleanses data, monitors quality and integrates big data with existing systems
- **InfoSphere Optim** – manages business information throughout its lifecycle
- **InfoSphere Master Data Management** – manages and maintains trusted views of master and reference data
- **InfoSphere Guardium** – real-time database security and monitoring



The Big Data Platform



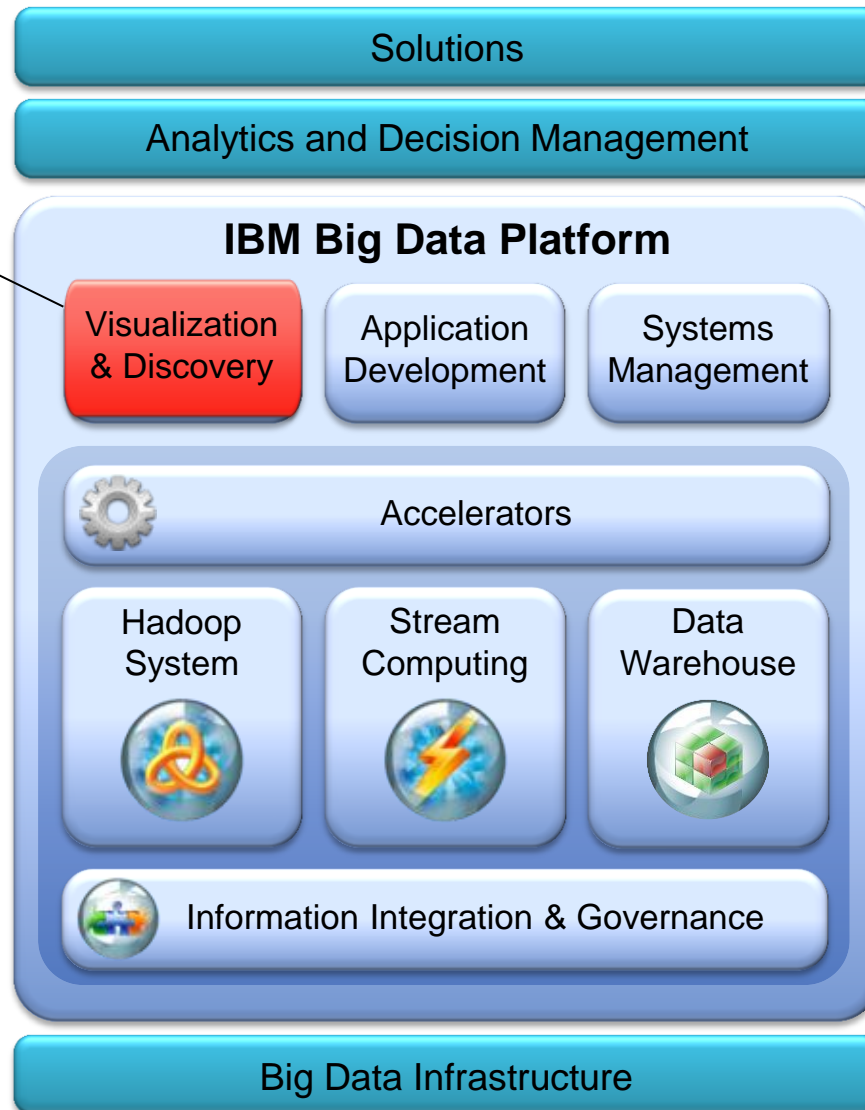
Speed time to value with analytic and application accelerators

- **Analytic Accelerators** – text analytics, geospatial, time-series, data mining
- **Application Accelerators** – financial services, machine data, social data, Telco event data
- **Industry Models** - comprehensive data models based on deep expertise and industry best practice

The Big Data Platform

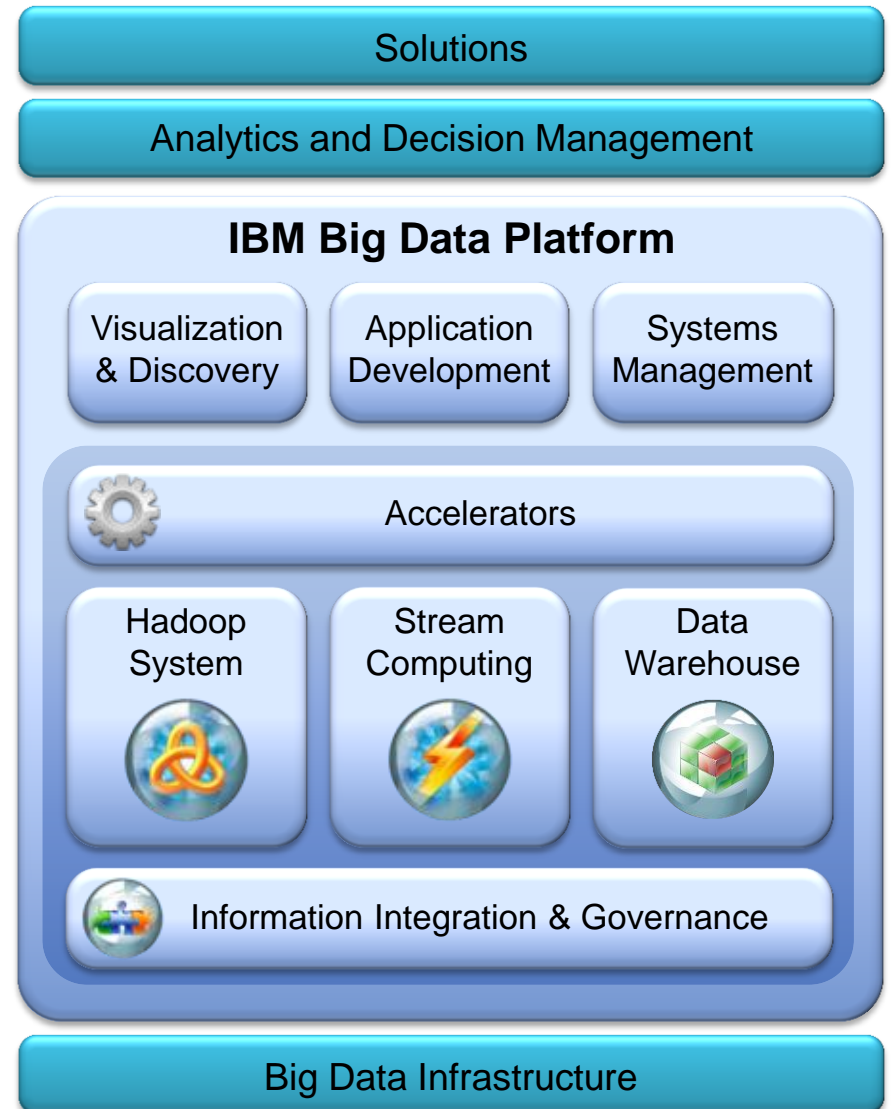
Discover, understand, search, and navigate federated sources of big data

- **InfoSphere Data Explorer** – Discovery and navigation software that provides real-time access and fusion of big data with rich and varied data from enterprise applications for greater insight



The Big Data Platform

- Process any type of data
 - Structured, unstructured, in-motion, at-rest
- Built-for-purpose engines
 - Designed to handle different requirements
- Analyze data in motion
- Manage and govern data in the ecosystem
- Enterprise data integration
- Grow and evolve on current infrastructure



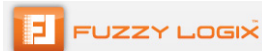
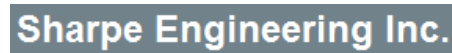
And we are driving hundreds of new Analytics and Big Data programs

- Active Relationships with 200+ Universities Around the World
 - Building new programs and enhancing existing programs to train the skilled professionals of the future in:
 - Analytics
 - Big Data
 - Business Intelligence and Analytics
 - Predictive Analytics
 - Computing and Informatics
 - Math, Statistics
 - Operations Research
 - D

Majority of new programs are Masters level in Business Schools



And building an extensive business partner ecosystem for Big Data and Analytics (Over 330 partners!)



THINK

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