

# How Evolgen Blended Analytics Is Helping to Transform IT Efficiency and Value

---

An ENTERPRISE MANAGEMENT ASSOCIATES® (EMA™) White Paper  
Prepared for Evolgen

September 2015



*IT & DATA MANAGEMENT RESEARCH,  
INDUSTRY ANALYSIS & CONSULTING*

# How Evolven Blended Analytics Is Helping to Transform IT Efficiency and Value

## Table of Contents

- Executive Introduction ..... 1
- How and Why IT Organizations Are Under Stress..... 1
- How and Why Blended Analytics Can Come to the Rescue ..... 2
- An Introduction to Evolven’s Analytics Engine..... 3
- Interview with a Large Financial Services Organization Targeting Performance and Dev/Ops with Evolven’s Blended Analytics ..... 4
- EMA Perspective..... 5
- About Evolven ..... 6



# How Evolgen Blended Analytics Is Helping to Transform IT Efficiency and Value

## Executive Introduction

This report introduces a fresh way of looking at IT analytic investments using an approach that EMA calls “tiered analytics” and Evolgen calls “Blended Analytics.” EMA research, industry dialog, and consulting all indicate that while there is clearly a growing trend to aggregate big data in data warehouses for IT operations, blended analytics offers a complementary approach that is often far more efficient—whether for performance management, DevOps, configuration management, change management, or for other use cases. This report will examine more closely how and why blended analytics adds value. It will also introduce Evolgen’s distinctive analytics capability in context with a deployment interview showing strong benefits in change, performance, and in particular, in facilitating a DevOps initiative through superior levels of insight and automation.

## How and Why IT Organizations Are Under Stress

We have come to what the industry in general is calling the “digital age,” a period when IT services are not only supporting business and organizational efficiencies, but are actually helping to transform business models and business effectiveness. This ought to elevate the role of IT in the eyes of its business stakeholders, but too often the opposite is true. Public cloud offerings for infrastructure as a service (IaaS) and software as a service (SaaS) frequently challenge IT organizations to compete in delivering value as well as in optimizing costs, while individual lines of business are often adopting “shadow IT” organizations that threaten central IT leadership and control.

In the meantime, many IT organizations remain their own worst enemies. Traditional siloed ways of working are no longer able to support the need to adopt a more holistic service-aware and business-aware approach. The following issues stand out as persistent challenges for today’s IT leadership:

- **Reactive versus proactive approaches to working** – Even after decades of effort and some amount of progress, the sad truth is that most IT organizations remain fundamentally reactive in their approach to managing problems and facilitating changes. This leads not only to excess operational costs, but also to poor service performance and a fundamental inability to adapt to increasingly dynamic business demands.
- **Siloed tools and siloed perspectives** – More often than not, IT organizations are reactive in large part because of siloed toolset investments and the fragmented ways of working they promote. These disjointed processes often promote a reluctance to share information among multiple stakeholders.
- **A changing consumer population** – One of the attributes of the digital age is a consumer population that is far more demanding and astute than ever before. This includes internal business consumers and organizational IT service consumers as well as external customers and partners. Higher expectations and the increasing ability to choose and shop for services elsewhere are putting pressure on IT for improved levels of efficiency and value as never before.
- **More dynamic business requirements** – Similarly, business priorities are also shifting. In many cases, businesses are focused on digital transformation initiatives as they seek to optimize both their brands and their overall operations via smart investments in digital assets and digital services. For IT to become a proactive partner in these changes requires not only more adaptive technologies, but also new ways of thinking and working.
- **IT’s unknown unknown** – For IT to meet these challenges head on not only requires a more facile and effective way of addressing known issues, but investments in technology and process that can help IT organizations step up to what still may not be visible to them. The *invisible* may come from a whole array of unforeseen technology symptoms and interdependencies, with often unforeseen business impacts that can challenge the very credibility of IT.

## How and Why Blended Analytics Can Come to the Rescue

*What is blended analytics?* A short answer is that a blended (or tiered) analytic layer is designed to capture context and relevance from existing data sources (monitoring tools, automation tools, ITSM tools, CMDB/CMS, etc.) and normalize and correlate these as a consistent set of dynamic insights. Blended analytics is *not* about putting everything into one big pot for mining and hoping for the best with data mining, trending, or even anomaly detection. The focus in blended analytics is less on big data per se, and more on relevance, context and time to value with the focus 100% on analytics versus undirected data volumes.

More specifically, **blended analytics** has the following characteristics:

- It is optimized for real-time and often predictive requirements. But it should also support advanced historical trending capabilities.
- It differs from classic warehousing in its focus on near-real-time data, discovery and data collection, service modeling and its distinctive use of trusted sources.
- Because of its blended (or tiered) capabilities, it can scale well to leverage other analytic resources as inputs.
- It is uniquely suited to combining change management with performance, security, capacity optimization, and improved IT efficiencies via integrated insights from service modeling.

This last is critical, as EMA research<sup>1</sup> has demonstrated time and again that there combining analytics with service modeling insights into interdependencies is a winning combination. While so far many in the industry have neglected this handshake, the differences in value and effectiveness are often dramatic when separating out successful analytic deployments that leverage service modeling from those that struggle for context and relevance. Some of the differentiators can be seen in the following bullets:

- **Speed** in data collection versus classic Extract, Transform, and Load (ETL) processes
- **Speed** in analysis, real time or near
- **Context** via increased relevance in sourcing and interdependencies in discovery
- **Flexibility** achieved by leveraging federated trusted sources versus one single melting pot
- **Time to value** from “months to days,” or in some cases “hours to minutes”

---

<sup>1</sup> [“EMA Research Report: The Many Faces of Advanced Operations Analytics,”](#) September, 2014.

# How Evolven Blended Analytics Is Helping to Transform IT Efficiency and Value

## An Introduction to Evolven's Analytics Engine

Evolven's distinctive approach to Blended Analytics starts with collecting directly a critical, yet frequently overlooked, data source – the **actual changes** made in the IT environment. Evolven monitors and analyze these *actual* changes in most granular level and across the entire IT environment. Evolven can track change in various dimensions—from *configuration* to *data* anomalies, from *capacity* issues to unexpected shifts in *workload* sequence or volume to actual changes in *code*.

Monitoring and analyzing the actual changes is critical since changes are the true root-causes to performance and availability incidents.

On top of all this, Evolven's blended analytics can also calculate risk scores for proposed changes based on insights into current conditions as well as performance and change histories.

To gain a cross-silo view and insights, Evolven also assimilates and normalizes and correlates the actual changes with: **symptoms**—such as those associated with events, time-series data, and log files—across a wide range of application performance management tools, event management capabilities, and other third-party solutions. Moreover, Evolven also provides insights into **contexts**—as can be derived from release and deployment automation, service desk, configuration management databases (CMDBs), and application discovery and dependency mapping (ADDM) tools.

Evolven's distinctive approach to Blended Analytics starts with collecting directly a critical, yet frequently overlooked, data source – the actual changes made in the IT environment.

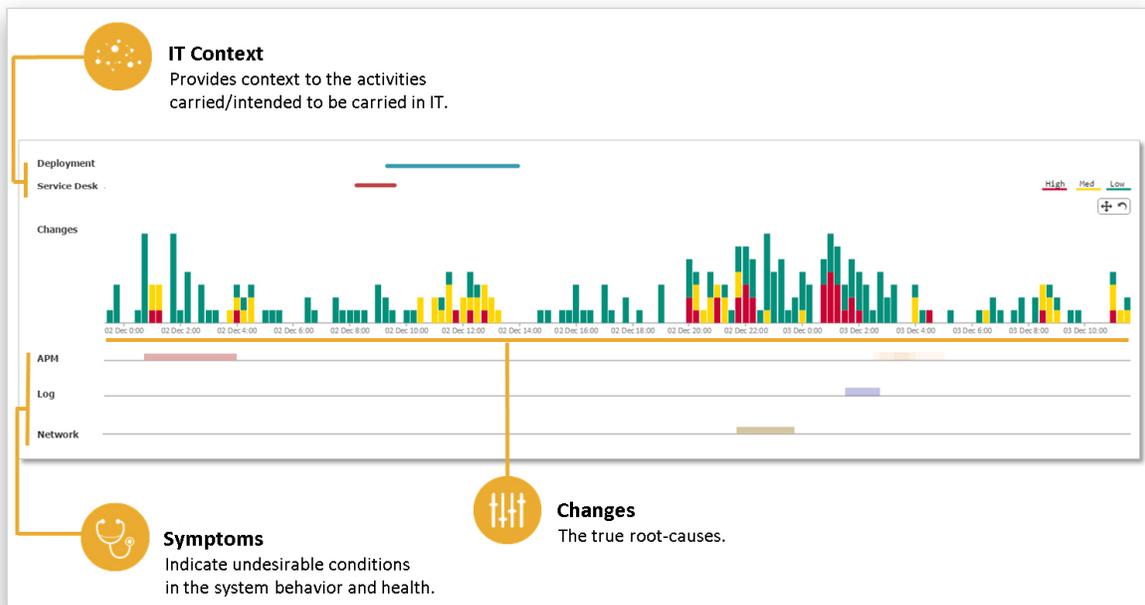


Figure 1: Evolven Blended Analytics collects all actual changes, and correlates them with other operational data (like APM, log, release automation and service desk). Machine learning analytics turns this data into actionable insights.

## Interview with a Large Financial Services Organization Targeting Performance and Dev/Ops with Evolgen's Blended Analytics

This interview spans a number of themes. It reflects a mature CMDB deployment with traditional roots evolving toward a far less traditional approach with much enriched capabilities in automation and analytics through Evolgen. As distinctive as it is, it also typifies the trend to move service management requirements through automation and agile application development.

### Can you briefly describe your role and your organization?

Our IT organization spans 14 countries with about a 9,000[-person] staff. I am the product owner for a number of products that are currently classified as "ITSM and CMS." However, these labels are changing, and another way to view my responsibilities is that I also own *contracts management, operations, resilience, and planning*—four of 16 overall focus areas across all of IT.

### Can you share some of your history in moving from a more ITIL-centric approach to focus more on agile, automation, and analytics?

Six years ago we implemented [ITIL] Incident, Problem, Change, and Configuration Management, supported by Helpdesk and Service Request Management. In all honesty this initiative was institutionalized by purists and turned into an objective all its own. After years of red tape that didn't bring us the values we needed, we moved away from some portions of the ITIL v3 framework for a more automated approach. We did keep Service Desk and Incident Management from ITIL intact, however. To sum up, you might say that we moved away from some portions of the ITIL v3 framework for a more automated agile Continuous Development/Continuous Integration (CD/CI) approach that we were able to achieve in large part through our investments in Evolgen.

---

The benefits of our Evolgen investments are substantial. For instance, it used to take 11 weeks to provision a VM, and now it takes eight minutes.

---

### Currently, what are your leading directions in CMDB/CMS, automation, and analytics?

We are bringing automation and analytics much more closely into the CMS fabric with a distributed framework. We have localized tools that can analyze and own configuration information in near-real time, whereas our core CMDB is updated, in general, on a 24-hour basis. But we're also aggregating the data from multiple discovery and other tools into our core CMDB so we have a clear image of the impacts of change—both vertically for depth and horizontally for breadth across our organization. We leverage Evolgen's Blended Analytics to keep a more dynamic record and facilitate automation that's critical for performance and change management and our DevOps initiative.

We are also adding a federated group of 11 CMDBs from a different vendor that are more closely aligned with our needs for process optimization, including our support for DevOps. With the advent of a more automated and analytically aware environment through Evolgen, we have also been able to reduce our core CMDB administrative team considerably.

### Can you share more about your directions in automation?

We started out automating event management—targeting user interfaces for critical business applications such as Internet banking so that we had clear user-experience insights primarily from synthetic testing.

With Evolgen we have an analytically rich capability that also complements our need for currency in understanding actual changes (for example, in configuration) and how they may impact application

# How Evolgen Blended Analytics Is Helping to Transform IT Efficiency and Value

performance. This capability is agent-based and provides far more granular insights than we might achieve otherwise.

The benefits of our Evolgen investments are substantial. For instance, it used to take 11 weeks to provision a VM, and now it takes eight minutes. We can also have a much cleaner set of change verification histories—so we're not dealing with unknowns when it comes to what's been changed and what's not. This has also helped DevOps and development to see the impacts of what they plan for their manifests to go into production.

## So, DevOps and agile have been a big focus for your move to automation and analytics with Evolgen?

Yes. Automation workflows increasingly cover the process from request to realization, including test and verification. As a result, human intervention/effort is minimized; IT is increasingly standardized (hence IT complexity is reduced); the traditional segregation of operations and development duties becomes obsolete (because it is taken care of in the workflows); velocity is increased; and the margin for human error is reduced. Taking this approach, we have seen double-digit-percentile cost-efficiency improvements over a one to two year period of time, while our time-to-market has drastically decreased.

## EMA Perspective

The above Q&A strongly underscores Evolgen's strengths in working with other IT management investments while adding many dimensions of value as a solution in itself. (For instance, Evolgen does not require a pre-existing CMDB to deliver dimensional values in managing change and change interdependencies.) The levels of currency, automation, and analytic insight are striking in this large, complex, and demanding environment.

In general, Evolgen estimates that its customers can reduce mean time to repair by 50% and extend mean time between failure by 35% as it reduces the volume of problem occurrences. The vendor also highlights its strengths in two areas: DevOps (as substantiated by this interview) and automating audits (where it claims a 75% reduction in manual effort).

These features map well to EMA's vision of how advanced operations analytics for IT should continue to progress across the broader industry. Shown below are four of the key predictions concluding EMA's research report, "The Many Faces of Advanced Operations Analytics."

- A growing number of vendors will create analytic offerings with differing architectures and distinctive value-feature focus.
- We will see greater awareness of and interest in enabling service modeling integrations with analytic investments—including ADDM (more directly) and CMDB/CMS (more indirectly).
- Advanced analytics will increasingly become a stimulus for process awareness and cross-domain process training to support service delivery versus domain-specific activity and communication.
- Advanced analytics will also promote more meaningfully integrated cross-domain relationships, including operations-to-service desk, development-to-IT, security-to-operations-and-development, and IT-to-business.

The fact that Evolgen's Blended Analytics maps well to all four of these predictions not only sets the vendor apart, it also shows how Evolgen is leading the way in making advanced analytics more natively, and more effectively, a part of IT operations overall.

---

Evolgen is leading the way in making advanced analytics more natively, and more effectively, a part of IT operations overall.

---

# How Evolgen Blended Analytics Is Helping to Transform IT Efficiency and Value

## About Evolgen

Evolgen is a recognized IT Operation Analytics (ITOA) leader. Evolgen Blended Analytics solution takes a fresh approach to chronic performance and availability problems, and delivers unparalleled IT operations insights.

Evolgen Blended Analytics collects and analyzes all actual changes, at the most granular level and across the entire IT environment. For a complete cross-silo analysis, Evolgen correlates changes with other operational data already available in the environment (like APM, log, release automation and service desk). Powerful analytics that rely on machine learning, anomaly detection and domain specific heuristics turn this data into actionable insights for slashing mean time to resolution, cutting the number of incidents and improving DevOps and Audit.

Evolgen's customers include leading companies such as: Barclays, Chubb, Deloitte, HP, ING, JPMorganChase, Moody's, Quintiles, VSE Corporation, Western Union and more.

Evolgen was selected by Gartner as a Cool Vendor in IT Operations, and it is also the winner of the Red Herring Top 100 North America, TiE 50 Top Startup, 20 Most Promising Data Center Solution Providers, Banking CIO Outlook and ITOA50 awards.

For more information: [www.evovlen.com](http://www.evovlen.com).

## About Enterprise Management Associates, Inc.

Founded in 1996, Enterprise Management Associates (EMA) is a leading industry analyst firm that provides deep insight across the full spectrum of IT and data management technologies. EMA analysts leverage a unique combination of practical experience, insight into industry best practices, and in-depth knowledge of current and planned vendor solutions to help EMA's clients achieve their goals. Learn more about EMA research, analysis, and consulting services for enterprise line of business users, IT professionals and IT vendors at [www.enterprisemanagement.com](http://www.enterprisemanagement.com) or [blogs.enterprisemanagement.com](http://blogs.enterprisemanagement.com). You can also follow EMA on [Twitter](#), [Facebook](#) or [LinkedIn](#).

This report in whole or in part may not be duplicated, reproduced, stored in a retrieval system or retransmitted without prior written permission of Enterprise Management Associates, Inc. All opinions and estimates herein constitute our judgement as of this date and are subject to change without notice. Product names mentioned herein may be trademarks and/or registered trademarks of their respective companies. "EMA" and "Enterprise Management Associates" are trademarks of Enterprise Management Associates, Inc. in the United States and other countries.

©2015 Enterprise Management Associates, Inc. All Rights Reserved. EMA™, ENTERPRISE MANAGEMENT ASSOCIATES®, and the mobius symbol are registered trademarks or common-law trademarks of Enterprise Management Associates, Inc.

### Corporate Headquarters:

1995 North 57th Court, Suite 120  
Boulder, CO 80301  
Phone: +1 303.543.9500  
Fax: +1 303.543.7687  
[www.enterprisemanagement.com](http://www.enterprisemanagement.com)  
3236.091415