planview®

The COMPLETE Agile Software Buying Guide:

Criteria for Team, Program, and Portfolio Level Solutions

The Age of Disruption

Regardless of the industry, several key market trends are impacting all enterprises today. Considered by some as the Fourth Industrial Revolution, extraordinary advancements in the ways people connect, sense, respond, and interact with data are changing everything about how we conduct business. As a result, customers are becoming accustomed to interacting with new technologies and getting immediate results to fulfill their needs. For the modern business to survive and thrive today, they need to embrace disruption and change their pace of innovation or risk being left behind by newer, more fast-paced startups.

In order for companies to deliver solutions to customers faster, with more predictability, enterprise agility is key. But, for most, this aim is illusive. To fully achieve it means changing processes, people and technology to improve collaboration and an organization's ability to execute against its strategy.

"Decision-makers are too often caught in traditional, linear (and non-disruptive) thinking or too absorbed by immediate concerns to think strategically about the forces of disruption and innovation shaping our future."

– Professor Klaus Schwab, Founder and Executive Chairman of the World Economic Forum, *The Fourth Industrial Revolution*

Process: **Why Lean and Agile?**

No longer a new fad, Lean and Agile practices continue to show strong growth among organizations of all shapes and sizes. Businesses are recognizing the value of adopting practices that enable their entire organization to better align around key business objectives and priorities, while shortening delivery cycles and speeding time to market.

Lean and Agile methodologies allow businesses to optimize their entire value chain and roll out products and services that deliver value to customers when, where, and how they want it. While Lean and Agile practices may sound like the way to go, they do require significant operational, as well as mental, changes. Where that starts is with a culture shift.

People: **Changing the Status Quo**

A common reason cited for Agile transformation failure is the inability to make an enterprise-wide culture change. Successful Agile adoption and implementation at any level of an organization requires people to think, act, and respond differently. This includes everything from how work is planned, managed, and completed, to how employees are engaged during the shift. For organizations to adopt new ways of working and supporting software, change must be driven from the highest levels of the organization. Therefore, it is imperative for leaders to understand the Lean and Agile mindset before attempting Agile at scale or a large-scale Agile transformation effort.

A Lean and Agile mindset prioritizes value, flow, and continuous improvement over milestones and requirements. This shift is important for how work is approached and completed, which includes introducing and embracing the concepts of failing fast and adapting quickly to promote ongoing learning.

With this culture shift embraced, organizations are better equipped to recognize and select their first or next Agile software solution.

Technology: **Enabling Agility**

A solid technology solution enables organizations to adopt and embrace Lean-Agile practices, scale Agile beyond teams, prioritize the right things, reduce wasted efforts, and quickly respond to dynamic markets.

Choosing the right Agile software solution depends on where your organization is on its journey to becoming a Lean-Agile enterprise. Whether you are just starting your Agile journey at the team-level, scaling Agile and implementing Agile Program Management at the program level, or stepping up your portfolio practices with a Lean approach, this guide provides the basic selection criteria to help your organization understand what it needs to grow and thrive at each stage of the journey.

Choosing a Solution for Your Stage of the Journey

TEAM-LEVEL AGILE

The adoption of Lean and Agile ways of working often begins in small groups, predominantly within software development and IT teams. Though these teams may face top-down pressures that influence what they work on, how they work is largely up to them.

At this level, needs for prioritizing work, coordinating activities, managing capacity and dependencies, as well as analyzing performance for continuous improvement, drives their adoption of team-level tool sets and technologies. Testing Agile and Lean software solutions can be a great first step toward broader adoption of these practices but be sure to keep your goals front and center and choose a technology that supports the way your team will work. Are you focused on project work or more process-oriented work? It is important for your teams and the broader organization to visually understand how work is interrelated and connected? Asking yourself and your team some of these questions will help you pinpoint the right solution for where you are today, and where your organization plans to go in the future.

For many, the conversations spurred from these questions leads them to Kanban Software.

AGILE TEAM SOLUTION ESSENTIALS

Enterprise Kanban

Whether your fledgling teams decide to practice Scrum, Scrumban, or Kanban, Kanban software offers a visual way to measure team progress, identify opportunities to increase workflow and throughput, as well as offer a great foundation for continuous learning and improvement.

Kanban solutions provide the necessary flexibility needed for teams (business and technology teams) to plan, coordinate, and execute their work. The visual nature of Kanban boards provide leadership with insight into the value delivered, and the progress of work along the way to delivery. Inclusive of any methodology or process, teams can visually map their workflow, improve their processes, and align work to the organization's strategic initiatives.

CAPABILITIES TO CONSIDER:

- Ability to use different Agile methodologies and processes without forcing a commitment to a one-size-fits all approach to doing work

- Configurability to change team processes and tool usage as teams mature, continuously adapting workflows as needed

- Customizable card types and tags for identifying, tracking and managing different types or sizes of work

- Access to user-friendly metrics dashboards to promote continuous learning and workflow optimization

PROGRAM-LEVEL AGILE

After an organization has adopted Agile at the team-level, a desire to scale to more teams emerges. Usually, this desire is spawned from leadership's notice and recognition of the productivity increases from the individual high-performing Agile teams. However, scaling Agile is more complex than adding teams and expecting instant delivery success.

When an Agile initiative grows without proper guidance, a disconnect tends to emerge between the way Agile teams form and operate, and the way projects are executed within the organization. In order to scale Agile successfully, there needs to be a better (read: more Agile) way to manage the work of interrelated teams.

Without the focus on managing the teams as a cohesive "unit", organizations find themselves with disconnected, disparate teams that deliver more, but deliver more in silos. This is sometimes referred to as horizontal scaling. Horizontal scaling happens when new Agile "project" teams are created to deliver specific projects. This perpetuates the existence of islands or pockets of Agile resulting in work that is disconnected from the goals of the broader organization.

To get the multiplier effect of increased productivity, performance, reliability and velocity that are benefits of Agile at scale, Agile teams must be coordinated and aligned toward a common purpose.

The first step toward coordination and alignment may be connecting the disparate teams (those islands of Agile) with a common tool. This doesn't mean asking developers or team members to switch delivery tools, rather it implies that leadership should think about how to connect and view the data from disparate development tools in a common format. This gives the development teams and leaders a way to see the Agile work that is happening across the business. From here, teams are better equipped to plan work together. This is where **Agile Program Management Software** comes into play.

Agile Program Management

Agile Program Management is the practice of managing, planning and coordinating across Agile teams. Implementing Agile Program Management will align teams to a process and planning structure, allowing all Agile teams to work together toward the achievement of key strategic objectives.

Agile Program Management is a key component to any successful Agile scaling effort. Implemented with the right solution to support it, Agile Program Management should provide necessary visibility at the team of teams (program or Agile Release Train) level for product owners and portfolio managers to see status and progress at-a-glance, and manage cross-team dependencies, capacity issues, and other delivery trade-offs. All of these are critical pieces required for organized value delivery.

For those organizations seeking software capabilities for scaling Agile delivery and Agile Program Management, the next section provides the essential criteria for these solutions.

Facilitate Quarterly or Program Increment Planning

Coordination throughout an enterprise should promote the inclusion of people from multiple functions, either across the entire business (end-to-end value stream) or within a department (Development and Operations). People and teams need opportunities to create alignment, coordination, and roadmaps for success. A Program Increment or Quarterly planning event is where teams of teams or Agile Release Trains build plans that deliver against corporate goals and highlight potential dependencies and risks to delivering value.

Facilitating a planning event does not require teams to be in the same tool, however, it certainly helps when they are. If teams are using different Agile execution tools, look for a solution that can manage connecting the tools and coordinating the teams visually. Visualization solutions allow teams to better understand the correlation, sequencing and dependencies of interrelated work items.

CAPABILITIES TO CONSIDER:

- A visual way to show the connection of business themes, vision, context, and established key business priorities to Agile teams

- The ability to live-plan capacity against features and stories during PI or Quarterly Planning

- Clear mapping of cross-team dependencies to help teams identify delivery risks

- Seamless integration capabilities for teams using different tools and methodologies to connect and collaborate without changing the way they currently work
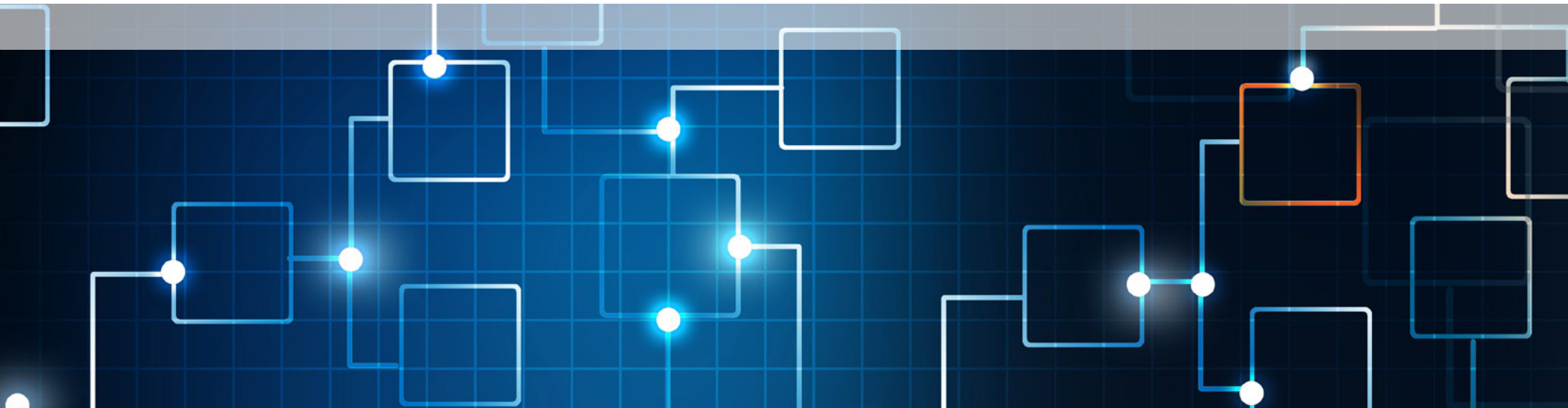
Capacity Planning and Management

The ability to facilitate Quarterly planning goes hand in hand with capacity planning. The best practice is to refocus and reevaluate capacity on a quarterly basis, ahead of Quarterly or PI planning. As pre-work to Quarterly Planning, management reviews the data available to them (ROI or early indicator information) to reflect and rebalance capacity based on the metrics. That information is surfaced in the Quarterly Planning event should it be necessary to reallocate capacity to different initiatives of higher value.

CAPABILITIES TO CONSIDER:

- Ability to plan team, release train, and value stream capacity against epic, feature, and story backlogs

- A way to balance capacity and demand by team, skill, location, and other factors

- Trade-off scenario functionality to evaluate capacity and prioritization pivots based on business and organizational impacts

- Visualization of capacity issues based on work in progress (WIP) limits or work sizing

Cross-team Dependency Management and Visibility

Teams are the lifeblood of scaling Agile across an organization. However, for Agile teams to successfully deliver their committed work, they need a way to stay aligned to strategic objectives and anticipate, understand, and manage workflows between each other. Scaling Agile success requires solution functionality geared to improve collaboration, keep information flowing between teams, and speed delivery across the business.

CAPABILITIES TO CONSIDER:

- Connectivity to the work of disparate Agile teams and a shared view of that work using enterprise Kanban boards

- Centralized and connected boards to synchronize planning and promote coordination, deconstruct epics and features, and highlight dependencies between teams

- A solution that helps teams reduce the complexity of delivery processes across multiple teams and tools by exposing critical issues and opportunities for improvement

AGILE PROGRAM MANAGEMENT SOLUTION ESSENTIALS

Real-time, Reliable Data

By investing in the right technology to support Agile at scale and Agile Program Management, organizations can bridge the strategy to delivery chasm and understand the impact of their work. Availability of real-time, reliable data enables all parts of an Agile team, release train and value stream to understand how their work matters and contributes to the bottom line.

CAPABILITIES TO CONSIDER:

- Easy to use dashboards to track the progress of single Agile team to many teams of teams (Agile Release Trains)

- The functionality to easily adjust or reprioritize work based on metrics and analysis reviewed

- Access to historical and predictive analytics to gauge timing and probability of work completion

PORTFOLIO-LEVEL AGILE

Quarterly planning is a core ceremony to align teams and Agile Release Trains to business priorities. However, if an organization's initiatives are still failing, there may be an issue with how prioritization and funding are determined at the portfolio level. Driving alignment across the Agile teams with strong Agile Program Management practices will often shine a light on obstacles preventing the achievement of key strategic objectives. To scale beyond Agile Program Management, organizations need to examine their portfolio practices to achieve the next phase of enterprise agility.

The disconnect between strategy and delivery often occurs from a lack of synchronization between the portfolio and the delivery teams. The misalignment happens because, even in the most Agile organizations, business funding and key priorities are only primarily determined once a year during annual planning. This planning session sets the direction for the organization and the portfolio.

While this approach may have worked historically, it's an inflexible model that doesn't support the dynamic adjustments required to truly realize the benefits of Agile program delivery. Realignment to the portfolio is needed to provide additional funding and capacity to the areas of the business that are yielding above average results. Conversely, alignment is also used to recalibrate funding and capacity when results are suboptimal. Agile teams or groups operate by agreeing on a collection of work in Program Increment (PI) or Quarterly planning, delivering value against their plan incrementally, thereafter. An Agile delivery groups' charter is to continuously plan and deliver, garnering feedback from each iteration of value delivery. If the Agile Release Trains or program teams do not have the opportunity to readjust plans or dollars across other teams of teams or value streams, innovation and productivity could stall, resulting in missed opportunities.

This need for more frequent feedback and alignment is a sharp contrast to how portfolios are traditionally planned and funded (think back to those annual planning meetings!). Agile teams need incremental funding (both dollars and capacity) as well as ongoing feedback to support mid-course adjustments to plans, should the market or customers indicate or dictate a change. To remedy this planning and delivery clash, organizations are exploring Lean-Agile planning and funding approaches with Lean Portfolio Management.

Lean Portfolio Management

Lean Portfolio Management helps organizations transform their business by rearchitecting planning and funding processes to iteratively and continuously deliver on desired business outcomes. Part of this shift includes thinking about planning and funding in terms of value streams that align to the portfolio. By creating value streams aligned to products or specific areas of the business, enterprise leaders can focus on business areas with the highest opportunity (or most persistent demand), evaluate investments more effectively, and tune delivery to meet customer needs. A value stream construct houses the many Agile Release Trains (teams of teams) and Agile teams that support portfolio objectives. By organizing Agile Release Trains and teams into value streams, coordination and alignment can be more easily shared.

Once the organization understands the value streams in play, management grants dollars to them incrementally based on desired outcomes rather than specific functional requirements. The value stream leaders have the ultimate discretion on how to best align to the organization's goals and satisfy specific objectives within a particular delivery window. Part of this funding process means that value streams, and the Agile Release Trains and subsequent teams that are part of those trains, get necessary funding and direction to pause, pivot or persistent current or future plans. And this synchronization happens semi-annually or quarterly to ensure the business is meeting or exceeding those projected outcomes.

A **value stream** is defined as an end-to-end business process and the associated steps an organization takes to deliver customer value.

It is also defined as a line of business that delivers value, typically a product or solution, to a customer. As organizations evolve, the shape of their value streams often evolves, too.

A benefit of Lean Portfolio Management is the reduction of exposure associated with longer cycle planning and funding models. By funding value streams in a more incremental fashion, the organization reduces potential financial risk by issuing smaller chunks of funding at a time. These small allocations of funding enable organizations to build enough value to test their deliverables against market and customer conditions, effectively producing stronger, more well-suited products and services for the marketplace.

For organizations needing to bridge between Agile Program Management and Lean Portfolio Management practices, the next section provides valuable insights into the essential criteria for such solutions.

LEAN PORTFOLIO MANAGEMENT SOLUTION ESSENTIALS

Strategically Align the Entire Enterprise

As organizations evolve, the way they plan, fund and deliver value evolves too. By taking a Lean-Agile approach to planning and funding with Lean Portfolio Management, organizations create a way to focus and deliver the organization's strategic objectives in a more continuous and iterative fashion. Organizing around value streams aligns delivery teams and associated funding to what produces the best value for customers. This alignment and continuous planning approach foster a focus on outcomes and creates transparency and cross-team coordination, giving the entire enterprise a purpose and goal to drive faster response times and to quickly pivot if priorities or the market shifts.

CAPABILITIES TO CONSIDER:

- Support for the architecture and enablement of Lean Portfolio Management capabilities, providing a single view into demand management, capacity planning, iterative funding, and Agile delivery

- An enterprise-level solution that allows you to build strategic plans to translate key objectives and outcomes into roadmaps

- The ability to leverage enterprise Kanban boards and boards of boards to visualize the progress and relationships between high-level goals, business milestones, and initiatives

- Capabilities to roll up status across the entire enterprise, without interrupting the delivery teams, to understand how work is mapping and delivering to strategic objectives

Enable Enterprise-wide Visibility

Understanding how work is connected to corporate objectives is not just an Agile phenomenon. Visibility is important for any and all work happening across the enterprise – traditional project work, Agile work, as well as hybrid or blended work styles. As organizations move through the stages and phases of transformation, it is critical to find a solution that enables your organization to visualize portfolios of work, regardless of the delivery methodology utilized.

Equally important is finding a solution that highlights bottlenecks and impediments, reveals opportunities to reallocate budget and capacity, and pinpoints areas to adjust priorities when needed. If organizational priorities pivot, leadership must have a method for evaluating where to shift teams, how to manage business impacts downstream, and understand the financial impact of alternatives. Some capabilities to consider are listed below.

CAPABILITIES TO CONSIDER:

- The coexistence and co-creation of planning and funding across traditional and Agile portfolios

- Support for the mapping strategic plans down to the delivery teams, and rolling the work, impact, and financial contributions up to the strategic objectives

- A system that gives leadership a view into portfolio and value stream success to determine where business opportunities lie based on priority rankings, performance metrics, and investment/ funding ROI

Fund the Value Streams that Matter Most

When funding is aligned to value streams, organizations allocate dollars to areas of the business that have the potential to deliver or greatly improve value delivery. Organizations grant funds to value streams leaders to determine how to best achieve the defined strategic objectives. Future funding decisions are made by evaluating associated KPIs, not the completion of the deliverables (as in traditional project delivery).

CAPABILITIES TO CONSIDER:

- A system that can break down strategic objectives into actionable work and fund value streams accordingly

- A prioritization and ranking mechanism to determine which epics to pursue based on potential business impact, alternatives, and trade-offs

- The ability to analyze past spending by value stream and then dynamically adjust future funding based on go-forward priorities

- Easy to understand dashboards to measure progress and value delivered to identify funding and capacity balancing needs based on internal and external factors

Reporting and Analytics for All Levels of the Organization

Realizing the benefits of connecting strategy with delivery would be incomplete without reporting and analytics. Data empowers all parts of the organization to make critical decisions. Most importantly, the data should be accessible by the different stakeholders that need it, based on what they need to see the most. This includes reporting and analytics for understanding outcomes, investments, performance, capacity and even understanding how Agile team costs are capitalized and evaluated.

CAPABILITIES TO CONSIDER:

- Configurable reporting features and dashboards to track the progress of current value stream delivery, investments to outcomes, funding, and other ROI measurements

- A solution that shows if value stream funding needs to be reprioritized based on strategic goals and objectives

- The ability to visualize performance and identify areas for organizational improvement, including mapping forecasts to actuals in real-time

- An automated solution for the capture and capitalization of Agile team costs

Evaluating Your Options

Regardless of where your organization is on its Agile journey, the solution you choose should create a collaborative and coordinated approach to planning across all levels of the enterprise. Ideally, providing visibility into work-in-progress, cross-team dependencies, performance metrics as well as insight into multiple types of information (team, status, financials) for different stakeholders and their desired view.

The solution should also support collaborative, in-platform capacity and scenario planning capabilities, allowing leadership to create what-if scenarios that show how funding, capacity, and delivery are impacted when things change within your business. Additionally, seek a solution to help connect your business and serve as a bridge between your execution teams and your strategic portfolios.

With clear insights into how your organization is delivering against your desired business outcomes, your organization will be more equipped to tackle challenges and welcome opportunities.


How to determine the right solution for your organization?

Not all solutions are created equally. Save yourself some time by determining what are the must-have capabilities versus those that are nice to have. Think about where your business is on its transformation journey, and ask yourself some of these questions to get started with vendor analysis:

- Do you need to bridge a disconnect between your Agile teams and your portfolio?

- Would you like to understand how value streams, Agile Release Trains and teams are impacting your bottom line?

- Is it important to be able to model trade-offs to costs, capacity and funding before making a major business decision?

- Would you like your Agile teams to connect and coordinate without forcing them into a new tool or process?

- Would you like to enable your business to pivot and fund faster?

- Is it important to see traditional projects and Agile work within the same solution?

On the next page is a solution purchase worksheet. Use the table to begin your evaluation of solutions and/or providers and remember this is your transformation. Find a solution that enables your organization to transform on your terms and at your own pace.
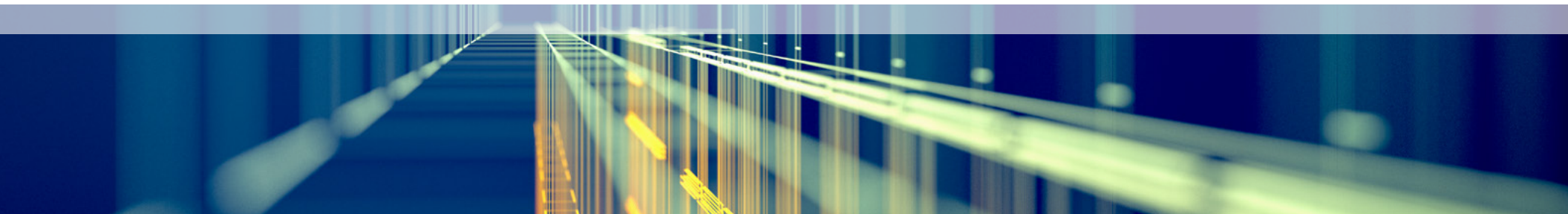
AGILE SOFTWARE SOLUTION PURCHASE WORKSHEET

Use the following purchase worksheet to compare vendors and find the one that is best suited for your organization.

Questions	Solution 1	Solution 2	Solution 3
Does the solution support team, program, and portfolio-level planning?			
Does the solution support multiple work delivery methods: Traditional, Agile or a blend of both ways of working?			
Does the solution provide seamless Agile tool integrations without requiring workflow changes or data hierarchy standardization?			
Does the solution offer a way to capitalize Agile development costs?			
Does the solution support Lean Portfolio Management, traditional Project Portfolio management, or a combination of both?			
Does the solution provide an easy way to roll up financials across the enterprise to track and manage time-phased budgets and forecasts?			
Does the solution support the ability to manage individual and team-level capacity?			
Does the solution offer a way to model trade-offs, rank priorities, and compare value scenarios?			
Does the solution let you see strategic objectives and how they are broken down from epic to feature to user story?			
Does the solution have built-in dashboards and analytics as well as support the use of BI tools like Power BI out-of-the-box?			
Does the solution help you visually track and manage dependencies spanning multiple teams, programs, and portfolios?			
Does the solution support different Agile methodologies: Scrum, Kanban, Scrumban, etc.?			
Does the solution support the use of Enterprise Agile frameworks like SAFe®, DA, LeSS? Does it allow you to mix methodologies?			
Is the solution highly flexible, configurable and easy to use?			
Is ongoing training and support available after implementation?			

ABOUT PLANVIEW'S ENTERPRISE AGILE PLANNING SOLUTION

Planview's Enterprise Agile Planning solution provides a scalable enterprise-level Lean Portfolio Management, Agile Program Management and Agile delivery platform that supports organizations from strategy to delivery, no matter where they are on their transformation journey. Plan and fund both Lean-Agile and traditional portfolios in a single platform for strategically aligned, outcome driven plans. The Planview Enterprise Agile Planning solution empowers organizations to deliver the value that matters most while transforming on their terms and timeline.
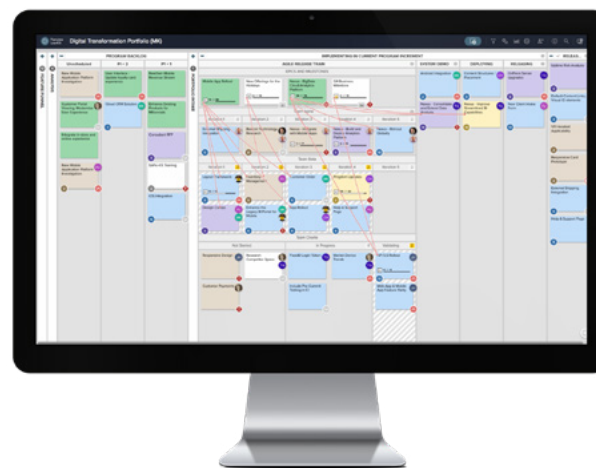
For more information please watch the **Enterprise Agile Planning solution demo** or visit us at **Planview.com/enterprise-agile-planning**

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