

BPM vendor capability comparison, 2H08

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Through 2H08, we have published new or updated in-depth assessments of BPM technology offerings from seven vendors: Appian, IBM, Lombardi, Oracle, Pegasystems, Software AG and TIBCO. This report provides an overview of the state of the BPM technology market today, explains our approach to assessing BPM technology offerings, and lays out a high-level comparison of the offerings from these seven vendors.

This Vendor Capability Comparison report forms part of a series of reports from MWD which assess vendor offerings in the area of BPM technology – that is, technology-related capabilities which support organisations adopting BPM to design, develop, deploy, monitor and optimise partially- or wholly-automated business processes. More detail on our assessment approach and individual vendors' offerings is provided in other MWD reports: please see the "Further reading" section at the end of this report for details.

See our BPM assessments in context

You can compare all seven of the BPM offerings we currently cover side-by-side against each other, using your own organisation's constraints and requirements to personalise the results, using MWD's interactive online BPM vendor comparison tool. The tool is provided as part of MWD's BPM advisory service.

To see if your organisation is already a subscriber to this service, or to find out more about becoming a subscriber, please visit <http://services.mwdadvisors.com>.

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Summary

At long last, BPM is becoming a mainstream proposition

Clearly, BPM is a growth area for technology vendors. In 2008, all four of the very largest enterprise software suppliers – IBM, Microsoft, Oracle and SAP – have made BPM a central element of their product portfolios and marketing efforts. At the same time, there are a number of “pure-play” BPM technology vendors, each of which can now count over 100 active customers. Nevertheless, in Europe at least, our primary research clearly shows that the market for BPM technology and tools is only just starting to mature.

Diverse supplier backgrounds create a confusing technology landscape

There’s still a great degree of technology diversity under the BPM umbrella – and this can be confusing. In our assessments, rather than grouping vendors based on their heritage, we aim to eliminate the confusion by differentiating them on the basis of the capabilities they offer in support of six real-world “process management scenarios”. We also assess – alongside their support for “core” BPM functionality and the cost of ownership throughout the BPM lifecycle.

In our functionality dimension, scoring is fairly even but pure-play vendors have the edge

Most of the vendors we covered in our 2H08 assessment round are able to deliver strong or very strong capabilities in the core functionality areas. Support for process discovery and requirements analysis is weaker in general, though specialist Lombardi clearly stands out in this respect – with Oracle and Pegasystems also providing many useful facilities. Lombardi’s simulation capabilities also stand out in an area where overall support is variable; and specialist Appian provides the strongest capabilities across the board when it comes to process monitoring and optimisation.

In our scenarios dimension, the biggest vendors have the edge – with one exception

When it comes to which vendors provide the best support across our six process management scenarios, the largest vendors (IBM and Oracle) stand out, primarily because their BPM offerings can be quickly integrated with a range of complementary tools (content management, collaboration, B2B integration, and so on). The other high scorer here is Appian, which holds its own against much bigger vendors in this respect. It scores well due to the very comprehensive capabilities it delivers “out of the box” – all straightforward to access and use because of the inventive way that they’re integrated into the design and monitoring environments.

In our ownership dimension, organically-grown suites are clearly ahead

Our ownership assessment dimension – which examines how vendors’ technologies help minimise the costs of solution development, management and change – favours technology offerings which present their capabilities simply and consistently to business analysts, developers and administrators. Those that sell software suites which have been built “from the ground up” should have an edge, and this is borne out by our work. Software AG scores best here; closely followed by Appian, Lombardi and Pegasystems.



2H08 BPM market overview

At long last, BPM is becoming a mainstream proposition

Business Process Management (BPM) is hardly a new idea, but it's taken a long time to really make inroads beyond leading-edge adopters and into the consciousness of broad swathes of industry. The idea got a significant boost at the beginning of the new millennium, with the publication of a book called "Business Process Management: The Third Wave": this introduced new ideas to the existing concept of Business Process Reengineering (BPR), based on the possibility of using specialised technology to drive a continuous process feedback and optimisation loop.

In 2008, all four of the very largest enterprise software suppliers – IBM, Microsoft, Oracle and SAP – made BPM a central element of their product portfolios and marketing efforts. At the same time, there are a number of "pure-play" BPM technology vendors, each of which can now count over 100 active customers. Clearly, BPM is a growth area for technology vendors. However, despite the current growth in demand for BPM technology and tools, it's not yet the case that BPM is mature. In Europe at least, the level of BPM market development can best be categorised as "just entering the mainstream".

In the summer of 2008 MWD carried out a European process improvement maturity study¹, asking 200 organisations across France, Germany and the UK a range of questions about the kind of process improvement work they're currently doing. The answers demonstrated that although process improvement is an initiative that has a lot of currency in European organisations, there's still little use of specialised tools in process improvement initiatives, and few organisations are really pursuing BPM. Most are much closer to BPR: that is, they appear to be implementing process improvements as "one off, "big bang" activities with little current focus on enabling continuous, incremental process improvement. It's clear that there's still a great deal of growth opportunity in this market.

Diverse supplier backgrounds create a confusing landscape

The principal challenge of anyone looking at BPM technology today and asking "what is it, and what can it do for me?" is that (as is so often the case) the companies making most of the noise about BPM take a perspective which is skewed towards the capabilities of their own offerings. This is a problem, because there are so many different vendors, from so many different backgrounds, wanting a piece of the action. Despite the ongoing maturing of the market for BPM technology and tools, there's still a great degree of technology diversity under the BPM umbrella.

Business-IT collaboration and software-as-a-service delivery are clear vendor focuses

In examining the current plans of many BPM technology vendors, it's clear that two areas are common focuses (and will continue to be so through 2009). The first is the development of tools and environments that provide better support for collaboration between business and IT people in exploring, designing, running and optimising processes. The second is the exploration of the software-as-a-service (SaaS) model for delivering some, or all, of the components of BPM technology offerings. Different vendors are taking different approaches: some are taking their existing "on premise" technologies and delivering them online; others are using the SaaS model for specific tools but not for others; and another vendor group is exploring how the technology aspects of the SaaS model can be applied to on-premise software to make it more scalable and flexible in large, enterprise-wide deployments².

We expect to adjust our assessment criteria in 1H09 to take account of these trends.

Supporting the promise of BPM

We're not short of tools that claim to enable us to build business software solutions that can be deployed and changed quickly, nor are we short of tools that claim to enable non-technologists in business to build software. The promise of BPM may on the surface appear similar to both of these claims, but in reality, it's much more than that – BPM is a transformational tool for business. If organisations are going to realise the potential business value of BPM, technology tools to support BPM must have some key characteristics that take them beyond concepts like “model-driven development”. BPM initiatives have to be able to coordinate activity across many teams, departments, and systems – it's simply not enough for them to be limited to working within one domain. They have to bake analysis, monitoring and measurement of business activity into the act of automating processes. And they have to promote the involvement of business specialists in the process of process management. To be market leaders, BPM technology tools must support all these principles³:

- **Business has to be able to take the driving seat.** BPM initiatives can't just be driven by IT staff; they need to actively involve both business and IT stakeholders if they are to offer real value (and be materially different from today's application software development initiatives). Within each stage of the BPM activity cycle (*understand, implement, monitor, optimise*), tools and practices need to foster this collaboration – and in some parts of the activity cycle business people need to be able to take the driving seat.
- **BPM has to be measurable and justifiable.** BPM tools need to support and demonstrate a business case for their broad deployment by showing how BPM technology and practice drives waste from processes. The only way to do this is to measure process efficiency before the application of BPM; and then measure it after. BPM technology vendors are going to have to find ways to help customers measure process efficiency before large investments are made.
- **BPM needs to support transformation decision-making.** Successful business transformation is about much more than being able to manage processes better. Process change is a product of the decision to make a significant business change. But although process change occurs downstream of a decision to enact business change, BPM initiatives and tools are in a great position to provide input. To do this optimally, though, BPM tools are going to have to enable business people to choose the ways in which they want to instrument processes and receive events or alerts.
- **BPM technology has to be “part of the furniture”.** Another way that BPM can improve its chances of being seeded throughout an organisation is for the “front end” elements of the technology, where processes meet individuals, to be as invisible as possible. Early adopters of BPM tools have by-and-large been content to use technology which specifies its own user interfaces for task lists and task forms. If BPM is to truly become a mainstream proposition, these interfaces will have to be delivered in contexts that individuals are already comfortable with.
- **BPM success needs platforms, not one-off technologies.** The world of business processes is far from straightforward. Some are very stable and predictable; some are unstable and dynamic. Some are highly automated and procedural; others are very collaborative and focused largely on extracting and combining the tacit knowledge held in the brains of key topic experts. MWD bases its BPM technology analysis on six process scenarios where BPM initiatives should be able to add real value (see below). If BPM is to see real success as a transformation tool for business, and drive improvements beyond the confines of departmental implementations, then BPM tools will have to deal with many types of process, each with its own requirements and constraints.
- **Supporting and managing change has to be central.** A key part of the BPM promise is about effectively managing process change. Without this, BPM may prove to be very exciting to both business and IT communities initially, because of how it helps people collaborate to automate processes; but later, as requirement change backlogs build up, disillusionment will set in – on both sides. If BPM is to see real success as a transformation tool for business, then BPM tools are going to have to help IT keep pace with changing business requirements.



Assessing BPM technology offerings

With the above principles in mind, in building our assessment model⁴ we decided that a simple, one-dimensional approach would fail to give prospective technology buyers an incomplete picture. The simple approach would be to assess technology offerings purely on the basis of core functionality required to support the various aspects of the BPM activity cycle. Given the diversity of process management scenarios that are commonly found in enterprises which BPM technologies should be able to address, and given the importance of being able to effectively manage change over long periods through the lifecycle of processes, we elected to use a multi-dimensional assessment model that analyses vendors' offerings from three key perspectives: core functionality, scenario support, and cost of ownership. Figure 1 provides a high-level summary of the key assessment criteria that we use.

Functionality

The **functionality** dimension of our assessment model focuses on essential technology capabilities that will play a valuable role in delivering on the BPM promise, whatever kind of process management scenario is in play.

We assess offerings' capabilities in the following six functional areas: discovery and analysis; design and development; simulation; rules; integration and execution; and monitoring and optimisation.

Scenarios

The **scenarios** dimension of our assessment model focuses on technology capabilities that are particularly important in serving the needs of particular process management scenarios. In some cases, the capabilities that are important to serve one scenario are also required to provide support for another scenario. As a consequence, scores in the scenarios dimension aren't completely independent of each other.

We assess offerings' capabilities in support of the following six process management scenarios: sequential workflow; straight-through processing; case management; content lifecycle management; collaborative process work; value chain participation.

Ownership

The **ownership** dimension of our assessment model focuses primarily on architectural aspects of vendors' offerings, rather than on functional elements. The purpose of this assessment dimension is to highlight the relationship between the way that an offering is designed and built, and the overall cost and effort you'll have to expend in using the technology to support a BPM initiative over time.

We assess offerings' capabilities from three perspectives: the cost of development; the cost of management; and the cost of change.

Other considerations

In selecting a vendor and offering to support your BPM initiative, there may be other very important considerations to explore. There may be elements of your technology environment, supplier management strategy, architecture practice or other IT practices which will make some offerings more appealing than others. Equally, your organisation may have particular requirements regarding the vendors you work with – their viability, their ability to work with you in your geography, their partners, and so on.

Although our published research reports lay out vendor assessments purely along the three dimensions outlined above, the online vendor comparison tool⁵ that we provide as part of our BPM Continuous Advisory Service also includes information related to these other key considerations.



Figure 1: A summary of MWD's BPM technology assessment criteria

Functionality	
Discovery and analysis	What level of richness is there in terms of what can be explored and modelled? How feasible is a truly collaborative approach to discovery and analysis? Can models and documents be easily exported?
Design and development	What features are available to assist use by people with different skillsets? To what extent can you model (not code) different aspects of a BPM implementation, and how rich can your models be? Can models drive the way that process monitoring is configured? What capabilities are available to specifically support our six BPM process scenarios?
Simulation	How well integrated can simulations be into design and development work and tools? How closely can simulations match real-world work environments? How much flexibility is there in interpreting and comparing simulation results?
Rules	What options are available for implementing decisions in processes? How sophisticated can rule sets be? Are there facilities to help manage change? How easy is it to reuse rules?
Integration and execution	What features are available in process model deployment? Does the runtime environment execute and manage processes efficiently and flexibly? Can process structures change dynamically at runtime? How sophisticated are the tools provided to assist the integration of processes with external applications, systems and data sources? What capabilities are available to specifically support our six BPM process scenarios?
Monitoring and optimisation	Can monitoring be carried out in the context of modelled KPIs and/or goals? How is monitoring data stored, managed and exposed for analysis? How open and flexible is the display and publishing of monitoring information? To what extent can information observed from running processes be automatically used to drive process optimisation?
Scenarios	
Sequential workflow	How sophisticated are the tools provided to help with the design and deployment of forms, tasklists, etc? What level of support is there for modelling organisational structures, and having those models influence the way that work is distributed and managed at runtime? Is it possible to report and monitor on performance from an organisational perspective?
Straight-through processing	How easy is it to design processes that will operate with no human intervention? How sophisticated is the support for semi-automated process error-handling? Can the runtime environment scale to meet high-performance, low-latency operational requirements?
Case management	What level of support is there for modelling organisational structures, and having those models influence the way that work is distributed and managed at runtime? Are content/document management facilities provided, or are they easy to integrate? Can process structures be modified dynamically? Is it possible to report and monitor on the performance of cases?
Content lifecycle management	Are content/document management facilities provided, or are they easy to integrate? Is it possible to report and monitor on performance from an organisational perspective?
Collaborative process work	What tools are provided to help specify/configure collaborative work activities that can be seamlessly integrated with structured processes? Are collaboration facilities provided, or are they easy to integrate?
Value chain participation	How easy is it to define organisational models that include external groups, with their own security requirements and permissions? How easy is it to associate different external groups with distinct process variations? How easy is it to provide tailored, secured performance dashboards to external participants?
Ownership	
Cost of development	How clear is the separation of concerns in the design and development environment? How well-integrated are the design and development tools? Where third-party technology is part of the offering, how well-integrated are the design tools with the rest of the toolset?
Cost of management	What features are provided to make the runtime environment straightforward to configure and administer, even in large-scale deployments? Is there a comprehensive set of administration tools? Where third-party technology is part of the offering, how well-integrated is the administration environment?
Cost of change	How clear is the separation of concerns in the design and development environment? What kind of model versioning and change management facilities are provided, both in the design and runtime environments?

The Further resources section at the end of this report highlights the MWD reports where these criteria are explained in more detail.

Vendor overviews and 2H08 comparison

A note about our 2H08 vendor selection

In our 2H08 BPM technology vendor assessment programme, we assessed offerings from Appian, IBM, Lombardi, Oracle, Pegasystems, Software AG and TIBCO. We selected this initial set of vendors based on three factors: their profile in the industry, the technological breadth of their offerings, and the level of ongoing investment they're making in driving their offerings forward. We didn't select vendors based on the technologies they use to build their products, or the specific types of process management scenario they are best suited to supporting.

The vendors compared

Figures 2, 3 and 4 below provide an overview of the strengths and weaknesses of the offerings of the vendors we covered in our 2H08 assessment round – in our functionality, scenarios and ownership dimensions respectively.

Consider our assessments in the context of your own needs and constraints

Figures 2, 3 and 4 below provide a high-level representation of the unweighted scores from our BPM technology vendor assessment database. We strongly advise you to consider these scores in the context of your own constraints and requirements when short listing BPM technology vendors, and weight the scores accordingly. It's very unlikely that these unweighted scores will, by themselves, help you select the vendors that are the best suited to your needs. Advisory service clients can use MWD's interactive online BPM vendor comparison tool to apply filters and weightings to our "raw" scores to obtain a personalised set of vendor rankings.

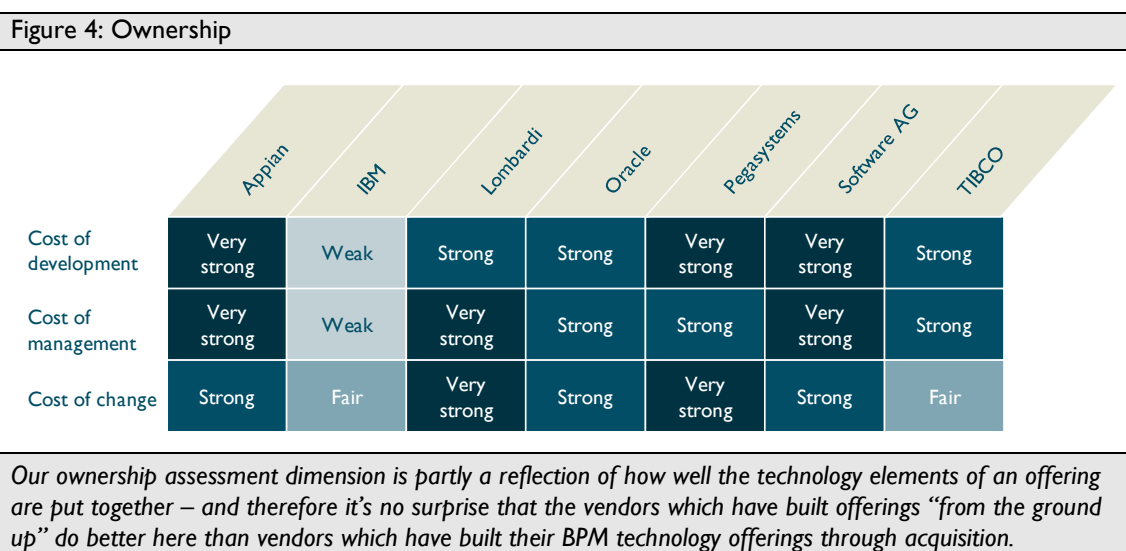
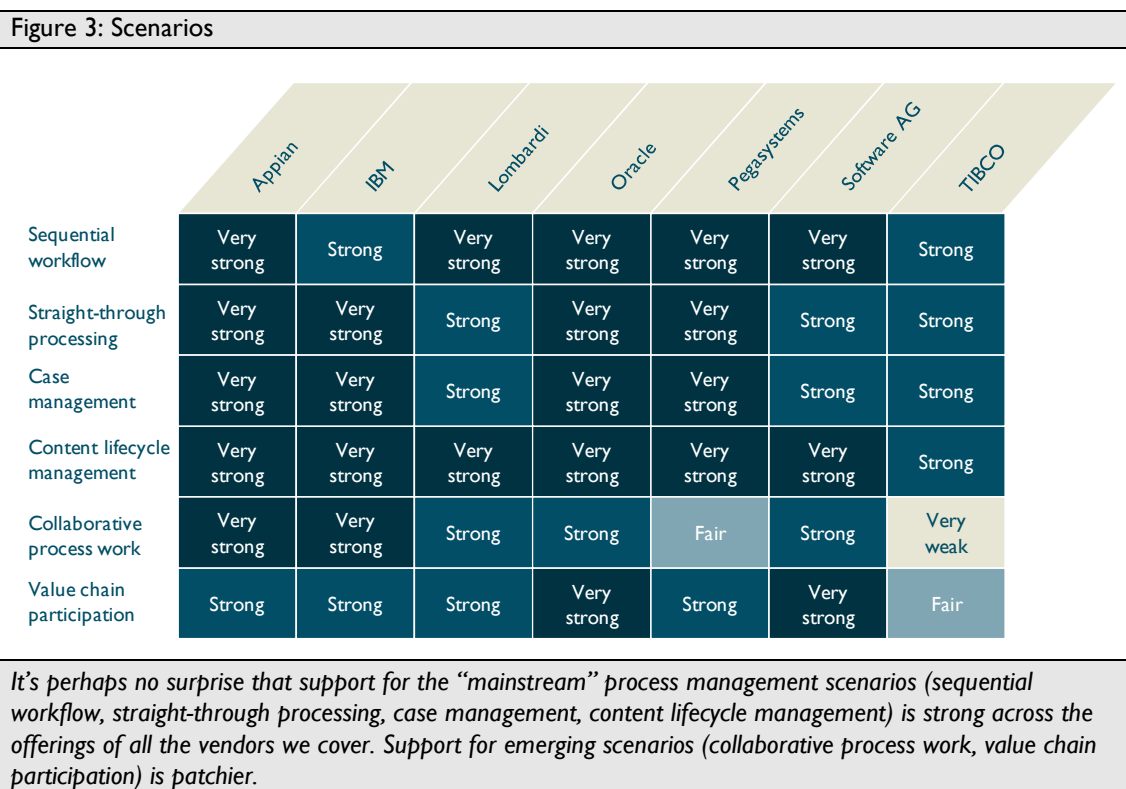
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Figure 2: Functionality

	Appian	IBM	Lombardi	Oracle	Pegasystems	Software AG	TIBCO
Discovery and analysis	Fair	Fair	Very strong	Strong	Strong	Weak	Fair
Design and development	Very strong	Very strong	Very strong	Very strong	Strong	Strong	Very strong
Simulation	Weak	Strong	Very strong	Strong	Fair	Strong	Fair
Rules	Very strong	Very strong	Very strong	Very strong	Very strong	Strong	Strong
Integration and execution	Very strong	Very strong	Strong	Very strong	Strong	Very strong	Strong
Monitoring and optimisation	Very strong	Strong	Strong	Strong	Fair	Strong	Strong

Overall in 2H08 the vendors we assessed performed strongly across the board within our Functionality dimension – with the smaller “pure play” BPM vendors, by and large, offering more functionally-advanced solutions than those of the bigger vendors.





Vendor overviews

Below we provide a brief overview of the strengths and weaknesses of each of the vendors covered in our 2H08 assessment round: Appian⁶, IBM⁷, Lombardi⁸, Oracle⁹, Pegasystems¹⁰, Software AG¹¹ and TIBCO¹².

Appian

Appian is a BPM specialist vendor: its BPM products and services are its core focus. The company was founded in 1999. It currently has around 120 customers, and 160 employees. It's privately-held and consequently doesn't divulge detailed financial results, but has stated that it expects its 2008 financial year to be profitable. Appian focuses its efforts across government and commercial industry sectors, including retail, manufacturing, financial services, service providers, healthcare, and energy. The company opened its first European office in 2007, in London, UK. Appian's BPM technology offering comprises two core products – Appian Enterprise (now on version 5.7) and Appian Anywhere (which is a hosted, but feature-equivalent, version of Appian Enterprise, launched in 2007).

Appian's technology tools and platform together deliver a strong showing across many of the functional areas we consider in our assessment, with particular strengths in design and development; rules; and, most notably, in monitoring and optimisation – where Appian's technology really shines out. Simulation is the one area where Appian's offerings do deliver less than the technologies of its closest competitors (support for discovery and analysis isn't particularly strong, but that's not uncommon in today's vendor offerings as this is a relatively new area of exploration and exploitation).

The technology products are unusual in the broad range of capabilities that they pull together and integrate strongly. Appian Enterprise and Appian Anywhere combine process management, portal, real-time analytics, content management, document management, and collaboration facilities – and deliver all these capabilities on one common platform, with a consistent set of completely web-based design, development and administration tools. Appian has also done something that no other BPM technology vendor has yet pulled off: it has found a way to expose a great many of the technical capabilities implemented in the platform (including in its content management, document management, collaboration tools and so on) directly to process designers – making it possible for non-specialists to quickly define processes that exhibit very sophisticated and dynamic behaviour. The result of all this innovation is an offering that provides strong or very strong support across all of our six process scenarios.

Beyond the functional strengths and weaknesses, which are easy to explore, other real strengths appear as you look under the hood. Appian has worked to deliver a carefully-architected environment where it's not only easy to get started and build process "applications", but where it's also going to be easy to implement process changes over time, while maintaining control of risk.

IBM

IBM has been one of the main providers of process automation technology for more than two decades. For most of that time its focus was on workflow technology (FlowMark and its offspring) – but in the past few years the company has focused its efforts on building a new process management platform within its WebSphere software unit. As IBM's WebSphere brand has grown in extent and maturity, this process management platform has evolved too. It started life very firmly as a toolset for supporting "straight through" application integration procedures – but latterly, as well as linking this technology much more closely to its SOA infrastructure work, IBM has broadened the WebSphere stack's suitability across process scenarios, as well as adding dedicated business process modelling and monitoring tools. Following IBM's acquisition of FileNet in 2006, another process management "stack" was added to the company's product portfolio, and as FileNet has become more completely absorbed into IBM, so the FileNet P8 BPM components have been pulled into a broader BPM proposition.



IBM's two BPM technology stacks are positioned within the BPM Suite today as "Editions", each of which is recommended for different kinds of process management scenario. The WebSphere Dynamic Process Edition is largely positioned as being the better fit for straight-through processing and what we call value chain participation scenarios; the FileNet Active Content Edition is positioned as being the better fit for processes with more human involvement and/or document/content management requirements.

Individually, each BPMS "Edition" today provides solid capabilities in support of the scenarios it's positioned for (and, with version 6.2 of the WebSphere Dynamic Process Edition, there's good support for the majority of our process scenarios). Courtesy of WebSphere Business Modeler, support for process discovery and requirements analysis is better than that provided by many other BPM technology providers, and another clear strong point is the ability of the technology to support large, complex deployments – whether you pursue the WebSphere or the FileNet route. What's more, with version 6.2 of the WebSphere Dynamic Process Edition, the role of the new "Business Space" technology – which provides a common user interface framework through which information and functionality for business managers, process analysts, process participants and administrators are exposed – is expanded, so that Business Space now makes the overall portfolio much more "consumable" for users, as well as enabling some sophisticated process optimisation scenarios.

Where IBM's BPM proposition is less strong today is in support of customers with complex process management and improvement needs which will need technologies from both Editions to be employed. For these customers, until IBM delivers better technology integration across the piece, IBM's portfolio will offer broad and deep functionality, but it will be at the expense of some technology complexity, duplication and cost – though this is improving, release by release.

Lombardi

Lombardi Software is a BPM specialist vendor and its flagship products – Teamworks and Blueprint – are the company's core focus. It was founded in 2000 and now has around 175 Global 2000 customers and around 200 employees. It's a privately owned and venture-funded company and so doesn't publicly report its financial performance, but it claims that it is profitable. Lombardi focuses most of its efforts in nine industry sectors: energy, financial services, government, healthcare, insurance, life sciences, manufacturing, retail and telecommunications. The company is currently expanding in Europe after having first opened European offices in 2005.

Teamworks delivers a set of tools that provide a strong degree of functional capabilities across the board - from process design and development through simulation, deployment, runtime administration to operational process monitoring and analytics. Teamworks' simulation capability is particularly noteworthy. The well-integrated toolset helps foster continuity through the BPM activity cycle, with a common runtime platform. Blueprint adds more interest because it's unusual in two respects: firstly, it's a product focused exclusively on providing process discovery and analysis capabilities, that allows disparate teams to collaborate in exploring BPM requirements and priorities; and secondly, it's only available as a hosted, online service. Advanced design, runtime and dashboarding capabilities (many of which are also available through Teamworks for Organizational Management, Teamworks for Office and Teamworks for SharePoint) can together provide a firm technology foundation for BPM implementations, across all of our six types of process scenario.

There are of course some areas where Lombardi's technology could be improved. The most obvious is in its support for integrating processes with external applications, systems and data sources (Teamworks includes a basic connector framework and several out-of-the-box adapters for integrations). Lombardi has fledgling partnerships with Progress (Sonic) Software and iWay Software to bring their ESBs together with Teamworks in order to improve its integration story, but there's currently more work to be done to make interworking of the technologies as seamless as it could be. What's more, the ESB technology isn't embedded in Lombardi's offering – you have to have a separate vendor relationship and contract with Progress or iWay to get it. In addition, Teamworks could provide more sophisticated information modelling capabilities at design time, which would improve your ability to implement enterprise-wide BPM initiatives that take consistent approaches to the use and management of business information.



Oracle

Although it was not often called out, one of the strongest technology elements that Oracle brought on board when it acquired BEA Systems in 2008 was BEA's BPM technology offering. Now marketed as Oracle BPM (OBPM for short), this technology offering now forms the backbone of Oracle's BPM Suite – which plays a strategic role in Oracle's continued Fusion Middleware market push, and also forms a keystone of the Fusion Applications development roadmap. Since the acquisition of BEA, Oracle has taken the OBPM product and bundled it with a number of its pre-existing integration and process improvement technologies – Oracle BPEL Process Manager, Oracle Business Activity Monitoring (BAM), and Oracle Business Rules; together with the WebCenter Suite.

From the perspective of functional capabilities OBPM's strongest suits are design and development, integration and execution. The richness of its design tools and the structure and flexibility of the underlying models make for an environment that is easy-to-use at a high level, yet very powerful when needs demand and also likely to deliver consistent productivity in the face of continued change. OBPM is also more open than most BPM technology offerings, with support for technology standards a key feature of most elements of the suite. There's also consistently strong support for all the six process management scenarios we consider, due in part to the very flexible nature of the runtime engine and in part to the engineered integration with the collaboration and content management facilities provided through Oracle's WebCenter Suite and the Oracle Service Bus. There are some weaknesses of course. In particular, facilities to help with design-time change management could be better.

Pegasystems

Pegasystems is a specialist BPM technology vendor with an unusually long heritage: it was founded in 1983. It currently has around 120 customers and 650 employees. It's publicly traded: for its last fiscal year (ended December 2007) it reported revenue of around \$160m, and it is currently profitable. Pegasystems started life focusing primarily on selling rules-based software development tools to the financial services sector, but has since expanded to also focus on cross-industry call centre solutions – and most recently, selling its BPM technology platform, PegaRules Process Commander (PRPC), to a variety of industries – including healthcare and insurance. PRPC is now bundled as the core element of a broader BPM offering called the SmartBPM Suite – which extends PRPC with a simulation engine, a historical process analysis engine, and a set of additional technology administration tools.

The SmartBPM Suite delivers a strong showing across many of the functional areas we consider in our assessment, particularly in design and development; and (not surprisingly) rules. A key construct in the way that PRPC applications are put together, “declarative rules”, enable highly sophisticated, dynamic, event-based behaviour – where, dependent on context, the flow of work can be shaped to take highly customised paths through different assignments and activities. Support for most of our six process management scenarios is very strong, with the exception of collaborative process work (where support is fair). Simulation is one area where the tools need to be improved if Pegasystems wants to deliver market-leading functionality; and although the monitoring tools provided are solid and enable administrators to keep on top of performance trends and recommend changes, there's little current tool support for those wanting to pursue more “closed-loop” process optimisation.

Software AG

Software AG has offered BPM technology for some years, primarily through a partnership with Japan's Fujitsu Software; but, in 2007, its acquisition of webMethods changed the picture significantly. With the webMethods technology and people on board, Software AG is now able to offer a broad and deep portfolio of BPM technologies that are almost completely under its control. The webMethods brand has been retained by Software AG and is now the home of Software AG's BPM, SOA and Application Modernization offerings. Alongside the webMethods business, Software AG also continues to service its “heritage” businesses in application development (with Natural) and data management (with Adabas). Software AG now positions itself as “the world's largest independent provider of Business Infrastructure Software”. It emphasises not only its ability to deliver technology and tools to customers, but also industry expertise and best practice consulting offerings.



The Software AG technology offering is particularly functionally strong in the areas of rules management, process integration and execution, and process monitoring and optimisation. The richness and flexibility offered in the webMethods Designer, coupled with the capabilities of the Task Engine and My webMethods Server, provide an environment that is particularly strong in its support of process scenarios where human process participants are a significant element in the mix, as well as being strong in support of straight-through processing and value chain participation scenarios. What's also particularly noteworthy about the webMethods BPMS is that the way the technology pieces are put together reflects a mature approach to product and technology architecture – and the end result is very likely to be a major positive impact on the cost of development, management and change in your BPM initiative.

There are some weaknesses, of course. Although the design tools offer a degree of flexibility when it comes to designing processes that need to exhibit dynamic behaviour at runtime, more could be done, and the same is true when it comes to designing processes that need to interleave with collaborative work practices. Also, currently, the webMethods BPMS offers some content and document management facilities through the My webMethods Server portal infrastructure, but support for third-party systems could be made a more explicit part of the design environment.

TIBCO

TIBCO is a rare beast in the crowded BPM technology market: a large independent enterprise infrastructure software provider that isn't a BPM-only specialist (the only other is Software AG). The company has a long history of providing integration software that offered some process co-ordination capabilities, but it only started delivering a focused BPM offering when it bought UK-based Staffware in 2004. Now BPM is one of four strategic focus areas for TIBCO (with the others being SOA, Master Data Management, and "Business Optimisation"). Staffware technology formed the backbone of what is now known as the iProcess Suite, which is TIBCO's BPM technology offering. The Staffware technology has been significantly reworked, and complemented by a range of other technologies, both developed internally within TIBCO and licensed from third parties.

Drawing on the current integration points between the various technology components in the BPM offering and TIBCO's other technologies (particularly its ActiveMatrix ESB, ActiveMatrix BusinessWorks application integration platform and Complex Event Processing infrastructure), the company pitches its technology approach as enabling what it calls "BPM+". The BPM+ label is designed to showcase the breadth and depth of functionality that TIBCO can offer to customers pursuing BPM initiatives. To a large extent, MWD's assessment of the iProcess Suite bears out TIBCO's claim. Some of the suite's capabilities – particularly, its support for highly dynamic processes, goal-based process execution and process analytics – are very strong.

With the v11 release, the iProcess Suite has moved on from the transitional stage that was evident when we last assessed the offering in April 2008. The release of version 3.0 of the modelling toolset, Business Studio, removes the need for customers' design and development efforts to straddle both Business Studio and iProcess Modeler. This is a significant improvement in terms of comprehensibility and integration across the suite. Products licensed from third parties (iProcess Decisions and iProcess Analytics) remain in place and remain less well-integrated with the rest of the tools and the runtime environment than they might be, however.

If TIBCO is to be able to continue to move forward in delivering on its "BPM+" promise, it will have to go further with the functionality on offer. At the moment the lack of design-time support for collaborative process work, and processes requiring the integration of content or document management functionality, means that delivering strong support for some key BPM process scenarios requires more programming than is ideal – and these are areas where other vendors are forging ahead. There could also be more support for value chain participation scenarios within the design-time tooling.



Further resources

Below are some references to other MWD reports and tools that you might find useful in your exploration of BPM technology offerings. Most of the resources below are freely-available through our Guest Pass library (free registration is required); although a few are restricted to our fee-paying advisory service customers.

- [1] **A picture of BPM practice in Europe, 1H08** – July 2008.
<http://www.mwdadvisors.com/articles/detail.php?id=126>. Available to advisory service customers only.
- [2] **What role should SaaS play in your BPM strategy?** – November 2008.
<http://www.mwdadvisors.com/articles/detail.php?id=137>. Available to advisory service customers only.
- [3] **What drives BPM technology requirements?** – April 2008.
<http://www.mwdadvisors.com/articles/detail.php?id=106>. Freely available through our Guest Pass library.
- [4] **Assessing BPM technology** – April 2008.
<http://www.mwdadvisors.com/articles/detail.php?id=107>. Freely available through our Guest Pass library.
- [5] **Online BPM vendor comparison tool** – updated December 2008.
http://services.mwdadvisors.com/bpm/comparison_home.php. Available to advisory service customers only.
- [6] **BPM technology: Appian** – December 2008.
<http://www.mwdadvisors.com/articles/detail.php?id=113>. Freely available through our Guest Pass library.
- [7] **BPM technology: IBM** – December 2008.
<http://www.mwdadvisors.com/articles/detail.php?id=118>. Freely available through our Guest Pass library.
- [8] **BPM technology: Lombardi** – December 2008.
<http://www.mwdadvisors.com/articles/detail.php?id=109>. Freely available through our Guest Pass library.
- [9] **BPM technology: Oracle** – December 2008.
<http://www.mwdadvisors.com/articles/detail.php?id=108>. Freely available through our Guest Pass library.
- [10] **BPM technology: Pegasystems** – December 2008.
<http://www.mwdadvisors.com/articles/detail.php?id=138>. Freely available through our Guest Pass library.
- [11] **BPM technology: Software AG** – December 2008.
<http://www.mwdadvisors.com/articles/detail.php?id=110>. Freely available through our Guest Pass library.
- [12] **BPM technology: TIBCO** – December 2008.
<http://www.mwdadvisors.com/articles/detail.php?id=111>. Freely available through our Guest Pass library.

