How do successful organizations implement data and analytics initiatives to drive differentiation and growth?

Today, business success and digital initiatives are fueled by data and analytics strategies that scale with business ambitions. According to Gartner experts, “the need for more accurate contextual awareness enabled by capabilities to scenario plan, optimize, prioritize and focus investments are now priorities.” Agile data and analytics capabilities are essential to build sense-and-respond capabilities and are leading organizations to unprecedented cycles of rapid innovation to meet the new requirements.

From our expert research and interactions with thousands of companies in a wide range of industries, we’ve compiled smarter data and analytics best practices into a customizable roadmap. Your organization can use this roadmap to understand the key stages, resources and people required to plan and execute an effective data and analytics initiative.

Some of the top questions of the data and analytics initiative are:

1. Is the scope of the initiative strategic, operational or governance?
2. What are the key stages and activities?
3. Which leaders and teams need to be involved?
What are the key stages?

This best-practice insight is distilled from interactions with clients who have successfully implemented data and analytics initiatives. This roadmap shows the sequence of objectives and desired outcomes and is useful for aligning all stakeholders.

A few key milestones and a sample of associated Gartner resources are highlighted below, but the full roadmap will include complete details of all milestones and resources for each stage.
Create vision and strategy

Establish stakeholder buy-in for the data and analytics program

Selected tasks include:

- Understand key business priorities and how data and analytics aligns with delivering business value
- Establish a current-state baseline to serve as a foundation for continuous improvement
- Identify opportunities to monetize and exploit data assets via use cases from other enterprises
- Design an agile data and analytics strategy that responds to a changing landscape of business and technology opportunities and risks

Sample of associated Gartner resources include:

- Analyst inquiry: Engage with an analyst on deriving business value of data and analytics
- IT Score for CIOs
- Research: Dare to Dream! Give Your Data and Analytics Programs a Mission to Transform Business and Improve the World
- Consultation by phone: Introduction to the Gartner BuySmart™ process and review of strategic, financial and technical requirements to identify where spend management is needed

+ more
Establish operating framework
Develop a balanced operating model with enhanced operational efficiencies

Selected tasks include:

- Identify the roles and competencies and target the operating model needed to create a data-driven organization
- Create a two-tiered organizational model: centralized team working with decentralized teams
- Design the architectural framework for the data and analytics platform
- Create distinct stewardship bodies to oversee strategic concerns versus tactical data solution imperatives

Sample of associated Gartner resources include:

- Research: To staff key activities, data and analytics leaders should focus on the new operating model for digital
- The New IT Operating Model for Digital
- Toolkit for Chief Data Officer Job Description
- Analyst inquiry: Engage with an analyst to discuss maturity model or data and analytics programs
- Data & Analytics Sample Strategy Presentation

+ more
Establish governance
Implement governance standards and procedures for data risk mitigation structure

Selected tasks include:
- Establish consistent data definitions standards and define governance policies
- Develop data management and integration framework to meet emerging challenges
- Measure accuracy, non-duplication, competitiveness, relevance and timeliness of data
- Develop framework for resisting data hoarding, preventing data hijacking and combating privacy shaming

Sample of associated Gartner resources include:
- Analyst inquiry: Understand how organizations can apply analytic capabilities to improve performance and optimize decision making
- On-site workshop: Best practices for implementation of a governance program
- Research: Understand tools, data models and data warehouse/lake that are used in both business intelligence and analytics scenarios
- Unified Toolset for Business Intelligence and Analytics

+ more
Continuous intelligence

Demonstrate quick wins derived through data-driven insights

Selected tasks include:
- Integrate data and analytics capabilities of digital business platforms and ecosystems to support enterprise growth, speed and agility
- Derive quick wins by equipping business users with analytic models to understand present realities and predict future states
- Automate process of visualizing and analyzing data by using augmented analytics

Sample of associated Gartner resources include:
- Facilitated networking: Meet with a peer member
- Analyst inquiry: Create a narrative linking program outcomes to corporate goals
- Consultation by phone: Review the entire engagement and address future state and other critical priorities

+ more
Refine and progress
Continuously improve and enhance data and analytics maturity

Selected tasks include:

- Track metrics: Seek feedback to assess and improve program effectiveness
- Reassess data and analytics strategy in light of emerging technologies such as the Internet of Things, artificial intelligence, machine learning, etc.
- Devise new enterprise processes roles and skills: Plan is informed by maturity, culture and risk appetite

Sample of associated Gartner resources include:

- Research: Learn about new approaches to managing data and analytics programs and how leaders can master them
- Use Bimodal Enterprise Information Management for Data and Analytics Program Innovation
- Research: Rewire organizational culture for an AI-infused future
  + more
Who needs to be involved?

The most successful companies establish cross-functional teams for their data and analytics initiatives. We have outlined the recommended functions to involve and their roles to ensure the best success in hitting the milestones.

CIO: Plays a part in the progressive data movement by creating a collaborative working structure with the strategic document outsourcing (SDO) and chief analytics officer with clear responsibilities for each group; allows collection of data from sources and helps data and analytics teams establish infrastructure for the data and analytics domain

Applications leader and team: Identify data assets in application logs or transactional databases that can be used for business value; coordinate with enterprise architecture (EA) teams to improve data access and interactivity with API-driven applications

Data and analytics leader and team: Set the foundations and day-to-day governance of the data, working aligned with the IT and business teams; create data literacy program and work with leaders on defining vision and strategy

Enterprise architecture leader and team: Consider information and data architecture as part of the overall EA and not as an afterthought

Infrastructure and operations leader and team: Establish and maintain new types of assets related to data and analytics and budgeting

Sourcing, procurement and vendor management leader and team: Work with data and analytics leaders to allow for faster experimentation with third-party vendors while the infrastructure is being decided on and revised

Technical professionals team: Plan a data and analytics technical roadmap, design the data pipeline and stores, select tools and vendors, and architect and implement data and analytics solutions
Client success story: Data at the Core and the Power of Analytics to Transform

**Mission-critical priority**
Watercare undertook a large, accelerated strategic transformation effort focused on people, which included its workforce and customers, to deliver changes across technology, process and data to better anticipate and respond to customer needs.

**How Gartner helped**
Gartner was an independent voice guiding the Watercare team of executives through the planning and execution stages, including:
- Data strategy support
- Asset management strategy guidance
- Planning workshops with experts
- Strategy execution and delivery of plan advice
- Future-looking research, thought leadership materials and tactical delivery elements
- Best-in-class templates or toolkits
- Third-party partner negotiation strategy and relationship planning
- Gartner conferences for tactical advice, future agendas and networking

**Mission accomplished**
By working with Gartner, Watercare was able to:
- Increase customer centricity and service
- Optimize business with technology, increased organizational pace and agility
- Use real-time data for risk mitigation and fraud detection
- Drive decisions with data, data visualization and predictive insights
Gartner roadmaps are designed to help CIOs and IT leaders successfully execute new initiatives and reduce time and costs. Our suite of roadmaps provides extensive coverage of IT leaders’ top priorities, such as:

- Data and Analytics
- Digital Transformation
- Security
- Data Strategy
- Cloud Strategy
- Maturing Information Security
- Cloud Migration
- IT Organizational Design
- Customer Experience
- ERP Transformation

Explore additional resources to learn more about data and analytics

→ 100 Data and Analytics Predictions Through 2024
→ Data and Analytics for Digital Transformation
→ Data and Analytics Leaders: Rewire Your Culture for an AI-Augmented Future